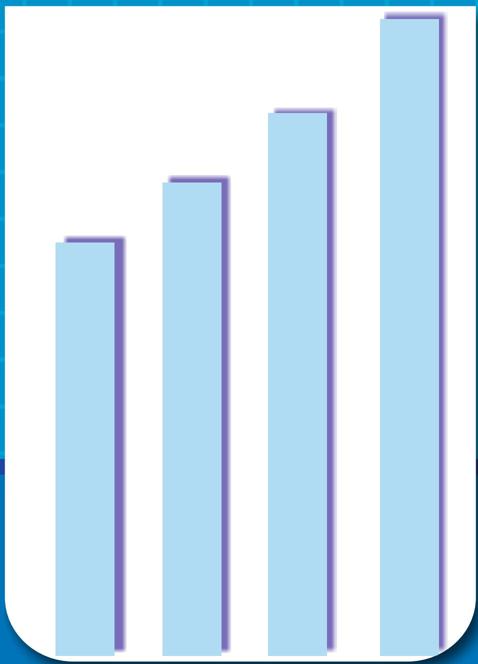
Class 12



Accountancy

Class 12
Accountancy

Accountancy

Class - XII

Board of Secondary Education Rajasthan, Ajmer

Text Book Preparation Committee

Accountancy

Class - XII

Convener :

Dr. Radheyshyam Agrawal
Ex-Joint Director,
College Education Rajasthan, Jaipur

Writers :

Prof. G. Soral
Dean and Chairman Faculty
University College of Commerce and Management Studies
Mohanlal Sukhadia University, Udaipur

Dr. Sunil Kumar Garg
Senior Lecturer & Bus. Statistics
B.B.D. Govt. P.G. College,
Chimanpura (Shahpura), Jaipur

Dr. Pushpkant Shakdwipee
Asstt. Professor
Faculty of Management Studies
Pacific University, Udaipur

Roshanlal Totala
Ex Additional District Education Officer
Principal, Shri Mahesh Siksha Sadan
Sr. Sec. School, Bhilwara

Krishnakant Paneri
Principal
Govt. Senior Secondary School,
Salumbar (Udaipur)

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Accountancy

Class - XII

Convener :

Prof. G. Soral
Dean and Chairman Faculty
University College of Commerce and Management Studies
Mohanlal Sukhadia University, Udaipur

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Govt. Senior Secondary School,
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Motilal Goyal
Principal
Govt. Senior Secondary School,
Saantpur, Tehsil-Abu Road (Sirohi)

Preface

We are happy to present the first edition of the book on Accountancy for class XII of commerce stream as per newly sanctioned syllabus for 10 + 2 scheme of the Board of Secondary Education, Rajasthan.

Accountancy is an important part of commerce studies. The scope of accountancy was very limited in the ancient times, but with the continued developments in the field of business and industry, banking services, communication services and information technology has made scope of accountancy far and wide. The accountancy has become indispensable necessity for all types of business & trade, industry, transportation, banking, insurance etc.. Therefore, in-depth study of accountancy has become necessary for students of commerce stream. A part from this there has been pheomenal growth in various branches of higher studies. Keeping these in view the Board has encompassed precribed chapters in the new syllabus. Accordingly this book of accountancy has been writter. The main features of this book are as follows :

1. Effort has been made to cover full syllabus and to have co-ordination in the subject matter.
2. Keeping in view the breadth and to maintain interest, the principal aspects of accounting have been explained with the help of small illustrations.
3. To explain practical aspects of accounting sufficient number of illustrations, in the order from simple to tougher ones with detailed working notes, have been used.
4. Sufficient number of questions of every type as per guidelines of the Board viz. multiple choice type, very short answer type, short answer type, essay type and numerical type; have been given at the end of every chapter.
5. Technical terms are given in english language also.
6. Questions have been selected from earlier senior secondary examinations also.
7. Effort has been made to make book error-free, as-far-as possible.
8. Due to paucity of space and to maintain simplicity, standard presentation format has not been used at some places. However, students must use standard presentation format while solving problems.
9. Mandatory Accounting Standards issued by the Institute of Chartered Accountants of India have been applied at appropriate places.

Lastly, we are indebted to all colleagues, well-wishers and family members for their guidance and good wishes in completing this task. We are also grateful to Prof. B. L. Choudhary, the Chairman, Board of Secondary Education, Rajasthan, for his guidance and leadership in completion of the task.

We are hopeful that our efforts will be useful to keen learner students of accountancy. Study, teaching and writing a book are continuous process, therefore, it is requested that teaching fraternity and students will come forward with their useful positive suggestions in improving the book from time to time, and help us.

Authors

Accountancy
Class-XII

Time Allowed : 3.15 hours | Maximum Marks : 80

		Weightage of Marks
Part A		
1. Introduction to Partnership	5	
2. Admission of New Partner	8	
3. Accounting for Retirement and Death of Partner	7	
4. Dissolution of the firm	5	25
5. Company Accounts: Issue of Shares & Debentures	8	
6. Introduction of Financial Statements of company	4	12
7. Joint Venture Accounts		7
8. Consignment Account		8
9. Accounting for Non-Trading Organisations and Professional Persons		8
Part B		
1. Analysis of financial Statements		7
2. Ratio analysis		9
3. Ethics in Accounting		4

(or)

Part B	
1. Application of Electronic Spreadsheet in Accounting	10
2. Computerised Accounting system	5
3. Database Management System	5

Note : Select any one from part B.

Details of the Syllabus

Part A

1. **Introduction to Partnership :** Meaning, types of partnership, Partnership Deed, Rules in the absence of Deed, Partners Capital A/c; Fixed and Fluctuating Capital Method, Calculation of Interest on Capital, Calculation; of Interest on Drawings; From the first date of a month, middle of the month and end of the month and also by product method. Division of Profit, Guarantee of Profit to a Partner, Past adjustments in closed Partnership by passing single entry & passing entries, Profit and Loss Adjustment Account.
2. **Admission of a New Partner :** Rights of a new partner, profit sharing Ratio, Sacrificing ratio, Meaning of goodwill and definition, Types of goodwill, Methods of valuation of goodwill and its accounting (including hidden goodwill), Division of undistributed profits and losses, Revaluation of Assets and liabilities, Accounting when no change in book value of assets and liabilities, Adjustment of Partners Capital: Adjustment in Capital of old partners on the basis of new partners Capital and determination of new partners Capital on the basis of old partners Capital. Balance Sheet after admission, Change in profit sharing ratio among the existing partners and accounting for such effects.
3. **Accounting for Retirement and Death of Partner :** Problems and their accounting, Determination of amount payables at the time death of retirement of a partner, Payment of amount payable, Gain ratio, New-profit sharing Ratio, Accounting for goodwill, Division of undistributed profits and losses, Revaluation of assets and liabilities, Interest on capital upto the date or retirement/Death, Remuneration, Share in profit. Adjustment for joint life policy and Separate life policy (including surrender Value), Capital Account of deceased Partners Successor and its accounting, Methods of Amount payable-lump-sum payment, payment in installments and payment by annuity method, Provision under section 37 for non-settlement of final payment of Retiring Partner or deceased Partner.
4. **Dissolution of firm :** Modes of Dissolution, Difference between dissolution of firm and partnership, difference between Revaluation Account and Realisation Account. Accounting at the time of dissolution of firm- (i) Realisation Account, (ii) Bank and Cash Account, (iii) Partners Capital Accounts, (iv) Other necessary

Accounts. Transfer of Assets and Liabilities, Payment of liabilities. Accounting for unrecorded assets and liabilities, Accounting treatment, when partner become insolvent (including Garner Vs. Murry rule)

5. **Company Accounts : Issue of Shares and Debentures – Issue of shares :** Kinds of shares, kinds of share Capital and their disclosure in Balance Sheet, Procedure for issue of shares: Issue of shares at par and at premium, Issue of shares for consideration other than cash, Calls-in-arrears, Calls-in-Advance, Right Shares, Sweat Equity Shares, Issue of Debentures: Meaning of debentures, Types, Difference between shares and debentures, Issue of Debentures-at par, At discount and at premium issue lieu of collateral securities, writing off Discount/Loss on issue of debentures, Accounting for Interest on Debentures, Disclosure in Balance Sheet.
6. **Introduction to Financial Statement of Company :** Introduction to financial statements and meaning of various items shown in Balance Sheet. Format of Statement of Profit and Loss and general instructions for its preparation, Format of Balance Sheet and general instructions for its preparation.
7. **Joint Venture Accounts :** Meaning of Joint venture, Characteristics, Difference between joint venture and Partnership, Methods of accounting for transactions related to joint Venture : (i) Separate books are kept for accounting of joint Venture. (ii) No separate books are maintained- When each co-venturer records its own transactions, when each co-venturer records all the transactions.
8. **Consignment Account :** Meaning of Consignment, Characteristics, Terminology related to consignment. Difference between Performa Invoice and Invoice, Difference between consignment and sale, difference between consignment and joint venture, Accounting for consignment related transactions, Valuation of unsold stock with consignee, Loss of goods sent on consignment: Normal and Abnormal, Damaged goods, Loss due to negligence of consignee, Fall in market value of stock, Repairs of partially damaged goods, Sale of damaged goods by consignee, Goods sent on consignment at invoice price and its accounting, Special commission or share in profit to consignee, Conversion of consignment into Joint Venture.
9. **Accounting for Non-Trading Organisations and Professional Persons :** Introduction, Books-Kept: Membership Register, stock Register and Cash Book, specific items; Receipts and Payments Account: Meaning, Procedure of Preparing and preparation, Difference between Receipts and Payments Account and Cash Book; Income and Expenditure Account: Meaning, Procedure of Preparing and to preparation, Preparation of Balance Sheet, Difference between Receipts and Payments Account and Income and Expenditure Account, Preparation of opening and closing Balance Sheet from Receipts and Payments Account and Income & Expenditure Account, Preparation of Receipts and Payments Account from Income and Expenditure Account and Balance Sheet.

Part-B

1. **Analysis of Financial Statements :** Preface, meaning of Financial Statements, Definition, objects, Nature, Characteristics, Utility and limitations. Procedure for analysis of financial statements: Techniques of Analysis of Financial Statements, Comparative Financial Statement: Common-Size Statement, Trend Analysis.
2. **Ratio Analysis :** Meaning of Ratio Analysis, Expression of Ratios, Objectives, significance, Limitations, Precautions in using Ratios, Classification of Ratios; Structural Classification, Functional Classification, Calculation of further mentioned main ratios : Liquidity ratios, Solvency ratios, Activity ratios, Profitability ratios and Investment Analysis Ratios
3. **Ethics in Accountancy :** Introduction, Concept of Ethics and meaning, Nature, Sources, Professional Accountant and Ethics, Ethics in Accounting transactions: with regards to cash receipts, with regards to cash payments, with regard to goods, with regards to other assets, window Dressing.

Or

Part B

1. **Application of Electronic Spreadsheet in Accounting :** Concept , Utility, Features, Preparation of Payroll, Tables, Graphs, Formulas, Computation of Tax, Calculation of Interest and Installment on Loan, Calculation of depreciation, Financial forecasting.
2. **Computerized Accounting System :** Procedure for Installation of system, Accounting Information system, Difference in Manual and Computerised Accounting system, Characteristics and limitations, Basic structure, types of Software, coding and sequence of Account, Data: Profit and Loss Account and Balance Sheet.
3. **Data Base Management System :** Concept, characteristics, structure, Profit elements, Types, Business Utility Elements, Tables, Query and Report (M.S. Excess), creation of Various accounting information, S.Q.L.

INDEX

1

General Introduction to Partnership

Learning objectives :

After studying this chapter you would be able to understand :

- Meaning, Definition, Need, Features and Types of Partnership
- Partnership Deed : Meaning, Contents, Rules in the absence of Partnership Deed.
- Partners' Capital Accounts : Fixed and Fluctuating - Its difference
- Distributions of Profits among Partners - P & L Appropriation Account.
- Calculation & Accounting for amount of Interest on Partners' Capital and Interest on Drawings under Different Conditions.
- Past Adjustments / Adjustments in Closed Accounts.
- Guarantee of Minimum Profit to a Partner.

Meaning & Definition of Partnership

The Law of Partnership is contained in the Indian Partnership Act, 1932, which came into force on 1-10-1932. It extends to the whole of India except for Jammu & Kashmir. Prior to this Act, the Law of Partnership was dealt with under the Indian Contract Act, 1872.

Partnership is an association of two or more persons who have agreed to combine their Financial resources and managerial abilities to run a legal business and share profit in an agreed ratio.

Sir Fredrick Pollock : "Partnership is the relation between two or more persons, who have agreed to share the profits of the business carried on by all or any of them acting for all." According to section 4 of the Indian Partnership Act, 1932, "Partnership is the relation between persons who have agreed to share the profit of a business carried on by all or any of them acting for all."

The persons who have entered into a partnership with one another individually are called partners and collectively a firm. The name under which the business is carried is called firm name.

Need of Partnership : To overcome the limitations of sole proprietorship namely limited capital, lack of managerial efficiency and uncertain existence, partnership is desirable.

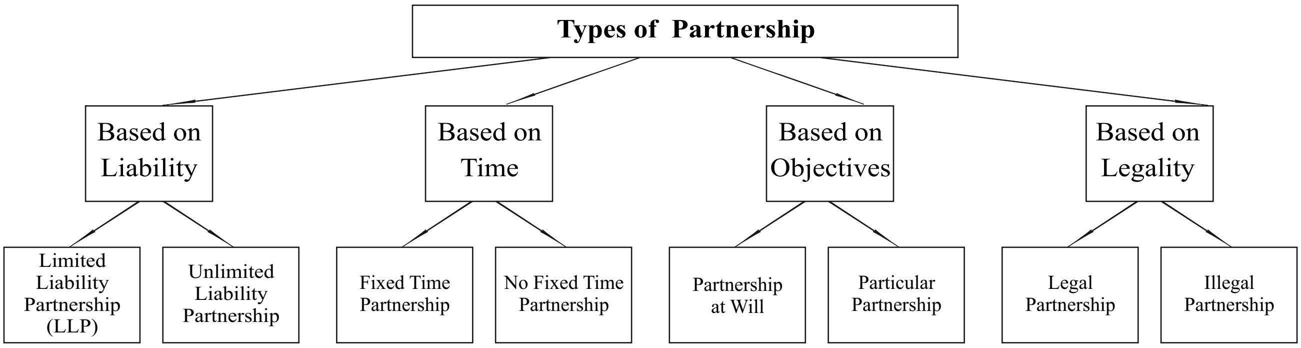
Characteristics of Partnership :

The essential characteristics of partnership are as under :

1. **Two or more than two persons :** There must be at least two persons to form a partnership and all such persons to be competent to contract. According to Indian Contract Act, 1872 a minor, persons of unsound mind and persons disqualified by any Law are not competent to contract. If any time the numbers of partners in a firm gets reduced to one the firm is dissolved. The Partnership Act does not prescribe the maximum number of partners in a firm. However section 464 of the Companies Act, 2013 empowers the Government to prescribe maximum number of partners in a firm subject to maximum of 100. The Government has prescribed maximum number of partners in a firm to be 50 vide rule 10 of the Companies (Miscellaneous) Rules, 2014.

2. **Agreement among partners :** Partnership comes into existance by an agreement**.** Such an agreement can be either oral or in writing. But to avoid any dispute it is better to have written agreement called partnership deed. According to Section 5 of Indian Contract Act, partnership arises from contract and not from status. Where there is no agreement there can not be a partnership.

   Partnership even does not arise from operation of law or from inheritance.
3. **Sharing of profits :** The object of partnership must be to make profit. Profit must be distributed among the partners in an agreed ratio**.** Usually partners also share losses in the ratio of profits, but it is not essential that all the partners must share the losses also. Example : a minor partner gets share in profits but not in loss.
4. **Carrying on a business :** A partnership is formed to do a lawful business. Business includes every trade, vocation & profession.
5. **Carried on by all or any of them acting for all :** The partnership business must be carried on by all or any of them acting for all. Every partner while carrying on the business of the firm stands in the position of an agent as well as principal. As an agent he by his acts binds the firm. As a principal he is bound by the acts of other partners.
6. **Act :** Business partnership is governed by the Indian partnership Act, 1932.
7. **Unlimited liability :** The liability of a partner for acts of the firm is unlimited. All the partners are liable jointly and severally to third party for all the acts of the firm.
8. **No separate existence :** A partnership firm is not a separate legal entity from its partners.



1. Partnership according to liability :-

(A) Limited liability partnership - Limited liability partnership (L.L.P.) is corporate under Partnership Act, 2008. It is an artificial person. It has separate entity and perpetual existence. It has a common seal, which is based on limited liability. Under L.L.P. liability of a partner is limited and firm has no right over partners personal property.

(B) Unlimited Liability Partnership - The type of partnership in which liability of all the partners' is unlimited.

2. Partnership according to time :-

(A) Fixed time partnership : When duration of partnership is fixed by the partner by an agreement it is said to be a partnership for a fixed period. Such partnership comes to on end on the expiry of the term.

(B) Non fixed time partnership : It is a partnership for which no duration has been fixed.

3. Partnership according to objects :-

(A) Partnership at will : If all the partners wish to continue the business even after the expiry of the fixed term the partnership becomes partnership at will.

(B) Particular partnership : When a partnership is formed for a particular adventure or undertaking, it is called a particular partnership. Such partnership comes to an end on the completion of the adventure or undertaking.

4. Partnership according to legality :-

(A) Legal partnership : Partnership established under rules and regulation of the country.

(B) Illegal partnership : Partnership, which is not according to rules and regulations of the country. Under the following circumstances partnership is deemed illegal :

(1) When partnership is established for illegal purpose.

(2) When number of partners is less than 2 or more than 50.

(3) When the business of the firm is against public policy/international policy.

(4) When a person of an alien nation is admitted as a partner in firm.

Partnership Deed : The written agreement among the partners is known as partnership deed. The partnership deed contains the following items :

(1) The name and address of the firm
(2) Name and address of the partners.
(3) Nature of business.
(4) Profit sharing ratio
(5) Capital contribution
(6) Interest on capital
(7) Drawings
(8) Interest on drawings
(9) Method of recording of firm's accounts
(10) Salary, Commission
(11) Auditing of accounts
(12) Duration of partnership
(13) Interest on partner's loan
(14) Methods of maintaining partner's capital accounts
(15) Rights, duties and liabilities of partners
(16) Settlement of disputes
(17) Rules to be followed in case of admission of a new partner
(18) Method of valuation and accounting treatment of goodwill in case of admission, retirement and death of a partner
(19) Rules to be followed while settling the accounts on retirement / death
(20) Modes and cases of distribution of firm
(21) Settlement of Accounts on dissolution of firm
(22) Use the decision under Garner v/s Murray Rule

Rules applicable in absence of partnership deed :

1. Profits are to be shared equally.
2. No interest on capital shall be allowed to the partners.
3. No interest is to be charged on drawings.
4. No partner is entitled to any salary or commission for taking part in running the firm's business.
5. Interest @ 6% p.a. is to be allowed on a partner's loan to the firm.
6. Each partner can participate in the conduct of business.
7. Each partner can inspect the books of firm and can take a copy of the same.

Capital accounts of partners:

The partner's capital accounts are maintained in two ways.

Capital Accounts

- Fixed Capital A/c Method
  - Partners Capital A/c
  - Partners Current A/c
- Fluctuating Capital A/c Method
  - Partners Capital A/c

Partners capital accounts :

1. Fixed capital accounts method : Under this system amount of capital does not fluctuate. The capital remains fixed. In this system two accounts are maintained :

(i) Partner's also capital accounts; **(ii)** Partner's current accounts.

(i) Partner's capital cccount : The partner's capital accounts will always show a credit balance, which shall remain the same (fixed) year after year unless there is any addition or withdrawal of capital.

(ii) Partner's current account : Current account is maintained to record transactions other than transactions relating to capital such as drawings, interest on capital, interest on drawings, salary or commission payable to partner, share of profit or losses. As a result the balance of current account fluctuates. The partner's current account may show a debit or a credit balance.

Format

Partner's Capital A/c

Dr. Cr.

Particulars	A ₹	B ₹	Particulars	A ₹	B ₹
To Cash/Bank A/c (Permanent withdrawal of capital)	xx	xx	By Balance b/d	xx	xx
To Balance c/d	xx	xx	By Cash/Bank (Additional capital introduced)	xx	xx
	xx	**xx**		**xx**	**xx**

Partner's Current A/c

Dr. Cr.

Particulars	A ₹	B ₹	Particulars	A ₹	B ₹
To Balance b/d	xx	xx	By Balance b/d	xx	xx
To Drawings	xx	xx	By interest on capital	xx	xx
To interest on drawings	xx	xx	By Salary	xx	xx
To P&L Appropriation A/c (Loss)	xx	xx	By Commission	xx	xx
To Balance c/d	xx	xx	By P & L Appropriation A/c (Profit)	xx	xx
	xx	**xx**		**xx**	**xx**

Note : If balance of partner's current accounts are given in the balance sheet, it implies that fixed capital account method is followed.

2. Fluctuating capital accounts method : All transactions of a partner capital introduced or withdrawn, salary or commission, interest on capital, interest on drawings, share of profits or loss etc., are recorded in his capital account, as a result balance in the capital account fluctuates with every transaction.

Note : In the absence of any instruction, the capital accounts should be prepared by fluctuating capital accounts method.

Partner's Capital A/c

Dr. Cr.

Particulars	A ₹	B ₹	Particulars	A ₹	B ₹
To Balance b/d	xx	xx	By Balance b/d	xx	xx
To Drawings	xx	xx	By Cash / Bank A/c	xx	xx
To Cash / Bank (Permanent withdrawal of capital)	xx	xx	(Additional capital introduced)		
To Interest on drawing	xx	xx	By Interest on capital	xx	xx
To P&L Appropriation A/c (Loss)	xx	xx	By Salary	xx	xx
			By Commission	xx	xx
To Balance c/d	xx	xx	By P & L Appropriation A/c (Profit)	xx	xx
	xx	**xx**		**xx**	**xx**

Note : The balance may be on the opposite side also.

Difference between Fixed Capital A/c & Fluctuating Capital A/c Method

Basis of difference	Fixed Capital A/c Method	Fluctuating Capital A/c Method
1. Number of accounts	Two accounts are maintained for each partner, fixed capital A/c and current A/c	Only one account(i.e.capital A/c)for each partner is maintained.
2. Change in balance of capital A/c	When the capital accounts are fixed, the balance in capital accounts usually remain unchanged during the life time of business, except when capital is introduced or withdrawn permanently.	When the capital accounts are fluctuating the balance of capital accounts changes from one year to another year.
3. Balance of capital A/c	It always shows credit balance in capital account.	Fluctuating capital accounts may show credit or debit balance.
4. Recording of transactions	Transactions relating to drawings, interest on drawings, interest on capital, salary, share of profits or loss etc. are not made in capital account but are entered in current account	In this case all transactions relating to partners are made directly in the capital accounts itself.

Distribution of profits among the partners :

After having determined the net profit by the Profit and Loss Account, Profit and Loss Appropriation Account, is prepared to show appropriation of net profit. The profit is distributed among partners as per provisions of the partnership deed.

Profit & Loss Appropriation Account : It is an extension of Profit and Loss Account. It is a nominal account. It is credited with net profit and interest on drawings of the partners and debited with interest on capital of the partners, partner's salaries and commissions and transfer to reserves. The balance profit is distributed between the partners in their profit sharing ratio.

Format : Profit & Loss Appropriation Account

For the year ended.........................

Dr. Cr.

Particulars		Amount ₹	Particulars		Amount ₹
To P&L A/c (Net Loss for the year)			By P&L A/c (Net profit for the year)		
To Interest on capital			By Interest on drawings		
A	xx		A	xx	xx
B	xx	xx	B	xx	
To Partner's salary			By Partner's Capital A/c / Current A/c (share of Loss)		
A	xx		A	xx	xx
B	xx	xx	B	xx	
To Partner's commission			(Balancing figure)		
A	xx				
B	xx				
To Reserve A/c (Transfer)		xx			
To Partner's Capital A/c / Current A/c (share of profit) (Balancing figure)		xx			
A	xx				
B	xx				
		xx			xx

Note : (i) If profit after charging any item is given then any such amount is not shown in P & L Appropriation Account, but such items are posted in Partners Capital or Current Account. **(ii)** If profit before charging any items is given then such item is shown in both Profit & Loss Appropriation Account and Partners Capital Account/Current Account. **(iii)** The following items are treated as charge on profits, hence it is shown in Profit & Loss Account not in Profit & Loss Appropriation Account. e.g. Managers Commission, interest on partners, loan rent of building. **(iv)** If capital account is prepared by fixed capital method then except capital other items will be shown in Partners Current Account.

Journal Entries

Relating to Profit and Loss Appropriation Account :

	Transaction	Accounting Entries
1)	For Interest on capital -	Interest on Capital A/c Dr. To Partner's Capital A/c (Being interest allowed on capital)
2)	For interest on capital transfer to P & L Appropriation A/c	Profit & Loss Approiation A/c Dr. To Interest on Capital A/c (Being transfer of interest to P/L App. A/c)
	Single entry for above 1 and 2 entries	Profit and Loss Appropriation A/c Dr. To Partner's Capital A/c (Being interest on capital allowed to partners)
3)	For interest on drawings	Partner's Capital A/c Dr. To Interest on Drawings A/c (Being interest on drawings transferred to Capital A/c)

4)	For interest on drawings transfer to P & L Appropriation A/c	Interest on Drawings A/c Dr. To Profit & Loss Appropriation A/c (Being transfer of interest on drawings to P/L Appropriation A/c)
5)	Combined entry may be passed	Partner's Capital A/c Dr. To Profit & Loss Appropriation A/c (Being interest on drawings charged)
6)	For partner's salaries / commission -	Partner's Salary/Commission A/c Dr. To Partner's Capital A/c (Being Partner's Capital A/c credited with salary...... ..)
7)	on closure of salary / commission A/c combined entry may be passed	Profit and Loss Appropriation A/c Dr. To Partner's Salary A/c To Partner's Commission A/c (Being transfer of partner's salary/commission to P/L Appropriation A/c)
8)	For transfers to reserve -	Profit and Loss Appropriation A/c Dr. To Reserve/Reserve Fund A/c (Being transfer of profit to Reserve A/c)
9)	For distribution of net profit -	Profit and Loss Appropriation A/c Dr. To Partner's Capital A/c (Being profit distributed among/between partners)
10)	For distribution of net Loss -	Partner's Capital A/c Dr. To Profit and Loss Appropriation A/c (Being Partner's Capital A/c debited with loss on P/L Appropriation A/c)

Note : In case of fixed capital A/C method....partner's current account is used in place of partner's capital account.

Example 1 :

Ajay and Vijay started a partnership business on 1st April, 2016. Their capital contributions were ₹ 2,00,000 and 3,00,000 respectively. The partnership deed provided : (i) Interest on capital at 10% p.a.(ii) Ajay to get a salary of ₹ 2000 p.m. and Vijay ₹ 36000 p.a. (iii) Interest on drawing amounted ₹ 2000 for Ajay and ₹ 3000 for Vijay. (iv) Profits are to be shared in the ratio of 3:2 (v) During the year drawing of Ajay and Vijay amounted to ₹ 30000 and ₹ 40000 respectively. The profit for the year ended 31st March, 2017 before making above appropriations was ₹ 2,45,000. Prepare Profit and Loss Appropriation Account.

Solution :

Profit and Loss Appropriation A/c
For the year ended 31st March, 2016

Dr. Cr.

Particulars		Amount ₹	Particulars		Amount ₹
To Interest on Capital:			By Profit before Adjustments		2,45,000
Ajay	20, 000		By Interest on Drawings:		
Vijay	30, 000	50, 000	Ajay	2,000	
To Partner's Salaries:			Vijay	3,000	5,000
Ajay	24, 000				
Vijay	36, 000	60, 000			
To Partner's Capital:					
Ajay	84, 000				
Vijay	56, 000	1,40,000			
		2,50,000			**2,50,000**

Example 2 :

K and R were partners sharing profits in the ratio of 3:2. Following terms were agreed upon between the partners : (1) Interest on Capital @ 10% per annum (2) Interest on drawings @ 5%. (3) Salary to K for conducting business of the firm ₹5000 per month. Following informations are available for the accounting year ended 31st March, 2017 : Capital of K on 01.04.2016 ₹ **2,00,000 ;** Capital of R on 01.04.2016 ₹ **1,20,000;** Current Account of K on 01.04.2016 ₹ **12,000 (Cr.);** Current Account of R on 01.04.2016 ₹ **4,000 (Dr.)**; Additional Capital by K on 01.10.2016 ₹ **80,000**; Drawings during the year by K ₹ **20,000**; Drawings during the year by R ₹ **20,000**; Profit for the year ₹ **1,34,000**.

Pass journal entries, prepare Profit and Loss Appropriation Account and show Capital Accounts of Partners assuming capitals are fixed.

Solution : **Journal**

Date	Particulars	L.F.	Dr. Amount ₹	Cr. Amount ₹
2016 Oct.,1	Bank A/c Dr. To K's Capital A/c (Additional capital contributed)		80,000	 80,000
	K's Drawings A/c Dr. R's Drawings A/c Dr. To Bank (Drawing made)		20,000 20,000	 40,000
2017 Mar., 31	Interest on Capital A/c Dr. To K's Current A/c To R's Current A/c (Interest charged)		36,000	 24,000 12,000
	K's Current A/c Dr. R's Current A/c Dr. To Interest on Drawings (Interest charged on Drawings)		1,000 1,000	 2,000
	K's Current A/c Dr. To K's Drawings A/c (Transfer drawings to Partner's Current Accounts)		20,000	 20,000
	R's Current A/c Dr. To R's Drawings A/c (Transfer of drawings to Partner's Current Accounts)		20,000	 20,000
	K's Salary A/c Dr. To K's Current A/c (Salary payable to K)		60,000	 60,000
	Profit and Loss A/c Dr. To Profit and Loss Appropriation A/c (Net Profit transferred to Profit and Loss Appropriation A/c)		1,34,000	 1,34,000
	Profit and Loss Appropriation A/c Dr. To Interest on Capital A/c To K's Salary A/c (Interest on Capital and salary transferrred to Profit and Loss Appropriation A/c)		96,000	 36,000 60,000
	Interest on Drawings A/c Dr. To Profit and Loss Appropriation A/c (Interest on Drawings transferred)		2,000	 2,000
	Profit and Loss Appropriation A/c Dr. To K's Current A/c To R's Current A/c (Balance of P & L Appropriation Account Transferred to Partners Current Account)		40,000	 24,000 16,000

Dr. **Profit and Loss Appropriation A/c for the year ended 31st March 2017** Cr.

Particulars		Amount ₹	Particulars		Amount ₹
To Interest on Capital A/c			By Profit & Loss A/c (Net Profit)		1,34,000
K	24,000		By Interest on Drawings A/c		
R	12,000	36,000			
To K's Salary A/c		60,000	K	1,000	
To Profit Transferred to Current A/c			R	1,000	2,000
To K	24,000				
To R	16,000	40,000			
		1,36,000			1,36,000

Partner's Capital Account

Date	Particulars	K ₹	R ₹	Date	Particulars	K ₹	R ₹
2017				2016			
Mar.,31	To Balance c/d	2,80,000	1,20,000	Apr.,01	By Balance b/d	2,00,000	1,20,000
				Oct.,01	By Bank A/c	80,000	
		2,80,000	**1,20,000**			**2,80,000**	**1,20,000**

Partner's Current A/c

Date	Particulars	K ₹	R ₹	Date	Particulars	K ₹	R ₹
2016				2016			
Apr., 1	To Balance b/d		4,000	Apr., 01	By Balance b/d	12,000	--
2017				2017			
Mar.,31	To Drawings A/c	20,000	20,000	Mar.,31	By Int. on capital A/c	24,000	12,000
Mar.,31	To Interest on Drawings A/c	1,000	1,000	Mar.,31	By Salary A/c	60,000	--
				Mar.,31	By Profit & Loss Appropriation A/c (Share of Profit)	24,000	16,000
Mar,31	To Balance c/d	99,000	3,000				
		1,20,000	**28,000**			**1,20,000**	**28,000**

Interest on Partner's Capital

Interest on capital is allowed only if it is mentioned under partnership deed. It is computed at the agreed rate with reference to the time the capital has been used in the business. Interest on capital is computed on the opening balance of the partner's capital. But if additional capital is introduce during the year, interest is allowed on it for the period it has remained in the business.

Capital at the end	xxx
Add: Drawings	xxx
Less: Additional Capital	xxx
Less Current year Profit	xxx

Opening Capital	xxx

$$\text{Interest on Capital} = \frac{\text{Amount of Capital} \times \text{Rate} \times \text{Period}}{100 \times 12}$$

Note : If additional capital is introduced during the year or withdrawal of capital during the year then interest capital will be calculate by product method.

$$\text{Interest on Capital} = \frac{\text{Total of Products} \times \text{Rate}}{100 \times 12}$$

Note : If capital is fixed then interest on Capital will be calculate on fixed capital.

Provisions relating to interest on capital :-

Situation	Provision
I. When partnership deed is silent in respect of interest on capital	Interest on capital is not allowed.
II. When the partnership deed provides for interest on capital but it is silent with regards to its treatment as charge or appropriation.	Interest on capital is allowed only if there is profit : **i.** In case of loss : Interest on capital is not allowed. **ii.** In case profit before interest is equal to or more than the interest, interest on capital is allowed at the agreed rate. **iii.** In case profit before interest is less than the interest, interest is allowed only to the extent of profit in the ratio of interest
III. Partnership deed provides interest on Capital as a charge against profit.	Interest on Capital is allowed even if there is a loss. (under such case interest on capital is debited to P & L A/c instead of P & L Appropriation A/c)

Example : 3

X and Y are partners sharing the profits and losses in the ratio of 3 : 2 with capitals of ₹ 2,00,000 and ₹ 1,00,000 respectively. Show the distribution of profits in each of the following alternative cases :

(1) If the partnership deed is silent as to the interest on Capital and the profit for the year is ₹ 60,000.

(2) If the partnership deed provides for interest on capital @ 10% p.a. and the loss for the year is ₹ 60,000.

(3) If the partnership deed provides for interest on capital @ 10% p.a. and the profit for the year is ₹ 60,000.

(4) If the partnership deed provides for interest on capital @ 10% p.a. and the profit for the year is ₹ 18,000.

(5) If the partnership deed provides for interest on capital @ 10% p.a. and the profit for the year is ₹18,000.

Solution :

Interest on capital is charged on Profit, in Conditions 3, 4, 5 only.

(1) **Dr.** **Profit and Loss Appropriation A/c** **Cr.**

Particulars	Amount ₹	Particulars	Amount ₹
To Partner's Capital (Profit) X 36,000 Y 24,000	60,000	By Profit & Loss A/c	60,000
	60,000		60,000

(2) **Dr.** **Profit and Loss Appropriation A/c** **Cr.**

Particulars	Amount ₹	Particulars	Amount ₹
To P&L A/c (Loss)	60,000	By Partner's Capital A/c X 36,000 Y 24,000	60,000
	60,000		60,000

Note: Interaction capital is allowed if there is a profit in case of loss interest on capital is not allowed.

(3) **Dr.** **Profit and Loss Appropriation A/c** **Cr.**

Particulars	Amount ₹	Particulars	Amount ₹
To Interest on Capital X 20,000 Y 10,000	30,000	By P&L A/c	60,000
To Partner's Capital A/c X 18,000 Y 12,000	30,000		
	60,000		60,000

(4) **Dr.** **Profit and Loss A/c** **Cr.**

Particulars	Amount ₹	Particulars	Amount ₹
To Interest on Capital A/c		By P&L A/c	18,000
X 18,000 x $\frac{2}{3}$	12,000		
Y 18,000 x $\frac{1}{3}$	6,000		
	18,000		18,000

Note: Profits are distributed between partners in the ratio of interest payable to him.

(5) **Dr.** **Profit and Loss A/c** **Cr.**

Particulars	Amount ₹	Particulars	Amount ₹
To Interest on Capital		By Profit for the year	18,000
X 20,000			
Y <u>10,000</u>	30,000	By Partner's Capital A/c	
		X 12,000 x $\frac{3}{5}$	7,200
		Y 12,000 x $\frac{2}{5}$	4,800
	30,000		**30,000**

Note: Interest on capital is treated as change on profits therefore debited to P&L A/C.

Illustration 4 :

Ram, Shyam and Mohan started a partnership firm. Ram introduced capital of ₹1,00,000 for the whole year and Shyam introduced at the begining ₹50,000 and at the end of 3 months, increased his capital to ₹60,000 and at the end of 8 months he withdrew ₹5,000. Mohan introduced ₹70,000 as his capital at the begning and withdrew at the end of 4 months ₹20,000. Profit for the year is ₹5,10,000. Distribute profit among partners on the basis of their capital.

Solution : Calculation the ratio of effective capital employed during the year

Ram :	₹ 1,00,000	for 12 months	₹ 12,00,000	Shyam :	₹ 50,000	for 3 months	₹ 1,50,000
Mohan:	₹ 70,000	for 4 months	₹ 2,80,000		₹ 60,000	for 5 months	₹ 3,00,000
	₹ 50,000	for 8 months	₹ 4,00,000		₹ 55,000	for 4 months	₹ 2,20,000
			₹ 6,80,000				₹ 6,70,000

Capital ratio = 120 :67 : 68

Dr. **Profit and Loss Appropriation A/c** **Cr.**

Particulars	Amount ₹	Particulars	Amount ₹
To Partner's Capital		By Net Profit	5,10,000
Ram $\frac{5,10,000 \times 120}{255}$	2,40,000		
Shyam $\frac{5,10,000 \times 67}{255}$	1,34,000		
Mohan $\frac{5,10,000 \times 68}{255}$	1,36,000		
	5,10,000		**5,10,000**

Interest on Drawings

Drawings means the amount withdrawn by partners in cash or kind for their personal use. If the partnership deed so provides interest on drawings is charged. Interest on drawings is an income of firm.

(Methods of calculation of Interest on Drawings)

- When unequal amount is withdrawn on different dates
  - Simple Method
  - Product Method
- When equal amount is withdrawn at regular interval
  - Average period method
    - Drawings is made on monthly basis
    - Drawings is made on quarterly basis

I. When unequal amount is withdrawn on different dates :

(i) Simple Method : Interest on drawings under this method is computed on each single drawing with reference to period of utilisation of money.

$$\text{Interest} = \text{Amount withdrawn} \times \frac{\text{Rate of Interest}}{100} \times \frac{\text{months}}{12} \text{ or } \frac{\text{days}}{365}$$

(ii) Product Method : Under this method the amount of drawings is multiplied by the number of months or number of days it has been used. The product so obtained is totaled and the interest is calculated there on for one month, if the period taken is in months and for one day if the period taken is in days.

Date of Drawings	Amount ₹	Period (months/days) from date of drawing to date of year ended	Product (Amount x Period)
			Total Product

$$\text{Interest on Drawings} = \text{Total of Product} \times \frac{\text{Rate of Interest}}{100} \times \frac{1}{12} \text{ or } \frac{1}{365}$$

Illustration 5 :

Calculate interest on drawings of Ram @ 12% p.a. for the year ended 31-12-2016 by simple method.

Date	Amount ₹
31.05.2016	2,000
30.09.2016	3,000

Solution : Interest on drawing = $2,000 \times \frac{7}{12} \times \frac{12}{100} = ₹\,140$ $3,000 \times \frac{3}{12} \times \frac{12}{100} = ₹\,90$

Illustration 6 :

A partner withdraws the following amounts on different dates :

Date of Drawings	Amount ₹	Date of Drawings	Amount ₹
01-04-16	1,000	30-06-16	1,200
31-12-16	1,500	31-03-17	2,0000

Calculate interest on drawings @ 12% p.a. by product method for the year ended on 31.3.2017

Solution :

Date of Drawings	Amount ₹	Months	Product
01-04-16	1,000	12	12,000
30-06-16	1,200	9	10,800
31-12-16	1,500	3	4,500
31-03-17	20,000	0	0
			27,300

$$\text{Interest on Drawings} = \frac{\text{Total of Product x Rate x Interest}}{100 \times 12} = \frac{27{,}300 \times 12}{100 \times 12} = ₹\,273$$

II. When equal amount is withdrawn at regular interval :

$$\text{Interest on Drawings} = \frac{\text{Total Drawings x Rate of Interest x Average period}}{100 \times 12}$$

Formulas for calculation of Average Period

Situation	n=No. of months	Drawings made for 12 months	Drawings made for 9 months	Drawings made for 6 months
I. Monthly drawings (a) At the beginning of every month.	$\frac{n+1}{2}$	$\frac{12+1}{2} = 6.5$	$\frac{9+1}{2} = 5$	$\frac{6+1}{2} = 3.5$

(b) At the end of every month.	$\frac{n-1}{2}$	$\frac{12-1}{2} = 5.5$	$\frac{9-1}{2} = 4$	$\frac{6-1}{2} = 2.5$
(c) In the middle of every month.	$\frac{n}{2}$	$\frac{12}{2} = 6$	$\frac{9}{2} = 4.5$	$\frac{6}{2} = 3$
II. Quarterly drawings (a) At the beginning of each quarter.	$\frac{n+3}{2}$	$\frac{12+3}{2} = 7.5$	$\frac{9+3}{2} = 6$	$\frac{6+3}{2} = 4.5$
(b) At the end of each quarter..	$\frac{n-3}{2}$	$\frac{12-3}{2} = 4.5$	$\frac{9-3}{2} = 3$	$\frac{6-3}{2} = 1.5$
(c) In the middle of each quarter.	$\frac{n}{2}$	$\frac{12}{2} = 6$	$\frac{9}{2} = 4.5$	$\frac{6}{2} = 3$
III. If the date of drawings is not given.	$\frac{n}{2}$	$\frac{12}{2} = 6$	$\frac{9}{2} = 4.5$	$\frac{6}{2} = 3$

Note : When rate of interest is given without the word "per annum" interest is charged without considering the time factor.

Illustration 7 : G, S and T are partners in a firm. You are informed that :

a. G draws ₹ 2,000 at the beginning of every month.

b. S draws ₹ 3,000 at the end of every month.

c. T draws ₹ 1,000 in the middle of every month.

Interest on drawings is to be charged @ 12% p.a. Calculate interest on drawings.

Solution :

G Total Drawings 2,000 x 12 = ₹ 24,000

S Total Drawings 3,000 x 12 = ₹ 36,000

T Total Drawings 1,000 x 12 = ₹12,000

Interest on Drawing = 24,000 x $\frac{6.5}{12}$ x $\frac{12}{100}$ = ₹ 1,560

Interest on Drawing = 36,000 x $\frac{5.5}{12}$ x $\frac{12}{100}$ = ₹ 1,980

Interest on Drawing = 12,000 x $\frac{6}{12}$ x $\frac{12}{100}$ = ₹ 720

Illustration 8 :

P, Q and R started business on 01.07.2016. Calculate interest on drawings @ 12% p.a. on the following drawings for the year ended on 31.03.2017

a. P draws ₹ 500 at the beginning of every month.

b. Q draws ₹ 600 in the middle of every month.

c. R draws ₹700 at the end of every month.

Solution :

P Total Drawings 500 x 9 = ₹ 4,500

Q Total Drawings 600 x 9 = ₹ 5,400

R Total Drawings 700 x 9 = ₹ 6,300

Interest on Drawing = 45,00 x $\frac{5}{12}$ x $\frac{12}{100}$ = ₹ 225

Interest on Drawing = 5,400 x $\frac{4.5}{12}$ x $\frac{12}{100}$ = ₹ 243

Interest on Drawing = 6,300 x $\frac{4}{12}$ x $\frac{12}{100}$ = ₹ 252

Illustration 9 :

R, S and T are partners in a firm. Each partner withdrew ₹ 2,000 per month. Calculate interest on drawings @ 10% p.a. when

a. R withdrew at the beginning of every month.

b. S withdrew in the middle of every month

c. T withdrew at the end of every month.

Solution :

R Total Drawings 2,000 x 6 = ₹ 12,000

S Total Drawings 2,000 x 6 = ₹ 12,000

T Total Drawings 2,000 x 6 = ₹ 12,000

Interest on Drawing = $12,000 \times \frac{3.5}{12} \times \frac{10}{100} =$ ₹ 350

Interest on Drawing = $12,000 \times \frac{3}{12} \times \frac{10}{100} =$ ₹ 300

Interest on Drawing = $12,000 \times \frac{2.5}{12} \times \frac{10}{100} =$ ₹ 250

Illustration 10 :

A, B and C are partners in a firm. Calculate interest on drawings @ 12% p.a. on the following drawings for the year ended on 31.03.2017,

a. A withdrew ₹ 3,000 at the beginning of each quarter.

b. B withdrew ₹ 4,000 in the middle of each quarter.

c. C withdrew ₹ 2,500 at the end of each quarter.

Solution :

	Total drawings	Average Period	Interest on Drawings
A	3,000 x 4 = ₹ 12,000	7.5 months	Interest on Drawing = $12,000 \times \frac{7.5}{12} \times \frac{12}{100} =$ ₹ 900
B	4,000 x 4 = ₹ 16,000	6 months	Interest on Drawing = $16,000 \times \frac{6}{12} \times \frac{12}{100} =$ ₹ 960
C	2,500 x 4 = ₹ 10,000	4.5 months	Interest on Drawing = $10,000 \times \frac{4.5}{12} \times \frac{12}{100} =$ ₹ 450

Illustration 11 :

Calculate interest on drawings of Virat @ 10% p.a. for the year ended on 31.03.2017

(a) If his drawings during the year were ₹ 20,000

(b) If he withdrew ₹ 2,000 per month during the year

Solution :

(a) Interest on Drawing = 20,000 x 10/100 = ₹ 2,000

(b) Total drawings 2,000 x 12 = ₹ 24,000 Interest on Drawing = 24,000 x10/100 = ₹ 2,400

Note : Rate of interest is given without the word 'p.a.', therefore interest is calculate for the whole year.

Example 12 :

R and S are partners sharing profits in the ratio of 3 : 2. R is a non-working partner. He contributed ₹ 5,00,000 as his capital. S did not contribute any capital. The partnership deed provides interest on capital @ 10% p.a. and salary to S as ₹ 2,500 p.m. The net profit before providing interest on capital and salary amounts to ₹ 40,000 for the year ended 31st March 2017. Show the distribution of profit for the year.

Solution :

Profit & Loss Appropriation A/c

Dr. For the year ended 31st March 2017 Cr.

Particulars	Amount ₹	Particulars	Amount ₹
To Interest on R's Capital To S's Salary	25,000 15,000	By Net Profit (as per P & L A/c)	40,000
	40,000		40,000

Note : Total appropriation (interest on capital and salary) of profit is ₹ 80,000, but available net profit is ₹ 40.000, So it should be divided between R and S in the ratio of 5:3. (interest on capital to salary ratio)

Example 13 :

R and S are partners with capitals of ₹ 80,000 and ₹ 60,000 respectively. The profit for the year ended 31st March, 2017 amounted to ₹ 47,500 before considering the following : (i) Interest on capital to be allowed @ 5% p.a. (ii) Interest on drawings to be charged @ 5% p.a. Drawings R – ₹ 16,000, S- ₹ 12000 (iii) R had advanced loan to the firm amounting to ₹ 20,000 (iv) R was allowed commission @ 2% on sales, which was ₹ 2,00,000. S was allowed commission @ 10% on divisible profit (before charging his commission but after charging R's commission.) (v) It was decided to transfer 10% of divisible profit to Reserve Account. Prepare Profit & Loss Appropriation Account.

Solution :

Profit & Loss Account

Dr. for the year ended 31st March, 2017 Cr.

Particulars	Amount ₹	Particulars	Amount ₹
To Interest on R's Loan	1,200		
To Net Profit trans. to P. & L. App. A/c	46,300	By Profit for the year	47,500
	47,500		**47,500**

Profit & Loss Appropriation Account

for the year ended 31st March, 2017

Particulars		Amount ₹	Particulars		Amount ₹
To Interest on Capital :			By Profit and Loss A/c		46,300
R	4,000		By Interest on Drawings :		
S	3,000	7,000	R	400	
To Commission to R 2,00,000 x 2%		4,000	S	300	700
To Commission to S 36,000 x 10%		3,600			
To Reserve 32,400 x 10%		3,240			
To Capital Accounts					
R	14,580				
S	14,580	29,160			
		47,000			**47,000**

Note : As the rate of interest on drawings (IOD) is mentioned with the term "p.a.", IOD is calculated for 6 months.

Past Adjustments in Closed Partnership Accounts

Some times profit of the firm is distributed among the partners for a particular period without giving consideration to the terms and conditions laid down in the partnership deed. Such ignored or omitted terms and conditions are required to be adjusted after the close of the accounting period. Since some accounting treatment is required to correct the past errors or omissions, the such treatment is called "Past Adjustment, situation for past adjustment arise when :

1. Interest on capital is completely omitted or charge in the books at more or less rate.
2. Interest on drawings is omitted
3. Salary / Commission payable to partner is omitted.
4. Profits have been divided in wrong ratio
5. Profit sharing ratio is changed with retrospective effect.

Methods of Adjustment

(Past Adjustment by Passing Single Entry) (Past Adjustment through P & L Adjustments A/c)

I. Past Adjustment by passing single entry : Under this method the capital account of the partner, who had been credited in excess would be debited and the capital account of the partner who had been credited less amount would be credited making an entry for net effect :

Gaining Partner's Capital A/c Dr. (Received more amount)

To Sacrificing Partner's Capital A/c (Received less amount)

II. Adjustment through Profit and Loss Adjustment Account :

(i) For omission of interest on capital, partner's salary, commission.

P & L Adjustment A/c Dr.

To Partner's Capital/Current Account

(ii) For omission of interest on drawings

Partner's Capital/Current A/c Dr.

To P & L Adjustment A/c

(iii) The net effect of the above entries will be either net Profit or Loss

(For this prepare profit and Loss adjustment A/c)

a. P & L Adjustment A/c Cr. If profit (i.e. credit balance of P & L Adjustment A/c)

P & L Adjustment A/c Dr.

To Partner's Capital/Current Account

b. P & L Adjustment A/c Dr. If loss (i.e. debit balance of P & L Adjustment A/c)

Profit & Loss Adjustment A/c

For the year ended..........................

Particulars		Amount ₹	Particulars		Amount ₹
To Interest on Capital			By Interest on Drawings		
A	xx		A	xx	
B	xx	xx	B	xx	xx
To Partner's Salary			By Partner's Capital A/c		
A	xx		Current A/c (share of Loss)		
B	xx	xx	A	xx	
To Partner's Commission			B	xx	xx
A	xx		(Balancing Figure)		
B	xx	xx			
To Partner's Capital A/c/Current A/c (Share of Profit)					
A	xx				
B	xx	xx			
		xx			xx

Note : If capital of the partners are fixed, adjustment entries are passed through partner's current A/c.

Example 14 : R, S and T are partners in a firm sharing profits and losses in the ratio of 3 : 2 : 1. On March 31st, 2017 their capital accounts show balances-R ₹ 1,15,000, S ₹ 70,000 and T ₹ 42,000 respectively after making all the necessary adjustments in connection with drawings and net profit. After closing the books of accounts it was found that interest on capital and drawings @ 10% was not provided. The drawings of the partners were- ₹ 15,000, S ₹ 10,000 and T ₹ 8,000 respectively and the interest thereon amounted to ₹ 1000, 600 and 400 respectively. The net profit for the year before considering above interest on capital and drawings amounted to ₹ 60,000. Make necessary adjustment entries.

Solution : **Statement showing opening capital (1.4.2016) and interest on capital**

Particulars	R ₹	S ₹	T ₹
Capital as on 31.03.2017	1,15,000	70,000	42,000
Add : Drawings during the year	15,000	10,000	8,000
	1,30,000	80,000	50,000
Less: Profit already credited	30,000	20,000	10,000
Capital as on 01.04.2016	1,00,000	60,000	40,000
Interest on Capital @ 10 % p.a.	10,000	6,000	4,000

Journal (Adjustment Entries)

Date	Particulars		L.F.	₹	₹
2017 Mar,31	P & L Adjustment A/c	Dr.		20,000	
	To R's Capital A/c				10,000
	To S's Capital A/c				6,000
	To T's Capital A/c				4,000
	(Adjustment of interest on capital not done in the Profit & Loss Account)				

Date	Particulars		L.F.	Dr. Amount	Cr. Amount
Mar,31	R's Capital A/c	Dr.		1,000	
	S's Capital A/c	Dr.		600	
	T's Capital A/c	Dr.		400	
	To P & L Adjustment A/c				2,000
	(Adjustment for Interest on drawings not done in the P & L Account)				
Mar,31	R's Capital A/c	Dr.		9,000	
	S's Capital A/c	Dr.		6,000	
	T's Capital A/c	Dr.		3,000	
	To P & L Adjustment A/c				18,000
	(Loss on account of adjustments distributed among partners in their profit sharing ratio.)				

Dr. **Profit and Loss Adjustment Account (For the year ended on 31 March 2017)** Cr.

Particulars		Amount ₹	Particulars		Amount ₹
To Interest on Capital :			By Interest on Drawings:		
R	10,000		R	1,000	
S	6,000		S	600	
T	4,000	20,000	T	400	2,000
			By Partner's Capital A/c :		
			R	9,000	
			S	6,000	
			T	3,000	18,000
		20,000			**20,000**

Partner's Capital Accounts

Particulars	Amount ₹ R	Amount ₹ S	Amount ₹ T	Particulars	Amount ₹ R	Amount ₹ S	Amount ₹ T
To P & L Adjustment a/c (Interest on Drawings)	1,000	600	400	By Balance b/d	1,15,000	70,000	42,000
To P & L Adjustment a/c (Loss on Adjustments)	9,000	6,000	3,000	By P&L Adjustment a/c (Interest on Capital)	10,000	6,000	4,000
To Balance c/d	1,15,000	69,400	42,600				
	1,25,000	**76,000**	**46,000**		**1,25,000**	**76,000**	**46,000**

The above adjustment will be made by passing a single entry. Adjusted Amount will be calculated from the analytical table.

Analytical Table

Particulars	R Dr. ₹	R Cr. ₹	S Dr. ₹	S Cr. ₹	T Dr. ₹	T Cr. ₹	Firm Dr. `	Firm Cr. ₹
Interest on Capital	--	10,000	--	6,000	--	4,000	20,000	
Interest on Drawings	1,000	--	600	--	400	--	--	2,000
							20,000	2,000
Loss of ₹ 18,000 debited to partners in the ratio 3: 2 :1	9,000	--	6,000	--	3,000	--	--	18,000
Total	10,000	10000	6,600	6,000	3,400	4,000	20,000	20,000
Final Adjustment		--	600 (Dr.)	--		600 (Cr.)		

Particulars		Amount ₹ Dr.	Amount ₹ Cr.
S's Capital A/c	Dr.	600	
To T's Capital A/c			600
(Adjustment of Partner's Accounts made)		**600**	**600**

Dr. **Partner's Capital Account** **Cr.**

Particulars	Amount ₹ R	Amount ₹ S	Amount ₹ T	Particulars	Amount ₹ R	Amount ₹ S	Amount ₹ T
To T's Capital A/c		600		By Balance b/d	1,15,000	70,000	42,000
To Balance c/d	1,15,000	69,400	42,600	By S's Capital A/c			600
	1,15,000	**70,000**	**42,600**		**1,15,000**	**70,000**	**42,600**

Guarantee of Profit to a Partner

Sometimes a new partner may be admitted in the firm with minimum guaranteed profit from business. The profit may be guaranteed to an existing or an incoming partner.

Types of Guarantee : **(i)** Guarantee by firm **(ii)** Guarantee by partners **(iii)** Guarantee by partner to firm **(iv)** Simultaneous guarantee by the partner to the firm and by the firm to the partner.

1. Guarantee by firm or by all the partners- Divisible profit is firstly distributed among the partners in their profit sharing ratio. Deficiency of guaranteed partner (if any) is adjusted through capital accounts of remaining partners in their profit sharing ratio.

Note : (1) When the guaranteed partner's share of profit is more than the guaranteed amount his actual share of profit is given to him instead of the guaranteed amount of profit. (2) The partner will get his guaranteed amount of profit even if there is loss. (3) If the deficiency sharing ratio is given then deficiency of profit will be adjusted in given ratio.

2. Guarantee by partners- When one of the partners guarantee a minimum profit the adjustment is made through the partner's capital account .The following, steps are to be followed :

(a) Distribute the profit among the partner's as per their profit sharing ratio.

(b) If the share of profit of the guaranteed partner is less than the minimum guaranteed profit, the difference is deducted from the share of profit of the partner who had guaranteed and it is added to the share of profit of the guaranteed partner.

Example 15 :

X and Y are partners in a firm sharing profit and loss in the ratio of 3 : 2. They decided to admit Z with 1/5 the share in profits with a guaranteed amount of ₹ 50,000. They decided that the profit sharing ratio between X and Y will not change. The firm earned profits of ₹ 1,50,000 for the year 2016-17. Prepare Profit & Loss Appropriation Account when -: (1) Guarantee is provided by firm (2) Guarantee is provided only by X.

Solution : 1 **Profit & Loss Appropriation A/c (for the year ended 31st March 2017)**

Particulars		Amount ₹	Particulars	Amount ₹
To X's Capital	72,000		By Profit for the year	1,50,000
Less guarantee to Z	12,000	60,000		
To Y's Capital	48000			
Less guarantee to Z	8,000	40,000		
To Z's Capital	30,000			
Add guarantee by X	12,000			
Add guarantee by Y	8,000	50,000		
		1,50,000		**1,50,000**

Note : New Ratio 12 : 8 : 5

Alternative Method :

Total Profit ₹ 1,50,000

Z's share ₹ 50,000

Remaining Profit ₹ 1,00,000

₹ 1,00,000 will be shared by X and Y in ratio - 3 : 2

X's share ₹ 1,00,000 x 3/5 = ₹ 60,000

Y's share ₹ 1,00,000 x 2/5 = ₹ 40,000

Dr. **P & L Appropriation A/c** Cr.

Particulars		Amount ₹	Particulars	Amount ₹
To Capital A/c			By Net Profit	1,50,000
X	60,000			
Y	40,000			
Z	50,000	1,50,000		
		1,50,000		1,50,000

2. When Guarantee is provided only by X.

Dr. **P & L Appropriation A/c** Cr.

Particulars		Amount ₹	Particulars	Amount ₹
To Capital A/c			By Net Profit	1,50,000
X	72,000			
Less guarantee to Z	20,000	52,000		
Y		48,000		
Z	30,000			
Add guarantee from X	20,000	50,000		
		1,50,000		1,50,000

3. Guarantee by a partner to firm : A partner may guarantee minimum earnings to the firm or guarantee a profit to the firm. In such a situation, shortfall is debited to the capital account of the partner who gives certain amount guaranter.

Example 16 :

A, B and C are partners sharing profit in ratio of 5:3:2. C gives guarantee to firm of minimum ₹60,000 earnings but C could earn only ₹ 40,000 for the firm. Total profit earned by the firm is ₹ 1,00,000. Prepare Profit & Loss Appropriation account for distribution of profit among partners.

Dr. **Profit and Loss Appropriation Account** Cr.

Particulars	Amount ₹	Particulars	Amount ₹
To Partners capital A/c		By Profit & Loss Account	1,00,000
A	60,000	By C' s capital A/c	20,000
B	36,000	(guaranteed amount)	
C	24,000		
	1,20,000		1,20,000

Note : Ultimately C will receiving only ₹ 4,000 as his share of profit.

4. Simultaneous guarantee by the partner to the firm and by the firm to the partner : In such a situation first the guarantee by the partner is adjusted then guarantee by the firm is adjusted.

Example 17 :

A, B and C are Partner, sharing profit in ratio of 3 : 2 : 1. It was agreed that **(1)** C would get minimum profit ₹ 1,50,000 **(2)** B made guarantee to the firm that the firm would earn minimum ₹ 2,40,000. Firm earned ₹ 7,60,000 for the current year Which included ₹ 1,60,000 earned by B.

Dr. **Profit and Loss Appropriation Account** Cr.

Particulars	Amount ₹	Particulars	Amount ₹
To Partners Capital A/c		By Profit & Loss Account	7,60,000
A	4,14,000	By B' s capital A/c	80,000
B	2,76,000	(guaranteed amount)	
C	1,50,000		
	8,40,000		**8,40,000**

Working Note : (1) Deficiency recovered from B is ₹ 80,000; (2) C was guaranteed a minimum sum of ₹ 1,50,000. Hence deficiency of ₹ 10,000 will be borne by A and B in the ratio 3 : 2.

Example 18 :

On 1st January, 2016 the balances of capital a/cs of A, B and C were ₹ 10,000, ₹ 18,000, and ₹15,000 respectively. They decided to make following adjustments before distributing profit & loss :

(i) ₹ 1000 per months is to be given to A as salary. (ii) 10% P.A. interest on capital is to be given to all partners (iii) After adjusting one to three adjustments, 10% commission is to be given to A on balance of profit. (iv) After adjusting one to four adjustments, 1/4 part of balance of profit is to given to B. (v) Balance of profit is to be divided in 3:2 ratio between A and C. On 31st December, 2016, the profit of the firm was ₹ 44,900 before above adjustments. Prepare Profit and Loss Appropriation Account of the firm and Partners Capital Accounts.

Solution : **Profit and Loss Appropriation Account**

for the year ended 31 December, 2016

Dr. Cr.

Particulars	Amount ₹	Particulars	Amount ₹
To Salary to A	12,000	By Profit & Loss A/c	44,900
To Interest on Capital			
A 1,000			
B 1,800			
C 1,500	4,300		
To Commission to A $\left(28,600 \times \frac{10}{110}\right)$	2,600		
To Partner's Capital A/c			
B $(26,000 \times \frac{1}{5})$ 5,200			
C $(20,800 \times \frac{3}{5})$ 12,480			
D $(20,800 \times \frac{2}{5})$ 8,320	26,000		
	44,900		**44,900**

Dr. **Partners Capitals Accounts** Cr.

Date	Particulars	A ₹	B ₹	C ₹	Date	Particulars	A ₹	B ₹	C ₹
2016	To Balance c/d	38,080	25,000	24,820	2016	By Balance b/d	10,000	18,000	15,000
31Dec,					31Dec,	By Salary A/c	12,000	-	-
					31Dec,	By Int. on Capital A/c	1,000	1,800	1,500
					31Dec,	By Commission A/c	2,600	-	-
					31Dec,	By P&L App. a/c	12,480	5,200	8,320
		38,080	**25,000**	**24,820**			**38,080**	**25,000**	**24,820**

Example 19 :

A, B and C entered into partnership on 1st January, 2016 to share profit in the ratio of 2 : 1 :1. It was provided in the deed that C's share of profit will not be less than ₹ 70,000 p.a.. The loss for the year ended 31st December, 2016 where ₹ 2,00,000 before allowing interest ₹ 9,000 to A, which is due for the current year. Prepare Profit and Loss Appropriation A/c for the year ended 31st December, 2016.

Solution :

In case of Loss, P & L Account will be prepared instead of P & L Appropriation Account.

Profit and Loss Account
for the year ended 31 Dec., 2016

Dr. Cr.

Particulars	Amount ₹	Particulars	Amount ₹
To Loss before Interest on A's Loan	2,00,000	By Net Loss transferred to:	
To interest on A's Loan	9,000	A's Capital A/c (2/3)	1,86,000
To C's Capital A/c (Minimum share of Profit)	70,000	B's Capital A/c (1/3)	93,000
	2,79,000		**2,79,000**

Important Points

- According to section 4 of the Indian Partnership Act, 1932 " Partnership is the relationship between persons who have agreed to share profits of the business carried on by all or any of them acting for all."
- The persons who have entered into a partnership with another individual are called partners and collectively a firm. The name under which the business is carried is called firm name.
- It resolves the limitations of sole proprietorship.

Features of partnership :

1. Two or more persons, maximum 50.
2. There should be an agreement between the partners.
3. The agreement between the partners must be with the object of sharing profits among all the partners. An agreement to share losses is not essential.
4. Law ful Business.
5. Business can be carried on by all or any of them acting for all.
6. Regulation of partnership according to Indian Partnership Act, 1932.
7. Unlimited liability of partners.
8. Partnership does not have a separate entity from its partners.
9. A written document containing the terms of agreement between the partners pertaining to the rights and duties of a partners is known as partnership deed. It is better to have written agreement to avoid any dispute.
10. Rules applicable in absence of partnership deed : No interest will be allowed on capital, no interest will be charged on drawings, remuneration (salary, commission) is not paid to any partner and interest on loan is paid @ 6% p.a.

    There are two methods to deal with partners capital Account :

1. **Fluctuating Capital Account Method :** Under this method the partners maintain capital account and all transactions (including capital) are made in the capital account.
2. **Fixed Capital Account Method :** Under this system two accounts are maintained (a) Partner's Capital Account (b) Partner's Current Account. All transactions (other then capital) are made in Partners Current A/c.

- **Profit and Loss Appropriation Account :** Distribution of profits among the partners is made through P & L Appropriation Account. P & L Appropriation Account is the extension of P & L A/c.
- **Interest on Capital :** Interest on capital will be allowed when it is provided by partnership deed. It will be allowed only when there is profit.
- **Interest on Drawings :** Interest on drawings is to be charged if partnership deed provides so. There are two methods of calculation of interest on drawings (a) Product Method (b) Average Period Method

  Treatment of Past Adjustments : After the final accounts have been prepared, some omission are noticed then necessary adjustments can be made in partner's capital account by passing an adjustment entry.

  Guarantee of Profit to a Partner : In such a situation when the share of profit of the new or existing partner is less than the minimum guaranteed amount the deficiency is met by all the partners or any one of the existing partners.

Glossary

Partnership	Partnership is the relation between persons who have agreed to share the profits of the business carried on by all or any of them acting for all.
Partners	The persons who have entered into partnership are called partners.
Name of Firm	The name under which the business is carried is called firm name.
Partnership Deed	It is written agreement between partners.
Partners Capital	The amount contributed by partners in a firm is called partners capital.
Fixed Capital	Fixed capital means capital invested by each partner in the firm remains fixed or unaltered.
Fluctuating Capital	All transactions of a partner (including capital) are recorded in his capital account. As a result balance in the capital account fluctuates.
Drawings	Drawings means the amount withdrawn by partners in cash or kind for their personal use.
Profit Sharing Ratio	The ratio in which profits of firm are distributed among partners.
Profit & Loss Appropriation Account	P & L Appropriation Account is an extension of P & L A/c. It is prepared to show how net profit has been distributed among the partners

Questions for Exercise

Multiple choice questions :

1. In the absence of Partnership Deed the interest on loan is payable at:
   (a) 6% p.m. (b) 0. 5% p.m. (c) 5% p.a. (d) 4% p.a.
2. In absence of Partnership Deed profit sharing ratio is:
   (a) capital ratio (b) equally (c) sacrificing ratio (d) as decided by the partners
3. Calculate the Interest on Ram's drawings @ 10% if he withdrew ₹24,000 during the year.
   (a) ₹ 1,200 (b) ₹ 1,800 (c) ₹ 2,400 (d) ₹ 1,600
4. In absence of partnership deed:
   (a) Interest on capital is given (b) Interest on drawing is charged
   (c) Salary is given (d) Provided share in profits
5. In a partnership firm maximum number of partners is :
   (a) 2 (b) 10 (c) 20 (d) 50
6. Partners are not entitled to receive -------- in the absence of partnership agreement:
   (a) salaries (b) interest on capital (c) fees and commission (d) all the above
7. The balance of partners capital account will reduce with ------
   (a) Interest on capital (b) Interest on drawings (c) Salaries (d) Interest on partners loan
8. Partnership Deed is the agreement between the partners in:
   (a) Oral (b) written (c) Implied (d) None of these
9. The persons who form the partnership are individually known as :
   (a) Firm (b) Partners (c) Sole trader (d) Conventurers
10. Interest on Drawings is ---------- for firm:
    (a) Income (b) Expenses (c) Income and Expense both (d) none of these

Very Short Answer Type Questions :

1. What is the minimum and maximum limit on number of partners in a firm?
2. What do you understand by Partnership Firm?
3. What do you mean by Profit and Loss Appropriation Account ?

4. Give two circumstances in which fixed capital of partners may change.
5. What Accounts are opened: (a) When the capitals are fixed. (b) When the capitals are fluctuating.
6. What is meant by unlimited liabilities of partner ?
7. State any three items of charge on Profits.
8. State any two points regarding need of partnership.
9. What items are shown on the credit side of Fluctuating Capital Account ?
10. What items are shown on the debit side of Fluctuating Capital Account ?
11. Name any two items which are shown on the credit side of Profit and Loss Appropriation Account.
12. Name any two items which are shown on the debit side of Profit and Loss Appropriation Account.
13. Shipra and Shruti are partners in a firm. After preparing the Final Account it was found that salary of ₹ 2000 was not given to shipra. Give Journal entry for rectification.
14. The Firm of A, B & C earned a profit of ₹ 20,000 during the year, which was distributed among the partners in the ratio of 2 : 1 : 1, whereas it should be in the ratio of 1 : 2 : 2. Give Journal entry for rectification.
15. Write the names of methods regarding adjustment in closed partnership accounts. (RBSE 2008)
16. How would you calculate interest on drawings of equal amounts drawn in the middle of every month?

Very Short Answer type Questions :

1. Name any two items which are shown on the credit side of Profit and Loss Appropriation Account.
2. In the absence of partnership deed, what are the rules relating to :
   (A) Interest on partner's Capital (B) Interest on partner's Drawings (C) Interest on partner's Loan
   (D) Partner's profit sharing Ratio (E) Salaries of partners
3. Rashmi & Ashish are two partners of a firm. Rashmi withdraws ₹ 1000 at the beginning of each month whereas, Ashish withdraws ₹ 2000 at the end of each months during the whole year. Interest on drawings is charged @ 12% per annum. Calculate the amount of interest at the end of the year. (RBSE 2005)
4. What is meant by Guarantee of profit to a Partner?
5. For how much period, interest on drawings will be calculated, if the equal amounts are drawn for 6 months ended on (i) Ist date of every month. (ii) End of every month. (iii) Middle of every month?
6. Chandra, Surya and Kiran are partners in a firm. During the year 2016, their drawings were as follows :

(Date)	(Chandra) ₹	(Surya) ₹	(Kiran) ₹
01-02-16	1,000	-	2,000
01-05-16	3,000	4,000	1,000
01-08-16	-	4,000	3,000
01-12-16	6,000	2,000	4,000

   Calculate the interest on drawings @6% p.a. for the year ended on 31st December, 2016 by 'Product Method'
   Ans. : Interest on Drawings ₹ 205; ₹ 270 and ₹ 245.
7. Ram, Rahim and Roja are partners sharing profit and loss in the ratio of 3 : 2: 1. As per partnership deed Roja's minimum profit will be ₹ 10,000 p.a. The profit for the half year ended on 31st March 2017 was ₹ 24,000. Pass necessary Journal entry for the distribution of the profit and prepare Profit and Loss Appropriation Account.
   Ans. : N.P. divided ₹ 11,400, ₹ 7,600 and ₹ 5,000). (RBSE2010)
8. X, Y and Z have Capital of ₹ 40,000, ₹ 30,000 and ₹ 20,000. For the year 2016; Interest was credited to them @ 12% p.a. instead of @ 10% p.a. With what amount you will pass the adjustment entry?
   Ans. : A's Capital A/c Dr. ₹ 200; C's Capital A/c Cr. ₹ 200.
9. X, Y and Z are partners sharing profit in ratio 5 :3:2. Z gives guarantee to firm of minimum ₹ 1,20,000 earnings but Z could earn only ₹ 80,000 for the firm. Total profit earned by the firm is ₹ 2,00,000. Prepare Profit & Loss Appropriation Account for distribution of profit among partners.

Ans. : Profit X ₹ 1,20,00, Y ₹ 72,000, Z ₹ 48,000.

10. P, Q and R are partner sharing profit in ratio 3 : 2 : 1. It was agreed that : 1. R would get minimum profits ₹ 3,00,000 2. Q made guarantee to the firm that he would earn minimum ₹ 4,80,000. Firm earned ₹ 15,20,000 for the current year. It included ₹ 3,20,000 earned by Q. Prepare Profit & Loss Appropriation Account for distribution of profit among partners.

    Ans. : Profit P ₹ 8,28,000, Q ₹ 5,52,000, R ₹ 3,00,000.

Essay Type Questions :

1. Define partnership and discuss it's characteristic.
2. What do you mean by fixed and fluctuating Capital Accounts? Point out the difference between the fixed and fluctuating Capital Accounts. Prepare partner's current account by using imaginary figures.
3. What is partnership deed? What points are included in it from accounting point of view?
4. Describe various types of partnership.
5. What do you mean by guarantee of profit to a partner? Explain the two types of such guarantee.
6. How would you adjust the omission disclosed after closing the partnership accounts?

Question No.	1	2	3	4	5	6	7	8	9	10
Answer	B	B	A	D	D	D	B	B	B	A

Numerical Questions :

1. Ram, Mohan and Sohan were partners. Their capital on 1st january 2016 were ₹ 40,000, ₹ 60,000 and ₹ 1,00,000 respectively. Before division of profit, Ram is entitled for salary of ₹ 12,000 and Mohan ₹ 18,000 per annum. Interest is allowed on Capital @ 10% per annum. Out of net divisible profits, first ₹ 40,000 will be divided in their captial ratio and the balance of profit is to be divided equally. The profit of the firm for the year ended on 31st December, 2016 amounted to ₹ 1,20,000 before making all the above adjustments. Prepare Profit & Loss Appropriation A/c, the partner's capital account on 31st December 2016 and Pass a Journal entry for distribution of profit.

   Ans. : Profit divided Ram ₹ 18,000, Mohan ₹ 22,000 and Sohan ₹ 30,000 respectively.

2. Ram, Shyam and Mohan were partners, their capital on 1st January 2016 were ₹ 50,000, ₹ 30,000 and ₹ 20,000 respectively. Before division of profit, Shyam is entitled for salary of ₹ 3,000 and Mohan ₹ 2,000 per annum. Interest is allowed on Capital @ 10% per annum. Out of net divisible profits, first ₹ 50,000 will be divided in their captial ratio and the balance of profit is to be divided equally. The profit of the firm for the year ended on 31st December, 2016 amounted to ₹ 95,000 before making all the above adjustments. Prepare P & L Appropriation A/c and give Journal entries.

   Ans. : N.P. divided Ram ₹ 35,000, Shyam ₹ 25,000 and Mohan ₹ 20,000.

3. A, B and C were partners. Their capital as on 1st January 2016 was ₹ 40,000, ₹ 27,800 and ₹ 15,900 respectively. Before division of profit, B is entitled for salary of ₹ 2,500 and C for ₹ 2,000 per annum. Interest is allowed on Capital @ 5% per annum. Out of net divisible profits, first ₹ 10,000, A will receive 40%, B-35% and C-25%. Profits in excesses to that are shared equally. For the year ended on 31st December, 2016 after debiting salary but before charging interest the profits were ₹ 23,170. Prepare Profit & Loss Appropriation A/c.

   Ans. : N.P. divided A ₹ 6,995, B ₹ 6,495 and C ₹ 5,495.

4. P and S started a partnership firm on 1st January 2016 with a capital of ₹ 1000, ₹ 10,000 respectively. On 1st March, 2016 P introduced additional capital of ₹ 4,000. On that day S withdrew ₹ 3,000 from his capital. C entered in the firm on 1st July 2016 with a capital of ₹ 15,000. On that day P and S introduced additional capital of ₹ 6,000 and ₹ 5,000 respectively. Profit-Loss are distributed in capital ratio. The profits for the year 2016 were ₹ 29,800. Prepare Profit & Loss Appropriation A/c by giving detailed calculations.

   Ans. : Capital Ratio- 44 : 60 : 45, N.P. divided P ₹ 8,800, S ₹ 12,000 and C ₹ 9,000.

5. A and B are partners sharing profits in the ratio of 7 : 3. On 1st April 2016, their capitals were ₹ 1,00,000, ₹ 40,000 respectively. Interest is to be charged on capital and drawings at 10% per annum. B is to be allowed salary ₹ 1,000 per month. A and B withdrew ₹ 1,000 and ₹ 600 per month respectively on the first day of every month. The profits for the year, prior to calculation of interest on capitals and drawings, but after charging B's salary, amounted to ₹ 54,960. A provision for to commission A at 5% on net profit (after charging such commission) is to be made. Prepare Profit & Loss Appropriation Account for the year ended 31st March, 2017.

Ans.: Interest on Drawings ₹ 650 and ₹ 390, N.P. A ₹ 28000, B ₹ 12000 and A's Commission ₹ 2000.

6. X and Y are partners sharing profits in the ratio of 3 : 2. On 1st April 2016 their capital is ₹ 3,00,000 and ₹ 2,00,000 respectively. The partnership deed provided interest on capital @10% p.a. and salary to Y as ₹ 2,500 p.m. The net profit before providing interest on capital and salary amounts to ₹ 40,000 for the year ended 31st March, 2017. Show the distribution of profit for the year.

Ans.: X Interest on Capital ₹ 15,000, Y Interest on Capital ₹ 10,000, Y's Salary ₹ 15,000.

7. Ruchi and Prashant are partners sharing profits and losses in the ratio of 3:1. On 1st April 2016 their capitals were ₹ 50000, and ₹ 40,000 respectively. During the year ended 31st March 2017 the profit of the firm amounted to ₹ 57,500 before taking into consideration the following :

1. Interest on capital is to be allowed @ 5 % p.a. 2. Ruchi will get commission of 2% on sales. Sales for the year were ₹ 1,25,000 3. Prashant will get a salary of ₹ 250 p.m. 4. Prashant is entitled to a rent of ₹ 625 per month for the use of his premises by the firm 5. 10% of the divisible profit is to be transferred to General Reserve. You are required to prepare the Profit and Loss Appropriation Account.

Ans. : Profit before P & L Appropriation ₹ 50,000, Profit Ruchi ₹ 27,000, Prashant ₹ 9000.

8. A, B and C are partners sharing profit and loss in 3 : 2 : 1 ratio. A withdraws ₹ 2,000 at the beginning of every month, B withdraws ₹ 1,500 in the middle of every month, whereas, C withdraws ₹ 1,000 at the end of every month. Interest on Capitals and drawings is to be charged @ 10% p.a. C is also to be allowed a salary of ₹ 800 per month. After deducting salary but before allowing all types of interest, the profit for the year ended 31st December 2016 was ₹ 1,22,150. Prepare Profit and Loss Account and Capital Accounts and Current Accounts of the partners from the additional informations given below.

	A ₹	B ₹	C ₹
Capital as on 1st Jan., 2016	2,00,000	1,50,000	1,00,000
Additional Capital introduced on 1st April, 2016	50,000	30,000	-
Withdral on 1st Oct., 2016	-	-	20,000
Current Account on 1st Jan. 2016	12,200	5,500	4,100 (Dr.)
Loan Accounts on 1st Jan. 2016	40,000	-	-

Ans. : Profit before P & L Appropriation ₹ 1,19,750, Profit A ₹ 36,000 , B ₹ 24,000, C ₹ 12,000, Current A/c Balance A ₹ 46,650, B ₹ 27,850, C ₹ 14,450.

9. Manish, Navan and Vaibhav are partners in a firm. Balance of their capital accounts as on 1st April, 2016 were : ₹ 4,00,000, ₹ 3,00,000 and ₹ 2,00,000 respectively. The partnership agreement provides :

A. Vaibhav shall be credited for ₹ 40,000 of salary per annum. **B.** After providing Vaibhav salary, 10% p.a. interest on capital to all partners and extra remuneration to Vaibhav as provided in this paragraph 'B' Vaibhav shall be entitled to 10% of all profits in excess of ₹ 35,000 p.a.. **C.** Manish is to have one third of the profits after charging all amount under 'A', 'B','C', **D.** The Balance is to be divided between Navan and Vaibhav in the ratio 4 : 1. The profits for the year ended 31st March, 2017 (before making any provision for the above) was ₹ 3,30,000. You have to prepare Profit & Loss Appropriation Account and Partners Capital Accounts for the year ended 31st March, 2017. During the year Manish, Navan and Vaibhav withdrew the amount for personal use ₹ 20,000, ₹ 15,000 & ₹ 10,000 respectively.

Ans.: Vaibhav Remuneration ₹ 15,000, Profit Manish ₹ 46,250, Navan ₹ 1,11,000, Vaibhav ₹ 27,750, Capital

Balance Manish ₹ 4,66,250, Navans ₹ 4,26,000, Vaibhav ₹ 2,92,750 .

10. A, B and C are equal partners in a firm. Their capitals on 1st January 2016 were ₹ 50,000, ₹ 40,000 and ₹ 30,000 respectively. After closing the accounts of the year 2016, it was found that according to the partnership agreement interest at 10% per annum on partners capitals, a salary of ₹ 3,000 per year to A and a commission of ₹ 6,000 to C were not provided before distribution of profits. It was agreed among the partners to make the adjustment entry at the beginning of the next year rather than to alter the Balance Sheet. Pass one Journal entry in the books of the firm showing the working of adjustments assuming that capitals are fixed.

    Ans. : 'B' Dr. ₹ 3,000, 'A' Cr. ₹ 1,000, 'C' Cr. ₹ 2,000.

11. X, Y, and Z are partners in a firm sharing profit and loss in the ratio of 2 : 2: 1. On 31st March, 2006 after recording drawings and distribution of profits ₹ 30,000, their capitals were ₹ 60,000, ₹ 45,000, and ₹ 30,000 respectively. After this it was found that 5% interest on capital and interest on drawings was omitted to be recorded. Drawings were as follows : X- ₹ 6,000, Y- ₹ 4,500, and Z- ₹ 3,600; Interest on which is to be charged ₹ 120, ₹ 90 and ₹ 45 respectively. Pass necessary Journal entries for the above omissions and prepare adjusted partners capital accounts.

    Ans. : Opening Capital X ₹ 54,000, Y ₹ 37,500 and Z ₹ 27,600, Loss X ₹ 2,280, Y ₹ 2,280, Z ₹ 1,140. Capital Balance X ₹ 60,300, Y ₹ 44,505, Z ₹ 30,195.

12. P, Q and R are partners in a firm. Their capital accounts stood at ₹ 90,000, ₹ 45,000 and ₹ 45,000 respectively on 31st March, 2017. **1.** R was to be allowed a remuneration of ₹ 9000 p.a.. **2.** Interest at 5% p.a. was to be provided on capitals **3.** Profits were to be divided in the ratio of 2 : 2 : 1. Ignoring the above items, net profit of ₹ 54000 for the year ended 31.03.2017. It was divided among the three partners equally. Make journal entry for rectification and show workings.

    Ans. : Opening Capital P ₹ 72000, Q ₹ 27000, R ₹ 27000, Q Dr. ₹ 1170, P Cr ₹ 1080, R Cr. ₹ 90.

13. Satish, Nitin and Ajay are partners with a fixed capital ₹ 1,00,000, ₹ 75,000, and ₹ 75,000 respectively. Their current account balances were Satish ₹ 5,000 (Cr.), Nitin ₹ 4,000 (Cr.), and Ajay ₹ 2,500 (Dr.). The partnership deed provided as under :

    1. Interest on capital @ 5% p.a. **2.** Nitin was entitled for rent @ ₹ 500 p.m. for providing his premises to the firm. **3.** Ajay was entitled to a salary of ₹ 1,000 p.m. The profits of the firm were to be distributed as follows : **A-** The first ₹ 20,000 in proportion to their capitals. **B-**Next ₹ 20,000 in the ratio 2:2:1. **C-** Remaining profits to be shared equally. The net profit before the above adjustments for the year was ₹ 85,500. Prepare Profit & Loss Appropriation Account, Capital Accounts and Current Accounts of the partners.

    Ans. : Profit before P& L Appropriation ₹ 79,500, Profit Satish ₹ 21,000, Nititn ₹ 19,000, Ajay ₹ 15,000, Current Account Balance Satish ₹ 31,000, Nitin ₹ 32,750, Ajay ₹ 28,250.

14. X, Y and Z are partners in a firm. Their profit sharing ratio is 5 : 3: 2. However, Z is guaranteed a minimum amount of ₹ 10,000 as share of profit every year. Any deficiency arising on that account shall be met by Y. The profit for the two years ended 31st December, 2015 and 2016 were ₹ 40,000 and ₹ 60,000 respectively. Prepare Profit & Loss Appropriation Account for the two years.

    Ans. : Share of Profit 2015 - X ₹ 20,000 , Y ₹ 10,000, Z ₹ 10,000 ; 2016 - X ₹ 30,000, Y ₹ 18,000, Z ₹ 12,000.

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2

Admission of New Partner

Learning objectives :

After studying this chapter you should be able to understand the followings :

- Concept and the ways of reconstitution of a partnership firm.
- Effects of admission of a new partner.
- Find out the new profit sharing ratio and calculate the sacrifice ratio.
- Meaning, features, nature, types of goodwill, methods of valuation of goodwill and accounting treatment of goodwill.
- Accounting for revaluation of assets and reassessment of liabilities, revaluation account and memorandum revaluation etc.
- Distribution of accumulated profits/losses and reserves.
- Adjustment of capital; adjustment of old partners capital on the basis of new partner's capital, determination of capital of new partner on the basis of old partner's capital.
- Meaning and accounting treatment of change in profit sharing ratio among existing partners.

Reconstitution of Partnership firm

Any change in the existing partnership arrangement among the partners is called reconstitution of partnership firm. The reconstitution of the firm takes place in the following circumstances:

1. Admission of a new partner.
2. Change in the profit sharing ratio among the existing partners.
3. Retirement of an existing partner.
4. Death of a partner.
5. Amalgamation of two partnership firms.

Admission of a new partner

Admission of a new partner means admission of a new member as a owner of firm, resulting in increase in number of the partners in the firm.

According to section 31 of the Indian Partnership Act, 1932, a person may be admitted as a partner in the firm with the consent of existing partners. At the same time he becomes answerable for all the activities of the firm. The person so admitted as a partner shall not be liable for the past acts of the firm. After admission the new partner gets the following two rights –

(i) Right to share in the asset of the firm, and

(ii) Right to share in future profits of the firm.

New partner brings in capital to get right in the assets of the firm. The amount he pays for share in future profits is called goodwill.

Main adjustments at the time of admission of a new partner :

1. Calculation of new profit sharing ratio.
2. Calculation of sacrifice ratio.
3. Valuation and accounting for goodwill.
4. Revaluation of assets and re-assessment of liabilities.
5. Adjustment of accumulated profits, reserves and losses.
6. Adjustment of capital.

Calculation of new profit sharing ratio and sacrifice ratio

New Profit Sharing Ratio (NPSR) : New profit sharing ratio in which all partners including new partner share future profits of the firm.

The incoming partner acquires his share of profit from the old partners so profit share of old partners is changed. Thus it is essential that new profit sharing ratio of partners be computed.

Sacrifice Ratio (SR) : Sacrifice ratio is the ratio in which old partners sacrifice their share of profit in favour of the new partner. Goodwill is paid to the Sacrificing partners in their sacrifice ratio at the time of admission of a new partner.

Sacrifice Ratio (S.R.) = Old Profit Sharing Ratio (OPSR) – New Profit Sharing Ratio (NPSR)

New Profit Sharing Ratio = Old Profit sharing Ratio (OPSR) – Sacrifice Ratio (SR)

New profit sharing ratio can be calculated in the following ways –

I. When only the ratio of the new partner is given in the question **:**

(i) A and B are partners sharing profits in the ratio 3 : 1. C is admitted for 1/4th share in the profits. Calculate new profit sharing ratio and sacrifice ratio.

Suppose total profit of the firm be = 1

C's share ¼ , so remaining profit will be 1-¼ = ¾

It is shared by A and B in their old profit sharing ratio.

A's new share $= \frac{3}{4} X \frac{3}{4} = \frac{9}{16}$ B's new share $= \frac{3}{4} X \frac{1}{4} = \frac{3}{16}$

New profit sharing ratio of A, B and C = $\frac{9}{16} : \frac{3}{16} : \frac{1}{4} = \frac{9 : 3 : 4}{16} \quad = 9 : 3 : 4$

Sacrifice ratio = Old profit sharing ratio – New profit sharing ratio

$A = \frac{3}{4} - \frac{9}{16} = \frac{3}{16}$; $B = \frac{1}{4} - \frac{3}{16} = \frac{1}{16}$ Sacrifice ratio = $\frac{3}{16} : \frac{1}{16} = 3 : 1$

Note : When share of new partner is given without the detail of sacrifice made by the old partners. In this case the sacrifice ratio will always be old profit sharing ratio.

(ii) When a new partner purchases his share of profits from the old partners equally. In such cases the new profit sharing ratio of the old partners will be ascertained by deducting the sacrifice made by them from the existing share of profit.

A and B are partners sharing profits in ratio of 7 : 5. They admit C for 1/6th share, which he acquires in equal proportions from both. Find the new profit sharing ratio and sacrificing ratio.

Calculation of sacrifice ratio :

A's sacrifice = $\frac{1}{6} X \frac{1}{2} = \frac{1}{12}$ B's sacrifice = $\frac{1}{6} X \frac{1}{2} = \frac{1}{12} \frac{1}{12} : \frac{1}{12} = 1 : 1$

Calculation of new profit sharing ratio :

New profit sharing ratio = Old profit sharing ratio – Sacrifice ratio

A's new share = $\frac{7}{12} - \frac{1}{12} = \frac{6}{12}$ B's new share = $\frac{5}{12} - \frac{1}{12} = \frac{4}{12}$ C's new share = $\frac{1}{12}$ or $\frac{2}{12}$

Thus new profit sharing ratio of A, B and C will be = $\frac{6}{12} : \frac{4}{12} : \frac{1}{6} = \frac{6 : 4 : 2}{12} = 3 : 2 : 1$

(iii) When new partner acquire his share of profits from the old partner in different proportions :

A and B are partners in a firm sharing profits in the ratio of 3 : 2. C is admitted for 1/5th share in profits of the firm. He gets it from A and B in the ratio of 1 : 2. Calculate new profit sharing ratio and sacrifice ratio.

A's sacrifice = $\frac{1}{5} X \frac{1}{3} = \frac{1}{15}$ B's sacrifice = $\frac{1}{5} X \frac{2}{3} = \frac{2}{15}$ Sacrifice ratio = $\frac{1}{15} : \frac{2}{15} = 1 : 2$

New profit sharing ratio = Old profit sharing ratio – sacrificing ratio

A's new share = $\frac{3}{5} - \frac{1}{15} = \frac{8}{15}$; B's new share = $\frac{2}{5} - \frac{2}{15} = \frac{4}{15}$; C's new share = $\frac{1}{5}$ or $\frac{3}{15}$

Thus new profit sharing ratio of A, B and C will be = $\frac{8}{15} : \frac{4}{15} : \frac{1}{5} = 8 : 4 : 3$

(iv) When new partner acquires his share wholly from one partner.

(i) A and B are partners in a firm sharing profits in the ratio of 7 : 3. C is admitted for 1/10th share in profits. C gets it wholly from A. Calculate new profit sharing ratio and sacrifice ratio.

Sacrificing ratio :

A's sacrifice = $\frac{1}{10}$ A's new share $= \frac{7}{10} - \frac{1}{10} = \frac{6}{10}$ B's new share = $\frac{3}{10}$ C's new share = $\frac{1}{10}$

Thus new profit sharing ratio of A, B and C will be = $\frac{6}{10} : \frac{3}{10} : \frac{1}{10} = 6 : 3 : 1$

Sacrifice ratio = $\frac{1}{10} : 0 = 1 : 0$

(ii) A and B are partners in a firm sharing profits in the ratio of 3 : 2. They admit C and D as partners with 1/5th and 1/5th share respectively. C acquires his entire share from A and D acquires his entire share from B. Find new profit sharing ratio.

A's sacrifice = $\frac{1}{5}$ B's sacrifice = $\frac{1}{5}$; A's new share = $\frac{3}{5} - \frac{1}{5} = \frac{2}{5}$;

B's new share = $\frac{2}{5} - \frac{1}{5} = \frac{1}{5}$ C's new share = $\frac{1}{5}$ D's new share = $\frac{1}{5}$

Thus new profit sharing ratio of A, B, C and D will be = $\frac{2}{5} : \frac{1}{5} : \frac{1}{5} : \frac{1}{5} = 2 : 1 : 1 : 1$

(v) When new partner purchases his share from old partners in a particular ratio.

A and B are partners sharing profits in the ratio of 3 : 2. They admit C for 1/4th share, which he takes 4/24 from A and 2/24 from B. Calculate new profit sharing ratio and sacrifice ratio.

A's sacrifice = $\frac{4}{24}$ B's sacrifice = $\frac{2}{24}$

A's new share = $\frac{3}{5} - \frac{4}{24} = \frac{52}{120}$ B's new share = $\frac{2}{5} - \frac{2}{24} = \frac{38}{120}$ C's new share = $\frac{1}{4}$ or $\frac{30}{120}$

Thus new profit sharing ratio of A, B and C will be :

$= \frac{52}{120} : \frac{38}{120} : \frac{30}{120} = 52 : 38 : 30 = 26 : 19 : 15$ Sacrifice ratio = $\frac{4}{24} : \frac{2}{24}$ = 4 : 2 or 2 : 1

(vi) When old partners surrender a particular fraction of their share in favour of the new partner.

(a) A and B are partners sharing profits in the ratio of 3 : 2. C is admitted as new partner. A surrenders 1/5th of his share and B 2/5th of his share in favour of C. Find the new profit sharing ratio and sacrifice ratio.

Sacrifice ratio

A's sacrifice = $\frac{3}{5} X \frac{1}{5} = \frac{3}{25}$ B's sacrifice = $\frac{2}{5} X \frac{2}{5} = \frac{4}{25}$ Sacrifice ratio = $\frac{3}{25} : \frac{4}{25}$ = 3 : 4

A's new share = $\frac{3}{5} - \frac{3}{25} = \frac{12}{25}$ B's new share = $\frac{2}{5} - \frac{4}{25} = \frac{6}{25}$ C's new share = $\frac{3}{25} + \frac{4}{25} = \frac{7}{25}$

Thus new profit sharing ratio of A, B and C will be = $\frac{12}{25} : \frac{6}{25} : \frac{7}{25} = 12 : 6 : 7$

(b) A and B are partners in a firm sharing profits in the ratio of 3 : 2. C is admitted as new partner. A surrenders 1/3rd of his share while B surrenders 1/10th from his share in favour of C. Calculate new profit sharing ratio and sacrifice ratio.

A's sacrifice $= \frac{3}{5} X \frac{1}{3} = \frac{1}{5}$ B's sacrifice $= \frac{1}{10}$

A's new share $= \frac{3}{5} - \frac{1}{5} = \frac{2}{5}$ or $\frac{4}{10}$ B's new share $= \frac{2}{5} - \frac{1}{10} = \frac{3}{10}$ C's new share $= \frac{1}{5} + \frac{1}{10} = \frac{3}{10}$

Thus new profit sharing ratio of A, B and C will be :$= \frac{4}{10} : \frac{3}{10} : \frac{3}{10} = 4 : 3 : 3$

Sacrifice ratio $= \frac{1}{5} : \frac{1}{10} = \frac{2:1}{10}$ or 2 : 1

1. A, B and C are partners in the ratio of 3 : 2 : 1. D is joining the firm as a new partner for 1/6th share in profit. C would retain his original share. Find new profit sharing ratio.

   C's new share $= \frac{1}{6}$ D's new share $= \frac{1}{6}$

   Combined share of C and D $\frac{1}{6} + \frac{1}{6} = \frac{2}{6}$ Remaining share $1 - \frac{2}{6} = \frac{4}{6}$

   A's new share $= \frac{4}{6} X \frac{3}{5} = \frac{12}{30}$ B's new share $= \frac{4}{6} X \frac{2}{5} = \frac{8}{30}$

   Thus new profit sharing ratio of A, B, C and D will be $= \frac{12}{30} : \frac{8}{30} : \frac{1}{6} : \frac{1}{6} = \frac{12:8:5:5}{30}$ = 12:8:5:5

2. A and B are partners sharing profits in the ratio of 3 : 2. C is admitted for 1/4th share. A and B decide to share equally in future. Find new profit sharing ratio and sacrifice ratio.

   C's share $= \frac{1}{4}$ The remaing share $1 - \frac{1}{4} = \frac{3}{4}$

   A's new share $= \frac{3}{4} X \frac{1}{2} = \frac{3}{8}$ B's new share $= \frac{3}{4} X \frac{1}{2} = \frac{3}{8}$

   Thus new profit sharing ratio of A, B and C = $\frac{3}{8} : \frac{3}{8} : \frac{1}{4}$ = 3 : 3 : 2

   Sacrifice ratio = Old profit sharing ratio – New profit sharing ratio

   Sacrifice made by A= $\frac{3}{5} - \frac{3}{8} = \frac{9}{40}$ Sacrifice made by B= $\frac{2}{5} - \frac{3}{8} = \frac{1}{40}$

   Sacrifice ratio $= \frac{9}{40} : \frac{1}{40}$ =9 : 1

3. A and B are partners sharing profits in the ratio 3 : 2. They admitted C as a partner. Ratio between B and C will be same as the ratio between A and B.

   A : B   B : C
   3 : 2   3 : 2
   x 3   x 2
   9 : 6   6 : 4

   Thus new profit sharing ratio = 9 : 6 : 4

4. A and B are partners sharing profits in the ratio of 3 : 2. They admitted C for 1/5th share. C gets his ½ share from A and gets his remaining share from A and B equally. Find new profit sharing ratio and sacrifice ratio.

   A's sacrifice $\frac{1}{5} X \frac{1}{2} = \frac{1}{10}$ Remaining share of C $\frac{1}{5} - \frac{1}{10} = \frac{1}{10}$

   againA's sacrifice $\frac{1}{10} X \frac{1}{2} = \frac{1}{20}$ B's sacrifice $\frac{1}{10} X \frac{1}{2} = \frac{1}{20}$

   Total sacrifice of A $\frac{1}{10} + \frac{1}{20} = \frac{3}{20}$ Sacrifice ratio $\frac{3}{20} : \frac{1}{20} =$ 3 : 1

   New profit sharing ratio = old profit sharing ratio – sacrifice ratio

   A $\frac{3}{5} - \frac{3}{20} = \frac{12-3}{20} = \frac{9}{20}$ B $\frac{2}{5} - \frac{1}{20} = \frac{8-1}{20} = \frac{7}{20}$ So new profit sharing ratio = $\frac{9}{20} : \frac{7}{20} : \frac{1}{5}$ or 9 : 7 : 4

5. A, B and C are partners sharing profits as 3:2:1. They admit D, who gets 1/4th of his share from A. B surrenders 1/4th of his share and C surrenders 1/5th of his share. Find new profit sharing ratio.

   B's sacrifice $\frac{2}{6} x \frac{1}{4} = \frac{2}{24}$ C's sacrifice $\frac{1}{6} x \frac{1}{5} = \frac{1}{30}$

Total sacrifice of B and C $\frac{2}{24}+\frac{1}{30}=\frac{10+4}{120}=\frac{14}{120}$

A's sacrifice is $1/4^{th}$ of D's share i.e $3/4^{th}$ of D's share is sacrificed by B and C.

Thus A's sacrifice is $\frac{14}{120}X\frac{4}{3}X\frac{1}{4}=\frac{14}{360}$

Sacrifice ratio A: B: C

$\frac{14}{360}:\frac{2}{24}:\frac{1}{30}=\frac{14:30:12}{360}$

New profit sharing ratio = old profit sharing ratio – new profit sharing ratio

A $\frac{3}{6}-\frac{14}{360}=\frac{180-14}{360}=\frac{166}{360}$ B $\frac{2}{6}-\frac{2}{24}=\frac{8-2}{24}=\frac{6}{24}$ C $\frac{1}{6}-\frac{1}{30}=\frac{5-1}{30}=\frac{4}{30}$

D's share $\frac{14}{360}+\frac{2}{24}+\frac{1}{30}=\frac{56}{360}$

A:B:C:D = $\frac{166}{360}:\frac{6}{24}:\frac{4}{30}:\frac{56}{360}=\frac{166:90:48:56}{360}$ or 83 : 45 : 24 : 28

6. A and B are partners sharing profit in the ratio of 3:2. C is admitted as new partner. The new profit sharing ratio among A,B and C is 5:3:2. Find sacrifice ratio.
   sharing ratio = old profit sharing ratio – new profit sacrifice ratio

   A=$\frac{3}{5}-\frac{5}{10}=\frac{1}{10}$ B=$\frac{2}{5}-\frac{3}{10}=\frac{1}{10}$ Sacrifice Ratio= 1 : 1

Goodwill :

Goodwill is an intangible asset. Goodwill is a thing very easy to describe, very difficult to define. It is the benefit and advantage of the good name, reputation and connection of a Business. It is the attractive force which brings in the customers.

"Goodwill is nothing more than the probability that the old customers will resort to the old place"

-Lord Eldon

Characteristics of Goodwill :

1. It is an intangible asset.
2. It is a valuable asset.
3. It helps to earn higher profits.
4. It is an attractive force which brings in customers to old place of business.
5. Its value is fluctuating.

Factors affecting the value of Goodwill :

1. Favourable location of the business
2. Efficiency of management.
3. The longevity of the business.
4. Nature of goods.
5. Possession of licence.
6. Monopoly.
7. Risk involved
8. Trend of profit.
9. Future competition.
10. Capital required.
11. Quality of products.

Need for the valuation of Goodwill :

The need for valuation of goodwill in partnership arises in following circumstances:-

1. When a partner is admitted.
2. When there is a change in profit sharing ratio among the existing partners.
3. When partner retired or dies
4. When the firm is sold.
5. When two firms amalgamate.

Types of Goodwill

Purchased Goodwill

Self Generated Goodwill

1. **Purchased Goodwill :** It is the goodwill which is acquired by making payment. For example, when a business is purchased the excess of purchase consideration over its net assets (i.e. Assets-Liabilities) is the value of purchased goodwill.
   a) It arises on purchase of business.
   b) It is recorded in the books of accounts because consideration is paid for it.
   c) It is shown in the balance sheet as an asset
2. **Self Generated Goodwill :**
   a) It is internally generated over a long period of time.
   b) As per accounting standard 26 and Indian A.S 38 it is not recorded in the book of accounts.

Nature of Goodwill

1. Institutional Goodwill or Cat Goodwill | **2. Personal Goodwill or Dog Goodwill** | **3. Goodwill related to casual event or Rat Goodwill**

1. **Institutional Goodwill or Cat Goodwill :** Such type of goodwill exists due to reputation, good name and quality of goods of the entity. There are customers who continue to visit the old business place even if the ownership changes. It is also called cat goodwill because cat does not leave the house even if the master leaves the house. The value of goodwill of such business will be very high.
2. **Personal Goodwill or Dog Goodwill :** When goodwill exists in business due to personality, efficiency and conduct of the owner then such goodwill is called personal goodwill. The customers will go to the old proprietor where he goes. It is also known as Dog Goodwill. A dog is faithful animal. Dogs are attached to the master. It follows its master. Value of such goodwill is less than the institutional goodwill. This type of goodwill exists in entity of professional nature.
3. **Goodwill related to Casual Events or Rat Goodwill :** Under this, value of goodwill of the business is not fixed but fluctuating in nature. Meaning that value of goodwill may change due to insignificant events. It is also known as 'Rat Goodwill.' Rat is attached neither to the master nor to the house. Rat is very flexible and moves frequently. Similarly, some customers have attachment neither to the person nor to the place. The value of such goodwill is very low.

Methods of Valuation of Goodwill :

1. **Years purchase method :** Under this method average profit as calculated is multiplied by number of years purchase to arrive at the value of goodwill.
2. **Average Profit Base :**
   a) **Simple Average Profit** : Under this method average profit of the past few years is taken into consideration. The following adjustments should be taken into account while calculating the average profits.
      a) Abnormal income/ profit of a year should be deducted from of net profit of that year.
      b) Abnormal loss/expenses of a year should be added back to the net profit of that year.
      c) Income from non trade investments should be deducted out of the net profit of that year.

$$\text{Average Profit} = (\text{AP}) = \frac{\text{Total Adjusted Profits}}{\text{No. of years}}$$

Actual Average Profit (AAP)= Average Profits – partner's remuneration

Goodwill = Actual Average Profit X No. of years purchase

1. Goodwill of a firm is valued at two years purchase of the average profits of the last five years.

Years	2012	2013	2014	2015	2016
Profits (₹)	15,000	18,000	7,000 (Loss)	10,000	14,000

Calculate value of goodwill.

Average Profit = $\frac{Total\ Profits}{No.of\ Years}$ = $\frac{15000+18000-7000+10000+14000}{5} = \frac{50000}{5}$ = ₹ 10000

Goodwill = Actual Average Profit X No. of years purchase

= 10000 x 2 = ₹ 20,000

2. Goodwill of a firm is valued at two year's purchase of the average of last 3 years.

Years	Profits ₹	
2014	40000	(including an abnormal gain ₹ 10000)
2015	30000	(after charging an abnormal loss of ₹ 5000)
2016	33000	(including interest on investments of ₹ 8000)

Average profit = $\frac{30000+35000+25000}{3} = \frac{90000}{3}$ = ₹ 30,000

Goodwill = A.P. X No. of years purchase = 30000 X 2 = ₹ 60,000

3. Goodwill of a firm is valued of 3 years purchase of the average profit of last 3 years.

Years	Profits ₹	
2012	25000	(Include speculative profits of ₹ 5000)
2013	(-) 5000	(After debiting loss of stock of ₹ 40000)
2014	22000	(Including profit on sale of assets of ₹ 2000)

Salary of the partner ₹ 5000 p.a.

Calculate the value of goodwill. Average Profit = $\frac{20000+35000+20000}{3} = \frac{75000}{3}$ = ₹ 25,000

Actual Average profit = ₹ 25,000 & ₹ 5,000 = ₹ 20,000 Goodwill = ₹ 20,000 x 3 = ₹ 60,000

b) Weighted Average Profit : This method is preferred when the profits over the past years have been continuously rising or falling. Under this method each year's profit is assigned a weight. Like 1,2,3,4....respectively.

Calculate the value of goodwill on the basis of two years purchase.

Purchase of weighted average profits of past 5 years.

Years	Profits		Weight		Product(PxW)
2012	10000	x	1	=	10000
2013	12000	x	2	=	24000
2014	15000	x	3	=	45000
2015	20000	x	4	=	80000
2016	30000	x	5	=	150000
			15		**309000**
			Total Weight		Total Product of Profits

Weighted Average Profit(WAP) = $\frac{Total\ product\ of\ profits}{Total\ of\ weight}$

= $\frac{309000}{15}$ = ₹20,600

Goodwill = ₹ 20,600 X 2 = ₹ 41,200

(1) Calculate the value of goodwill on the basis of 3 years purchase of the weighted average profit.

Years	Profits		Weight		Product (P X W)
2013	5000	X	1	=	5000
2014	7000	X	2	=	14000
2015	10000	X	3	=	30000
2016	15000	X	4	=	60000
		∑W	10	∑P	1,09,000

Weighted Average Profit (W.A.P.) = $\frac{\sum P}{\sum W} = \frac{109000}{10} =$ ₹ 10,900

Goodwill = 10900 X 3 = ₹ 32,700

(iii) Compute the value of goodwill on the basis of 3 years purchase of weighted average profits of last 4 years.

Years	Profits ₹	Weight
2012-13	20200	1
2013-14	24800	2
2014-15	20000	3
2015-16	30000	4

On scrutiny of the accounts the following matters are revealed :-

(i) On 1-12-2014 a major repair was made in respect of the plant incurring ₹ 6000 which amount was charged to revenue. The paid sum is agreed to be capitalised for goodwill. Calculate subject to adjustment of depreciation of 10% p.a. on reducing balance method.

(ii) The closing stock for the year 2013-14 was over valued by ₹ 2400.

(iii) To cover the management cost an annual charge of ₹ 4800 should be made for the purpose of goodwill valuation.

Years	2012-13₹	2013-14₹	2014-15₹	2015-16₹
Profits	20200	24800	20000	30000
(-) Managerial Cost	4800	4800	4800	4800
(+) Capital Expenditure Charge to revenue	-	-	6000	-
(-) Dep. (Not Provided)	-	-	200	580
(-) Over Valuation of closing Stock	-	2400	-	-
(+) Over Valuation of Opening stock	-	-	2400	-
Adjusted Profits	**15400**	**17600**	**23400**	**24620**

3. **Super Profit Base :** The excess of actual profit over the normal profit is called super profit.

Super profit = Actual Average Profit – Normal Profit

S.P = A.A.P – N.P Normal Profit = Capital Employed x NRR

Normal Rate of Return (NRR) : Normal rate of return refers to the rate of return normally earned by other firms in the same industry.

Normal Rate of return (NRR) = Rate of Interest + Risk Factor

Note : If super profit is zero or negative then there will be not goodwill.

Goodwill = super profit x no. of years purchase;

(i) The capital of the firm is ₹ 50000 and normal rate of return is 10%. Actual average profit is ₹ 9000. Calculate goodwill at 4 times the super profit.

Normal profit = Capital Employed x N.R.R. = ₹ 50000 x 10 /100 = ₹ 5000

S.P. = AAP - NP

= ₹ 9000 - ₹ 5000 = ₹ 4000

Goodwill = SP X 4 = ₹ 4000 X 4 = ₹ 16000

(ii) Capital of the firm of A and B is ₹ 200000 and the normal rate of return is 10%. Annual sales to the partners are ₹ 6000 each. The profits of the last three years were ₹ 4000, ₹ 35000 and ₹ 45000 respectively. Goodwill is to be valued at two years purchase of last 3 years super profit.

Average Profit = $\frac{40000 + 35000 + 45000}{3} = \frac{120000}{3} =$ 40000 - 12000 (Salary to partners) = ₹ 28000

Normal profit = Capital Employed x N.R.R. → = ₹ 2, 00,000 x 10 /100 = ₹ 20000

S. P. = AAP – NPSP = 28000 - 20000 = ₹ 8000 Goodwill= SP X 2 = 8000 X 2 = ₹ 16000

(iii) On 1-4-2017 an existing firm had asset of ₹ 200000 including cash of ₹ 10000. Its creditors amounted to ₹ 10000 on that date. The firm had a reserve of ₹ 30000, while partner's capital account showed a balance of ₹ 160000. Rate of interest is 8% and risk factor is 2%. Goodwill of the firm is valued at ₹ 33000 at three years purchase of super profit. Find actual average profit of the firm.

Capital Employed = Assets – Liabilities = 200000 – 10000 = ₹ 190000

Normal rate of return = rate of interest + Risk factor = 8% + 2% = 10%

Normal profit = Capital Employed x N.R.R. = 190000 X 10 /100 = ₹19000

Goodwill = SP X 3 = ₹ 33000 33000 = SP X 3 S.P. = 33000/3 = ₹ 11000

S.P = AAP-NP ₹ 11000 = AAP-19000 AAP=₹30,000

(iv) Profits of last three years of firm were ₹ 20000, ₹ 17000, ₹ 23000 respectively, Capital employed is ₹ 100000 and normal rate of return is 12%. Find goodwill on the basis of three years purchase of super profit.

Average Profit=$\frac{20000+17000+23000}{3}$ = $\frac{60000}{3}$ = ₹ 20,000

Normal Profit = Capital Employed X N.R.R. = 100000 X 12 /100 = ₹ 12000

S.P = AAP - NP = 20000 - 12000 = ₹ 8000 Goodwill = SP X 3 = 8000 X 3 = ₹ 24000

(2) **Capitalisation method :** Under this method goodwill can be calculated in 2 ways :

(i) By Capitalising the Average Profit, or

(ii) By Capitalising the Super Profits.

(iii) **Capitalisation of Average Profit Method :**

Capitalised value of Average Profit = $\frac{Average\ Profit\ X\ 100}{Normal\ Rate\ of\ Return}$

Goodwill = Capitalised value of profits – Capital Employed

Note : If the capitalised value of business less capital employed is zero or negative there will be no goodwill.

a. From the figures given below, calculate goodwill by capitalisation of average profit method.

(a) Actual Average Profits ₹ 15000

(b) Capital of firm ₹ 100000 (c) NRR 10%

Goodwill = $\frac{AAP\ X\ 100}{NPR}$ – Capital Employed = $(\frac{15000\ X\ 100}{10})$ – ₹ 100000

Goodwill = 150000 – 100000 ₹ 50,000

b. From the figures given below, calculate goodwill by capitalisation of average profit method.

(a) Actual Average Profits ₹ 46000

(b) NRR 10%

(c) Assets ₹ 500000

(d) Liabilities ₹ 100000

Goodwill = $\frac{AAP\ X\ 100}{NRR}$ – Capital Employed = $(\frac{46000\ x\ 100}{10})$ – 400000 = ₹ 60,000

(ii) Capitalisation of Super Profit Method

Goodwill = $\frac{Super\ Profit\ X\ 100}{NRR}$

(a) Actual Average Profit ₹ 1,00,000, NRR 10%

Capital Employed ₹ 800000

Normal Profit = Capital Employed x N.R.R. = 800000 x 10 /100 = ₹ 80,000

S.P.=100000 - 80000 = ₹ 20000 ; Goodwill = $\frac{S.P.X\ 100}{NRR}$ = $\frac{20000\ X\ 100}{10}$ = ₹ 2,00,000

(b) Assets ₹ 300000, Liabilities ₹ 50000, NRR 10%, AAP ₹ 30000

Normal Profit = Capital Employed x N.R.R. = 250000 X 10 /100 = ₹ 25,000

Super Profit = AAP – NP = ₹ 30,000 – ₹ 25,000 = ₹ 5,000

Goodwill = $\frac{S.P.X\ 100}{NRR} = \frac{5000\ X\ 100}{10}$ = ₹ 50,000

(c) A.A.P. ₹ 50,000; NRR 10%; Capital Employed ₹ 3,00,000. Calculate goodwill by Capitalisation of Average Profit and Super Profit Method.

i) on the basis of Average Profit

Goodwill = $(\frac{\text{AP X 100}}{\text{NRR}})$ – Capital Employed = $(\frac{\text{50000 X 100}}{10})$ – 300000 = ₹2,00,000

ii) on the basis of Super Profit

Normal Profit = Capital Employed x N.R.R. = 300000 x 10 /100 = ₹ 30000

S.P = AAP - NP = 50000 – 30000 = ₹ 20000

Goodwill = $\frac{S.P.X\ 100}{NRR} = \frac{20000\ X\ 100}{10}$ = ₹ 200000

(4) Hidden Goodwill Method :

Total capital of the firm will be calculated according to new partner's share of profit.

Goodwill of the firm = Total capital – Adjusted capital of the old partners– Capital of new partner

Adjusted Capital = Balance of capital A/C + Reserves + Profits – Loss

(i) A and B are partners in a firm. Their capitals are ₹ 20000 and ₹ 30000 respectively. They admit C for $1/5^{th}$ share. ₹ 15000 is brought by C as his share of capital. Find the value of firm's goodwill.

Total Capital of the firm on the basis of C's capital $15000 \text{ X } \frac{5}{1} =$ ₹ 75,000

Goodwill = Total capital – Adjusted capital of A and B – C's capital

= 75000 – 50000 – 15000 = ₹ 10000

(ii) A and B are partners in a firm. Their capital are ₹ 10,000 and ₹ 20,000. Undistributed reserves ₹10,000. C is admit for $1/4^{th}$ share. ₹ 20,000 is brought by C as his capital. Find the value of firm's goodwill.

Total capital of the firm $\frac{20000 \text{ x } 4}{1}$ = ₹ 80000

(-) Adjusted capital of A (10000 + 5000) = 15000

(-) Adjusted capital of B (20000 + 5000) = 25000

(-) C's capital = 20000

Goodwill of the firm ₹ 20000

(5) Purchase Consideration Method :

Goodwill = Purchase Consideration – Net Assets

Illustration : Assets ₹ 200000 Liabilities ₹ 50,000

Purchase consideration ₹ 1,70,000

Find the value of Goodwill.

Net Assets = Assets – Liabilities = 200000 – 50000 = ₹ 1,50,000

Goodwill = Purchase Consideration - Net Assets= 170000 – 150000 = ₹ 20,000

(6) Annuity Method :

Goodwill= Super Profit X Present Value of Annuity

$$\text{Present Value of Annuity} = \frac{1 - \left(\frac{100}{100+r}\right)^n}{\frac{r}{100}}$$

n = no. of years r = normal rate of return

Illustration : n = 3, r = 10%

$$\text{Present Value of Annuity} = \frac{1 - \left(\frac{100}{100+10}\right)^{3}}{\frac{10}{100}} = 2.487$$

(i) AAP = ₹ 20,000, Capital Employed = ₹ 1,50,000, NRR = 10%, P.V. A = 2.487

Find value of the Goodwill by Annuity Method

Normal profit = Capital Employed x N.R.R. = 150000 x 10 /100 = ₹ 15,000

S.P. = AP - NP = 20000 – 15000 = ₹ 5,000

Goodwill = S.P. x P.V.A. = 5000 x 2.487 = ₹ 12,435

Accounting Treatment of Goodwill (Premium)

The following are the situations at the time of admission of a new partner related to treatment of goodwill.

1. Goodwill is paid by the incoming partner privately.
2. Incoming partner brings his share of goodwill.
3. New partner does not bring his share of goodwill in cash.
4. New partner brings in only part of his share of goodwill in cash.
5. Incoming partner brings his share of goodwill in kind.
6. Treatment of hidden goodwill.
7. Treatment of goodwill at the time of change in profit sharing ratio.

Note : When goodwill A/c already appeared in the books.

Old Partner's Capital A/c Dr.(OPSR)

To Goodwill A/c

(Being existing goodwill account is written off in old profit sharing ratio)

(i) Goodwill is paid by the incoming partner privately :

If the amount of goodwill is paid by the incoming partner privately, no journal entry is required in the books of accounts.

(ii) When new partner brings his share of goodwill in cash :

(a) For goodwill brought in cash

Cash A/c Dr.

To Goodwill A/c

(Being amount of goodwill brought in cash)

(b) On the distribution of amount of goodwill among sacrificing partners :

Goodwill A/c Dr.

To Sacrificing partner's capital A/c

(Being amount of goodwill transferred to sacrificing partner's capital A/c)

(c) Amount of goodwill is withdrawn by the sacrificing partners:

Sacrificing partner's capital A/c Dr.

To Cash A/c

(Being amount of goodwill withdrawn by sacrificing partners)

(iii) When new partner does not bring his share of goodwill in cash :

New partner's current A/c Dr.

To Sacrificing partner's capital A/c

(Being share of goodwill of new partner adjusted through capital A/c)

Note : New partner's current A/c has been debited instead of his capital A/c, so that his capital is not reduced.

(iv) When new partner brings in only a part of his share of goodwill –

(a) Goodwill brought in cash by the new partner

Cash A/c Dr.

To Goodwill A/c

(Being amount of goodwill brought in cash)

(b) Goodwill credited to sacrificing partners

Goodwill A/c Dr.

New partner's current A/c Dr.

To Sacrificing partner's capital A/c

(Being amount of goodwill transferred to sacrificing partner's capital A/c)

(v) Incoming partner brings his share of goodwill in kind –

(a) For assets brought in by new partner

Asset A/c Dr.

To Goodwill A/c

(Being assets contributed by new partner for his share of goodwill)

(b) For giving credits of incoming partner's share of goodwill to sacrificing partners

Goodwill A/c Dr.

To Sacrificing partner's capital A/c

(Being goodwill transferred to sacrificing partner's capital A/c)

(vi) Treatment of hidden goodwill :

New partner's current A/c Dr.

To Sacrificing partner's capital A/c

(Being amount of goodwill adjusted through sacrificing partner's capital A/c)

(vii) Treatment of goodwill at the time of change in profit sharing ratio

Gaining partner's capital A/c Dr.

To Sacrificing partner's capital A/c

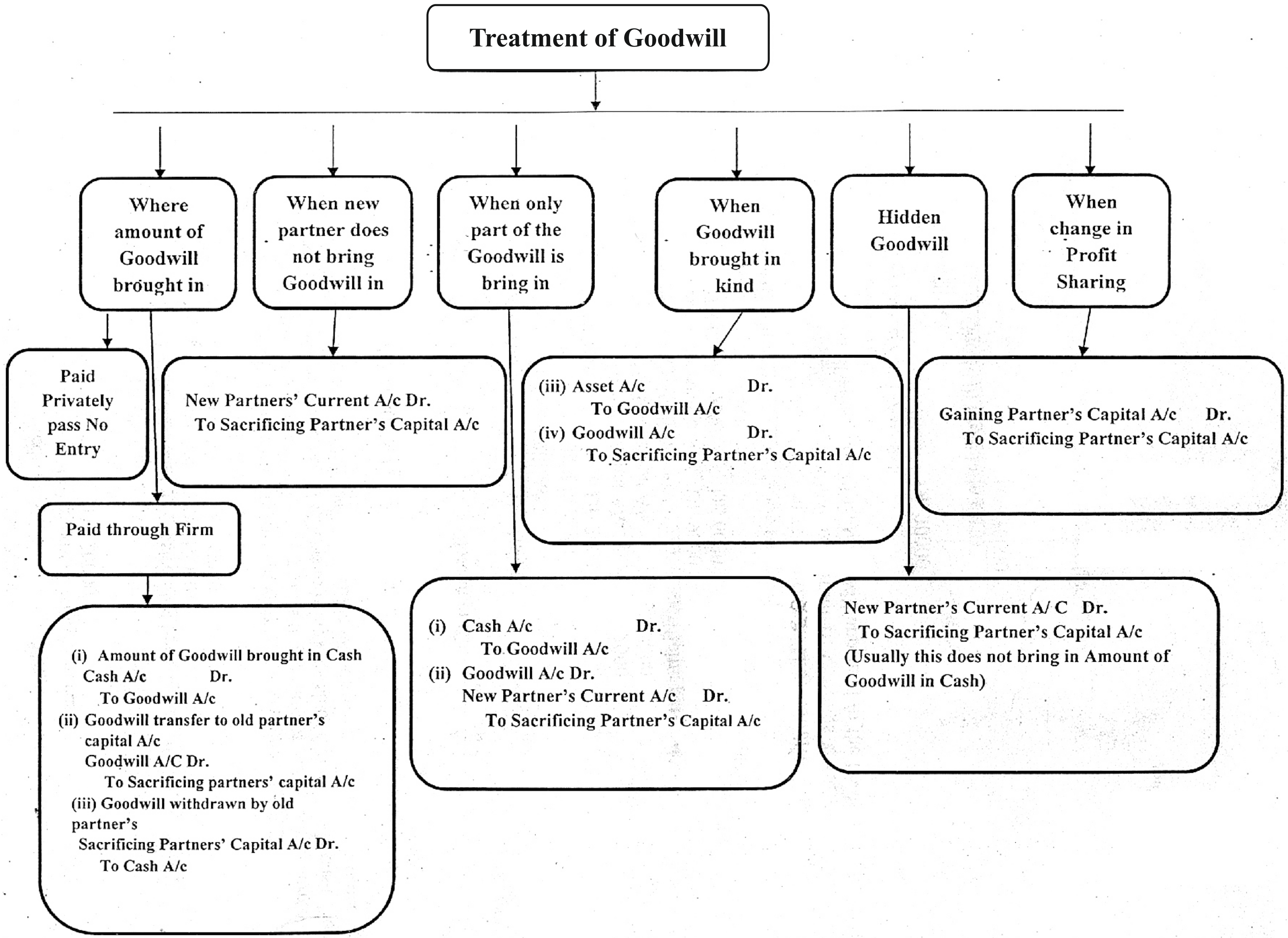
(Being adjustment goodwill due to change in profit sharing ratio)

Note : (i) Term premium is used for goodwill sometimes.

(ii) Amount of goodwill brought in by a new partner is distributed between sacrificing partners in their sacrificing ratio.

(ii) According to A.S. 10, 26/ Indian A.S. 38 Goodwill should be recorded in the books only when consideration in money or money's worth has been paid for it. i.e. when goodwill is purchased.

Self-Generated Goodwill : If goodwill is evaluated at the time of change in constitution of the firm (by way of admission/retirement/death/changes in profit sharing ratio) brought in books since it is self- generated goodwill. The value of goodwill in this situation should be adjusted through partner's Capital or Current Account



Note: In all the above conditions Goodwill already appearing in the Books will be written off among old partners.

(i) A and B are partners in a firm sharing profits in the ratio of 3:2. They admit C as a partner for $1/4^{th}$ share in profit. He brings ₹20,000 as goodwill. Pass the necessary journal entries when –

(a) Goodwill is retained in the business.

(b) Goodwill is withdrawn by sacrificing partners.

(a) (i) Cash A/c Dr. 20000
To Goodwill A/c 20000
(Being amount of goodwill brought in cash)

(ii) Goodwill A/c Dr. 20000
To A'S Capital A/c 12000
To B'S Capital A/c 8000
(Being amount goodwill distributed between sacrificing partners)

(**b**) A'S Capital A/c Dr. 12000
B'S Capital A/c Dr. 8000
To Cash A/c 20000
(Being amount of goodwill withdrawn by the sacrificing partners)

(ii) A and B are partners in a firm sharing profits in the ratio of 3:2. A and B surrender ½ of their respective shares in favour of C. C is to brings his shared goodwill in cash. Goodwill of the firm is estimated at ₹40,000. $3/4^{th}$ goodwill is withdrawn by A and B. Pass necessary journal entries.

C's share in goodwill = 40000 X ½ = ₹ 20,000.

A's sacrifice = $\frac{3}{5} \times \frac{1}{2} = \frac{3}{10}$ Sacrifice ratio = 3:2

B's sacrifice = $\frac{2}{5} \times \frac{1}{2} = \frac{2}{10}$ C's share in profit = $\frac{3}{10} + \frac{2}{10} = \frac{5}{10}\ or\ \frac{1}{2}$

Journal entries :

Cash A/c Dr. 20000
To Goodwill A/C 20000
(Being amount of goodwill brought in cash)

Goodwill A/C Dr. 20000
To A'S Capital A/c 12000
To B'S Capital A/c 8000
(Being amount of goodwill distributed between sacrificing partners)

A'S Capital A/c Dr. 9000
B'S Capital A/c Dr. 6000
To Cash 15000
(Being goodwill withdrawn by sacrificing partners)

(iii) A and B are partners sharing profits in the ratio 3:2. They admit C into the firm for $3/7^{th}$ profit, which he takes $2/7^{th}$ from A and $1/7^{th}$ from B. C brings ₹30,000 for his share of goodwill. At the time of admission of C, goodwill appeared in the books at ₹ 20,000. Pass necessary journal entries.

Sacrificing Ratio = 2/7 : 1/7 = 2:1

Cash A/c Dr. 30000
To Goodwill A/c 30000
(Being amount of goodwill brought in cash)

Goodwill A/c Dr. 30000
To A'S Capital A/c 20000
To B'S Capital A/c 10000
(Being amount of goodwill distributed in sacrifice ratio)

A'S Capital A/c Dr. 12000
B'S Capital A/c Dr. 8000
To Goodwill 20000
(Being goodwill A/c written off)

(iv) A and B are partners sharing profits in the ratio 3:2. C is admitted as a new partner. C brings ₹ 20,000 as goodwill. Treatment of goodwill made under the following conditions :

(a) C is admitted for $1/5^{th}$ share, which he gets entirely from A.
(b) C is admitted for $1/5^{th}$ share, which he gets entirely from B.
(c) C is admitted for $1/5^{th}$ share.
(d) C is admitted for $1/5^{th}$ share, which he gets equally from A and B.
(e) The new profit sharing ratio among A, B and C is 1:1:3.
(f) A contributes $3/20^{th}$ and B contributes $1/20^{th}$ share in favour of C.

Following entry is common in all cases:

Cash A/c Dr. 20000
To Goodwill A/c 20000
(Being amount of goodwill brought in cash)

(a) C gets his $1/5^{th}$ share entirely from A.

Goodwill A/c Dr. 20000
To A'S Capital A/c 20000
(Being amount of goodwill transferred to A's Capital A/c)

(b) C gets his $1/5^{th}$ share entirely from B.

Goodwill A/c Dr. 20000
To B'S Capital 20000
(Being amount of goodwill transferred to B's Capital A/c)

(c) C is admitted for $1/5^{th}$ share. In this condition OPSR = SR.
So sacrificing ratio = 3:2.

Goodwill A/c Dr. 20000
To A's Capital 12000
To B's Capital 8000
(Being amount of goodwill distributed between A and B in their sacrifice ratio)

(d) C gets his $1/5^{th}$ share equally from A and B. So in this condition the sacrificing ratio will be = 1:1

Goodwill A/c Dr. 20000
To A's Capital 10000
To B's Capital 10000
(Being amount of goodwill distributed between A and B in their sacrifice ratio)

(e) In this condition, sacrifice ratio of A and B = 2:1.

Goodwill A/c Dr. 20000
To A's Capital 13333
To B's Capital 6667
(Being amount of goodwill distributed between A and B in their sacrifice ratio)

(f) C gets $3/20^{th}$ share from A and $1/20^{th}$ share from B. In this condition the sacrifice ratio will be = 3:1.

Goodwill A/c Dr. 20000

To A's Capital A/c 15000

To B's Capital A/c 5000

(Being amount of goodwill distributed between A and B in their sacrifice ratio)

(v) A and B are partners in a firm sharing profits in the ratio of 4:3. They admitted C as a new partner. The new profit sharing ratio of A, B and C will be 3:2:2. The firm's goodwill on C's admission was valued at ₹ 28,000. C could not bring his share of goodwill in cash. Pass necessary journal entries.

Sacrifice ratio = Old profit sharing ratio – New profit sharing ratio

$A = \frac{4}{7} - \frac{3}{7} = \frac{1}{7}$; $B = \frac{3}{7} - \frac{2}{7} = \frac{1}{7}$; Sacrifice ratio = 1:1

C's share = $\frac{1}{7} + \frac{1}{7} = \frac{2}{7}$ C's share in goodwill = 28000 X $\frac{2}{7}$ = ₹ 8,000

C's Current Account Dr. 8000

To A's Capital A/c 4000

To B's Capital A/c 4000

(Being C's share of goodwill adjusted)

(vi) A and B are partners in a firm sharing profits in the ratio of 2 : 1. They admitted C as a new partner. The new profit sharing ratio is 2:1:1. Goodwill of the firm is valued at ₹ 30,000. C is unable to bring in his share of goodwill in cash. At the time of admission of C, goodwill appeared in books at ₹ 15,000. Pass necessary journal entries.

Sacrifice ratio = Old profit sharing ratio – New profit sharing ratio

$A = \frac{2}{3} - \frac{2}{4} = \frac{2}{12}$; $B = \frac{1}{3} - \frac{1}{4} = \frac{1}{12}$ SR = 2:1

A's Capital Dr. 10000

B's Capital Dr. 5000

To Goodwill A/c 15000

(Being goodwill account written off)

C's share in goodwill = 30000 x 1 /4 = ₹ 7500

C's Current Account Dr. 7500

To A's Capital A/c 5000

To B's Capital A/c 2500

(Being goodwill adjusted between A & B)

Note :– New partner's current a/c has been debited instead of his capital a/c so that his capital is not reduced.

(vii) A and B share profits in the ratio of 2:1. They admitted C for $1/4^{th}$ share in profits. C pays ₹ 3000 out of his share of ₹ 4200 for goodwill. The new profit sharing ratio among A, B and C will be 5 : 3 : 2. Pass necessary journal entries.

1. Cash A/c Dr. 3000

To Goodwill 3000

(Amount of goodwill brought in by C)

2. Goodwill Dr. 3000

C's Current A/c Dr. 1200

To A's Capital A/c 3500

To B's Capital A/c 700

(Being goodwill distributed between A & B)

Sacrifice ratio = Old profit sharing ratio – New profit sharing ratio

$A = \frac{2}{3} - \frac{5}{10} = \frac{5}{30}$; $B = \frac{1}{3} - \frac{3}{10} = \frac{1}{30}$ SR = 5:1

(viii) A and B are partners in a firm. They admit C for 1/4th share in profit. C pays only ₹1000 out of his share of ₹ 1800 for goodwill. Goodwill account appeared in the books at ₹ 6000. Pass necessary journal entries.

1. Cash A/c Dr. 1000
To Goodwill 1000
(Being goodwill brought in cash)

2. Goodwill Dr. 1000
C's Current A/c Dr. 800
To A's Capital A/c 900
To B's Capital A/c 900
(Being goodwill distributed between A & B)

3. A's Capital A/c Dr. 3000
B's Capital A/c Dr. 3000
To Goodwill 6000
(Being goodwill account written off)

(ix) A and B are partners in a firm sharing profits in the ratio of 3:2. They admit C for 3/13th share in profit. The new profit sharing ratio will be 5:5:3. C contributed the following assets towards his capital and his share of goodwill.

Stock ₹20,000, furniture ₹ 10,000, machine ₹ 6,000 on the date of admission of C. The goodwill of the firm was valued at ₹ 2,60,000.

Pass necessary journal entries.

Sacrifice ratio = Old profit sharing ratio – New profit sharing ratio

$\mathrm{A} = \frac{3}{5} - \frac{5}{13} = \frac{14}{65}$; $\mathrm{B} = \frac{2}{5} - \frac{5}{13} = \frac{1}{65} = 14 : 1$

C's share in goodwill = 2,60,000 x 3/13 = ₹ 60,000.

Stock	Dr. 20,000	
Furniture	Dr. 30,000	
Machine	Dr. 80,000	
To C's Capital A/c		70,000
To Goodwill A/c		60,000

(Being sundry assets contributed by new partner as his capital and his share of goodwill)

Goodwill A/c	Dr. 60,000	
To A's Capital A/c		56,000
To B's Capital A/c		4,000

(Being goodwill transferred to sacrificing partner's capital A/c)

(x) A and B are partners in a firm sharing profits in the ratio of 7:5. They admitted C for 1/6th share in profit. The new profit sharing ratio among A, B and C will be 13:7:4. C contributed the following assets towards his capital and his share of goodwill.

Stock ₹ 60,000, land and building ₹ 2,80,000, plant ₹ 1,20,000, on the date of C's admission. The goodwill of the firm was valued at ₹ 7,50,000.

Pass necessary journal entries.

Sacrifice ratio = Old profit sharing ratio – New profit sharing ratio

$\mathrm{A} = \frac{7}{12} - \frac{13}{24} = \frac{1}{24}$; $\mathrm{B} = \frac{5}{12} - \frac{7}{24} = \frac{3}{24}$ =1:3

C's share in goodwill = 7,50,000x1/6 = ₹ 1,25,000.

Stock	Dr. 60,000	
Land & Building	Dr. 2,80,000	
Plant A/c	Dr. 1,20,000	
To C's Capital A/c		3,35,000
To Goodwill A/c		1,25,000

(Being sundry assets contributed by new partner as his capital and his share of goodwill)

Goodwill A/c Dr. 1,25,000

To A's Capital A/c 31,250

To B's Capital A/c 93,750

(Being goodwill transferred to sacrificing partner's capital A/c)

(xi) A and B are partners with capitals of ₹ 40,000 and ₹ 30,000 respectively. They admit C for 1/5th share, who contributes ₹ 20,000 as his share of capital. Calculate the amount of goodwill and pass necessary journal entries.

Goodwill of the firm :

Total capital on the basis of C's capital = $\frac{20000 \, X \, 5}{1}$	= ₹1,00,000
(−) Adjusted capital of A and B	= ₹70,000
(−) C's capital	= ₹20,000
Goodwill of the firm	= ₹10,000

C's share in Goodwill 10000 x 1 /5 = ₹ 2000

C's Current A/c Dr. 2000

To A's Capital A/c 1000

To B's Capital A/c 1000

(Being C's share of goodwill adjusted to sacrificing partner's capital)

(xii) A and B are partners in a firm sharing profits in the ratio 3:2. They agreed to share profits equally. For this purpose, the goodwill of the firm was valued at ₹ 60,000. Pass the journal entries for the treatment of goodwill.

Sacrifice ratio = Old profit sharing ratio – New profit sharing ratio

$A = \frac{3}{5} - \frac{1}{2} = \frac{1}{10}$ (Loss); $B = \frac{2}{5} - \frac{1}{2} = \left(\frac{1}{10}\right)$ (Gain) = 1:1

B's Capital A/c Dr. 6000

To A's Capital A/c 6000

(Being the goodwill adjusted on change in profit sharing ratio)

General entries when a new partner contributes capital :

(a) By bringing cash

Cash / Bank A/c Dr.

To New Partner's Capital A/c

(Being cash brought in by a new partner's towards capital)

(b) By bringing his existing business (by the way of assets and liabilities to firm)

Sundry Assets A/c Dr.

To Sundry Liabilities A/c

To New Partner's Capital A/c

(Being assets & liabilities brought in by new partner)

The difference between pre decided capital and net assets is brought in cash.

Sundry Assets A/c Dr.

Cash/Bank A/c Dr.

To Sundry Liabilities A/c

To New Partner's Capital A/c

(Being assets & liabilities brought in by new partner towards his share of capital)

Revaluation of Assets and Reassessment of Liabilities

The value of assets sometimes is different from the shown in value books because with the time value of some assets increases while of some other decreases. In the case of liabilities, it is possible that the amount payable is different from the value recorded in the books. It is also possible that some assets or liabilities are not recorded in the books. The value of assets and the liabilities payable need to be brought to their correct value so that incoming partner is not put any advantage or disadvantage. The value of assets and liabilities is adjusted through an account, called revaluation account or profit and loss adjustment account. This account is similar to a nominal account.

Entries passed for revaluation of assets and reassessment of liabilities

1. For increase in value of assets	Assets A/c To Revaluation A/c (Being increase in value of assets)	Dr.	By increase in Value
2. Decrease in value of assets	Revaluation A/c To Assets A/c (Being decrease in value of assets)	Dr.	By decrease in Value
3. For unrecorded assets	Unrecorded Assets To Revaluation A/c (Being unrecorded assets taken into account)	Dr.	By Values of Assets
4. For increase in value of liabilities and provisions	Revaluation A/c To Liabilities/Provision A/c (Being increase in value of liabilities/provision)	Dr.	By increase in Value
5. Decrease in value of liabilities and provisions	Liabilities/Provision A/c To Revaluation A/c (Being decrease in value of liabilities/provision)	Dr.	By decrease in Value
6. For unrecorded liabilities	Revaluation A/c To Unrecorded Liabilities (Being unrecorded liabilities taken into account)	Dr.	By Values of Liabilities
7. Profit on revaluation	Revaluation A/c To Old Partner's Capital (Being profit on revaluation credited to Old Partner's Capital A/c in their OPSR)	Dr.	By Amount of Profit (in OPSR)
8. Loss on revaluation	Old Partner's Capital A/c To Revaluation A/c (Being loss on revaluation debited to old partner's capital account in their OPSR)	Dr.	By Amount of Loss (in OPSR)

Format of Revaluation Account

Dr. **Revaluation / P & L Adjustment Account** Cr.

Particulars	Amount ₹	Particulars	Amount ₹
To Decrease in value of assets To Increase in the value of liabilities/ provision To Unrecorded liabilities To Profit on revaluation Transfer to old Partner's Capital A/c (In OPSR)		By Increase in value of assets By Decrease in the value of Liabilities/provision By Unrecorded assets By Loss on revaluation Transfer to old partner's capital A/c (In OPSR)	

Note : 1. Assets undervalued by --% = (Value as given X rate) / (100-rate)

2. Assets overvalued by --% = (Value of assets as given X rate) / (100 + rate)

3. If "Increased by" is given then increase by same amount.

4. If "Decreased to" is given then value of difference is taken.

Undistributed Profits Reserves, Undistributed Loss and Fictitious Assets

The value is credited or debited to the old partner's capital accounts/current accounts in their old profit sharing ratio.

(i) For distributing reserves and accumulated profits –

P&L A/c (Credit Balance)	Dr.	
Reserve Fund / General Reserve A/c	Dr.	
Workman Compensation Reserve A/c	Dr.	(Excess of reserve over actual liability)
Investment Fluctuation Reserve A/c	Dr.	(Excess of reserve over the difference between book value and market value)
To Old Partner's Capital A/c (In OPSR)		

(ii) For distributing accumulated losses and fictitious assets –

Old Partner's Capital A/c	Dr.	(in OPSR)
To P & L (Dr. Balance)		
To Deferred Revenue Expenditure A/c		

Note : 1. Balance of Employees Provident Fund (E.P.F.) appearing on liabilities side of the balance sheet is not distributed among old partners, as this is not reserve but a statutory liability payable by the firm. 2. Deferred Revenue Expenditure i.e. Advertisement expenditure.

Adjustment of Partner's Capital

Adjustment of the old partner's capital accounts on the basis of the new partner's capital.	Calculating the capital of the new partner on the basis of capitals of the old partners.	When capital of the new firm is given.

1. Adjustment of the old partner's capital accounts on the basis of the new partner's capital :

Step (i) Calculate total capital of the firm on the basis of capital of the new partner.

Step (ii) Total capital is divided in their new profit sharing ratio.

Step (iii) Find adjusted capital of partner's

Step (iv) Compare adjusted capital and cash a/c or partner's current accounts.

Note : In absence of information adjustment is made through the cash account.

(i) A and B are partners sharing profits in the ratio of 3:1. They admitted C who brings in ₹ 40,000 for 1/4th share of profit. The adjusted capital of A and B are ₹1,00,000 and ₹25,000 respectively. It was decided that the capital accounts of old partners are to be adjusted on the basis of C's capital.

Solution :

Total capital of the firm (40000 X 4) / 1 = ₹1, 60,000

A's new share $\frac{3}{4} \times \frac{3}{4} = \frac{9}{16}$ B's new share $\frac{3}{4} \times \frac{1}{4} = \frac{3}{16}$ C's new share $\frac{1}{4}$ *or* $\frac{4}{16}$

A: B:C = $\frac{9}{16} : \frac{3}{16} : \frac{4}{16}$ = 9:3:4

A's capital = 16000 X $\frac{9}{16}$ = ₹90,000 B's capital = 16000 X $\frac{3}{16}$ = ₹30,000

C's capital = 16000 X $\frac{4}{16}$ = ₹40,000

A = 1,00,000 – 90,000 = 10,000 surplus capital B = 25,000 – 30,000 = 5,000 Deficiency

A's Capital A/c Dr. 10000

To Cash 10000

(Being cash withdrawn by A)

Cash A/c Dr. 5000

To B's Capital 5000

(Being cash brought in by B)

Calculation of the new partner's capital on the basis of capitals of the old partners.

Step (i) Determine total adjusted capital of the old partners.

Step (ii) Determine total capital of the new firm on the basis of total adjusted capital of old partners.

Step (iii) Determine capital of new partner.

I. A and B are in partnership with ₹40,000 and ₹20,000 as their adjusted capital. They admitted C as a partner for 1/6th share in profits.

(i) If new partner C is asked to bring in capital in proportion to his profit sharing ratio.

Total adjusted capital of A and B 40000 + 20000 = ₹ 60,000

Combined share of A and B 1 – 1/6 = 5/6

Total capital of the firm = (60000 X 6)/5 = ₹ 72,000

C's share in total capital = (72000 X 1)/6 = ₹ 12,000

(ii) If new partner C is to contribute 1/6th of the combined capital of A and B.

Combined capital of A and B ₹ 60,000

C's share in capital = 60000 X 1/6 = ₹ 10,000

Illustration1 :

A and B are partners sharing profits in ratio 3:1. Their Balance Sheet is as follows :

Balance Sheet as on 31st March, 2017

Liabilities	Amount (₹)	Assets	Amount (₹)
Creditors	30,000	Cash at Bank	22,000
Bills Payable	6,000	Debtors	40,000
Outstanding Expenses	2,000	Stock	15,000
Employee's Provident Fund	6,000	Investments	12,000
General Reserve	12,000	Land & Building	50,000
Capitals		Plant & Machinery	30,000
A 80000		Furniture	16,000
B 70000	1,50,000	Trademark	5,000
		Patent	6,000
		Goodwill	10,000
	2,06,000		**2,06,000**

They decided to admit C on April 1st, 2017. New Profit Sharing Ratio will be equal :

(i) C Shall bring ₹10,000 share of premium (Goodwill) and ₹ 50,000 as his capital. **(ii)** A Liability of ₹ 4,000 included in creditors was not likely to arise **(iii)** investments valued at ₹15,000 **(iv)** Create P.B.D. 5% and Provision For Discount on Debtors 2%. **(v)** Land &Building undervalued by ₹5,000 **(vi)** Plant & Machinery overvalued by ₹10,000 **(vii)** Furniture is depreciated by 10% **(viii)** Trademark valued at ₹ 3000. **(ix)** Patents reduced to ₹ 2,000. **(x)** Outstanding salary ₹ 2,000 **(xi)** Prepaid Insurance ₹ 2,000. **(xii)** Claim for damages ₹ 2,000 is accepted **(xiii)** There is also a unforeseen liability for ₹ 5,000. **(xiv)** Stock is valued at ₹13,000 **(xv)** Unrecorded Assets ₹10,000 **(xvi)** A debtor whose due of ₹ 500 was written off as bad debts, paid ₹ 400 in full settlement. Prepare Revaluation Account.

Solution :

Dr. **Revaluation Account** Cr.

Particulars	Amount (₹)	Particulars	Amount (₹)
To P.B.D. A/c	2000	By Creditors A/c	4000
To P.D.D. A/c	760	By Investments A/c	3000
To Plant & Machine A/c	10000	By Land & Building A/c	5000
To Furniture A/c	1600	By Prepaid Insurance	2000
To Trade Mark A/c	2000	By Unrecorded Assets	10000
To Patent A/c	4000	By Bad-debts recovered	400
To Outstanding Salary	2000	By Loss transferred to	
To Claim For damages	2000	A's Capital A/c 5220	
To Unforeseen liability	5000	B's Capital A/c 1740	6960
To Stock A/c	2000		
	31360		**31360**

Memorandum Revaluation Account

The partners may decide that the value of assets and liabilities will continue to appear in the books at the existing values, yet new partner be not put to any advantage or disadvantage because of change in values. In such a case, an increase or decrease in the amount of assets and liabilities is recorded in the memorandum revaluation account. This account is divided into two parts. First part is similar to the revaluation account and in the second part entries are reversed.

The balance of first part (profit or loss on revaluation) is transferred to the capital account of the old partners in their old profit sharing ratio. The balance of the second part is transferred to all the partners, including new partner, in the new profit sharing ratio.

For profit on revaluation:

1. Memorandum Revaluation A/c Dr.

 To Old Partner's Capital A/c

 (Profit on revaluation transferred to old partner's capital A/c)

2. All Partner's Capital A/c Dr.

 To Memorandum Revaluation A/c

 (Memorandum Revaluation Account closed by transferring to capital A/c's in NPSR)

 In relation to above in place of two entries one entry can be done.

3. All Partner's Capital A/c Dr.

 To Old Partners Capital A/c

 (Adjustment of revaluation made)

Note : On revaluation loss reverse entry of the above will be done.

Illustration2 :

A and B are partners in a firm sharing profits in their capital ratio. Their Balance Sheet as on 31st March,2017 is as under:

Balance Sheet as on 31st March, 2017

Liabilities	Amount (₹)	Assets	Amount (₹)
Capital:		Building	25,000
A 30,000		Stock	12,500

B 20,000	50,000	Debtors	7,000
Creditors	7,000	Profit & Loss A/c	2,500
		Cash Balance	10,000
	57,000		**57,000**

On 1st April,2017 they decide to admit C for 1/5th share on the following terms : **(i)** C will get his share equally from A and B. He brings cash ₹20,000 for capital. **(ii)** Firm's goodwill is valued at ₹ 15,000 and C brings his share in cash. **(iii)** Make a provision for bad debts @ 10% on debtors. **(iv)** Stock is to be valued ₹ 12,000 and the value of building is to be increased by ₹ 3,200 **(v)** Book values of assets and liabilities are not to be changed (Excluding Profit and Loss Account)

Prepare Memorandum Revaluation Account, Partner's Capital Account and Balance Sheet.

Dr. **Memorandum Revaluation A/c** Cr.

Particulars	Amount (₹)	Particulars	Amount (₹)
To P.B.D.	700	By Building A/c	3,200
To Stock A/c	500		
To Profit	2,000		
	3,200		**3,200**
To A's Capital A/c	1,200	By A's Capital A/c	1000
To B's Capital A/c	800	By B's Capital A/c	600
		By C's Capital A/c	400
	2,000		**2,000**

Partner's Capital A/c

Particulars	A (₹)	B (₹)	C (₹)	Particulars	A (₹)	B (₹)	C (₹)
To Memorandum Revaluation A/c	1,000	600	400	By Balance b/d	30,000	20,000	--
To P & L	1,500	1,000	--	By Memorandum Revaluation	1,200	800	--
To Balance c/d	30,200	20,700	19,600	By Cash A/c	--	--	20,000
				By Goodwill A/c	1,500	1,500	--
	32,700	**22,300**	**20,000**		**32,700**	**22,300**	**20,000**

Balance Sheet as on 1st April, 2017

Liabilities	Amount (₹)	Assets	Amount (₹)
Capital A/c		Building	25,000
A 30,200		Stock	12,500
B 20700		Debtors	7,000
C 19,600	70,500	Cash Balance	33,000
Creditors	7,000		
	77,500		**77,500**

Working Notes :

(1) Cash Balance 10,000 + 20,000 + 3,000 = ₹33,000

(2) C gets his share from A and B equally

Sacrifice of A=$\frac{1}{5} X \frac{1}{2} = \frac{1}{10}$; Sacrifice of B=$\frac{1}{5} X \frac{1}{2} = \frac{1}{10}$

New Profit sharing ratio = Old Profit sharing ratio – Sacrifice Ratio

A$\frac{3}{5} - \frac{1}{10} = \frac{5}{10}$;B $\frac{2}{5} - \frac{1}{10} = \frac{3}{10}$; NPSR = $\frac{5}{10} : \frac{3}{10} : \frac{1}{5}$= 5:3:2

Illustration : A and B are partners in a firm sharing profits in the ratio of 5:4. They admit C on 1-4-17 for 1/5 share in profits

Balance Sheet 31st March, 2017

Liabilities	Amount (₹)	Assets	Amount (₹)
Workmen Compensation Reserve	9,000		

(i) If there is no other information:

Workmen Compensation Reserve A/c	Dr.	9,000	
To A's Capital A/c			5,000
To B's Capital A/c			4,000

(Being W.C.R. transfer to old Partner's Capital A/c in their old Profit Sharing Ratio)

(ii) If a claim on account of workmen compensation is estimated at ₹ 2,700

Workmen Compensation Reserve A/c	Dr.	9,000	
To Liability for Workmen compensation			2,700
To A's Capital A/c			3,500
To B's Capital A/c			2,800

(Being transfer of the surplus of WCR to Old Partner's Capital A/c in their old Profit Sharing Ratio)\

(iii) If a claim on account of workmen compensation is estimated at ₹ 13,500

(a)

Workmen Compensation Reserve A/c	Dr.	9,000	
Revaluation A/c	Dr.	4,500	
To Liability for Workmen compensation			13,500

(Being liability created and short fall charged to Revaluation Account)

(b)

A's Capital A/c	Dr.	2,500	
B's Capital A/c	Dr.	2,000	
To Revaluation A/c			4,500

(Being loss on revaluation transfer to Old Partner's Capital A/c)

(iv) If a claim on account of workmen compensation is estimated at ₹ 9,000

Workmen Compensation Reserve A/c	Dr.	9,000	
To Liability for Workmen compensation A/c			9,000

(Being liability created for workmen compensation)

(v) If there is no balance of Workmen Compensation Reserve Account in Balance Sheet but claim against workmen compensation reserve is estimated at ₹ 3,600

(a)

Revaluation A/c	Dr.	3,600	
To Liability for workmen compensation A/c			3,600

(Being liability created)

(b)

A's Capital A/c	Dr.	2,000	
B's Capital A/c	Dr.	1,600	
To Revaluation A/c			3600

(Being loss on revaluation transferred to Old Partner's Capital A/c)

Investment Fluctuation Reserve (IFR)

Investment fluctuation reserve is a reserve created out of profits to meet the fall in the market value of investments. The accounting treatment of investment fluctuation reserve is as follows :

Illustration : A and B are partner's in a firm sharing profits in the ratio of 3:2. They admit C on 1-4-17 for 1/5 share in profits

Balance Sheet as on 31 March, 2017

Liabilities	Amount (₹)	Assets	Amount (₹)
Investment Fluctuation Reserve	5,000	Investment	25,000

Show the accounting treatment of Investment Fluctuation Reserve under the following five alternative situations :

(i) If there is no other information

Investment Fluctuation Reserve A/c	Dr.	5,000	
To A's Capital A/c			3,000
To B's Capital A/c			2,000

(Being IFR transfer to old Partner's Capital A/c in their old ratio)

(ii) If the market value of investment is ₹ 25,000

"Same solution as given in Case (i)"

(iii) If the market value of investment is ₹ 22,000

Investment Fluctuation Reserve A/c	Dr.	5,000	
To Investment A/c			3,000
To A's Capital A/c			1,200
To B's Capital A/c			800

(Being excess IFR transfer surplus of WCR to Old Partner's Capital A/c)

(iv) If the market value of investment is ₹ 30,000

(a)

Investment Fluctuation Reserve A/c	Dr.	5,000	
To A's Capital A/c			3,000
To B's Capital A/c			2,000

(Being IFR transfer to old Partner's Capital A/c in their old ratio)

(b)

Investment A/c	Dr.	5,000	
To Revaluation A/c			5,000

(Being value of Investment brought upto market value)

(c)

Revaluation A/c	Dr	5,000	
To A's Capital A/c			3,000
To B's Capital A/c			2,000

(Being Profit on Revaluation transferred to Old Partner's Capital A/c)

(v) If the market value of investment is ₹ 18,000

(a)

Investment Fluctuation Reserve A/c	Dr.	5,000	
Revaluation A/c	Dr.	2,000	
To Investment A/c			7,000

(Being IFR transfer to old Partner's Capital A/c in their old Ratio)

(b)

A's Capital A/c		1,200	
B's Capital A/c			800
To Revaluation A/c			2,000

(Being loss on revaluation transfer to Old Partner's Capital A/c)

Illustration 3 :

Ramesh and Suresh are partners sharing profits in ratio of 5:3 respectively. Their Balance Sheet is as follows:

Balance Sheet

Liabilities	Amount (₹)	Assets		Amount (₹)
Creditors	28,000	Cash		8,000
General Reserve	4,000	Debtors	40,000	
Munesh's Loan	30,000	Less-Provision	1,600	38,400
Capital:		Stock		56,000
Ramesh	50,000	Investments		8,000
Suresh	40,000	P & L A/c		16,000
		Plant		25,600
	1,52,000			**1,52,000**

Munesh is admitted into partnership on the following terms : **(i)** The new profit sharing ratio will be 3:3:2 respectively. **(ii)** Munesh's loan should be treated as his capital. **(iii)** Goodwill of the firm is valued at ₹24,000 and he brings his share in cash. **(iv)** Investments were to be taken over by Ramesh and Suresh in their profit sharing ratio. **(v)** Stock be reduced upto ₹ 50,000 **(vi)** Provision for doubtful debts should be @ 5% on debtors. **(vii)** Suresh is to bring ₹ 10,000 **(viii)** Accrued income ₹ 800 **(ix)** Goodwill be retained in the business. Give Journal entries to record the above.

Solution :

Journal

Date	Particulars		L/F	Amount (₹) Dr.	Amount (₹) Cr.
1-4-17	Munesh's Loan A/c	Dr.		30,000	
	To Munesh's Capital A/c				30,000
	(Being Munesh's Loan A/c transferred to his capital A/c)				
	Cash A/c	Dr.		6,000	
	To Goodwill A/c				6,000
	(Being cash brought in for goodwill)				
	Goodwill A/c	Dr.		6,000	
	To Ramesh's Capital A/c				6,000
	(Being goodwill credited to Ramesh Capital A/c)				
	General Reserve A/c	Dr.		4,000	
	To Ramesh's Capital A/c				2,500
	To Suresh's Capital A/c				1,500
	(Being General Reserve distributed between old partner's in their OPSR)				
	Ramesh's Capital A/c	Dr.		10,000	
	Suresh's Capital A/c	Dr.		6,000	
	To P & L A/c				16,000
	(Being P & L A/c transferred to Old partner's capital A/c)				
	Ramesh's Capital A/c	Dr.		5000	
	Suresh 's Capital A/c	Dr.		3000	
	To Investments				8000
	(Being investments taken over by partners)				

	Revaluation A/c Dr.		6,400	
	To Stock A/c			6,000
	To P.B.D. A/c			400
	(Being decrease value of stock and increase in PBD)			
	Accrued Income A/c Dr.		800	
	To Revaluation A/c			800
	(Being Accrued income transfer to Revaluation A/c)			
	Ramesh's Capital A/c Dr.		3,500	
	Suresh's Capital A/c Dr.		2,100	
	To Revaluation A/c			5,600
	(Being loss on revaluation transferred to Old partner's Capital A/c)			
	Cash A/c Dr.		10,000	
	To Suresh's Capital A/c			10,000
	(Being cash brought in by Suresh)			

Illustration 4 :

P and Q were partners in a firm sharing profits in the ratio of 7:5. Their Balance Sheet as on 31.3.2017 was as follows :

Balance Sheet

Liabilities	Amount (₹)	Assets	Amount (₹)
Bank Overdraft	70,000	Cash	18,000
Creditors	40,000	Debtors	1,00,000
Provision For Bad Debts	2,000	Bills Receivable	38,000
General Reserve	48,000	Stock	44,000
S's Loan	80,000	Building	2,00,000
Capitals :		Land	60,000
P	1,20,000		
Q	1,00,000		
	4,60,000		**4,60,000**

On 1-4-2017 they admitted S as a new partner on the following conditions : **(i)** S will get 1/4th share in the profits of the firm. **(ii)** S's Loan will be converted into his capital. **(iii)** The goodwill of the firm was valued at ₹ 96,000 and S brought his share of goodwill (premium) in cash. **(iv)** Provision for bad debts was made equal to 5% on Debtors. **(v)** Stock was overvalued by 10%. **(vi)** Land was to be appreciated by 10%. **(vii)** Building was to be appreciated by 12.5%. Prepare Revaluation Account, Capital Accounts of P, Q & S and the Balance Sheet of the new firm as on 1-4-2017.

Solution :

Revaluation A/c

Particulars	Amount (₹)	Particulars	Amount (₹)
To P.B.D. A/c	3,000	By Land A/c	6,000
To Stock	4,000	By Building A/c	25,000
To profits transfer to Capital A/c:			
P 14,000			
Q 10,000	24,000		
	31,000		**31,000**

Dr. **Partner's Capital A/c** Cr.

Particulars	P (₹)	Q (₹)	S (₹)	Particulars	P (₹)	Q (₹)	S (₹)
To Balance c/d	1,76,000	1,40,000	80,000	By Balance b/d	1,20,000	1,00,000	--
				By S's Loan A/c	--	--	80,000
				By General Reserve	--	--	--
				By Revaluation	28,000	20,000	--
				By Goodwill	14,000	10,000	--
	1,76,000	**1,40,000**	**80,000**		**1,76,000**	**1,40,000**	**80,000**

Balance Sheet of the new firm
As on 1 April, 2017

Liabilities	Amount (₹)	Assets	Amount (₹)
Bank Overdraft	70,000	Cash	42,000
Creditors	40,000	Debtors	1,00,000
Provision For Bad Debts	5,000	Bills Receivables	38,000
Capital A/c		Stock	40,000
P 1,76,000		Buildings	2,25,000
Q 1,40,000		Land	66,000
S 80,000	3,96,000		
	5,11,000		**5,11,000**

Working Note :

(1) Cash Balance 18,000 + 24,000 = 42,000 (2) Sacrifice ratio will be the same as old profit sharing ratio.

Illustration 5 :

X and Y are partners in a firm sharing profits in the ratio 3:2. They admit Z as a partner and decide the new profit sharing ratio as 5:3:2. Their Balance Sheet is as under before admission of Z :

Balance Sheet

Liabilities	Amount (₹)	Assets	Amount (₹)
Creditors	33,000	Bank	4,000
General Reserve	10,000	Debtors 32,000	
Capital Accounts:		Less : Provision For D.D. (1,000)	31,000
X 60,000		Stock	32,000
Y 40,000	1,00,000	Furniture	20,000
		Plant & Machinery	56,000
	1,43,000		**1,43,000**

Other terms agreed were : **(i)** Z will bring ₹ 40,000 as his capital. **(ii)** Z is unable to bring his share of goodwill in cash. It is therefore, decided to compute goodwill on the basis of Z's share in profit and capital contributed by him in the firm. **(iii)** Plant and machinery is valued at ₹ 60,000 and stock at ₹35,000. However, provision for doubtful debt be maintained at 5% on debtors and furniture be depreciated by 10%. **(iv)** Rent outstanding ₹ 1,400 remained unrecorded. Prepare Revaluation Account, Partners' Capital Accounts and Balance Sheet of the new firm.

Solution : **Revaluation A/c**

Particulars	Amount (₹)	Particulars	Amount (₹)
To P.B.D To Outstanding Rent	600	By Plant & Machine A/c	4,000

To Outstanding Rent	1,400	By Stock A/c	3,000
To Furniture	2,000		
To Profit Transfer to Capital A/c			
X 1,800			
Y 1,200	3,000		
	7,000		**7,000**

Dr. **Partner's Capital A/c** Cr.

Particulars	X (₹)	Y (₹)	Z (₹)	Particulars	X (₹)	Y (₹)	Z (₹)
To Balance c/d	72,500	49,900	40,000	By Balance b/d	60,000	40,000	--
				By Cash A/c	--	--	40,000
				By General Reserve	6,000	4,000	--
				By Revaluation A/c	1,800	1,200	--
				By Z'S Current A/c	4,700	4,700	--
	72,500	**49,900**	**40,000**		**72,500**	**49,900**	**40,000**

Balance Sheet of the new firm

Liabilities	Amount (₹)	Assets	Amount (₹)
Creditors	33,000	Bank	4,000
Capital A/c		Cash	40,000
X 72,500		Debtors 32,000	
Y 49,900		Less - Provision 1600	30,400
Z 40,000	1,62,400	Stock	35,000
Outstanding Rent	1,400	Furniture	18,000
		Plant & Machine	60,000
		Z'S Current A/c	9,400
	1,96,800		**1,96,800**

Working Note :

(1) Sacrifice ratio = OPSR - NPSR

$X: \frac{3}{5} - \frac{5}{10} = \frac{5}{50}$ $Y: \frac{2}{5} - \frac{3}{10} = \frac{5}{50}$ 5:5 or 1:1

(2) Calculation of hidden Goodwill:

Adjusted capital of X and Y

$X : 60{,}000 + 6{,}000 + 1{,}800 = 67{,}800; Y : 40{,}000 + 4{,}000 + 1{,}200 = ₹45{,}200$

Z's capital for $\frac{1}{5}$ share is ₹ 40,000

Goodwill of the firm = 2,00,000 (40,000 X$\frac{5}{1}$) – 67800 – 45,200 – 40,000 = ₹ 47,000

Z's share in goodwill = $47{,}000 \times \frac{1}{5} = ₹9{,}400$

Adjustment of Goodwill is made through current A/c

Illustration 6 :

A and B are partners. On 1st Jan,2017 they decide to admit C into partnership on the basis of the following Balance Sheet.

Balance Sheet

Liabilities	Amount (₹)	Assets	Amount (₹)
Creditors	6,000	Cash at Bank	12,000
Outstanding Expenses	2,000	Debtors	16,000
Employee's Provident Fund	3,000	Stock	22,000
Workmen's Compensation Fund	4,000	Fixed Assets	43,000
Capital A/c A 50,000		Profit & Loss A/c	2,000
B 30,000	80,000		
	95,000		**95,000**

The following terms were agreed upon : **(i)** New profit sharing ratio should be 2:1:1 respectively and C brought in ₹ 20,000 as capital. **(ii)** Fixed Assets is to be appreciated by ₹ 12,000. **(iii)** Bad debts amounting to ₹ 2,000 to be written off. **(iv)** A Provision of 2% was to be made for discount on creditors. **(v)** Outstanding expenses be brought down to ₹ 1,800. **(vi)** The liability on Workman's compensation fund is determined at ₹ 1,000. **(vii)** Employee's provident fund be raised by ₹ 500. **(viii)** C is unable to bring goodwill in cash. Goodwill valued at ₹ 8,000. **(ix)** Stock is valued at ₹ 24,180. Prepare Partner's Capital Accounts and Balance Sheet of the new firm.

Solution:

Revaluation Account

Particulars	Amount (₹)	Particulars	Amount (₹)
To Debtors A/c	2,000	By Fixed Assets A/c	12,000
To Employee's Provident fund A/c	500	By Reserve for discount on Creditors	120
		By Outstanding Exp.	200
To Profit transferred to:		By Stock	2,180
A's Capital A/c 6,000			
B's Capital A/c 6,000	12,000		
	14,500		**14,500**

Dr. **Partner's Capital A/c** Cr.

Particulars	A (₹)	B (₹)	C (₹)	Particulars	A (₹)	B (₹)	C (₹)
To P & L	1,000	1,000	--	By Balance b/d	50,000	30,000	--
To Balance c/d	56,500	38,500	20,000	By Cash A/c	--	--	20,000
				By C's Current A/c	--	2,000	--
				By WCR	1,500	1,500	--
				By Revaluation	6,000	6,000	--
	57,500	**39,500**	**20,000**		**57,500**	**39,500**	**20,000**

Balance Sheet of the new firm as on 1st January 2017

Liabilities	Amount (₹)	Assets	Amount (₹)
Creditors 6,000		Cash at Bank	12,000
(-) Reserve for Discount 120	5,880	Cash in hand	20,000
Outstanding Expenses	1,800	Debtors	14,000
Workmen Compensation Liabilities	1,000	Stock	24,180
Employee's Provident Fund	3,500	Fixed Assets	55,000
Capital A/c		C's current A/c	2,000
A 56500, B 38500, C 20,000	1,15,000		
	1,27,180		**1,27,180**

Working Notes :

(1) Sacrifice Ratio = OPSR – NPSR

A $\frac{1}{2}-\frac{2}{4}=\text{Nil}$; B $\frac{1}{2}-\frac{1}{4}=\frac{1}{4}$

(2) WCR ₹ 4,000 - ₹1,000 Liability = ₹ 3,000 . Surplus is distributed between A and B in their OPSR.

(3) Cash Balance: ₹ 20,000

Illustration7 :

P and Q were partners sharing profits in the ratio 3:1. Their Balance Sheet on 31st March,2017 was as follows :

Balance Sheet

Liabilities	Amount (₹)	Assets	Amount (₹)
Creditors	40,000	Bank	7,000
Bills Payable	15,000	Debtors 30,000	
Capital		Less : Provision 1,000	29,000
P 85,000		Stock	40,000
Q 40,000	1,25,000	Fixed Assets	86,000
		Goodwill	8,000
		Profit & Loss A/c	10,000
	1,80,000		**1,80,000**

R is admitted as a partner on that date and new profit sharing ratio was agreed as 5:3:2. Other terms agreed were : **(i)** Create provision for doubtful debts on debtor's @5% and 2% provision for discount on debtors. **(ii)** Fixed Assets were valued at ₹ 80,000. **(iii)** Creditors include sum due to Ajay ₹ 2,500 for the last 4 years, who is not likely to claim. **(iv)** A provision for discount is required@ 2% on creditors. **(v)** Goodwill of the firm is valued at ₹ 20,000. **(vi)** R will pay ₹ 30,000 as capital and will bring his share of goodwill in cash and capital of P and Q be adjusted on the basis of R's capital. Adjustments in capital be made on cash basis. Prepare Revaluation Account, Partner's Capital Accounts and Balance Sheet of new firm.

Solution :

Revaluation A/c

Particulars	Amount (₹)	Particulars	Amount (₹)
To P.B.D. A/c	500	By Creditors A/c	2,500
To P.D.D A/c	570	By Reserve for discount on Creditors A/c	750
To Fixed Assets A/c	6,000	By Loss transfer to Capital A/c	
		P 2,865	
		Q 955	3,820
	7,070		**7,070**

Dr. **Partner's Capital A/c** Cr.

Particulars	P (₹)	Q (₹)	R (₹)	Particulars	P (₹)	Q (₹)	R (₹)
To P's Capital	--	1,000	--	By Balance b/d	85,000	40,000	--
To P&L	7,500	2,500	--	By Cash A/c	--	--	30,000
To Revaluation	2,865	955	--	By Goodwill A/c	4,000	--	--
To Goodwill	6,000	2,000	--	By Q's Capital	1,000	--	--
To Balance c/d	75,000	45,000	30,000	By Cash A/c			
				(Balancing figure)	1,365	11,455	--
	91,365	**51,455**	**30,000**		**91,365**	**51,455**	**30,000**

Balance Sheet of the new firm

Liabilities	Amount (₹)	Assets	Amount (₹)
Creditors		Bank	7,000
40,000 – 2,500 – 750	36,750	Cash	46,820
Bills payable	15,000	Debtors 30,000	
Capital A/c		Less : P.B.D. 1,500	
P 75,000		Less : P.D.D. 570	27,930
Q 45,000		Stock	40,000
R 30,000	1,50,000	Fixed assets	80,000
	2,01,750		**2,01,750**

Working Notes :

(1) Cash Balance 30,000 + 4000 + 1,365 + 11,455 = ₹46,820

(2) OPSR – NPSR = SR/GR

$P: \frac{3}{4} - \frac{5}{10} = \frac{5}{20}(SR)$ $Q: \frac{1}{4} - \frac{3}{10} = (-)\frac{1}{20}(GR)$

(3) R's share in Goodwill $20{,}000 \times \frac{2}{10} = ₹\, 4{,}000$

Q's Capital Account will be debited by $20{,}000 \times \frac{1}{20} = ₹\, 1{,}000$

Illustration 8 :

A and B were partners sharing profits in proportion of 5:3. Their Balance Sheet on 31st March, 2017 was as follows:

Balance Sheet

Liabilities	Amount (₹)	Assets	Amount (₹)
Creditors	24,000	Bank	4,000
Bills Payable	10,500	Debtors	25,000
General Reserve	12,000	Stock	45,000
Capitals		Investments	10,500
A 75,000		Machinery	30,000
B 50,000	1,25,000	Buildings	60,000
Current Accounts:		Goodwill	20,000
A	15,000		
B	8,000		
	1,94,500		**1,94,500**

They admit C on the following terms : **(i)** New profit sharing ratio of partners will be 4:2:1. C will bring in ₹30,000 as his capital. **(ii)** C is to pay in cash an amount equal to his share in firm's goodwill, valued at twice the average profit of the last three years, which were ₹ 25,000, ₹ 36,000 and ₹ 44,000 respectively. **(iii)** 20% of the general reserve is to remain as provision for doubtful debts. **(iv)** Value of stock is found over valued by ₹ 5,000. **(v)** 50% of the amount of goodwill is withdrawn by old partners. **(vi)** That ₹ 1,000 is to be received as commission, hence to be accounted for. **(vii)** That ₹ 1,500 be provided for an unforeseen liability. **(viii)** Investments, the market value of which at the date of the balance sheet is ₹ 8,000. Prepare Revaluation Account, Capital Accounts and amended Balance Sheet.

Solution :

Revaluation A/c

Particulars	Amount (₹)	Particulars	Amount (₹)
To Stock A/c	5,000	By Accrued Commission	1,000
To Provision for Unforeseen Liability	1,500	By Loss transfer to current A/c	
To Investments	2,500	A 5,000	
		B 3,000	8,000
	9,000		**9,000**

Dr. **Partner's Capital A/c** Cr.

Particulars	A (₹)	B (₹)	C (₹)	Particulars	A (₹)	B (₹)	C (₹)
To Balance c/d	75,000	50,000	30,000	By Balance b/d	75,000	50,000	--
				By Cash A/c	--	--	30,000
	75,000	**50,000**	**30,000**		**75,000**	**50,000**	**30,000**

Dr. **Partner's Current A/c** Cr.

Particulars	A (₹)	B (₹)	Particulars	A (₹)	B (₹)
To Goodwill	12,500	7,500	By Balance b/d	15,000	8,000
To Revaluation	5,000	3,000	By Goodwill A/c	3,750	6,250
To Cash	1,875	3,125	By General Reserve	6,000	3,600
To Balance c/d	5,375	4,225			
	24,750	**17,850**		**24,750**	**17,850**

Balance sheet as on.........

Liabilities	Amount (₹)	Assets		Amount (₹)
Creditors	24,000	Cash		35,000
Bills payable	10,500	Bank		4,000
Provision for Unforeseen Liability	1,500	Debtors	25,000	
Capital A/c		Less – Provision	2400	22,600
A 75,000		Stock		40,000
B 50,000		Investments		8,000
C 30,000	1,55,000	Machinery		30,000
Current A/c		Buildings		60,000
A 5,375		Accrued Commission		1,000
B 4,225	9,600			
	2,00,600			**2,00,600**

Working Notes :

(1) Cash Balance 30,000+10,000-5,000= ₹ 35,000

(2) General Reserve A/c Dr 12,000

To P.B.D A/c 2,400

To A's Current A/c 6,000

To B's Current A/c 3,600

(3) SR = OPSR - NPSR

$$A: \frac{5}{8} - \frac{4}{7} = \frac{3}{56}\ ;\ B: \frac{3}{8} - \frac{2}{7} = \frac{5}{56}\ ; \quad 3:5$$

Illustration 9 :

The following is the Balance Sheet of A and B who share profits in the ratio of 2:1

Balance Sheet

Liabilities	Amount (₹)	Assets	Amount (₹)
Bank Overdraft	12,000	Sundry Debtors	37,000
Reserve Fund	12,000	Stock	20,000
Investment Fluctuation Fund	3,000	Investments	33,000
Sundry Creditors	20,000	Buildings	25,000
Capitals		Patents	2,000
A	40,000		
B	30,000		
	1,17,000		**1,17,000**

They admitted C into partnership on this date. New profit sharing ratio is agreed as 3:2:1. C brings proportionate capital after the following adjustments : **(i)** C bring ₹10,000 in cash as his share of Goodwill. **(ii)** One Debtor for ₹ 500 is dead. Nothing will be recovered from him. **(iii)** There is an old Computer valued ₹ 2,600. It does not appear in the books of the firm. It is now to be recorded. **(iv)** Patents are valueless. **(v)** 2% discount is to be received from creditors. **(vi)** Investments valued at ₹ 28,000. Prepare Revaluation A/c, Partner's Capital A/c and the opening Balance Sheet.

Solution :

Revaluation A/c

Particulars	Amount (₹)	Particulars	Amount (₹)
To Debtors	500	By Computer	2,600
To Patent	2,000	By Reserve for discount on creditors	400
To Investments	2,000	By Loss transfer to Capital A/c's	
		A 1000	
		B 500	1,500
	4,500		**4,500**

Dr. **Partner's Capital A/c** Cr.

Particulars	A (₹)	B (₹)	C (₹)	Particulars	A (₹)	B (₹)	C (₹)
To Revaluation	1,000	500	--	By Balance b/d	40,000	30,000	--
To Balance c/d	57,000	33,500	18,100	By Cash A/c	--	--	18,100
				By Goodwill A/c	10,000	--	--
				By Reserve Fund	8,000	4,000	--
	58,000	**34,000**	**18,100**		**58,000**	**34,000**	**18,100**

Balance Sheet of the new firm

Liabilities		Amount (₹)	Assets	Amount (₹)
Bank overdraft		12,000	Debtors	36,500
Sundry Creditors	20,000		Stock	20,000
Less – Provision	400	19,600	Investments	28,000
Capital A/c			Building	25,000
A 57000			Cash (18,100 + 10,000)	28,100
B 33500			Computer	2,600
C 18100		1,08,600		
		1,40,200		**1,40,200**

Working notes :

(1) SR = OPSR - NPSR

$A: \frac{2}{3} - \frac{3}{6} = \frac{1}{6}$; $\quad$ B: $\frac{2}{3} - \frac{2}{6} = \text{Nil}$; Note: Sacrifice is made by A only

(2) Adjustment of Capital:

Total adjusted capital of A and B: 57,000 + 33,500 = ₹90,500; C's share in profit $\frac{1}{6}$;

C's Capital $= 90{,}500 \times \frac{6}{5} \times \frac{1}{6} =$ ₹ 18,100

Illustration 10 :

Sakshi, Sindhu and Deepa were partners in a firm sharing profits in the ratio of 3:2:1. On 1st April, 2017 their Balance Sheet was as follows:

Balance Sheet

Liabilities	Amount (₹)	Assets	Amount (₹)
Capitals		Land & Building	3,64,000
Sakshi 3,58,000		Plant & Machinery	2,95,000
Sindhu 3,00,000		Furniture	2,33,000
Deepa 2,62,000	9,20,000	Bills Receivable	38,000
General Reserve	48,000	Sundry Debtors	90,000
Creditors	1,60,000	Stock	1,11,000
Bills Payable	90,000	Bank	87,000
	12,18,000		**12,18,000**

On the above date Saniya was admitted on the following terms : **(i)** She will bring ₹1,00,000 for her capital and will get 1/10th share in the profits. **(ii)** She will bring necessary cash for her share of goodwill (Premium). The goodwill of the film was valued at ₹ 3,00,000. **(iii)** A liability of ₹18,000 will be created against bills receivables discounted. **(iv)** The value of stock and furniture will be reduced by 20%. **(v)** The value of land and building will be increased by 10% **(vi)** Half of the amount of General Reserve is withdrawn by the partners. **(vii)** Capital accounts of the partners will be adjusted on the basis of Saniya's capital in their profit sharing ratio by opening current accounts. Prepare Revaluation Accoun, a Partner's Capital Accounts and Balance sheet of the new firm.

Solution :

Revaluation A/c

Particulars	Amount (₹)	Particulars	Amount (₹)
To Liability for Bills discounted	18,000	By Land & Building A/c	36,400
To Furniture A/c	46,600	By Loss transfer to Capital A/c	
To Stock A/c	22,200	Sakshi 25,200	
		Sindhu 16,800	
		Deepa 8,400	50,400
	86,800		**86,800**

Dr. **Partner's Capital A/c** Cr.

Particulars	Sakshi ₹	Sindhu ₹	Deepa ₹	Saniya ₹	Particulars	Sakshi ₹	Sindhu ₹	Deepa ₹	Saniya ₹
To Revaluation	25,200	12,000	8,400	--	By Balance b/d	3,58,000	3,00,000	2,62,000	--
To Cash A/c	12,000	8,000	4000	--	By Cash A/c	--	--	--	1,00,000
To Current A/c (Balancing fig.)	--	12,000	1,12,600	--	By Goodwill A/c	15,000	10,000	5,000	--
To Balance c/d	4,50,000	3,00,000	150000	100000	By General Reserve	24,000	16,000	8,000	--
					By Current A/c (Balancing fig.)	90,200	--	--	--
	487200	**326000**	**275000**	**100000**		**487200**	**326000**	**275000**	**100000**

Balance Sheet of the new firm as on 1st April 2017

Liabilities		Amount (₹)	Assets	Amount (₹)
Capital A/c			Land & Buildings	4,00,400
Sakshi	4,50,000		Plant & Machine	2,95,000
Sindhu	3,00,000		Furniture	1,86,400
Deepa	1,50,000		Bills Receivable	38,000
Saniya	1,00,000	10,00,000	Sundry Debtors	90,000
Creditors		1,60,000	Stock	88,800
Bills payable		90,000	Bank	87,000
Liability For Bills discounted		18,000	Cash	1,06,000
Current A/c			Sakshi's Current A/c	90,200
Sindhu	1,200			
Deepa	1,12,600	1,13,800		
		13,81,800		**13,81,800**

Working Notes :

(1) New Profit sharing Ratio Balance Profit $= 1 - \frac{1}{10} = \frac{9}{10}$

Sakshi= $\frac{9}{10} \times \frac{3}{6} = \frac{27}{60}$ Sindhu= $\frac{9}{10} \times \frac{2}{6} = \frac{18}{60}$ Deepa= $\frac{9}{10} \times \frac{1}{6} = \frac{9}{60}$

NPSR = $\frac{27}{60} : \frac{18}{60} : \frac{9}{60} : \frac{1}{10} = 27:18:9:6: \ or \ 9:6:3:2$

(2) Saniya's Capital for $\frac{1}{10}$ share is ₹ 1,00,000 : Total capital of the firm $\frac{1,00,000 \times 10}{1}$= ₹ 10,00,000

Sakshi 10,00,000 × $\frac{9}{20}$ = ₹ 4,50,000, Sindhu10,00,000 × $\frac{6}{20}$ = ₹ 3,00,000,

Deepa 10,00,000 × $\frac{3}{20}$ = ₹ 1,50,000 , Saniya = ₹ 1,00,000

Cash Balance 1,00,000 + 30,000 – 24,000 = ₹ 1,06,000

Illustration 11 :

Surendra and Mahendra are partners in a firm sharing profits in the ratio of 5:3. Their Balance Sheet on 31st December, 2016 was as follows :

Liabilities		Amount (₹)	Assets	Amount (₹)
Creditors		22,000	Cash	9,000
Provision for Doubtful Debts		1,000	Debtors	12,000
Bills Payable		18,000	Stock	25,000
Investment Fluctuation Reserve		2,000	Investments	10,000
General Reserve		16,000	Land & Buildings	55,000
Capitals			Goodwill	8,000
Surendra	35,000			
Mahendra	25,000	60,000		
		1,19,000		**1,19,000**

On 1st January, 2017 Ankur was admitted as partner. He brought ₹20,000 as capital.New Ratio will be 3 :3:2. On admission of new partner, following decisions were taken : **(i)** Ankur's share in firm's goodwill was decided as ₹ 10,000. He brought, the amount of goodwill in cash. **(ii)** Surendra took all investments for ₹ 8,000 **(iii)** A provision for Bad & Doubtful debts of ₹ 2,000 is to be made on Debtors and Land & Buildings is to be valued at ₹ 85,000 **(iv)** Stock is valued at ₹ 20,000 **(v)** Creditors have given up claim of ₹ 4,000. **(vi)** Adjustment of all partners' capital is to be done out of cash in new profit sharing ratio. Prepare Revaluation Account and Capital Account and Balance Sheet of the new firm.

Solution :

Revaluation A/c

Particulars		Amount (₹)	Particulars	Amount (₹)
To Provision for Bad Debts A/c		1,000	By Land & Buildings	30,000
To Stock A/c		5,000	By Creditors	4,000
To Profit transferred to :				
Surender's Capital A/c	17,500			
Mahendra's Capital A/c	10,500	28,000		
		34,000		**34,000**

Dr. **Partner's Capital A/c** Cr.

Particulars	Surendra ₹	Mahendra ₹	Ankur ₹	Particulars	Surendra ₹	Mahendra ₹	Ankur ₹
To Investment	8,000	--	--	By Balance b/d	35,000	25,000	--
To Goodwill	5,000	3,000	--	By Cash A/c	--	--	20,000
To Cash A/c	29,500	8,500	--	By Goodwill A/c	10,000	--	--
(Balancing figure)				By General Reserve	10,000	6,000	--
To Balance c/d	30,000	30,000	20,000	By Revaluation A/c	17,500	10,500	--
	72,500	**41,500**	**20,000**		**72,500**	**41,500**	**20,000**

Balance sheet of the new firm as on 01St January, 2017

Liabilities		Amount (₹)	Assets	Amount (₹)
Creditors		18,000	Cash	1,000
Bills Payable		18,000	Debtors	12,000
Provision for Bad Debts		2,000	Stock	20,000
Capital A/c			Land & Building	85,000
Surendra	30,000			
Mahendra	30,000			
Ankur	20,000	80,000		
		1,18,000		**1,18,000**

Working Notes :

(1) SR = OPSR - NPSR; Surendra $\frac{5}{8} - \frac{3}{8} = \frac{2}{8}$; Mahendra $\frac{3}{8} - \frac{3}{8} = \text{Nil}$

(2) Adjustment of Capital:

Ankur's Capital for $\frac{2}{8}$ share is ₹ 20,000. Total capital of the firm $= 20{,}000 \times \frac{8}{2} =$ ₹ 80,000

Surendra Capital = $80{,}000 \times \frac{3}{8} = 30{,}000$; Mahendra Capital = $80{,}000 \times \frac{3}{8} = 30{,}000$; Ankur Capital = ₹ 20,000

(3) Cash Balance = 9,000 + 20,000 +10,000 - 29,500 - 8,500 = ₹ 1,000

(4) Investment Fluctuation Reserve A/c Dr. 2,000

To Investments A/c 2,000

Illustration12 :

Amit and Ashish were sharing profits in the ratio of 5:3. They admitted Shravan as a partner with 1/5th share in profits. He had to contribute proportionate capital. The financial position was as under:

Balance Sheet

Liabilities	Amount (₹)	Assets	Amount (₹)
Creditors	19,000	Goodwill	10,000
Bills Payable	8,000	Land & Buildings	25,000
Capital :		Plant & Machinery	35,000
Amit	55,000	Stock	20,000
Ashish	30,000	Debtors	25,000
General Reserve	16,000	Investment	14,000
Provision for Bad debts	1,500	Cash	2,400
Outstanding Salary	2,400	Prepaid Insurance	500
	1,31,900		**1,31,900**

They agreed to admit Shravan on the following terms : **(i)** Goodwill of the firm was to be valued at ₹ 20,000. He will bring his share in cash. **(ii)** Land & Buildings was to be increased by ₹ 13,000 and Machinery was to be valued at ₹ 30,000 **(iii)** The provision for bad & doubtful debts was found in excess by ₹ 500. **(iv)** A liability for ₹ 1,200 included in sundry creditors was not likely to arise. **(v)** ₹ 500 for damages claimed by a customer had not been accepted by the firm and it was agreed at ₹ 100 by compromise between the customer and the firm. **(vi)** ₹10,000 investments were taken over by old partners in their profit sharing ratio. **(vii)** The capitals of the partners were to be adjusted in profit sharing ratio by opening current accounts. **(viii)** Ashish is to withdraw ₹ 2,400 in cash. Prepare Revaluation Account, Partner's Capital Accounts and Balance Sheet of the New Firm.

Solution :

Revaluation A/c

Particulars	Amount (₹)	Particulars	Amount (₹)
To Machinery A/c	5,000	By Land & Buildings A/c	13,000
To Provision for Claim	100	By P.B.D A/c	500
To Profit Transfer to Capital A/c		By Creditors A/c	1,200
Amit 6,000			
Ashish 3,600	9,600		
	14,700		**14,700**

Dr. **Partner's Capital A/c** Cr.

Particulars	Amit ₹	Ashish ₹	Shravan ₹	Particulars	Amit ₹	Ashish ₹	Shravan ₹
To Goodwill	6,250	3,750	--	By Balance b/d	55,000	30,000	--
To Cash A/c	--	2,400	--	By Cash A/c	--	--	23,050
To Investment	6,250	3,750	--	By Goodwill A/c	2,500	1,500	--
To Amit's Current A/c	3,375	--	--	By General Reserve	10,000	6,000	--
To Balance c/d	57,625	34,575	23,050	By Revaluation A/c	6,000	3,600	--
				By Ashish's Current A/c	--	3,375	--
	73,500	**44,475**	**23,050**		**73,500**	**44,475**	**23,050**

Balance Sheet of the new firm

Liabilities	Amount (₹)	Assets	Amount (₹)
Creditors	17,800	Land & Buildings	38,000
Bills payable	8,000	Plant & Machinery	30,000
Provision for Claim	100	Stock	20,000

Outstanding salary	2400	Debtors 25,000	
Capital A/c		Less – P.B.D 1,000	24,000
Amit 57,625		Investments	4,000
Ashish 34,575		Prepaid Insurance	500
Sharvan 23,050	1,15,250	Cash (2,400+23,050,+4,000 – 2,400)	27,050
Amit's Current A/c	3,375	Ashish's Current A/c	3,375
	1,46,925		**1,46,925**

Working Notes :

(1) New Profit sharing Ratio Balance Profit $= 1 - \frac{1}{5} = \frac{4}{5}$

Amit = $\frac{4}{5} \times \frac{5}{8} = \frac{20}{40}$ Ashish= $\frac{4}{5} \times \frac{3}{8} = \frac{12}{40}$

NPSR = $\frac{20}{40} : \frac{12}{40} : \frac{1}{5} = 20:12:8 \; = \; 5:3:2$

(2) Adjustment of Capital:

Total Adjusted Capital of Amit = 73,500 – 12,500 = ₹ 61,000,

Total Adjusted Capital of Ashish = 41,100 – 9,900 = ₹ 31,200

61,000 + 31,200 = ₹ 92,200 $1 - \frac{1}{5} = \frac{4}{5}$ (Amit + Ashish)

Shravan's Share in Capital 92,200$\times \frac{5}{4} \times \frac{1}{5} =$ ₹ 23,050

(3) Total Capital of Firm 92,200$\times \frac{5}{4} =$ ₹ 1,15,250

Amit 11,5250$\times \frac{5}{10} =$ ₹ 57,625 ; Ashish11,5250$\times \frac{3}{10} =$ ₹ 34,575 ; Shravan11,5250$\times \frac{2}{10} =$ ₹ 23,050

Total capital of all three partners after new profit Sharing Ratio = ₹ 57,625, ₹ 34,575, ₹ 23,050

Illustration13 :

Suraj and Chanda are partners sharing profits in the ratio of 2:1. Their Balance Sheet as on 31st March, 2017 is as follows:

Balance Sheet as on 31st March, 2017

Liabilities	Amount (₹)	Assets	Amount (₹)
Creditors	30,000	Cash Balance	20,000
Bank Loan	10,000	Bank Balance	20,000
General Reserve	30,000	Sundry Debtors 60,000	
Capitals		Less : Provision 24,000	36,000
Suraj 1,20,000		Stock	90,000
Chanda 60,000	1,80,000	Machine	29,000
		Furniture	10,000
		Goodwill	36,000
		Profit & Loss	9,000
	2,50,000		**2,50,000**

On 1st April, 2017 they admit Tara for 1/3rd share. She pays cash in the business for her share of goodwill and brings sufficient capital so that she can be given 1/3rd share of the total capital of the new firm. The goodwill of the firm is to be valued at three times of average profit of the last three years. Profit or loss of these three years were ₹30,000, ₹ 35,000 (Loss) and ₹ 50,000. It was also decided that the Provision on debtors be reduced ₹ 9,000 and Stock is to revalue at ₹ 1,20,000. The machine is to be reduced upto ₹ 20,000. Bank loan will be paid off. Pass Journal entries and prepare Revaluation Account, Partner's Capital Accounts and Balance Sheet of the new firm.

Solution : **Journal**

Date	Particulars		L/F	Amount (₹) Dr.	Cr.
1-4-17	Cash A/c	Dr.		1,23,000	
	To Tara's Capital A/c				1,08,000
	To Goodwill A/c				15,000
	(Being cash brought in by Tara towards goodwill and capital)				
	General Reserve A/c	Dr.		30,000	
	To Suraj's Capital A/c				20,000
	To Chanda's Capital A/c				10,000
	(Being General Reserve transferred to old Partner's Capital A/c in their old Profit sharing ratio)				
	Suraj's Capital A/c	Dr.		24,000	
	Chanda's Capital A/c	Dr.		12,000	
	To Goodwill A/c				36,000
	(Being existing goodwill A/c written off)				
	Bank Loan A/c	Dr.		10,000	
	To Bank A/c				10,000
	(Being Bank Loan paid off)				
	Suraj's Capital A/c	Dr.		6,000	
	Chanda's Capital A/c	Dr.		3,000	
	To P & L A/c				9,000
	(Being P & L transferred to Old partner's capital A/c)				
	P.B.D. A/c	Dr.		15,000	
	Stock A/c	Dr.		30,000	
	To Revaluation A/c				45,000
	(Being decrease in PBD and increase in value of Stock)				
	Revaluation A/c	Dr.		9,000	
	To Machine A/c				9,000
	(Being decrease in value of machine)				
	Revaluation A/c	Dr.		36,000	
	To Suraj's Capital A/c				24,000
	To Chanda's Capital A/c				12,000
	(Being profit on revaluation transferred to old Partner's Capital A/c in their old profit sharing ratio)				
	Goodwill A/c	Dr.		15,000	
	To Suraj's Capital A/c				10,000
	To Chanda's Capital A/c				5,000
	(Being goodwill credited to old Partner's Capital A/c in their sacrifice ratio)				

Solution :

Revaluation A/c

Particulars		Amount (₹)	Particulars	Amount (₹)
To Machinery		9,000	By P.B.D. A/c	15,000
To Profit transferred to:			By Stock A/c	30,000
Suraj's Capital A/c	24,000			
Chanda's Capital A/c	12,000	36,000		
		45,000		**45,000**

Dr. **Partner's Capital A/c** Cr.

Particulars	Suraj ₹	Chanda ₹	Tara ₹	Particulars	Suraj ₹	Chanda ₹	Tara ₹
To Goodwill A/c	24,000	12,000	--	By Balance b/d	1,20,000	60,000	--
To P & L A/c	6,000	3,000	--	By Cash A/c	--	---	1,08,000
To Balance c/d	1,44,000	72,000	1,08,000	By Goodwill A/c	10,000	5,000	--
				By General Reserve	20,000	10,000	--
				By Revaluation A/c	24,000	12,000	--
	1,74,000	**87,000**	**1,08,000**		**1,74,000**	**87,000**	**1,08,000**

Balance Sheet of new firm as on 1 April, 2017

Liabilities		Amount (₹)	Assets		Amount (₹)
Creditors Capital A/c		30,000	Cash at Bank		1,43,000
Suraj	1,44,000		Bank Balance		10,000
Chanda	72,000		Debtors	60,000	
Tara	1,08,000	3,24,000	(-) Provision	9,000	51,000
			Stock		1,20,000
			Machinery		20,000
			Furniture		10,000
		3,54,000			**3,54,000**

Working Notes:

(1) New Profit sharing Ratio : Balance Profit $1-\frac{1}{3}=\frac{2}{3}$; Suraj $\frac{2}{3}X\frac{2}{3}=\frac{4}{9}$; Chanda $\frac{2}{3}X\frac{1}{3}=\frac{2}{9}$

Profit Sharing Ratio of all three $\frac{4}{9}:\frac{2}{9}:\frac{1}{3}$ = 4:2:3

(2) <u>Valuation of Goodwill:</u> Average Profit $=\frac{30,000-35,000+50,000}{3}=\frac{45,000}{3}$ = ₹15000;

Goodwill= 15000 x 3 = ₹ 45000 ; Tara's Share in Goodwill 45,000 x $\frac{1}{3}$ = ₹ 15,000

(3) Sacrifice ratio will be the same as old profit sharing ratio.

(4) <u>Calculation of share of capital of Tara:</u>

Total Adjusted capital of Suraj and Chanda is 1,44,000 +72,000= ₹ 2,16,000

$1-\frac{1}{3}=\frac{2}{3}$ Suraj and Chanda's share ; Tara's share in Capital 2,16,000 x $\frac{3}{2}x\frac{1}{3}=1,08,000$

(5) Cash Balance20,000 + 1,08,000 + 15,000 = ₹ 1,43,000

(6) Bank Balance 20,000 – 10,000 = ₹ 10,000

Change in Profit sharing ratio among existing partners

The partners of an existing firm may decide to change their profit sharing ratio. As a result some partners will gain in future (called gaining partners) while others will lose in future (called sacrificing partners). Thus the partners who gain due to change in profit sharing ratio must compensate the sacrificing partners. Following issues must be considered due to change in profit sharing ratio.

1. Determination of sacrifice ratio and gain ratio.
2. Accounting treatment of goodwill.
3. Accounting treatment of reserves, accumulated profits/losses.
4. Revaluation of assets and re assessment of liabilities.
5. Adjustment of capital.

1. Determination of sacrifice ratio and gain ratio.

Sacrifice Ratio (SR) = Old Profit Sharing Ratio (OPSR) – New Profit Sharing Ratio (NPSR)

Gain Ratio(GR) = New Profit Sharing Ratio (NPSR) – Old Profit Sharing Ratio (OPSR)

2. Accounting treatment of goodwill.

Gaining partner's capital/current A/c Dr.

To Sacrificing partner's capital/current A/c

(Being the adjustment made for goodwill on change in profit sharing ratio)

Illustration : A and B shared profits in the ratio of 3:2. They agreed to share profits equally. The goodwill the firm was valued at ₹30,000. Pass necessary journal entry for accounting for goodwill.

B's Capital A/c Dr. 3000

To A's Capital A/c 3000

[Bing the adjustment made for goodwill on change in profit sharing ratio {30000 × 1/10 = ₹ 3000}]

SR or GR = OPSR - NPSR

$A = \frac{3}{5} - \frac{1}{2} = \frac{1}{10}$ (SR); $B = \frac{2}{5} - \frac{1}{2} = (-)\frac{1}{10}$ (GR)

All partners capital/current A/c Dr.

To Goodwill A/c (In OPSR)

(Being existing goodwill written off in old profit sharing ratio)

Treatment for existing goodwill :

Goodwill appearing in the books of firm should be written off.

Illustration - A and B are partners in a firm sharing profits in the ratio of 5:3. They agreed to share profits equally. The goodwill of the firm was valued at ₹48,000. Goodwill already appeared in the books at ₹ 16,000. Pass necessary journal entry for accounting for goodwill.

1. A's Capital A/c Dr. 10000

B's Capital A/c Dr. 6000

To Goodwill A/c 16000

(Being existing goodwill written off in old profit sharing ratio)

2. B's Capital A/c Dr. 6000

To A's Capital A'/'c 6000

(Being adjustment made for goodwill on change in profit sharing ratio 48000 × 1/8 = ₹ 6000)

OPSR – NPSR = SR/GR; $A = \frac{5}{8} - \frac{1}{2} = \frac{1}{8}$ (SR) ; $B = \frac{3}{8} - \frac{1}{2} = (-)\frac{1}{8}$ (GR)

Illustration : X, Y and Z are partners in a firm sharing profits in the ratio of 3:2:1. They decided that Z will get 1/3rd share in future profits. Goodwill of the firm was valued at ₹30,000. Pass the necessary journal entries.

Z's Capital A/c Dr. 5000

To X's Capital A/c 3000

To Y''s Capital A/c 2000

(Being adjustment made for goodwill on change in profit sharing ratio)

₹

Calculation of new profit sharing ratio $1-\frac{1}{3}=\frac{2}{3}$

X's new share $=\frac{2}{3}\times\frac{3}{5}=\frac{6}{15}$; Y's new share $=\frac{2}{3}\times\frac{2}{5}=\frac{4}{15}$;

New profit sharing ratio = $\frac{6}{15}:\frac{4}{15}:\frac{1}{3}$ = 6:4:5

SR or GR = OPSR – NPSR

X $=\frac{3}{6}-\frac{6}{15}=\frac{3}{30}$ SR; Y $=\frac{2}{6}-\frac{4}{15}=\frac{2}{30}$ SR; Z $=\frac{1}{6}-\frac{5}{15}=(-)\frac{5}{30}$ GR.

X's share $=30000\times\frac{3}{30}$= ₹ 3,000 Y's share = ₹$30000\times\frac{2}{30}$= ₹2,000

Z.s share $=30000\times\frac{5}{30}$ = ₹ 5,000

3. Accounting treatment of reserves, accumulated profits/losses :

I. Reserves, profits and losses be cancelled.

II. Reserves, profits and losses are not to be cancelled.

(i) Reserves & Profits/Loss to be cancelled

General Reserve A/c Dr.

P & L A/c Dr.

Workmen Compensation Reserve A/c Dr.

Investment Fluctuation Reserve A/c Dr.

To partner's capital/current A/c (In OPSR)

(Being reserve & undistributed profits transferred to partner's capital A/c in OPSR)

(b) Partner's capital/current A/c Dr. (In OPSR)

To P & L A/c

To Deferred Revenue Expenditure

(Being undistributed loss transferred to partner's capital A/c in old Profit sharing Ratio)

(ii) Cancellation of losses/differed revenue expenses.

(a) For reserves and accumulated profits –

Gaining Partner's Capital/Current A/c Dr.

To Sacrificing Partner's Capital/Current A/c

(Being adjustments for profits on change in profit sharing ratio)

(b) For accumulated losses –

Sacrificing Partner's Capital/Current A/c Dr.

To Gaining Partner's Capital/Current A/c

(Being adjustment made for loss on change in profit sharing ratio)

Illustration : A, B and C are partners in a firm sharing profits in the ratio of 3:2:1. They decided to share profits equally in future. On that date they had ₹60,000 in profit and loss account and ₹ 30,000 in general reserve. Pass journal entry in the following cases.

(i) Firm decided to close the profit and loss account and general reserve account.

P & L A/c	Dr.	60000	
General Reserve A/c	Dr.	30000	
To A's Capital A/c			45000
To B's Capital A/c			30000
To C's Capital A/c			15000

(Being undistributed profits and General Reserve transferred to partner's capital A/c in OPSR)

(ii) Firm does not want to close the P & L a/c and general reserve a/c.

C's Capital A/c Dr. 15000

To A's Capital A/c 15000

(Being adjustment made for P&L A/c and General Reserve on change in profit sharing ratio)

SR or GR = OPSR – NPSR

A $= \frac{3}{6} - \frac{1}{3} = \frac{1}{6}$ (SR); $B = \frac{2}{6} - \frac{1}{3} = 0$; $C = \frac{1}{6} - \frac{1}{3} = (-)\frac{1}{6}$ (GR)

4. Accounting treatment for revaluation of assets and re assessment of liabilities :

(a) When revised values are to be recorded in the books - In such a case revaluation of assets and reassessment of the liabilities is done with the help of revaluation account.

(i) Profit on revaluation –

Revaluation A/c Dr.

To partner's capital/current A/c (In OPSR)

(ii) Loss on revaluation –

Partner's capital/current A/c Dr.

To Revaluation A/c

(b) When revised values are not to be recorded in the books or adjustments are made through partner's capital accounts.

(i) For profit on revaluation –

Gaining partner's capital/current A/c Dr. (in OPSR)

To Sacrificing partner's capital/current A/c

(ii) For loss on revaluation –

Sacrificing partner's capital/current A/c Dr.

To Gaining partner's capital/current A/c

Illustration : A, B and C are partners in a firm sharing profits in the ratio of 5:3:2. They decided to share future profits in the ratio of 2:3:5. On this date revaluation of assets and liabilities has was under :

	Book Value ₹	Revised Value ₹
Building	50000	60000
Plant	30000	50000
Creditors	20000	30000

Pass necessary journal entry under the following cases :

(i) When revised value are to be recorded in books –

Revaluation A/c Dr. 20000

To A's Capital A/c 10000

To B's Capital A/c 6000

To C's Capital A/c 4000

(Being profit on revaluation transferred to partner's capital A/c in their old Profit sharing ratio)

(ii) When revised value are not to be recorded in the books –

C's capital A/c Dr. 6000

To A's Capital A/c 6000

(Being adjustment of 20000 × 3/10 = ₹ 6000 made for profit on revaluation)

SR/GR $= \frac{5}{10} - \frac{2}{10} = \frac{3}{10}$; $B = \frac{3}{10} - \frac{3}{10} = 0$; $C = \frac{2}{10} - \frac{5}{10} = (-)\frac{3}{10}$

Illustration 14 :

Lara, Priyanka and Vashu are partners in a firm sharing profits in the ratio of 8:5:3 respectively. Their Balance Sheet as on 31st March, 2017 was as follows :

Balance Sheet

Liabilities	Amount (₹)	Assets	Amount (₹)
Partner's Capital A/c		Cash at Bank	10,000
Lara	40,000	Investments	15,000
Priyanka	32,000	Stock	40,000
Vashu	28,000	Bills Receivable	8,000
Partner's Loan A/c		Debtors	40,000
Lara	16,000	Furniture	28,000
Priyanka	12,000	Patents	15,000
Provident Fund	18,000	Prepaid Insurance Premium	2,000
General Reserve	16,000	Plant & Machinery	62,000
Creditors	40,000		
Bank Loan	14,000		
Provision For Bad Debts	4,000		
	2,20,000		**2,20,000**

They agreed to change their profit sharing ratio as 5 :6 : 5 from 1st April, 2017. For this purpose it is decided that : **(i)** Goodwill of the firm has been valued at three times of the average super profits of last four years. Average profits of the last four years are₹ 40,000, while the normal profits that can be earned with the capital employed are ₹ 24,000. **(ii)** Provident Fund to be raised by ₹ 2,000. **(iii)** The provision for doubtful debts was to be maintained upto ₹ 3,000 **(iv)** Priyanka is to withdrew ₹ 5,000 in cash. **(v)** The value of furniture is to be decreased upto ₹ 25,000 and stock is to be revalued at as ₹ 30,000 **(vi)** Outstanding wages ₹ 5,000 are to be shown in books. **(vii)** A provision for bad debts on Bills Receivable to be made 5% **(viii)** Sanni, an old customer whose account was written off as bad has promised to pay ₹ 800 in the settlement of his full claim. **(ix)** The present value of patents is NIL. The book values of the Assets, Liabilities and Reserves are not be altered. Prepare Capital Accounts and new Balance Sheet.

Solution :

Dr. **Partner's Capital A/c** Cr.

Particulars	Lara ₹	Priyanka ₹	Vashu ₹	Particulars	Lara ₹	Priyanka ₹	Vashu ₹
To Lara	--	1,900	3,800	By Balance b/d	40,000	32,000	28,000
To Cash	--	5,000	--	By Priyanka	1,900	--	--
To Balance c/d	45,700	25,100	24,200	By Vashu	3,800	--	--
	45,700	**32,000**	**28,000**		**45,700**	**32,000**	**28,000**

Balance sheet as on 1st April 2017

Liabilities	Amount (₹)	Assets	Amount (₹)
Creditors	40,000	Cash at Bank (10,000 – 5,000)	5,000
P.B.D	4,000	Investments	15,000
Bank Loan	14,000	Stock	40,000
Provident fund	18,000	Bills Receivable	8,000
General Reserve	16,000	Debtors	40,000

Partner's Loan		Furniture	28,000
Lara	16,000	Patent	15,000
Priyanka	12,000	Prepaid Insurance	2,000
Capital A/c		Plant & Machinery	62,000
Lara 45,700			
Priyanka 25,100			
Vashu 24,200	95,000		
	2,15,000		**2,15,000**

Working Notes :

(1) SR/GR = OPSR - NPSR

Lara $= \frac{8}{16} - \frac{5}{16} = \frac{3}{16}$ Priyanka$= \frac{5}{16} - \frac{6}{16} = -\frac{1}{16}$ Vashu$= \frac{3}{16} - \frac{5}{16} = -\frac{2}{16}$

(2) Valuation of Goodwill :

S.P. = A.P. – N.P.= 40,000 – 24,000= ₹16,000

Goodwill = 16,000×3= ₹ 48,000

(3) Net Profit / Loss on Revaluation :

Items of Loss		**Items of Profit**	
Furniture	3,000	PBD 1,000	
Stock	10,000	Debtors 800	1,800
Outstanding wages	5,000	Net Loss 35400 – 1800 =	33,600
Provision for Bills (8,000 × 5%)	400		
Patent	15,000		
P.F. A/c	2,000		
	35,400		**35,400**

Net Profit After adjustment = 48,000 + 16,000 – 33,600 = ₹30,400

Priyanka's Capital A/c	Dr.	1,900	
Vashu's Capital A/c		Dr.	3,800
To Lara Capital A/c			5,700

Lara = 30,400 × 3/16 = ₹ 5,700; Priyanka = 30,400 × 1/16 = ₹ 1,900; Vasu = 30,400 × 2/16 = ₹ 3,800

Illustration15 :

Dhoni and Dhavan are partners. Their balance sheet on 31-03-2017 was as follows :

Balance Sheet as on 31 March, 2017

Liabilities	Amount (₹)	Assets	Amount (₹)
Creditors	20,000	Cash at Bank	9,500
Workmen Compensation Reserve	8,000	Debtors 20,000	
Investment Fluctuation Reserve	3,000	(-) Provision 500	19,500
Bills Payable	3,000	Stock	6,000
Outstanding expenses	1,000	Investments	10,000
Employee's Provident fund	5,000	Land & Buildings	30,000
General Reserve	10,000	Plant & Machinery	36,000
Capital :		Furniture	10,000

Dhoni 40,000		Trade Marks	3,000
Dhavan 50,000	90,000	Patents	5,000
		Goodwill	5,000
		P & L (Dr.)	4,000
		Advertisement Expenses	2,000
	1,40,000		**1,40,000**

They decided to admit Virat on April 1st, 2017. New Profit Sharing Ratio will be equal : **(i)** Virat shall bring ₹ 6,000 as his Capital and ₹ 8,000 as share of premium & half of the goodwill is withdrawn by the partner. **(ii)** That unaccounted accrued income of ₹ 500 are provided for. **(iii)** The market value of investments was ₹ 9,000. **(iv)** A debtor whose due of ₹ 500 was written off as bad debts, paid ₹ 400 in full settlement. **(v)** Land & Buildings appreciate by 25%. **(vi)** Plant & Machinery undervalued by 10%. **(vii)** Furniture is depreciated by 10%. **(viii)** Trademarks valued at ₹ 2,500. **(ix)** Patents reduced to ₹ 3,000. **(x)** Liability against Workmen Compensation Reserve is ₹ 3,000 **(xi)** Prepaid Insurance ₹ 1,000. **(xii)** Outstanding Bills for Repair ₹ 1,000. **(xiii)** There is an old computer valued at ₹ 4,000. It does not appear in the books. It is now to be recorded. **(xiv)** Create Provision for Bad Debts 5% and Provision for Discount on Debtors 2%. **(xv)** Create Reserve for discount on creditors @ 5%. **(xvi)** Stock is overvalued by 20%. **(xvii)** Capital of the Partners shall be adjusted on the basis of Virat's Capital. Prepare Revaluation A/c, Partners' Capital A/c's and the Balance Sheet of the new firm.

Solution :

Revaluation A/c

Particulars	Amount (₹)	Particulars	Amount (₹)
To Furniture A/c	1000	By Accrued Income	500
To Trade Marks A/c	500	By Bad Debts Recovered	400
To Patents A/c	2000	By Land & Buildings A/c	7500
To Outstanding Repairs Bill	1000	By Plant & Machinery A/c	4000
To P.B.D. A/c	500	By Prepaid Insurance A/c	1000
To P.D.D A/c	380	By Computer A/c	4000
To Stock A/C	1000	By Reserve for discount on creditors A/c	1000
To Profit Transfer to			
Dhoni 's Capital 6010			
Dhavan 's Capital 6010	12020		
	18400		**18400**

Dr. **Partner's Capital A/c** Cr.

Particulars	Dhoni ₹	Dhavan ₹	Virat ₹	Particulars	Dhoni ₹	Dhavan ₹	Virat ₹
To Cash	2000	2000	--	By Balance b/d	40000	50000	--
To Goodwill	2500	2500	--	By Cash A/c	--	--	60000
To P&L	2000	2000	--	By Goodwill A/c	4000	4000	--
To Adv. Exp.	1000	1000	--	By Workmen Compensation Reserve A/c	2500	2500	--
To Cash A/c (Balancing fig.)	--	1010	--	By Investments Fluctuation Reserve A/c	1000	1000	--
To Balance c/d	60000	60000	60000	By General Reserve A/c	5000	5000	--
				By Revaluation A/c	6010	6010	--
				By Cash A/c (Balancing fig.)	8990	--	--
	67500	**68510**	**60000**		**67500**	**68510**	**60000**

Balance sheet as on 1st April 2017

Liabilities		Amount (₹)	Assets		Amount (₹)
Creditors	20000		Cash at Bank		9,500
Less : Provision	1000	19,000	Cash in hand		72,380
Liability for workmen compensation		3,000	Debtors	20000	
Bills payable		3,000	Less : P.B.D.	1000	
Outstanding expenses		1,000	Less : P.D.D.	380	18,620
Outstanding Repairs bills		1,000	Stock		5,000
Employee's Provident Fund		5,000	Investments		9,000
Capital A/c			Land & Building		37,500
Dhoni	60000		Plant & Machinery		40,000
Dhavan	60000		Furniture		9,000
Virat	60000	1,80,000	Trade Mark		2,500
			Patent		3,000
			Prepaid Insurance		1,000
			Accrued Income		500
			Computer		4,000
		2,12,000			**2,12,000**

Working Notes :

1. Sacrifice ratio will be the same as old Profit Sharing Ratio.
2. WCR appear in Balance sheet ₹8000
   Less Liability against WCR ₹ 3000
   Surplus 5000
3. IFR ₹ 2000
   (-) Fall in market value of Investment ₹ 1000
   Surplus ₹ 1000
   Surplus is transferred to old painter's capital A/c, in their OPSR.
4. Dabit Balance of P&L A/c, Advertisement suspense A/c and Goodwill A/c are written off in old profit sharing ratio.
5. PBD: 20000 X 5% = ₹ 1000;
   PDD: 20000-1000 = 19000; 19000 X 2/100 = ₹ 380
6. Stock $\frac{6000X20}{120}$ = ₹ 1000
7. Plant & Machinery 36000 x $\frac{10}{90}$ = ₹ 4000
8. Adjustment for Capital: Virat's Capital for 1/3 share is ₹ 60,000
   Total Capital of the Firm $\frac{60000\ X\ 1}{3}$ = ₹ 1,80,000
   Dhoni1,80,000 X $\frac{1}{3}$ ₹ 60,000; Dhavan 1,80,000 X $\frac{1}{3}$ ₹ 60,000; Virat 1,80,000 X $\frac{1}{3}$ ₹ 60,000;
9. Cash in hand: 60000 + 8000 – 4000 + 400 + 8990 - 1010 = ₹ 72,380

Summary

1. **Reconstitution of a firm :** Any change in existing agreement of partnership amounts to reconstitution of a firm. Change in profit sharing ratios of existing partners, admission of a new partner, retirement/death of a partner, etc.
2. **Admission of a new partner :** When an existing partner of a firm allows a new person to become a partner in the firm, it is called admission of a new partner.
3. **New partner's profit sharing ratio :** The ratio in which all the partners including incoming partner share future

profits is known as the new profit sharing ratio.

4. **Sacrifice ratio :** The ratio in which the old partners have agreed to sacrifice their share in profits in favour of an incoming partner is called the sacrifice ratio.
5. **Goodwill :** Goodwill is the benefit and advantage of good name, reputation and connection of a business.
6. **Methods of valuation of goodwill :** 1. Average profit method 2. Super profit method, 3. Capitalisation method. The A.S. 10, 26/ Indian A.S. 38 prescribes that goodwill should be recorded in the books only when consideration in money or money's worth has been paid for it. i.e. when goodwill is purchased.
7. **Revaluation of assets and re assessment of liabilities :** Adjustment of partner's capital account.
   (i) Adjustment of the old partner's capital account on the basis of the new partner's capital account.
   (ii) Calculation the new partner's capital on the basis of capitals of the old partners.

Glossary

• Reconstitution of Partnership	Any change in existing agreement of partnership amounts to reconstitution of firm.
• Admission of a Partner	Admission of a partner refers to entry of a new member in the firm as owner.
• New Profit Sharing Ratio	The ratio in which all partners including the incoming partner share the future profits and losses is known as the new profit sharing ratio.
• Sacrifice Ratio	The ratio in which the old partners have agreed to sacrifice their shares in profit in favour of a new partner is known as the sacrifice ratio.
• Goodwill	Monetary valuation of reputation of business is called goodwill.
• Purchased Goodwill	It is the goodwill that is acquired by marking a payment.
• Self-Generated Goodwill	It is an internally generated goodwill. No consideration is paid for it.
• Average Profit	The sum of the profits of several years is divided by the number of years is called average profit.
• Super Profit	The excess of actual profit over normal profit.
• Capitalisation Method	Under this method goodwill is calculated by capitalisation of profit.
• Revaluation Account	Revaluation account is prepared to ascertain the Gain (Profit)/Loss arising on account of revaluation of assets and reassessment of liabilities.
• Reserve	Undistributed profit.
• Workmen Compensation Reserve	It is created out of firm's profit to meet likely liability to pay compensation to employees.
• Investments Fluctuation Reserve	It is created out of firm's profit to meet the fall in the market value of Investments.

Questions for Exercise

Multiple Choice Questions :

1. Super Profit is :
   (a) Normal Profit- Average Profit (b) Average Profit- Normal Profit
   (c) Normal Profit +Average Profit (d) None of these
2. A and b are equal partners with the capital of ₹ 16000 and ₹ 12000. C a new partner comes in for ¼ share and brings capital ₹ 15000. Find the value of the firm's goodwill?
   (a) ₹ 60,000 (b) ₹11200 (c) ₹ 17000 (d) ₹ 43000
3. Total assets and liabilities of the firm are ₹ 70000 and ₹ 10000. Average profit is ₹ 8000. NRR 10%. Calculate super profit?
   (a) ₹ 1000 (b) ₹ 2000 (c) 3000 (d) ₹ 4000

4. For getting share in profits, a new partners brings:
   (a) Capital (b) Loan (c) Goodwill (d) None of these
5. For getting share in assets of firm, a new partner brings:
   (a) Capital (b) Loan (c) Goodwill (d) Subsidy
6. Nature of revaluation account is:
   (a) Personal account (b) Nominal account (c) Real Account (d) None of these
7. When the partners decide to change the value of assets and liabilities, then the a/c prepared is:
   (a) Revaluation a/c (b) Realisation A/c (c) Memorandum revaluation (d) None of these.
8. All undistributed losses are transferred to capital account of the old partners in the ratio of:
   (a) New Profit Sharing Ratio (b) Gaining ratio (c) old Profit Sharing Ratio (d) Sacrifice ratio
9. Nature of goodwill is:
   (a) Cat Goodwill (b) Dog Goodwill (c) Rat Goodwill (d) All of them
10. A and B are partners sharing profits in ratio of 2:1. They admit C for 1/3 share in profits. The sacrifice ratio of A and B is:
    (a) 2:3 (b) 1:2 (c) 2:1 (d) 1:1

Very Short Answer Type Questions :

1. In which ratio amount of goodwill is divided among the old partners, when new partner brings cash for goodwill?
2. Write one difference between Super Profit and Average Profit.
3. What is meant by reconstitution of partnership?
4. What is the nature of revaluation account?
5. A and B are partners in a firm, sharing profits in the ratio of 3:2. C is admitted for 20% share in profits of the firm. Calculate New Profit Sharing Ratio and Sacrifice Ratio.

   Ans. : NPSR = 12:8:5 SR = 3:2
6. A, B and C are partners in a firm, sharing profits in the ratio of 5:3:2. D is admitted for 1/5th share in profits of the firm. Calculate New Profit Sharing Ratio and Sacrifice Ratio.

   Ans.: NPSR = 10 : 6 : 4 : 5 SR = 5 : 3 : 2
7. A, B and C are partners in a firm, sharing profits in the ratio of 3/6:2/6:1/6 . D is admitted for 1/6th share in profits of the firm. Calculate New Profit Sharing Ratio and Sacrifice Ratio.

   Ans. : NPSR = 15:10:5:6 SR = 3:2:1
8. A and B are partners in a firm, sharing profits of the firm. C is admitted for 1/4th share in profits of the firm. Calculate New Profit Sharing Ratio & Sacrificing ratio.

   Ans. : NPSR = 3:3:2 SR = 1:1
9. A and B are partners in a firm, sharing profits in the ratio of 2:1. C is admitted for 1/4th share in profits of the firm. After admission of C, D is admitted for 10% share in profits of the firm. Find New Profit Sharing Ratio after admission of D.

   Ans. : NPSR 18 : 9 : 9 : 4
10. A and B are partners in a firm, sharing profits in the ratio of 3:2. C is admitted for 1/5th share in profits of the firm, which he acquired in equal proportions from both A & B. Calculate New Profit Sharing Ratio and Sacrifice Ratio.

    Ans. : NPSR = 5:3:2 SR = 1:1
11. A, B and C are partners in a firm, sharing profits in the ratio of 3:2:1. D is admitted for 1/6th share in profits of the firm, which he acquired in equal proportion from A, B and C. Calculate New Profit Sharing Ratio.

    Ans.: NPSR = 8 : 5 : 2 : 3
12. A and B are partners in a firm, sharing profits in the ratio of 3:2. C is admitted for 1/4th share in profits of the firm

which he acquired from A and B in the ratio of 2:1. Calculate New Profit Sharing Ratio.

Ans. : NPSR = 26:19:15

13. A and B are partners in a firm, sharing profits in the ratio of 3:2. C is admitted for 1/5th share in profits of the firm, which he acquired entirely from B. Calculate New Profit Sharing Ratio.

    Ans.: NPSR = 3:1:1

14. A and B are partners in a firm, sharing profits in the ratio of 7:5. C is admitted for 1/6th share in profits of the firm. C acquires 1/24 from A and 1/8 from B. Calculate New Profit Sharing Ratio and Sacrifice Ratio.

    Ans.: NPSR = 13:7:4 SR = 1:3

15. A and B are partners in a firm, sharing profits in the ratio of 3:1. A new partner C is admitted. A surrenders 2/3 of his share and B surrenders 1/3 of his share in favour of C. Calculate New Profit Sharing Ratio and Sacrifice Ratio.

    Ans.: NPSR = 3:2:7 SR = 6:1

16. A and B are partners in a firm, sharing profits in the ratio of 2:1. A new partner C is admitted. A surrenders 1/3 from his share and B surrenders 1/3 of his share in favour of C. Calculate New Profit Sharing Ratio and Sacrifice Ratio.

    Ans.: NPSR = 3:2:4 SR = 3:1

17. A, B and C are partners in a firm, sharing profits in the ratio of 5:3:2 . D is admitted for 2/10 share in profits of the firm. C will retain his original share. Calculate New Profit Sharing Ratio.

    Ans.: NPSR = 15:9:8:8

18. A and B are partners in a firm, sharing profits. They admitted C and D for 1/5th and 1/6th shares in profits respectively. Calculate New Profit Sharing Ratio.

    Ans.: NPSR = 19:19:12:10

19. A, B and C are partners in a firm, sharing profits in the ratio of 3:2:1 . D is admitted as a new partner. D acquires ¼ of his share from C and A surrenders 3/10 of his share and B surrenders 1/10 of his share. Calculate New Profit Sharing Ratio and Sacrifice Ratio.

    Ans.: NPSR = 63:54:19:44 SR = 27:6:11

Short Answer Type Questions :

1. State the rights acquired by a newly admitted partner.
2. Why Profit and Loss Adjustment Account or Revaluation Account is prepared?
3. Goodwill of the firm is valued at three years purchase of average profits of last five years. The firm earned the following profits during last five years : ₹30,000, ₹ 25,000, ₹ 40,000, ₹ 35,000, ₹ 20,000. Calculate the value of goodwill of the firm.

   Ans.: ₹ 90,000

4. Goodwill of a firm is valued at two years purchase of average profits of last four years. The firm earned the following profits during last four years : 2013 - ₹ 10,000, 2014 ₹ 16,000, 2015 - ₹ 6,000 (Loss), 2016 – ₹ 12,000. Calculate the value of goodwill of the firm.

   Ans.: ₹ 16,000

5. Profits of the firm for last four years- 2013 – ₹ 20,000 (including ₹ 4,000 speculative profits); 2014 – Loss ₹ 2,000 (after charging an abnormal loss of ₹ 16,000); 2015 - ₹17,000 (closing stock overvalued by ₹ 2,000); 2016 – ₹19,000 (including profit on sale of machine ₹ 2,000) Goodwill of the firm is valued three times of average profits of last four years. Find value of goodwill.

   Ans. : ₹ 48,000

6. Profits of the firm for last five years are :

Year	2012	2013	2014	2015	2016
Profits (in₹)	10,000	12,000	15,000	19,000	29,000
Weight	1	2	3	4	5

Calculate value of goodwill on the basis of three years purchase of weighted average profits.

Ans.: ₹ 60,000

7. Capital of the firm is ₹ 2,00,000. Normal Rate of Return is 10% and average profit of the firm is ₹ 30,000. Goodwill is to be valued at three years purchase of super profits. Find value of goodwill.

   Ans.: ₹ 30,000

8. Capital of the firm is ₹ 1,80,000. Normal Rate of Return is 12% and average profit of the firm is ₹ 24,000. Calculate value of goodwill by capitalisation method.

   Ans.: ₹ 20,000

9. A and B are partners in a firm. Capital employed of the firm is ₹ 5,00,000. Normal Rate of Return is 10% and average profit of the firm is ₹ 80,000. Salary of each partner is ₹ 8,000 p.a. Calculate value of goodwill according to capitalisation of super profit method.

   Ans.: ₹ 1,40,000

10. Adjusted capital of X and Y is ₹ 30,000 and ₹ 25,000 respectively. Z brings in ₹ 25,000 as capital for ¼ share of profits in the firm. Calculate value of goodwill.

    Ans.: ₹ 20,000

11. Balance of Capital Accounts of A and B were ₹ 40,000 and ₹ 30,000 respectively. For the year ended 31–12–2016. Balance of General Reserve Stood at ₹ 20,000. C is admitted on 1 – 01 -2017 for 1/3rd share in profits. C brings in ₹ 50,000 for his share of capital. Calculate value of goodwill.

    Ans.: ₹ 10,000

12. Super Profit of a firm is ₹ 10,000. The present value of an annuity of ₹ 1 for five years at 10% per annum may be taken at ₹ 3.791. Find the value of goodwill of the firm.

    Ans.: ₹ 37,910

13. Purchase consideration of a business is determined at ₹ 3,50,000. Assets were ₹ 4,00,000 and liabilities were worth ₹ 80,000. Find the value of goodwill of the firm.

    Ans.: ₹ 30,000

14. A and B are partners in a firm sharing profits in the ratio of 2: 1. They admitted C as a new partner. C brought in ₹ 40,000 for his share of capital and ₹ 15,000 as goodwill for 1/6th share in profits of the firm. Goodwill withdrawn by A and B from the firm. On C's admission goodwill appeared in the books of the firm at ₹ 30,000. Record necessary Journal entries.

15. A and B are partners in a firm sharing profits in the ratio of 3:2. They admitted C as a new partner for 1/5th share in profits of the firm. C acquires his entire share from A. C brought in ₹ 50,000 as his capital and ₹ 10,000 as goodwill. On C's admission goodwill appeared in the books of the firm at ₹ 25,000. Record necessary Journal entries.

16. A and B are partners in a firm sharing profits in the ratio of 3:2. They admitted C as a new partner for 1/5th share in profits of the firm. On the date of C's admission goodwill was valued at ₹ 25,000. C contributed the following assets to his capital and his share of goodwill : Debtors ₹ 10,000 and Stock ₹ 15,000. Record necessary Journal entries.

17. A, B and C are partners in a firm sharing profits in the ratio of 3:2:1. They admitted D as a new partner for 1/7th share in profits of the firm. D brought in ₹ 1,00,000 as his capital and ₹ 45,000 as goodwill. Record necessary Journal entries.

18. L, M and N are partners in a firm sharing profits in the ratio of 2:2:1. They decided that N will get 1/4th share in future profits. Goodwill of the firm was valued at ₹ 80000. Goodwill already appeared in the books at ₹ 20000. Pass necessary journal entries.

    Ans. : L (SR), M 1/40 (SR), N 2/40 (GR)

19. X, Y and Z were partners sharing profits in the ratio of 5:3:2. They decided to share future profits in the ratio of 2:3:5 with effect from 1-04-2017. They decide to record the effect of the following without affecting their book value.

    1. Profit and Loss A/c ₹ 24000, 2. Advertisement Suspense A/c ₹ 12000. Pass the necessary adjustment entry.

    Ans. : Z (Dr.) ₹ 3600, X (Cr.) ₹ 3600

Essay type Questions :

1. What is meant by admission of a partner? Explain and illustrate the different methods of calculation of goodwill.
2. What is Revaluation Account? Why is it prepared? What entries are passed for revaluation of assets and re-assessment of liabilities on admission of a new partner?
3. What problems occur at the time of admission of a new partners, for this what adjustments are made? Explain.
4. What is Memorandum Revaluation Account? How does it differ from Revaluation Account?
5. State the treatment of goodwill at the time of admission of a new partner as per Indian AS- 26/ Indian AS-38.

Answers of multiple choice type questions

Question No.	1	2	3	4	5	6	7	8	9	10
Answer	B	C	B	C	A	B	A	C	D	C

Numerical Questions :

1. A & B are partners sharing profits in the ratio of 3:1. They admit C for 1/4th share in profits of the firm. Goodwill of the firm is valued at ₹40,000 on the date of admission of C. Pass Journal entries in the following cases :

   (a) C pays for his share of goodwill privately to A and B. **(b)** C brings his share of goodwill in cash. **(c)** C brings his share of goodwill in cash. A & B withdraws half of the goodwill. **(d)** C brings ₹ 6,000 in cash out of his share of goodwill. **(e)** C is unable to bring his share of goodwill in cash.

2. A and B shares the profits of a business in the ratio of 5: 3. They admitted C into the firm for 1/4th share in profits, which is to be contributed equally by A and B. On the date of admission of C the Balance Sheet of the firm was as follows :

Liabilities	Amount (₹)	Assets	Amount (₹)
A's Capital	50,000	Goodwill	10,000
B's Capital	30,000	Machinery	35,000
General Reserve	16,000	Furniture	15,000
Creditors	14,000	Stock	10,000
Employees Provident Fund	10,000	Debtors	10,000
		Bank	40,000
	1,20,000		**1,20,000**

Terms of C's admission were as follows : **(i)** C will bring ₹30,000 for his share of capital and goodwill. Half of the goodwill shall be withdrawn by the old partners. **(ii)** Goodwill of the firm has been valued at 3 years' purchase of the super profit ₹ 8,000. **(iii)** Machinery, furniture and stock are revalued at ₹ 30,000, ₹ 12,000 & ₹ 8,000 respectively. **(iv)** An old customer whose account was written off as bad debts has promised to pay ₹ 1,200. From the above prepare Revaluation account, Partners' Capital accounts and Balance Sheet of the new firm.

If it has been agreed that assets and liabilities are to be shown at old values. Prepare Memorandum Revaluation A/c, Partner's capital A/c and Balance Sheet.

Ans. : (i) Loss on revaluation ₹ 8,800; A's capital ₹ 49,750; B's capital ₹ 30,450; C's capital ₹24,000;
B/S ₹ 1, 28,200; **(ii)** B/S ₹1,37,000; Capital A/c : A ₹ 54,250; B ₹ 32,550; ₹ 26,200.

3. X and Y are partners sharing profits in the ratio of 2:1. Their Balance Sheet as on 31st March, 2017 is as under:

Balance Sheet (as on 31st March 2017)

Liabilities	Amount (₹)	Assets		Amount (₹)
Creditors	30,000	Bank Balance		17,200
Outstanding Salary	1,000	Debtors	16,000	

Workmen Compensation Reserve	6,000	Less : Provision 1,200	14,800
General Reserve	9,000	Stock	43,000
Capital:		Plant & Machinery	42,000
X 60,000		Buildings	36,000
Y 50,000	1,10,000	Goodwill	3,000
	1,56,000		**1,56,000**

They admitted Z in the firm from 1st April, 2017 for 1/4th share, which he will receives, from X. Following decisions were taken at that time : **(i)** Z brings ₹36,000 in cash and share of Ram Ltd. Worth ₹ 14,000 as his capital. **(ii)** The present value of firm's goodwill is ₹ 12,000. Z brings his share of goodwill in cash. **(iii)** Provision for bad debts on debtors be increased to 10% and outstanding salary is not required now. **(iv)** Plant and machinery overvalued by 5% and stock to be increased by ₹ 2,400. **(v)** Building undervalued by 10%. **(vi)** Sundry creditors were written back by ₹ 4,000. **(vii)** Liability against workmen Compensation determined at ₹ 9,000. Prepare Profit & Loss Adjustment Account, Partners' Capital Accounts and Balance Sheet on the admission of Z.

Ans. : (Profit on Revaluation ₹ 6,000; X's capital ₹ 71,000; Y's capital ₹ 54,000; Z's capital ₹ 50,000; B/S ₹ 2,10,000.)

4. L, M and N were partners in a firm sharing profits in the ratio of 3: 2: 1. Their Balance Sheet on 31.3.2017 was as follows :

Balance Sheet of L, M and N as on 31 March, 2017

Liabilities	Amount (₹)	Assets	Amount (₹)
Creditors	1,68,000	Bank	28,000
General Reserve	42,000	Debtors	40,000
Capitals :		Stock	2,20,000
L 1,20,000		Investments	60,000
M 80,000		Furniture	20,000
N 40,000	2,40,000	Machinery	70,000
		Profit & Loss	12,000
	4,50,000		**4,50,000**

On the above date O was admitted as a new partner and it was decided that : **(i)** The new profit sharing ratio between L, M, N and O will be 2: 2: 1: 1. **(ii)** Goodwill of the firm was valued at ₹1,80,000 and O brought his share of goodwill (premium) in cash. **(iii)** The market value of investments was ₹ 36,000. **(iv)** Machinery will be reduced to ₹ 58,000. **(v)** A creditor of ₹ 6,000 was not likely to claim the amount and hence was to be written off. **(vi)** O will bring proportionate capital so as to give him 1/6th share in the profits of the firm. **(vii)** Provision for doubtful debts to be maintained @ 5% and provision for discount on debtors be made @ 2%.Prepare Revaluation Account, Partner's Capital Accounts and Balance Sheet of the New Firm.

Ans. : Loss on Revaluation ₹ 32,760; B/S ₹ 4,82,688; Capital A/c L ₹ 1,48,620; M ₹ 79,080; N ₹ 39,540; O ₹ 53,448.

5. A and B shares the profits in the ratio of 5: 3. They admit C into firm for a 1/4th share in the profits to be contributed equally by A and B. Before admission of C, Balance Sheet of the firm is as follows :

Balance Sheet

Liabilities	Amount (₹)	Assets	Amount (₹)
A's Capital	40,000	Machinery	30,000
B's Capital	30,000	Furniture	20,000
Workmen Compensation Reserve	4,000	Stock	15,000

Provision for Doubtful Debts	1,000	Debtors	15,000
Creditors	2,000	Bank	7,000
Provident fund	10,000		
	87,000		**87,000**

Terms of C's admission were as follows : **(i)** C will bring ₹30,000 as his share of Capital and Goodwill. (ii) Goodwill of the firm has been valued at 3 times of the average super-profits of last four years. Average profits of the last four years are ₹ 20,000, while the normal profits that can be earned with the capital employed are ₹ 12,000. **(iii)** Furniture to be appreciated by ₹ 6,000 and the value of stock is to be reduced by ₹ 2,000. Provident fund be raised by ₹ 1,000. **(iv)** All debtors are good. **(v)** Liability against Workmen Compensation Reserve is determined at ₹ 2,000. Prepare Revaluation Account, Partners' Capital Accounts and the Balance Sheet of the new firm.

Ans. : Profit on Revaluation ₹ 4,000; Capital A/c : A ₹ 47,500; B ₹ 34,500 & C ₹ 24,000. B/S ₹ 1,21,000.

6. The following is the Balance Sheet of A and B, who are sharing profit in the proportion of 3: 1 on 31st March, 2017:

Balance Sheet as on 31st March, 2017

Liabilities	Amount (₹)	Assets	Amount (₹)
Creditors	39,700	Cash at Bank	22,600
Provision For Bad Debts	300	Bills Receivable	3,000
General Reserve	4,000	Debtors	16,000
Capital:		Stock	20,000
A ₹ 30,000		Office Furniture	1,000
B ₹ 16,000	46,000	Land & Buildings	25,000
		Advertisement Expenses	2,400
	90,000		**90,000**

They agreed to take C in partnership on 1st April, 2017 on the following terms : (i) C will pay ₹14,000 as his capital and goodwill for 1/5th share in the future profits. **(ii)** That the goodwill of the firm be valued at ₹ 20,000. **(iii)** The stock and furniture will be reduced by 10% and the provision for doubtful debts will be created @ 5% on debtors. **(iv)** Value of Land & Building be appreciated by 20%. **(v)** That the capital accounts of the partners will be readjusted on the basis of new partners' capital and any excess or deficiency transferred to their current accounts. Prepare Revaluation account, Partner’s Capital accounts and Balance Sheet of the new firm.

Ans. : Profit on Revaluation ₹ 2,400; Capital A/c ; A ₹ 30,000; B ₹ 10,000 & C ₹ 10,000; B/S ₹ 1,04,500.

7. A and B distribute profit in 3:2 ratio. On 31st March, 2017 their Balance Sheet is as follows:

Balance Sheet as on 31st March, 2017

Liabilities	Amount (₹)	Assets		Amount (₹)
Bills Payable	60,000	Cash and bank balance		25,000
Reserve Fund	15,000	Debtors	30,000	
Workmen Compensation Reserve	10,000	Less: Provision	2,000	28,000
Capital :		Stock		32,000
A	90,000	Goodwill		10,000
B	40,000	Buildings		1,20,000
	2,15,000			**2,15,000**

On 1st April, 2017 C was admitted in partnership on the following conditions: **(i)** New profit sharing ratio of partners will be 2: 1: 1. **(ii)** C pays ₹40,000 as his capital. **(iii)** Stock be decreased by ₹ 2,000. Provision for Doubtful debts is to be maintained up to ₹ 3,000. **(iv)** C's share in the goodwill of the firm be valued at ₹ 5,000. C brings cash for goodwill. **(v)** Prepaid insurance ₹ 1,000. **(vi)** Outstanding electricity bills ₹ 500. **(vii)** Buildings undervalued by ₹ 10,000. **(viii)** The capitals of all partners will be in their profit sharing ratio. Adjustment is to be done by cash. Prepare Capital Accounts and Balance Sheet of the new firm.

Ans. : Profit on Revaluation ₹ 7,500; Capital A/c A ₹ 80,000; B ₹ 80,000 & C ₹ 40,000. B/S ₹ 2,60,500; Cash & Bank Balance ₹ 72,500.

8. M and N are partners in a firm in equal profit sharing ratio. On 31st March, 2017 their Balance Sheet was as follows :

Balance Sheet (as on 31st March, 2017)

Liabilities	Amount (₹)	Assets	Amount (₹)
General Reserve	8,000	Cash in hand	1,500
Investment Fluctuation Reserve	2,000	Investments	30,000
Bank Overdraft	40,000	Debtors	57,000
Creditors	36,000	Furniture	4,000
Capital:		Stock	10,500
M 30,000		Buildings	30,000
N 20,000	50,000	Patents	3,000
	1,36,000		**1,36,000**

They admit O in the partnership on the following terms : **(i)** Create provision for doubtful debts by 10% on debtors. **(ii)** Furniture will be depreciated by 25%. **(iii)** Increase the value of Investment by ₹5,000. **(iv)** O shall bring ₹ 25,000 as his capital and his share in profit & loss will be 1/3rd and he will brings ₹ 5,000 as his share of goodwill. **(v)** A creditor for ₹ 1,700 is dead. No liability shall arise in future on this account. **(vi)** Patents are valueless. **(vii)** Buildings will be appreciated by 25%. Stock is reduced to ₹ 9,000. The capitals of old partners are also to be adjusted accordingly. Prepare Revaluation A/c, Partners' Capital A/c and Balance Sheet.

Ans. : Profit on Revaluation ₹ 3,000; Capital A/c : M ₹ 25,000; N ₹ 25,000 & O ₹ 25,000; B/S ₹ 1,49,300; Cash Balance ₹ 13,500.

9. Atal and Madan were partners in a firm sharing profits in the ratio of 5: 3. On 31.3.2017 they admitted Mehra as a new partner for 1/5th share in the profits. The new profit sharing ratio was 5: 3: 2. On Mehra's admission the Balance Sheet of the firm was as follows :

Liabilities	Amount (₹)	Assets	Amount (₹)
Capitals :		Land and Buildings	1,50,000
Atal 1,50,000		Machinery	40,000
Madan 90,000	2,40,000	Patents	5,000
Provision for bad debts	1,200	Stock	27,000
Creditors	20,000	Debtors	47,000
Workmen Compensation Fund	32,000	Cash	4,200
		Profit and Loss Account	20,000
	2,93,200		**2,93,200**

On Mehra's admission it was agreed that : **(i)** Mehra will bring ₹40,000 as his capital and ₹ 16,000 for his share of goodwill (premium), half of which was withdrawn by Atal and Madan. **(ii)** A provision of 2 1/2 % for bad and doubtful debts was to be created. **(iii)** Included in the sundry creditors was an item of ₹ 2,500, 2.5% which was not to be paid. **(iv)** A provision was to be made for an outstanding bill for electricity ₹ 3,000. **(v)** A claim of ₹ 325 for damages against the firm was likely to be admitted. Provision for the same was to be made. After the above adjustments, the capitals of Atal and Madan were to be adjusted on the basis of Mehra's capital. Actual cash was to be brought in or to be paid off to Atal and Madan as the case may be. Prepare Revaluation Account, Capital Accounts of the partners and the Balance Sheet of the new firm.

Ans.: Loss on Revaluation ₹ 800; B/S ₹ 2,69,000; Capital A/c : Atal ₹ 1,00,000; Madan ₹ 60,000; Mehra's ₹ 40,000.

10. Shikhar and Rohit were partners in a firm sharing profits in the ratio of 7: 3. On 1st April, 2017 they admitted Kavi as a new partner for 1/4 share in profits of the firm. Kavi brought ₹ 4,30,000 as his capital and ₹ 25,000 for his share of goodwill (premium). The Balance Sheet of Shikhar and Rohit as on 1st April, 2017 was as follows:

Balance Sheet of Shikhar and Rohit as on 1st April, 2017

Liabilities	Amount (₹)	Assets	Amount (₹)
Capitals :		Land and Buildings	3,50,000
Shikhar 8,00,000		Machinery	4,50,000
Rohit 3,50,000	11,50,000	Debtors 2,20,000	
General Reserve	1,00,000	Less : Provision 20,000	2,00,000
Workmen's Compensation Fund	1,00,000	Stock	3,50,000
Creditors	1,50,000	Cash	1,50,000
	15,00,000		**15,00,000**

It was agreed that : **(i)** The value of Land and Buildings will be appreciated by 20%. **(ii)** The value of Machinery will be depreciated by 10%. **(iii)** The liabilities of Workmen's Compensation Fund was determined at ₹50,000. **(iv)** Capitals of Shikhar and Rohit will be adjusted on the basis of Kavi's capital and actual cash to be brought in or to be paid off as the case may be. Prepare Revaluation Account, Partners' Capital Accounts and the Balance Sheet of the new firm.

Ans. : Profit on Revaluation ₹ 25,000. Capital A/c : Shikhar ₹ 9,03,000; Rohit ₹ 3,87,000; Kavi ₹ 4,30,000; B/S ₹ 19,20,000; Cash Balance ₹ 5,45,000.

11. A and B are partners in a firm sharing profits in the ratio of 3:2. On 1st April 2017 they admit C in new firm for 1/5 share in profit. Their balance sheet was as follows:

Balance Sheet as on 31st March, 2017

Liabilities	Amount (₹)	Assets	Amount (₹)
Capital Accounts:		Goodwill	5,000
A 60,000		Plant & Machinery	65,000
B 50,000	1,10,000	Furniture	15,000
General Reserve	10,000	Investments	20,000
Sundry Creditors	50,000	Stock	20,000
		Sundry Debtors	30,000
		Cash in hand	15,000
	1,70,000		**1,70,000**

C was admitted on the following terms : **(i)** C is to bring capital ₹40,000 and goodwill ₹ 15,000 **(ii)** Partners agreed to share the future profits in the ratio of 5:2:3 **(iii)** Investments will be appreciated by 20% and furniture depreciated by 10% **(iv)** One customer who owed the firm ₹ 2,000 becomes insolvent and nothing could be realised from him. **(v)** Creditors will be written off ₹ 2,000. **(vi)** Outstanding bills for repairs ₹ 1,000 will be provided for. **(vii)** Interest accrued on investments ₹ 2,000. **(viii)** Capitals of the partner's shall be in proportion to their profit sharing ratio. For this, adjustment to be made through cash. Prepare Revaluation Account, Capital

Accounts and the Balance Sheet of new firm.

Ans.: Profit on Revaluation ₹ 3,500. Capital A/c : A ₹ 1,00,000; B ₹ 60,000; C ₹ 40,000.

12. Ishu and Vishu are partners sharing profits in the ratio of 3:2. Their Balance Sheet as on 31st March 2017 was as follows:

Balance Sheet as on 31st March, 2017

Liabilities	Amount (₹)	Assets	Amount (₹)
Creditors	66,000	Cash at Bank	87,000
General Reserve	10,000	Debtors 42,000	
Investment Fluctuation Fund	4,000	Less : Prov. For D.D. 7,000	35,000
Capital :		Investments (Market Price 19,000)	21,000
Ishu 1,19,000		Buildings	98,000
Vishu 1,12,000	2,31,000	Plant & Machinery	70,000
	3,11,000		**3,11,000**

Nishu was admitted on that date for 1/6th share on the following terms : **(i)** Nishu will bring ₹56,000 as his share of capital. **(ii)** Goodwill of the firm is valued at ₹ 84,000 and Nishu will bring his share of goodwill in cash. **(iii)** Plant and Machinery be appreciated by 20%. **(iv)** All debtors are good. **(v)** There is a liability of ₹ 9,800 included in sundry creditors that is not likely to arise. **(vi)** Capital of Ishu and Vishu will be adjusted on the basis of Nishu's capital and any excess or deficiency will be made up by withdrawing or bringing in cash by concerned partner. Prepare Revaluation Account, Partners' Capital Accounts and the Balance Sheet of the firm after the above adjustments.

Ans. : Profit on Revaluation ₹ 30,800.

Capital A/c : Ishu ₹ 1,68,000; Vishu ₹ 1,12,000; Nishu ₹ 56,000; B/S ₹ 3,92,200.

13. A and B, who are partners in a firm share profits in the ratio of 3:2 on 31st December, 2016. The Balance Sheet was as follows:

Balance Sheet as on 31st December, 2016

Liabilities	Amount (₹)	Assets	Amount (₹)
Capital Accounts :		Plant & Machinery	10,000
A 10,000		Land & Buildings	8,000
B 8,000	18,000	Debtors 12,000	
General Reserve	15,000	Less: Prov. For D.D. (1,000)	11,000
Workmen's Compensation Fund	5,000	Stock	12,000
Creditors	12,000	Cash	9,000
	50,000		**50,000**

They agreed to admit C into partnership for 1/5th share of profits on the following terms : **(i)** Provision for doubtful debts be increased by ₹2,000. **(ii)** The value of stock be increased by ₹ 4,000 and Land & Buildings be increased to ₹ 18,000. **(iii)** The liability against workmen's compensation fund is determined at ₹ 2,000. **(iv)** C brought in as his share of goodwill ₹ 10,000 in cash. **(v)** C would bring cash and would make his capital equal to 20% of combined capital of A & B, after the above revaluation and adjustments are carried out. Prepare Revaluation Account, Partners' Capital Accounts and the Balance Sheet of the firm after C's admission.

Ans. : Profit on Revaluation ₹ 12,000.

Capital A/c : A ₹ 34,000; B ₹ 24,000; C ₹ 11,600. B/S ₹ 83,600; Cash Balance ₹ 30,600.

14. P and Q are partners in a firm sharing profits in the ratio of 3 :1. Their Balance Sheet was as follows :

Liabilities	Amount (₹)	Assets	Amount (₹)
Creditors	11,000	Cash	4,000
Workmen's Compensation Fund	4,000	Debtors 16,000	
Investment Fluctuation Fund	1,000	Less : Prov. For D.D. (500)	15,500
General Reserve	2,000	Stock	18,500
Capital A/c:		Investments	6,000
P 16,000		Goodwill	4,000
Q 14,000	30,000		
	48,000		**48,000**

R is admitted for 1/5th share in profit on the following terms : **(i)** Market value of investments is taken as ₹4,200 **(ii)** Accrued Interest amounts to ₹ 200. **(iii)** Provision for doubtful debt was in excess to ₹ 200. **(iv)** A claim of Workmen's Compensation for ₹ 1,000 be provided. **(v)** R is to bring ₹ 10,000 as goodwill share. **(vi)** Total capital of the firm was agreed as ₹ 50,000 to be adjusted in their profit sharing ratio. R brings his capital in cash but capital of other partners be adjusted by opening current accounts. Prepare Revaluation Account, Capital Accounts and the Balance Sheet of new firm.

Ans. : Loss on Revaluation ₹ 400.

Capital A/c : P ₹ 30,000; Q ₹ 10,000 & R ₹ 10,000; B/S ₹ 68,650. Cash Balance ₹ 24,000.

15. A, B and C are partners sharing profits in the ratio 2:2:1. Their balance sheet on 31-3-2017 was as follows :

Liabilities	Amount (₹)	Assets	Amount (₹)
Creditors	30,000	Bank	30,000
General Reserve	68,000	Debtors 40,000	
Profit & Loss A/c	30,000	Less : Provision 2,000	38,000
Capital A/cs		Stock	50,000
A 40,000		Furniture	30,000
B 40,000		Plant	80,000
C 30,000	1,10,000	Deferred Revenue Expenditure	10,000
	2,38,000		**2,38,000**

The partners agreed to share profits in the ratio 1:1:1 from 1-4-2017. They further agreed that : **(i)** Stock be valued at 20% more. **(ii)** Doubtful debt provision be increased by ₹1,000. (iii) Depreciate furniture and plant by 10%. **(iv)** Rent outstanding is ₹ 2,000. **(v)** Goodwill of the firm is valued at ₹ 51,000.Partners decided not to alter the values of assets, liabilities and reserves. They also decided not to show goodwill in the books. Pass a single entry to give effect to above changes.

Ans. : Net profit by adjustment ₹ 1,35,000

C's Capital A/c	Dr.	18000	
To A's Capital			9000
To B's Capital			9000

16. Suresh, Ramesh and Mahesh share profits in the ratio of 3: 2: 1 respectively. Their Balance Sheet as on 1st April, 2017 was as-

Balance Sheet as on 1st April, 2017

Liabilities	Amount (₹)	Assets	Amount (₹)
Creditors	1,60,000	Cash	1,40,000
General Reserve	1,08,000	Sundry Assets	4,80,000

Capital A/c		Profit & Loss A/c	36,000
Suresh 1,80,000			
Ramesh 1,20,000			
Mahesh 88,000	3,88,000		
	6,56,000		**6,56,000**

On that date they decided that Suresh, Ramesh and Mahesh will share profits in future in the ratio of 2: 2: 1 respectively. The goodwill of the firm was valued at ₹72,000 on that date. Prepare Partner's Capital Accounts and Balance Sheet of the firm.

Ans. : Capital A/c Suresh ₹ 2,23,200; Ramesh ₹ 1,39,200; Mahesh ₹ 97,600; B/S ₹ 6,20,000.
Suresh 3/30 (SR); Ramesh (-)2/30 (G/R); Mahesh(-)1/30 (GR).

17. Nardeep, Hardeep and Gagandeep were partners in a firm sharing profits in 2: 1: 3 ratio. Their Balance sheet as

Liabilities	Amount (₹)	Assets	Amount (₹)
Creditors	1,00,000	Land	1,00,000
Bills Payable	40,000	Buildings	1,00,000
General Reserve	60,000	Plant	2,00,000
Capital :		Stock	80,000
Nardeep 2,00,000		Debtors	60,000
Hardeep 1,00,000		Bank	10,000
Gagandeep 50,000	3,50,000		
	5,50,000		**5,50,000**

From 1.4.2017, Nardeep, Hardeep and Gagandeep decided to share future profits equally. For this purpose it was decided that : **(a)** Goodwill of the firm be valued at ₹3,00,000. (b) Land be revalued at ₹ 1,60,000 and buildings be depreciated by 6%. **(c)** Creditors of ₹ 12,000 were not likely to be claimed and hence be written off. Prepare, Revaluation Account, Partners Capital Accounts and the Balance Sheet of the reconstituted firm.

Ans. : Profit on Revaluation ₹ 66,000. Capital A/c : Nardeep ₹ 2,42,000; Hardeep ₹ 71,000; Gagandeep ₹ 1,63,000; B/S ₹ 6,04,000; Hardeep (-) 1/6 (GR); Gagandeep 1/6 (SR).

18. A and B are partners sharing profits in the ratio of 3:2 in a firm. On 31.3.2017 their Balance Sheet was as follows:

Balance sheet as on 31 March, 2017

Liabilities	Amount (₹)	Assets	Amount (₹)
Creditors	40,000	Cash at Bank	40,000
Provision for Bad-debts	2,000	Debtors	50,000
Employee's Provident fund	8,000	Stock	30,000
Bank Loan	40,000	Investments	10,000
P & L A/c	20,000	Buildings	1,00,000
General Reserve	10,000	Machinery	40,000
Capital :		Furniture	4,000
A 1,00,000		Patents	6,000
B 80,000	1,80,000	Goodwill	15,000
		Deferred Revenue Expenditure	5,000
	3,00,000		**3,00,000**

They decided to admit C for 1/5th share. He takes his share entirely from A. He had to contribute the proportionate capital. **(i)** Goodwill of the firm is valued at 2 years purchase of average profit of last 3 years, which was ₹ 10,000. C brings his share of goodwill in cash. **(ii)** Unrecorded Assets ₹ 10,000 **(iii)** Investment valued at ₹ 12,000 and taken by A. **(iv)** ½ of General Reserve withdrawn by the partners. **(v)** Land & Buildings appreciates by 10%. **(xi)** Plant & Machinery valued at 20% more. **(vii)** Furniture valued at 10% less. **(viii)** Outstanding Salary ₹ 2,000. **(ix)** Patent reduced by ₹ 3,000. **(x)** Liability of workmen compensation is ₹ 2,000. **(xi)** Prepaid insurance ₹ 1,000. **(xii)** Bank loan would be paid off. **(xiii)** A liability of ₹ 4,000 included in creditors was not likely to arise. **(xiv)** Bad debts ₹ 3,000. **(xv)** Stock is reduced to ₹ 26,000. Prepare Revaluation A/c, Partner's Capital Accounts and the Balance Sheet of the new firm.

Ans. : Profit on Revaluation ₹ 18,600; Capital A/c : A. ₹ 1,06,160; B. ₹ 89,400; C. ₹ 48,900; B/S ₹ 2,92,500; Cash Balance ₹ 47,900.

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3

Accounting for Retirement and Death of Partner

Learning Objectives :

After studying this chapter, you should be able to understand:

- Meaning and methods of retirement of a partner
- New profit-sharing ratio and gaine ratio after retirement or death of a partner
- Distinction between sacrifice ratio and gaine ratio
- Accounting treatment of goodwill on retirement or death of a partner
- Accounting treatment for revaluation of assets and reassessment of liabilities on retirement or death of a partner
- Accounting treatment of accumulated profits/losses and reserves on retirement or death of a partner.
- Accounting treatment for joint life policy and individual life policy on retirement of a partner.
- Computation and payment of amount due to retiring or deceased partner
- Adjustment of capital on retirement or death of a partner
- Preparation of diseased partner's executors account under the provisions of section 37 of the Indian Partnership Act, 1932
- Accounting treatment admission cum retirement

An existing partner may decide to leave the firm due to ill health, old age, misunderstanding, mutual consent or due to other similar reasons. Thus, a partner leaving the firm is known as a retiring or an outgoing partner. As per section 32 (1) of the Indian Partnership Act, 1932 a partner may retire under the following circumstances:

(i) With the consent of all the partners.
(ii) As per agreement to that effect.
(iii) By giving notice in writing to all other partners, if partnership is at will.

Accounting problems arising at the time of retirement of a partner :

1. Calculation of new profit-sharing ratio and gaining ratio
2. Accounting treatment of goodwill
3. Accounting treatment of revaluation of assets and reassessment of liabilities
4. Accounting treatment of accumulated profits/ losses
5. Adjustment of joint life policies
6. Determination of amount payable to retiring partner
7. Amount payable to retiring partner's representatives.
8. Adjustment of capital

Calculation of New Profit Sharing Ratio

On retirement of a partner, the profit sharing ratio of the remaining partners also changes. Thus, new profit sharing ratio of the remaining partners is required to be computed. New profit sharing ratio on retirement of a partner is the ratio in which the remaining partners decide to share future profits.

New Profit Sharing Ratio(NPSR) = Old Profit Sharing Ratio (OPSR) + Gaine Ratio(GR); NPSR = OPSR + GR
Gaine Ratio (GR) = New Profit Sharing Ratio (NPSR) - Old Profit Sharing Ratio (OPSR)

I. If the new profit sharing ratio of the remaining partners is not given in the question, it will be assumed that the remaining partners continue to share profits in the old ratio.
A,B and C are partners in a firm sharing profits in the ratio of 3:2:1. Calculate new ratio when :
(a) A retires then new ratio will be 2: 1
(b) B retires then new ratio will be 3: 1
(c) C retires then new ratio will be 3: 2

Note: New profit sharing ratio of the remaining partners is calculated by simply striking out the share of retiring partner.

II. **When a partner acquires retiring partner's entire share :** In this case, the share of the acquiring partner will increase and the share of other partners will remain the same.
Illustration : A, B and C are partners in a firm sharing profits in the ratio of 2:2:1. C retires from the firm. C's entire share is acquired by A. Calculate new profit sharing ratio.

NPSR = OPSR + GR or A's New Share $\frac{2}{5}+\frac{1}{5}=\frac{3}{5}$; new ratio of A & B $\frac{3}{5}:\frac{2}{5}=3{:}2$

III. When remaining partners purchase the retiring partner's share in a specific proportion:
In such a case, the acquired share is added to their existing shares to arrive at the new profit sharing ratio.

(i) A, B and C are partners in a firm sharing profits in the ratio of 5: 4: 3. B retires, and his share is taken by A and C equally. Find new profit sharing ratio.
B's Share $\frac{4}{12}$; A will gain $\frac{4}{12}\times\frac{1}{2}=\frac{2}{12}$; C will gain $\frac{4}{12}\times\frac{1}{2}=\frac{2}{12}$
NPSR= OPSR + GR; A's new share = $\frac{5}{12}+\frac{2}{12}=\frac{7}{12}$; C's new share = $\frac{3}{12}+\frac{2}{12}=\frac{5}{12}$] and NPSR = 7:5

(ii) A, B and C are partners sharing profits in the ratio of 5: 3:2. C retires and his share is taken by A and B in the ratio of 2: 1. Calculate new profit sharing ratio.
C's share $\frac{2}{10}$;A will gain $\frac{2}{10}\times\frac{2}{3}=\frac{4}{30}$; B will gain $\frac{2}{10}\times\frac{1}{3}=\frac{2}{30}$
NPSR= OPSR + GR; A's new share = $\frac{5}{10}+\frac{4}{30}=\frac{19}{30}$; B's new share = $\frac{3}{10}+\frac{2}{30}=\frac{11}{30}$; or 19:11

Gain Ratio

The ratio in which the continuing partners acquire the outgoing (Retired or Deceased) partner's share is the ratio in which the remaining partners will pay the amount of goodwill to the retiring or deceased partner.

(i) When new profit sharing ratio is given.

Illustration : A,B and C are partners in a firm sharing profits equally. B retires and new profit ratio is 5: 4. Calculate the gaine ratio.

(G.R.) = NPSR – OPSR; A = $\frac{5}{9}-\frac{1}{3}=\frac{2}{9}$; B = $\frac{4}{9}-\frac{1}{3}=\frac{1}{9}$; or 2:1

(ii) When new profit sharing ratio is not given. In such a case, it is assumed that the remaining partners continue to share profits in old ratio. Thus gain to the continuing partners is in the old ratio.

Illustration : A, B and C are partners in a firm sharing profits in the ratio of 5:1. Find out the gaine ratio when,
(a) A retires then Gain Ratio is 4: 1 (b) B retires then Gain Ratio is 5: 1
(c) C retires then Gain Ratio is 5: 4

Distinction between sacrifice ratio and Gaine Ratio

Basis of difference	Sacrifice ratio	Gaine ratio
1. Meaning	It is the ratio in which old partners sacrifice their share of profits in favour of new partner	It is the ratio in which remaining partners acquire share of profit from the outgoing partner (retired or deceased partner)
2. When calculated	At the time of admission of a new partner	At the time of retirement or death of a partner

3.	Formula for calculation	Old profit sharing ratio – new profit sharing ratio	New profit sharing ratio – old profit sharing ratio
4.	Purpose of calculation	New partner's share of goodwill is divided between the old partners in sacrifice ratio	Goodwill paid to outgoing partner is paid by the remaining partners in their gaine ratio
5.	Effect	It signifies reduction in share of profits of the old partners.	It signifies increase in share of profits of the remaining partners

Accounting Treatment of Goodwill

According to A.S. 26 and Indian A.S. 38, goodwill can be recorded in the books only when some consideration in money or moneys worth has been paid for it. It also states that internally generated goodwill should not be recognized as an asset. Hence only purchased goodwill can be recorded in the books. Goodwill should not be raised in the books of accounts at the time of retirement/death, rather goodwill should be adjusted through partner's capital accounts.

i. Write off the existing book value of goodwill if any appearing in Balance Sheet

All Partner's Capital A/c Dr.
To Goodwill A/c
(Being existing goodwill written off in OPSR)

ii. Give credit for outgoing partner's (retired or deceased partner) share of goodwill to outgoing partner.

Remaining Partner's Capital A/c Dr.
To Retiring / Deceased Partner's Capital A/c
(Being retiring/deceased partner's share of goodwill adjusted in GR)

Illustration : 1

(i) A,B and C are partners in a firm. C retires and goodwill of the firm is valued at ₹ 60,000. A and B agree to share future profits in the ratio of 3:2. Goodwill is appearing in their books at the value of ₹ 36,000. Pass necessary journal entries for goodwill.

Gain Ratio = NPSR – OPSR; A = $\frac{3}{5}-\frac{1}{3}=\frac{9-5}{15}=\frac{4}{15}$;B =$\frac{2}{5}-\frac{1}{3}=\frac{6-5}{15}=\frac{1}{15}$;or 4:1

A's Capital A/c	Dr.	16,000	
B's Capital A/c	Dr.	4,000	
To C's Capital A/c			20,000
(Being retiring partner's share of goodwill adjusted to remaining partner's in their gaine ratio)			
A's Capital A/c	Dr.	12,000	
B's Capital A/c	Dr.	12,000	
C's Capital A/c	Dr.	12,000	
To Goodwill A/c			36,000
(Being existing goodwill written off)			

(ii) A, B and C are partners in a firm sharing profits in the ratio of 3:4:3. C retires and goodwill of the firm is valued at ₹60,000. New profit sharing ratio is 3:7. Pass necessary Journal entry in relation to goodwill.

(G.R.) = NPSR – OPSR; A = $\frac{3}{10}-\frac{3}{10}=\mathrm{Nil}(0)$;B =$\frac{7}{10}-\frac{4}{10}=\frac{3}{10}$

B's Capital A/c	Dr.	18,000	
To C's Capital A/c			18,000
(Being C's share of goodwill ₹ 18,000 adjusted with gaining partner B)			

(iii) Sacrifice made by continuing partner besides retiring partner.

Continuing Partner's Capital A/c - Dr. (who has gained)
To Retiring/Deceased Partner's Capital A/c
To continuing Partner's Capital A/c (who has sacrificed)

Illustration 2 :

A,B, and C are partners in a firm sharing profits in the ratio of 3:2:1. C retires and new profit sharing ratio between A and B was 1:2. The goodwill of the firm is valued at at ₹60,000. Pass journal entry for goodwill.

(G.R.)= NPSR – OPSR; A = $\frac{1}{3} - \frac{3}{6} = -\frac{1}{6}$;B =$\frac{2}{3} - \frac{2}{6} = \frac{2}{6}$(Gain)

B's Capital A/c	Dr.	20,000	
	To C's Capital A/c		10,000
	To A's Capital A/c		10,000
(Being A and C compensated for goodwill)			

(iv) **Accounting treatment of hidden goodwill:**

If a firm has agreed to settle the accounts of the retiring partner by paying him a lump sum amount. Then the amount paid to him in excess of his share (after all adjustments) is taken as his share of goodwill.

Illustration 3 :

A, B, and C are partners in a firm sharing profits in the ratio of 3:2:3. C retires and his capital after making all adjustments stands at ₹ 1,20,000. A and B agreed to pay him ₹ 1,50,000 in full settlement of his claim. Pass necessary journal entry for the treatment of goodwill.

Hidden Goodwill =1,50,000 – 1,20,000 = ₹ 30,000

A's Capital A/c	Dr.	18,000	
B's Capital A/c	Dr.	12,000	
To C's Capital A/c			30,000
(Being C's Share of goodwill adjusted in gaine ratio 3:2)			

Revaluation of Assets and Reassessment of Liabilities

(I) When revised value of assets/liabilities to be recorded:

To give effect to the change in the values, revaluation account/P&L adjustment account is prepared in the same manner as is prepared at the time of admission of a new partner. Profit/loss on revaluation is distributed among all the partners including retiring/deceased partner in their old profit sharing ratio.

If there is profit: Revaluation A/c Dr.
To All Partner's Capital A/c (OPSR)
(Being distribution of profits on revaluation)

If there is Loss: All Partner's Capital A/c Dr. (OPSR)
To Revaluation A/c
(Being distribution of loss on revaluation)

(II) When revised value of assets/liabilities are not to be recorded:

In this case memorandum revaluation account is prepared in the same manner as is prepared at the time of admission of a new partner.

1- Distribution of profits on revaluation in lower part of the account.

Memorandum Revaluation A/c Dr. (in OPSR)
To Old Partners Capital A/c
(Profit transferred to Capital A/c)

Note: In case of loss, reverse entry will be made.

2- Reverse entry for above profit:

Remaining Partner's Capital A/c Dr. (in NPSR)
To Memorandum Revaluation A/c
(Adjustment made for profit)

Note: In case of loss, reverse entry will be made.

Adjustment for Accumulated Profits/Losses

All the accumulated profits/losses, reserves be allocated among all the partners including retiring/ deceased partner in their old profit sharing ratio.

General Reserve A/c Dr.
P&L A/c Dr.
Investment Fluctuation Reserve A/c Dr. (Deduct fall in value of investment, if any)

Workmen Compensation Reserve A/c Dr (Deduct claim, if any)
To All Partner's Capital A/c (OPSR)
(Being reserves amd accumulated profits transferred to Partner's Capital A/c in OPSR)

For undistributed losses :
All Partner's Capital A/c Dr.
To Profit and Loss A/c
To Advertisement Exp. A/c (Deferred Revenue Expenditure A/c)
(Being losses distributed)

Note: Employees Provident Fund is a liability of the firm. Hence, it will not be distributed among the partners.

Illustration 4 :

X, Y and Z are partners sharing profits in ratio 2:2:1. Z decided to retire from the firm on 31st March, 2017. Their balance sheet stood as under:

Liabilities		Amount ₹	Assets	Amount ₹
Creditors		30,000	Cash at Bank	36,500
Workmen Compensation Reserve		10,000	Debtors	51,500
Bills Payable		20,000	Investments	10,000
Provision for Doubtful Debts		1,000	Stock	40,000
Profit & Loss		8,000	Freehold Property	72,000
Bank Loan		6,000	Plant &Machinery	50,000
Employee's Provident Fund		5,000	Furniture	20,000
General Reserve		10,000	Patents	6,000
Capitals:			Advertisement Expenses	5,000
X	80,000			
Y	80,000		Goodwill	9,000
Z	50,000	2,10,000		
		3,00,000		**3,00,000**

Other conditions at the time of retirement are as under:

(i) Goodwill of the firm be fixed at ₹ 1,00,000. **(ii)** Unrecorded Assets ₹ 5,000. **(iii)** Investment valued at ₹ 15,000 and taken by Z. **(iv)** Provision of ₹ 3,500 be made in respect of outstanding legal charges. **(v)** Freehold property appreciated by ₹ 8,000. **(vi)** Plant & Machinery overvalued by ₹ 10,000. **(vii)** Furniture reduced to ₹ 17,000. **(viii)** O/s salary ₹ 2,000. **(ix)** Patent reduced by ₹ 1,000. **(x)** Bad debts reserve is to be increased to ₹ 1,500 and provision for discount be created at 2%. **(xi)** Prepaid Insurance ₹ 1,000. **(xii)** Bank Loan would be paid off. **(xiii)** A liability of ₹ 5,000 included in creditors was not likely to arise. **(xiv)** A Liability against Workmen Compensation is ₹ 12,000. **(xv)** Stock is to be valued at 20% less. Prepare Revaluation Account.

Solution:

Dr. **Revaluation Account** Cr.

Particulars	Amount₹	Particulars		Amount₹
To Provision for Legal Expenses	3,500	By Unrecorded asset		5,000
To Plant &Machinery	10,000	By Investments A/c		5,000
To Furniture A/c	3,000	By Freehold Property		8,000
To Outstanding Salary A/c	2,000	By Prepaid Insurance A/c		1,000
To Patents	1,000	By Creditors A/c		5,000
To P.B.D. A/c	500	By Loss Transferred to:		
To P.D.D. A/c	1,000	X's Capital A/c	2,800	
To Liability for Workmen compensation	2,000	Y's Capital A/c	2,800	
		Z's Capital A/c	1,400	7,000
To Stock A/c	8,000			
	31,000			**31,000**

Payment of Amount Due to Retiring Partner

Amount due to the retiring partner can be settled in the following ways:

1. Payment of full amount in lump-sum
2. By transferring balance of his capital account to his loan account
3. Payment is instalments
4. Payment by annuity

I. **Payment of full Amount in lumpsum :**

1- Lumpsum Payment –If firm has sufficient liquidity (cash and bank balance) then payment is made in full to the retiring partner. Necessary journal entry for the same:

Retiring Partner's Capital A/c Dr. (amount payable)
To Cash/Bank A/c
(Being amount due to retiring partner paid)

Example 1 : A retired on 1-4-2017. On that date, adjusted balance of his capital account was ₹60,000. Amount due to a paid in cash.

A's Capital A/c Dr. 60,000
To Cash A/c 60,000
(Being A's due amount paid)

Sometimes bank loan is obtained to pay off the amount due to the retiring partner.

(i) For loan taken from bank **:**
Bank A/c Dr.
To Bank Loan A/c

(ii) Payment made to retiring partner **:**
Retiring Partners Capital A/c Dr.
To Bank A/c

II. **By transferring balance of his capital account to his loan account**

If the question is silent on settlement of retiring partner's account the amount due to him is transferred to his loan account.

Retiring Partner's Capital A/c Dr.
To Retiring Partner's Loan A/c
(Being amount due to retiring partners transfer to his loan account)

III. **Payment partly in cash and partly by transferring into loan account**

Sometimes it is possible that at the time of retirement, a part of amount due to retiring partner is paid in cash and the balance amount is transferred to his loan account.

Retiring Partner's Capital A/c Dr.
To Cash A/c
To Retiring Partner's Loan A/c
(Being retiring partner paid partly in cash and balance by transfer to his loan account)

IV. **Payment in Instalments :**

It may be agreed among the partners that the retiring partner shall be paid in instalments. In such a case balance in his capital account is transferred to his loan account. Interest is calculated on unpaid amount and credited to his loan account at the agreed rate. If not agreed, then @6% p.a. till date of payment.

(i) Balance of capital account transferred to his loan account
Retiring Partner's Capital A/c Dr.
To Retiring Partner's Loan A/c
(Being retiring partner's capital account balance transfer to his loan account)

(ii) For interest on balance of loan account
Interest A/c Dr.
To Retiring Partner's Loan A/c
(Being for interest or retired partners loan account)

(iii) Payment of instalment amount with interest

Retiring Partner's Loan A/c Dr.

To Cash/Bank A/c

(Being instalment paid)

Illustration 5 : Y retires on 1-1-2014. His capital account shows a credit balance of ₹ 30,000 and is to be paid in three equal annual instalments along with interest @ 6% p.a. Prepare B's Loan account.

Solution :

Dr. **B's Loan A/c** **Cr.**

Date	Particulars	Amount₹	Date	Particulars	Amount₹
31.12.14	To Bank A/c (10,000 + 1,800)	11,800	01.01.14	By B's Capital A/c	30,000
31.12.14	To Balance c/d	20,000	31.12.14	By Interest A/c (30,000 x 6%)	1,800
		31,800			**31,800**
31.12.15	To Bank A/c (10,000 + 1,200)	11,200	01.01.15	By Balance b/d	20,000
31.12.15	To Balance c/d	10,000	31.12.15	By Interest A/c (20,000 x 6%)	1,200
		21,200			**21,200**
31.12.16	To Cash A/c (10,000 + 600)	10,600	01.01.16	By Balance b/d	10,000
			31.12.16	By Interest A/c (10,000 x 6%)	600
		10,600			**10,600**

V. **Payment by Annuity Method :** Under this method annuity is paid to the retiring partner or deceased partner's legal representative. The total claim is transfer to Annuity Suspense Account or Annuity Accounts. The interest at a certain rate on the unpaid balance is credited and Annuity payments are debited. Any surplus or deficit in this account after the final annuity payment will be shared among the existing partners in their profit sharing ratio. If the annuity receiver remains alive after paying off the total annuity, then this amount will be treated as expenses and charged to profit and loss account

Journal Entries

(1) Balance of retiring partner's capital account is transferred to annuity suspense account

Retiring Partner's Capital A/c Dr.

To Annuity Suspense A/c

(Being balance of retiring partner's capital account transferred to Annuity Suspense)

(2) Interest on unpaid Balance

Interest A/c Dr.

To Annuity Suspense A/c

(Being interest due)

(3) Payment on Annuity,

Annuity Suspense A/c Dr.

To Bank/Cash A/c

(Being amount of annuity paid)

(4) Balance of annuity amount at the time of death of annuity receiver

Annuity Suspense A/c Dr.

To Remaining Partner's Capital A/c

(Being balance of Annuity Suspense account transfer to remaining Partner's Capital account)

(5) If the Annuity receiver is alive, even when the balance of annuity has finished. In such a situation, pass the following entry in addition to the above three entries till the time he is alive.

P & L A/c Dr.

To Annuity Suspense A/c

Illustration 6 :

A, B and C were partner in a firm. B retires on 31-03-2012 and his capital account shows a credit balance of ₹ 25,000 after all adjustments. It is decide that the life annuity of ₹ 6,000 per annum with 10% interest p.a. assuming that the annuitant passes away immediately after payment of the second annuity.

Solution :

Dr. **B's Annuity A/c** **Cr.**

Date	Particulars	J.F.	Amount ₹	Date	Particulars	J.F.	Amount₹
31.03.2013	To Bank A/c		6,000	01.04.2012	By B's Capital A/c		25,000
31.03.2013	To Balance c/d		21,500	31.03.2013	By Interest A/c		2,500
			27,500				**27,500**
31.03.2014	To Bank A/c		6,000	01.04.2013	By Balance b/d		21,500
31.03.2014	To A's Capital A/c		8,825	31.03.2014	By Interest A/c		2,150
31.03.2014	To B's Capital A/c		8,825				
			23,650				**23,650**

Illustration 7 :

A, B and C were partner in a firm. C retires on 01-01-2014 and his capital account shows a credit balance of ₹ 40,000. Show the relevant ledger accounts in the books of firm.

(i) Amount payable to C is transferred to his loan account.
(ii) Amount payable to C immediately is paid in cash.
(iii) That C be paid 50% in cash and the balance 50% be transferred to his Loan A/c
(iv) Amount due to C payable in two equal annual instalments along with interest @10% p.a.
(v) Amount due to C payable in two equal faft yearly instalment along with interest @10% p.a.
(vi) The life annuity of ₹ 10,000 per annum with 10% per annum with 10% interest p.a. assuming that the C passes away immediately after payment of the second annuity.
(vii) The life annuity of ₹ 10,000 per annum with 10% interest p.a. assuming that the C passes away immediately after payment of the fourth annuity.
(viii) Amount due to C payable in two equal instalments ₹ 15,000 each (cum-interest) and interest @10% p.a. and balance amount (along with interest) paid at the end of third year.
(ix) Amount due to C payable in two equal annual instalments along with interest @10% p.a., first instalment will be start on 01-01-2015.

Solution :

(i) Dr. **C's Capital Account** **Cr.**

Particulars	Amount ₹	Particulars	Amount ₹
To C's Loan A/c	40,000	By Balance b/d	40,000
	40,000		**40,000**

(ii) Dr. **C's Capital Account** **Cr.**

Particulars	Amount ₹	Particulars	Amount ₹
To Cash/Bank A/c	40,000	By Balance b/d	40,000
	40,000		**40,000**

(iii) Dr. **C's Capital Account** **Cr.**

Particulars	Amount ₹	Particulars	Amount ₹
To Cash/Bank A/c	20,000	By Balance b/d	40,000
To C's Loan A/c	20,000		
	40,000		**40,000**

(iv) Dr. **C's Loan Account** **Cr.**

Date	Particulars	Amount ₹	Date	Particulars	Amount ₹
31-12-14	To Cash/Bank A/c (₹ 20000 + 4000)	24,000	01-01-14	By C's Capital A/c	40,000
31-12-14	To Balance c/d	20,000	31-12-14	By Interest A/c (₹ 40000x10%)	4,000
		40,000			**44,000**

31-12-15	To Cash/Bank A/c (₹ 20000 + 2000)	22,000	01-01-15 31-12-15	By Balance c/d By Interest A/c	20,000 2,000
		22,000			**22,000**

(v) Dr. C's Loan Account Cr.

Date	Particulars	Amount ₹	Date	Particulars	Amount ₹
30-06-14	To Cash/Bank A/c (₹ 20000 + 2000)	22,000	01-01-14 30-06-14	By C's Capital A/c By Interest A/c (40000x10/100 x 6/12)	40,000 2,000
31-12-14	To Cash/Bank A/c (₹ 20000 + 1000)	21,000	31-12-14	By Interest A/c	1,000
		43,000			**43,000**

(vi) Dr. Annuity Suspense A/c Cr.

Date	Particulars	Amount ₹	Date	Particulars	Amount ₹
31-12-14 31-12-14	To Cash/Bank A/c To Balance c/d	10,000 34,000	01-01-14 31-12-14	By C's Capital A/c By Interest A/c (₹ 40000x10%)	40,000 4,000
		44,000			**44,000**
31-12-15 31-12-15	To Cash/Bank A/c To Capital A/c(Profit on Death) A's Capital ₹ 13,700 B's Capital ₹ 13,700	10,000 27,400	01-01-15 31-12-15	By Balance b/d By Interest A/c (₹ 34000 x 10%)	34,000 3,400
		37,400			**37,400**

(vii) Dr. Annuity Suspense A/c Cr.

Date	Particulars	Amount ₹	Date	Particulars	Amount ₹
31-12-14 31-12-14	To Cash/Bank A/c To Balance c/d	16,000 28,000	01-01-14 31-12-14	By C's Capital A/c By Interest A/c (40000x10%)	40,000 4,000
		44,000			**44,000**
31-12-15 31-12-15	To Cash/Bank A/c To Balance c/d	16,000 14,800	01-01-15 31-12-15	By Balance b/d By Interest A/c (28000 x 10%)	28,000 2,800
		30,800			**30,800**
31-12-16 31-12-16	To Cash/Bank A/c To Balance c/d	16,000 280	01-01-16 31-12-16	By Balance b/d By Interest A/c (14,800x10%)	14,800 1,480
		16,280			**16,280**
31-12-17	To Cash/Bank A/c	16,000	01-01-17 31-12-17 31-12-17	By Balance b/d By Interest A/c (280 x 10%) P and L A/c	280 28 15,692
		16,000			**16,000**

(viii) Dr. C's Loan A/c Cr.

Date	Particulars	Amount ₹	Date	Particulars	Amount ₹
31-12-14 31-12-14	To Cash/Bank A/c To Balance c/d	15,000 29,000	01-01-14 31-12-14	By C's Capital A/c By Interest A/c	40,000

				(40000x10%)	4,000
		44,000			**44,000**
31-12-15	To Cash/Bank A/c	15,000	01-01-15	By Balance b/d	29,000
31-12-15	To Balance c/d	16,900	31-12-15	By Interest A/c	
				(29000 x 10%)	2,900
		31,900			**31,900**
31-12-16	To Cash/Bank A/c	18,590	01-01-16	By Balance b/d	16,900
	(16900 + 1690)		31-12-16	By Interest A/c	
				(16,900x10%)	1,690
		18,590			**18,590**

(ix) Dr. **C's Loan A/c** **Cr.**

Date	Particulars	Amount ₹	Date	Particulars	Amount ₹
31-12-14	To Balance c/d	44,000	01-01-14	By C's Capital A/c	40,000
			31-12-14	By Interest A/c	
				(40000x10%)	4,000
		44,000			**44,000**
01-01-15	To Bank/Cash A/c	24,000	01-01-15	By Balance b/d	44,000
	(20000 + 4000)		31-12-15	By Interest A/c	
31-12-15	To Balance c\d	22,000		(20000 x 10%)	2,000
		46,000			**46,000**
01-01-16	To Cash/Bank A/c	22,000	01-01-16	By Balance b/d	22,000
		22,000			**22,000**

Illustration 8 :

A, B and C are partners sharing profits in the ratio 2: 2: 1. Their Balance Sheet as on 31-03-2017 was as follows:

Balance Sheet

Liabilities		Amount ₹	Assets	Amount ₹
Sundry Creditors		35,000	Cash	15,000
Provision for Bad debts		1,000	Sundry Debtors	20,000
Bank Loan		14,000	Stock	30,000
General Reserve		20,000	Furniture	10,000
Capital A/c's			Plant and Machinery	40,000
A	45,000		Building	60,000
B	45,000		Goodwill	10,000
C	30,000	1,20,000	P and L A/c	5000
		1,90,000		**1,90,000**

B Retires on the above date and the partners agreed that:

(i) The goodwill of the Firm is to be valued at ₹24,000. **(ii)** Furniture, Plant and Machine are to be depreciated by 10% and 5% respectively. **(iii)** Provision for doubtful debts is to be increased to ₹1,500. **(iv)** Stock and Buildings are to be appreciated 20% and 10% respectively. **(v)** That out of the amount of Insurance Premium, which was debited annually to P and L A/c ₹1,500 be carry forward for unexpired insurance on 31.03.17. **(vi)** That a provision for ₹2,000 be made in respect of outstanding salaries.

Pass journal entries and prepare Revaluation A/c , Partner's Capital A/c and Balance Sheet of the new firm.

Solution:

Journal

Date	Particulars	L.F.	Amount Dr. ₹	Amount Cr. ₹
	General Reserve A/c Dr.		20,000	
	To A's Capital A/c			8,000

	To B's Capital A/c			8,000
	To C's Capital A/c			4,000
	(Being General Reserve transferred to Partner's Capital A/c			
	A's Capital A/c Dr.			
	B's Capital A/c Dr.		2,000	
	C's Capital A/c Dr.		2,000	
	To P and L A/c		1,000	5,000
	(Being loss transfer to Partner's Capital A/c)			
	A's Capital A/c Dr.		4,000	
	B's Capital A/c Dr.		4,000	
	C's Capital A/c Dr.		2,000	
	To Goodwill A/c			10,000
	(Being goodwill written off)			
	Revaluation A/c Dr.		5,500	
	To Furniture A/c			1,000
	To Plant and Machinery A/c			2,000
	To P.B.D. A/c			500
	To Outstanding salaries A/c			2,000
	(Being decrease in value of assets and increase in the amount of liabilities)			
	Stock A/c Dr.		6,000	
	Buildings A/c Dr.		6,000	
	Prepaid Insurance A/c Dr.		1,500	
	To Revaluation A/c			13,500
	(Being values of assets increased)			
	Revaluation A/c Dr.		8,000	
	To A's Capital A/c			3,200
	To B's Capital A/c			3,200
	To C's Capital A/c			1,600
	(Being profit on revaluation transferred to Partner's Capital A/c)			
	A's Capital A/c Dr.		6,400	
	C's Capital A/c Dr.		3,200	
	To B's Capital A/c			9,600
	(Being B's share of goodwill adjusted in gaine ratio)			
	B's Capital A/c Dr.		59,800	
	To B's Loan A/c			59,800
	(Being B's balance of Capital A/c transferred to B's Loan A/c)			

Dr. **Revaluation Account** **Cr.**

Particulars	Amount ₹	Particulars	Amount ₹
To Furniture A/c	1,000	By Stock A/c	6,000
To Plant and Machinery A/c	2,000	By Buildings A/c	6,000
To P.B.D. A/c	500	By Prepaid Insurance A/c	1,500
To Outstanding Salaries A/c	2,000		
To Profit transferred to:			
A's Capital A/c 3,200			
B's Capital A/c 3,200			
C's Capital A/c 1,600	8,000		
	13,500		**13,500**

Dr.		Partner's Capital Account					Cr.
Particulars	**A ₹**	**B ₹**	**C ₹**	**Particulars**	**A ₹**	**B ₹**	**C ₹**
To PandL A/c	2000	2000	1000	By Balance b/d	45000	45000	30000
To Goodwill A/c	4000	4000	2000	By General Reserve	8000	8000	4000
To B's Capital	6400	-	3200	By Revaluation	3200	3200	1600
To B's Loan	-	59800	-	By A's Capital A/c	-	6400	-
To Balance c/d	43800	-	29400	By C's Capital A/c	-	3200	-
	56200	**65800**	**35600**		**56200**	**65800**	**35600**

Balance Sheet of A and C
as on 31 March, 2017

Liabilities		Amount ₹	Assets	Amount ₹
Sundry Creditors		35,000	Cash	15,000
Provision for Bad-debts A/c		1,500	Sundry Debtors	20,000
Outstanding Salaries		2,000	Stock	36,000
Bank Loan		14,000	Furniture	9,000
B's Loan A/c		59,800	Plant and Machinery	38,000
Capital A/c			Buildings	66,000
A's Capital	43,800		Pre-paid Insurance	1,500
B's Capital	29,400	73,200		
		1,85,500		**1,85,500**

Illustration 9 :

The Balance Sheet of M, N and O who are sharing profits in the ratio of 1/2, 1/3 and 1/6 respectively, as at 31st March, 2014 was as follows:

Liabilities		Amount ₹	Assets	Amount ₹
Bills Payable		7,000	Cash at Bank	25,650
Sundry Creditors		18,000	Bills Receivable	5,400
Profit and Loss A/c		6,000	Debtors	17,800
Investment Fluctuation Reserve		5,000	Stock	22,300
Capital A/cs:			Investments	12,000
M	50,000		Patents	10,000
N	25,000		Furniture	3,500
O	20,000	95,000	Plant and Machinery	9,750
			Buildings	24,000
			Advertisement Expenditure	600
		1,31,000		**1,31,000**

M retires from business on 1st April, 2014 and his share in the firm is to be ascertained on revaluation of assets as follows: Stock ₹ 20,000; Furniture ₹ 3,000; Plant and Machinery ₹ 9,000; Buildings ₹ 20,000; Investments ₹10,000; Accrued Income ₹500; Patents ₹11,500 and ₹850 is to be provided for doubtful debts. A debtor whose dues of ₹1,000 were written off as bad debts paid ₹400. The goodwill of the firm is agreed to be valued at ₹ 6,000 and adjustment in this respect was to be made in the continuing Partners' Capital Accounts without raising goodwill account. M is to be paid ₹ 9,200 in cash on retirement and balance in three equal yearly instalments with interest @ 5% p.a. Prepare Revaluation A/c, Partners' Capital A/c and Balance Sheet. Also prepare M's Loan A/c till it is finally closed.

Solution:

Dr.	Revaluation Account		Cr.
Particulars	**Amount ₹**	**Particulars**	**Amount ₹**
To Stock A/c	2,300	By Patent A/c	1,500
To Furniture A/c	500	By Accrued Income	500

To Plant and Machinery	750	By Bad debts recovered	400
To Buildings A/c	4,000	By Loss transferred to:	
To P.B.D. A/c	850	M's Capital A/c 3,000	
		N's Capital A/c 2,000	
		O's Capital A/c 1,000	6,000
	8,400		**8,400**

Dr. **Partner's Capital Account** **Cr.**

Particular	M ₹	N ₹	O ₹	Particulars	M ₹	N ₹	O ₹
To Advertisement Expenses	300	200	100	By Balance b/d	50,000	25,000	20,000
To Revaluation	3,000	2,000	1,000	By P and L A/c	3,000	2,000	1,000
To M's Capital	-	2,000	1,000	By Investments Fluctuation Reserve	1,500	1,000	500
To Bank A/c	9,200	-	-	By N's Capital A/c	2,000	-	-
To M's Loan A/c	45,000	-	-	By O's Capital A/c	1,000	-	-
To Balance c/d	-	23,800	19,400				
	57,500	**28,000**	**21,500**		**57,500**	**28,000**	**21,500**

Balance Sheet of N and O
As on 01 April, 2014

Liabilities	Amount ₹	Assets	Amount ₹
Bills Payable	7,000	Cash at Bank	16,850
Sundry Creditors	18,000	Bills Receivables	5,400
M's Loan A/c	45,000	Debtors 17,800	
		(-) PBD 850	16,950
		Stock	20,000
Capital A/c's		Patents	11,500
N 23,800		Accrued income	500
O 19,400	43,200	Furniture	3,000
		Plant and Machinery	9,000
		Buildings	20,000
		Investments	10,000
	1,13,200		**1,13,200**

Dr. **M's Loan Account** **Cr.**

Date	Particulars	Amount ₹	Date	Particulars	Amount ₹
31-3-15	To Bank A/c (15000+2250)	17,250	1-4-2014	By M's Capital A/c	45,000
31-3-15	To Balance c/d	30,000	31-3-15	By Interest 45000x5%	2,250
		47,250			**47,250**
31-3-16	To Bank A/c	16,500	1-4-15	By Balance b/d	30,000
31-3-16	To Balance c/d	15,000	31-3-16	By Interest	1,500
		31,500			**31,500**
31-3-17	To Bank A/c 15000+750	15,750	1-4-16	By Balance b/d	15,000
			31-3-17	By Interest A/c(1500x5%)	750
		15,750			**15,750**

Working Notes :

(i) Fall in market value of investments is charged out of IFR and balance of IFR is transferred to partners' Capital A/c in their old Ratio.

(ii) M's share in goodwill ₹ 6000X1/2 = ₹ 3000 is adjusted through capital A/c of N and O in their gaine ratio 2:1

(iii) Bank balance: 25650 + 400 – 9200 = ₹16850

Illustration 10 :

X, Y and Z are partners sharing profits in the ratio 2: 2: 1. Their Balance Sheet as on 31st December, 2016 was as under :

Liabilities		Amount ₹	Assets		Amount ₹
Creditors		37,000	Bank		9,000
Bills Payable		13,000	Debtors	40,000	
Reserve Fund		10,000	Less: Provision for D.D.	2,000	38,000
Capital Accounts			Stock		40,000
X	60,000		Furniture		20,000
Y	60,000		Machinery		78,000
Z	20,000	1,40,000	Goodwill		15,000
		2,00,000			**2,00,000**

X retired on 1st January, 2017 on the following terms:

(i) Provision for doubtful debts be raised by ₹ 2,000. **(ii)** Stock be increased by ₹4,000 and Machinery be reduced to ₹75,000. **(iii)** Outstanding claim for damages of ₹1,200 is to be provided. **(iv)** Creditors be reduced by ₹4,000. **(v)** Goodwill of the firm is valued at ₹ 60,000. **(vi)** The continuing partners agreed to pay ₹ 60,000 in cash on retirement of X, to be contributed by continuing partners in the ratio of 3:2. The balance capital of X be treated as loan.

Prepare Revaluation Account, Capital Account and Balance Sheet of new firm.

Solution:

Dr. Revaluation Account Cr.

Particulars		Amount ₹	Particulars	Amount ₹
To Provision for Doubtful Debts A/c		2,000	By Creditors A/c	4,000
To Outstanding Claim for Damages A/c		1,200	By Stock A/c	4,000
To Machine A/c		3,000		
To Capital A/c's(Profit):				
X	720			
Y	720			
Z	360	1,800		
		8,000		**8,000**

Dr. Partner's Capital Account Cr.

Particulars	X₹	Y₹	Z₹	Particulars	X₹	Y₹	Z₹
To Goodwill A/c	6,000	6,000	3,000	By Balance b/d	60,000	60,000	20,000
To X's Capital A/c	-	16,000	8,000	By Reserve Fund A/c	4,000	4,000	2,000
To Bank A/c	60,000	-	-	By Revaluation A/c	720	720	360
To X's Loan	22,720	-	-	By Y's Capital A/c	16,000	-	-
To Balance c/d	-	78,720	35,360	By Z's Capital A/c	8,000	-	-
				By Bank A/c	-	36,000	24,000
	88,720	**1,00,720**	**46,360**		**88,720**	**1,00,720**	**46,360**

Balance Sheet of Y and Z

As on 1st Jan 2017

Liabilities	Amount ₹	Assets		Amount ₹
Creditors	33,000	Bank		9,000
Bills Payable	13,000	Debtors	40,000	
O/S Claim for Damages	1,200	Less: Provision for BD	4,000	36,000
X's Loan	22,720	Stock		44,000
Capital A/cs:		Furniture		20,000

Y	78,720		Machinery	75,000
Z	35,360	1,14,080		
		1,84,000		**1,84,000**

Working Notes:

(i) X's share in goodwill 60,000× $\frac{2}{5}$ =₹ 24,000 has been debited to capital A/c of Y and Z in their gaine ratio 2:1 and credited to X's capital A/c

(ii) Amount contributed by Y and Z ₹60,000 in the ratio of 3:2 which, is ₹36,000 and ₹24,000 respectively.

Adjustment of Capital

On retirement/death of a partner, the remaining partner's share in profits is to be changed. As a result the total capital of the firm is also changed. Therefore, adjustment in Capital Account is required. This capital can be adjusted in three ways:

I. When Total Capital of the New Firm is given : Steps for adjustment of capital are as under :

(a) Ascertain adjusted capital of remaining partners.
(b) Calculate proportionate capital of remaining partners on the basis of capital of the new firm in their profit sharing ratio.
(c) Find surplus/deficit by comparing proportionate capital and adjusted capital.
(d) Adjust the surplus by paying or by transfer to the credit side of current account of the concerned partner. In case of deficit, the amount of deficiency is brought by the concerned partner or alternatively transferred to the debit side of his current account.

Journal Entries

(a) When adjusted capital is more than the proportionate capital

Concerned Partner's Capital A/c Dr.
To Cash/Bank/Concerned Partners' Current A/c

(b) When adjusted capital is less than the proportionate capital

Cash/Bank/Concerned Partner's Current A/c Dr.
To Concerned Partner's Capital A/c

Illustration 11 :

A, B and C are partners in a firm sharing profits in the ratio of 3:2:1. C retires on 31-03-2016. On that date adjusted capital of A,B and C stood at ₹ 30,000, ₹ 20,000 and ₹ 25,000. Capital of the new firm is ₹ 50,000 and new profit sharing ratio is 1:1. Calculate amount to be paid or to be brought by the partners and pass necessary Journal entries.

Solution:

A's Capital	Dr.	5,000	
To Cash A/c			5,000
(Being cash withdrawn by A)			
Cash A/c	Dr.	5,000	
To B's Capital			5,000
(Being cash brought in by B)			

II. When the total capital of the new firm is not given :

(i) Ascertain adjusted capital of the remaining partners.
(ii) Calculate total capital of the new firm as follows:
Total capital of the new firm=aggregate of adjusted capital of remaining partners.
(iii) Calculate new capital of remaining partners by dividing total capital of the new firm in their new profit sharing ratio. Journal entries will be same as recorded above.

Illustration 12 :

A, B and C are partners in a firm sharing profits in the ratio of 5:3:2. A retired on 31-03-2017 on which date the capital of A,B and C after all the necessary adjustments stood at ₹ 60,000, ₹ 50,000 and ₹ 40,000 respectively.

Capital of the reconstituted firm will be readjusted by bringing in or paying cash so that the future capitals of B and C be in their profit sharing ratio. Pass necessary Journal entries.

Solution :

New profit sharing ratio 3:2

Capital of the new firm is - ₹50,000 + ₹40,000 = ₹90,000

		B ₹	C ₹
(A)	New Capital ₹ 90,000	54,000	36,000
(B)	Existing Capital	50,000	40,000
(C)	Cash to be brought in (Paid off) (A-B)	4,000	(4,000)

1.	Cash A/c	Dr.	4,000	
	To B's Capital A/c			4,000
	(Being cash brought in by B to make capital proportionate to profits)			
2.	C's Capital A/c	Dr.	4,000	
	To Cash A/c			4,000
	(Being cash paid off to C to make his capital proportionate to profit sharing ratio)			

III. When the retiring Partner is to be paid through amount brought by the remaining partners in a manner to make their capitals proportionate to their new profit sharing ratio.

a) When decided to leave a minimum cash/bank balance

i. Capital the new firm = total adjusted capital of all the partners + minimum cash balance required – opening cash balance

ii. Calculate new capital of each remaining partner

iii. Calculate the surplus/deficit

Journal entries will be same as recorded above in point no. 1

b) when no information is available regarding minimum cash/bank balance:

i. Total capital of new firm = Total adjusted capital of all the partners

ii. Calculate new capital of each remaining partner

iii. Calculate surplus/deficit

Journal entries will be same as recorded above in point no.1

Illustration 13 :

A, B and C are partner in a firm sharing profits in the ratio of 3:2:1. C retired. On that date the adjusted capital of A,B and C stood at ₹ 30,000, ₹ 40,000 and ₹ 30,000. C is to be paid in cash. The cash balance amounted to ₹ 20,000 and a minimum cash balance of ₹ 10,000 is to be maintained. Calculate amount of cash to be paid or to be brought in by the continuing partners.

Solution :

Total capital of the new firm = ₹ 30,000 + ₹ 40,000 + ₹ 30,000+₹ 10,000 - ₹ 20,000 = ₹ 90,000

A = 90,000 $\times \frac{3}{5}$ = ₹54,000; B = 90,000 $\times \frac{2}{5}$ = ₹36,000

		B ₹	C ₹
(A)	New Capital ₹ 90,000 (3:2)	54,000	36,000
(B)	Existing Capital	30,000	40,000
(C)	Cash to be brought in (Paid off) (A-B)	24,000	(4,000)

Cash A/c	Dr.	24,000	
To A's Capital A/c			24,000
B's Capital A/c	Dr.	4,000	
To Cash A/c			4,000

Illustration14 :

A, B and C are partners in a firm sharing profits in the ratio of 3:2:1. C retired and on that date adjusted capital of A,B and C stood at ₹ 40,000, ₹ 30,000 and ₹ 30,000. C is to be paid through cash. Calculate amount of cash to be paid or to be brought in by the continuing partners.

Particulars	Amount ₹	Particulars	Amount ₹
To PBD A/c	2,000	By Buildings A/c	20,000
To Machinery A/c	10,000	By Creditors A/c	6,000
To Outstanding Rent	1,000		
To Stock A/c	1,000		
To Profit Transfer			
A's Capital A/c 6,000			
B's Capital A/c 3,000			
C's Capital A/c 3,000	12,000		
	26,000		**26,000**

Solution :

Capital of the new firm = 40,000+30,000+30,000 = ₹ 1,00,000

A's share = 60,000 B's Share = 40,000	B ₹	C ₹
(A) New Capital ₹ 1,00,000 (3:2)	60,000	40,000
(B) Existing Capital	40,000	30,000
(C) Amount to be brought in	20,000	10,000

		Dr.	Cr.
Cash A/c	Dr.	30,000	
To A's Capital A/c			20,000
To B's Capital A/c			10,000

Illustration15 :

The Balance Sheet of A, B and C who are partners in a firm and sharing profits according to their capitals. Their Balance Sheet as at 31st March, 2017 was as under:

Liabilities	Amount ₹	Assets	Amount ₹
Creditors	24,000	Goodwill	10,000
General Reserve	20,000	Buildings	1,00,000
Workmen Compensation Reserve	16,000	Machinery	50,000
Capital A/cs		Stock	18,000
A 80,000		Debtors 20,000	
B 40,000		Less: Provision for D.D 1,000	19,000
C 40,000	1,60,000	Cash at Bank	15,000
		Profit and Loss A/c	8,000
	2,20,000		**2,20,000**

On that date, B decided to retire from the firm and was paid for his share in the firm subject to the following terms:

(i) Buildings to be appreciated by 20%.

(ii) Provision for Doubtful Debts to be increased to 15% on Debtors.

(iii) Machinery to be depreciated by 20%.

(iv) Stock is overvalued by ₹1,000.

(v) Creditors reduced by ₹6,000.

(vi) Outstanding Rent ₹1,000.

(vii) Claim against Workmen Compensation Reserve is determined at ₹ 8,000.

(viii) Goodwill of the firm is valued at ₹72,000 and the retiring partner's share is adjusted through the Capital Accounts of the remaining partners.

(ix) The capital of the new firm be fixed at ₹ 1,20,000. Adjustments are to be made through current account.

Prepare the Revaluation Account, Capital Accounts of partners and the Balance Sheet after retirement of B.

Dr. Partner's Capital A/c Cr.

Particulars	A₹	B₹	C₹	Particulars	A₹	B₹	C₹
To PandL A/c	4,000	2,000	2,000	By Balance b/d	80,000	40,000	40,000
To Goodwill A/c	5,000	2,500	2,500	By General Reserve	10,000	5,000	5,000

To B's Cap. A/c	12,000	-	6,000	By WCR	4,000	2,000	2,000
To B's Loan A/c	-	63,500	-	By A's Cap. A/c	-	12,000	-
To Balance c/d	79,000	-	39,500	By Revaluation A/c.	6,000	3,000	3,000
				By C's Cap. A/c	-	6,000	-
	1,00,000	**68,000**	**50,000**		**1,00,000**	**68,000**	**50,000**
To Balance c/d	80,000	-	40,000	By Balance b/d	79,000	-	39,500
				By Current A/c	1,000	-	500
	80,000	**-**	**40,000**		**80,000**	**-**	**40,000**

Balance Sheet A and C
As on 31—03-2017

Liabilities			Amount ₹	Assets			Amount ₹
Creditors			18,000	Buildings			1,20,000
Outstanding Rent			1,000	Machinery			40,000
Liability for Workmen Compensation			8,000	Stock			17,000
				Debtors		20,000	
Capital A/c				(-)PBD		3,000	17,000
	A	80,000		Cash on Bank			15,000
	C	40,000	1,20,000	Current A/c			
B's Loan A/c			63,500		A	1,000	
					C	500	1,500
			2,10,500				**2,10,500**

Working Notes :

(i) B's share in goodwill ₹ 72,000$\times \frac{1}{4}$ =₹ 18,000 will be debited to A and C's capital A/c in their gaine ratio 2:1 and credited to B.

(ii) Workmen compensation reserve to the extent of liability (₹8,000) is credited to workmen compensation liability A/c and the balance is credited to Partner's capital A/c.

(iii) In absence of information, amount payable to B is transferred to his loan A/c.

(iv) Adjustment of capital is made through the partner's current account.

Illustration 16 :

L, M and N were partners in a firm sharing profits in the ratio of 2: 1: 1. On 1st April, 2017 their Balance Sheet was as follows:

Balance Sheet of L, M and N
As on 1st April, 2017

Liabilities			Amount ₹	Assets		Amount ₹
Capital A/c				Land		8,00,000
	L	6,00,000		Buildings		6,00,000
	M	4,80,000		Furniture		2,40,000
	N	4,80,000	15,60,000	Debtors	4,00,000	
General Reserve			4,40,000	Less:	20,000	3,80,000
Workmen Compensation Fund			3,60,000	Stock		4,40,000
Creditors			2,40,000	Cash		1,40,000
			26,00,000			**26,00,000**

On the above date N retired. The following were agreed : **(i)** Goodwill of the firm was valued at ₹ 6,00,000. **(ii)** Land was to be appreciated by 40% and Building was to be depreciated by ₹ 1,00,000. **(iii)** Furniture was to be depreciated by ₹ 30,000. **(iv)** The liabilities for Workmen Compensation Fund was determined at ₹ 1,60,000. **(v)** Amount payable to N was transferred to his loan account (vi) Capital of L and M were to be adjusted in their new profit sharing ratio and for this purpose current accounts of the partners will be opened. Prepare Revaluation Account, Partners' Capital A/c and the Balance Sheet of the new firm.

Solution :

Dr. **Revaluation Account** **Cr.**

Particulars	Amount ₹	Particulars	Amount ₹
To Building A/c	1,00,000	By Land A/c	3,20,000
To Furniture A/c	30,000		
To Profit transferred to			
L's Cap. A/c 95,000			
M's Cap. A/c 47,500			
N's Cap. A/c 47,500	1,90,000		
	3,20,000		**3,20,000**

Dr. **Partner's Capital A/c** **Cr.**

Particulars	L ₹	M ₹	N ₹	Particulars	L ₹	M ₹	N ₹
				By Balance b/d	6,00,000	4,80,000	4,80,000
To N's Cap. A/c	1,00,000	50,000	-	By General Res.	2,20,000	1,10,000	1,10,000
To N's Loan A/c	-	-	8,37,500	By Workmen Compensation Reserve	1,00,000	50,000	50,000
To Balance c/d	9,15,000	6,37,500	-				
				By Revaluation	95,000	47,500	47,500
				By L's Cap A/c	-	-	1,00,000
				By M's Cap A/c	-	-	50,000
	10,15,000	**6,87,500**	**8,37,500**		**10,15,000**	**6,87,500**	**8,37,500**
To Current A/c (B/F)	-	1,20,000	-	By Balance b/d	9,15,000	6,37,500	-
To Balance c/d	10,35,000	5,17,500	-	By Current A/c (B/F)	1,20,000	-	-
	10,35,000	**6,37,500**	**-**		**10,35,000**	**6,37,500**	**-**

Balance Sheet of New Firm
As on 1st April, 2017

Liabilities	Amount ₹	Assets	Amount₹
Capital A/c		Land	11,20,000
L 10,35,000		Building	5,00,000
M 5,17,500	15,52,500	Furniture	2,10,000
		Debtors 4,00,000	
N's Loan A/c	8,37,500	(-)Provision: 20,000	3,80,000
Liability for workmen		Stock	4,40,000
Compensation	1,60,000		
Creditors	2,40,000	Cash	1,40,000
M's Current A/c	1,20,000	L's Current A/c	1,20,000
	29,10,000		**29,10,000**

Working Notes :

(i) Gaine ratio is 2:1

(ii) N's share in goodwill 60,000$\times\frac{1}{4}$ =₹ 1,50,000 is adjusted through capital accounts of L and M in their gaine ratio 2:1

(iii) Total adjusted capital of L and M 9,15,000+6,37,500 = ₹15,52,500

L's share 15,52,500$\times\frac{2}{3}$ =₹ 10,35,000

M's share 15,52,500$\times\frac{1}{3}$ =₹ 5,17,500

Illustration 17 :

X, Y and Z were partners in a firm whose Balance Sheet as on 31st December, 2016 was as under:

Liabilities			Amount ₹	Assets	Amount ₹
Creditors			18,240	Cash	16,240
General Reserve			7,500	Debtors	22,500
Capitals:				Stock	26,500
	X	20,000		Furniture	5,000
	Y	14,500			
	Z	10,000	44,500		
			70,240		**70,240**

Y retired on that date. In this connection, it was decided to make the following adjustments:

(a) To reduce stock and furniture by 5% and 10% respectively.

(b) To provide for doubtful debts at 5% on debtors.

(c) A long dispute with the creditors was settled and firm has to pay ₹ 9,050. In anticipation ₹ 6,000 have already been included in sundry creditors for this purpose.

(d) Goodwill was valued at ₹ 12,000.

(e) To share profits and losses in 5:3 ratio.

(f) Y should be paid off and the entire sum payable to Y shall be brought in by X and Z in such a way that their capitals should be in their new profit sharing ratio.

Prepare Revaluation A/c, Partners' Capital A / c's and Balance Sheet after Y's retirement.

Dr. **Revaluation Account** **Cr**

Particulars	Amount ₹	Particulars			Amount ₹
To Stock A/c	1,325	By Loss transferred to Capital			
To Furniture A/c	5,00		X	2,000	
To Provision for Doubtful Debt A/c	1,125		Y	2,000	
To Creditors A/c	3,050		Z	2,000	6,000
	6,000				**6,000**

Dr. **Partner's Capital A/c** **Cr.**

Particulars	X₹	Y₹	Z₹	Particulars	X₹	Y₹	Z₹
To Revaluation A/c	2,000	2,000	2,000	By Balance b/d	20,000	14,500	10,000
To Y's Capital A/c	3,500	-	500	By General Reserve	2,500	2,500	2,500
To Balance c/d	17,000	19,000	10,000	By X's Capital A/c	-	3,500	-
				By Z's Capital A/c	-	500	-
	22,500	**21,000**	**12,500**		**22,500**	**21,000**	**12,500**
To Cash	-	19,000	-	By Balance b/d	17,000	19,000	10,000
To Balance c/d	28,750	-	17,250	By Cash A/c	11,750	-	7,250
	28,750	**19,000**	**17,250**		**28,750**	**19,000**	**17,250**

Balance Sheet of X and Z

Liabilities		Amount ₹	Assets		Amount ₹
Creditors		21,290	Cash		16,240
X's Capital	28,750		Debtors	22,500	
Y's Capital	17,250	46,000	Less: Provision for D.D.	1,125	21,375
Stock		25,175			
Furniture		4,500			
		67,290			**67,290**

Working Notes:

(i) G.R. = NPSR – OPSR X : $\frac{5}{8}-\frac{1}{3}=\frac{7}{24}$ Y:$\frac{3}{8}-\frac{1}{3}=\frac{1}{24}$ GR 7:1

(ii) Y's share in goodwill 12,000× $\frac{1}{3}$ =₹ 4,000 is adjusted through capital accounts of X and Z in their gaine ratio 7:1

(iii) Adjustment of Capital:

Total adjusted capital of X,Y and Z: 17,000+19,000+10,000 = ₹46,000

X's Capital 46,000× $\frac{5}{8}$ =₹ 28,750

Y's Capital 46,000× $\frac{3}{8}$ =₹ 17,250

Illustration 18 :

A, B and C are partners in a firm sharing profits and losses in the ratio of 3: 2: 1. Their Balance Sheet as at 31st March, 2017 is:

Liabilities	Amount ₹	Assets	Amount ₹
Creditors	30,000	Cash	26,000
Bills Payable	13,000	Debtors 25,000	
General Reserve	12,000	Less: Provision for D.D. 3,000	22,000
Workmen Compensation Reserve	9,000	Stock	18,000
Capital		Furniture	30,000
A 40,000		Machinery	63,000
B 40,000		Goodwill	12,000
C 30,000	1,10,000	Profit and Loss	3,000
	1,74,000		**1,74,000**

B retires on 1st April, 2017 on the following terms:-

(a) Provision for Doubtful Debts be raised by ₹1,000. **(b)** Stock to be depreciated by 10% and Furniture by 5%. **(c)** There is an outstanding claim for damages of ₹1,100 and it is to be provided for. **(d)** Creditors will be written back by ₹6,000. **(e)** Goodwill of the firm is valued at ₹21,000. **(f)** Outstanding Rent ₹600. **(g)** B is paid in full with the cash brought in by A and C in such a manner that their capitals are in proportion to their profit sharing ratio and Cash in hand remains at ₹10,000. Prepare the Revaluation A/c, Partners 'Capital Accounts and the Balance Sheet of A and C.

Solution: **Revaluation Account**

Particulars	Amount ₹	Particulars	Amount ₹
To P.B.D. A/c	1,000	By Creditors A/c	6,000
To Stock A/c	1,800		
To Furniture A/c	1,500		
To Claim for Compensation	1,100		
To Outstanding Rent	600		
	6,000		**6,000**

Dr. **Partner's Capital A/c** **Cr.**

Particulars	A ₹	B ₹	C ₹	Particulars	A ₹	B ₹	C ₹
To Goodwill	6,000	4,000	2,000	By Balance b/d	40,000	40,000	30,000
To PandL A/c	1,500	1,000	500	By General Reserve	6,000	4,000	2,000
To B's Capital	5250	-	1750	By Workmen Reserve	4,500	3,000	1,500
To Balance c/d	37,750	49,000	29,250	By A's Capital A/c	-	5,250	-
				By C's Capital A/c	-	1,750	-
	50,500	**54,000**	**33,500**		**50,500**	**54,000**	**33,500**
To Cash A/c	-	49,000	-	By Balance b/d	37,750	49,000	29,250

To Cash A/c b/f	-	-	4,250	By Cash A/c b/f	37,250	-	-
To Balance c/d	75,000	-	25,000				
	75,000	**49,000**	**29,250**		**75,000**	**49,000**	**29,250**

Balance Sheet

As on 31 March, 2017

Liabilities	Amount ₹	Assets	Amount ₹
Creditors	24,000	Cash in Hand	10,000
Bills Payable	13,000	Debtors 25,000	
Outstanding Payable	600	Less: Provision for DD. 4,000	21,000
Claim for Compensation	1,100	Stock	16,200
Capital A/c's		Furniture	28,500
A 75,000		Machinery	63,000
C 25,000	1,00,000		
	1,38,700		**1,38,700**

Working Noted :

(i) B's share in goodwill $21{,}000 \times \frac{2}{6}$ =₹ 7,000 is adjusted through capital accounts of A and C in their gaine ratio 3:1

(ii)

Dr. **Cash Account** **Cr.**

Particulars	Amount₹	Particulars	Amount ₹
To Balance b/d	26,000	By B's Capital A/c	49,000
To A's Capital A/c	37,250	By C's Capital	4,250
		By Balance c/d	10,000
	63,250		**63,250**

(iii) Total adjusted capital of the new firm:

37,750+49,000+29,250+10,000-26,000 = ₹1,00,000

A's Capital $1{,}00{,}000 \times \frac{3}{4}$ =₹ 75,000

B's Capital $1{,}00{,}000 \times \frac{1}{4}$ =₹ 25,000

Illustration19 :

A, B and C are partners sharing profits as 5: 4: 1. Their Balance Sheet as on March 31, 2017 was as follows :

Balance Sheet as on March 31, 2017

Liabilities	Amount ₹	Assets	Amount ₹
Capital		Fixed Assets	1,00,000
A: 80,000		Investments	60,000
B: 70,000		Stock	10,000
C: 50,000	2,00,000	Debtors	60,000
Creditors	30,000	Cash in hand	50,000
Reserves	50,000	Goodwill	20,000
Provident Fund	20,000		
	3,00,000		**3,00,000**

C retires on the above date and on the same date D is admitted with $\frac{1}{5}$ share in the profits. For this the following terms were agreed upon:

1. Goodwill of the firm is valued at ₹ 60,000. **2.** Fixed assets are depreciated by 4%. **3.** Stock is valued at ₹ 18,000. **4.** Amount due to the retiring partner shall be transferred to his loan account. **5.** The new firm of A, B and D will have the profit sharing ratio of 2: 2: 1 and its total capital will be ₹ 2,00,000. Prepare Revaluation Account, Capital Accounts and Balance Sheet of the new firm.

Solution:

Revaluation Account

Particulars	Amount ₹	Particulars	Amount ₹
To Fixed Assets A/c	4,000	By Stock A/c	8,000
To Profits transferred to			
A's Capital A/c 2,000			
B's Capital A/c 1,600			
C's Capital A/c 400	4,000		
	8,000		**8,000**

Dr. Partner's Capital Account Cr.

Particulars	A ₹	B ₹	C ₹	D ₹	Particulars	A ₹	B ₹	C ₹	D ₹
To Goodwill	10,000	8,000	2,000	-	By Balance b/d	80,000	70,000	50,000	
To C's Loan	-	-	59,400	-	By Reserves	25,000	20,000	5,000	
To Cash A/c (Bal. Figure)	23,000	3,600	-	-	By D's Current A/c	6,000	-	6,000	
To Balance c/d	80,000	80,000	-	40,000	By Revaluation	2,000	1,600	400	
					By Cash A/c	-	-	-	40,000
	113000	**91,600**	**61,400**	**40,000**		**113000**	**91,600**	**61,400**	**40,000**

Balance Sheet the New Firm
As on 31 March, 2017

Liabilities	Amount ₹	Assets	Amount ₹
Capital A/c's		Fixed Assets	96,000
A 80,000		Investments	60,000
B 80,000		Stock	18,000
D 40,000	2,00,000	Debtors	60,000
C's Loan A/c	59,400	Cash	63,400
Provident Fund	20,000	D's Current A/c	12,000
Creditors	30,000		
	3,09,400		**3,09,400**

Working Notes:

(i) Treatment of goodwill:

C's share in goodwill 60,000x$\frac{1}{10}$= ₹ 6,000

D's share in goodwill 60,000x$\frac{1}{5}$= ₹ 12,000

Sacrifice made by A: $\frac{5}{10}-\frac{2}{5}=\frac{1}{10}$; A's capital AC is credited by 60,000x$\frac{1}{10}$ = ₹ 6,000

D's Current A/c	Dr.	12,000	
To A's Capital A/c			6,000
To C's Capital A/c			6,000

(ii) Cash Balance: 50,000 + 40,000 – 23,000 – 3,600 = ₹ 63,400

Illustration20 :

Ajay, Akshay and Abhishek are partners. They were sharing profits in ratio of 5:3:2. Balance Sheet as on 31 March, 2017 was as followings:

Liabilities	Amount ₹	Assets	Amount ₹
Creditors	30,000	Cash at Bank	10,000
Workmen Compensation Reserve	10,000	Debtors 20,000	
Investment Fluctuation Reserve	3,000	Less: PBD 1,000	19,000

Bills Payable	3,000	Stock	6,000
Outstanding Expenses	2,000	Investment	12,000
Employees' Provident Fund	7,000	Leasehold Property	66,000
Reserve	10,000	Plant and Machinery	48,000
Capitals		Furniture	20,000
Ajay 60,000		Trademark	3,000
Akshay 45,000		Patent	5,000
Abhishek 30,000	1,35,000	Profit and Loss Account (Dr.)	4,000
		Advertisement	2,000
		Goodwill	5,000
	2,00,000		**2,00,000**

Ajay retired on 31-3-2017 and Akshay and Abhishek decided to share profits in future in the ratio of 2:3 respectively. The other terms on retirement were as follows : **(i)** Goodwill of the firm is to be valued at ₹ 40,000. **(ii)** Accrued income of ₹ 1,500 be provided for. **(iii)** The market value of investments was ₹8,000. **(iv)** Bad debts recovered ₹ 1,000. **(v)** Leasehold property over valued by 10% **(vi)** Plant and Machinery undervalued by 20% **(vii)** Furniture is depreciated by 15%. **(viii)** Trade marks valued at 20% less. **(ix)** Patents valued at 40% more. **(x)** Liability against Workmen Compensation is ₹ 10,000. **(xi)** Prepaid insurance ₹ 2,000. **(xii)** O/s bills for Repair ₹ 2,000 **(xiii)** There is an old computer valued at ₹ 5,000. It does not appear in the books. It is taken by Ajay. **(xiv)** Provision for doubtful debts is not required. **(xv)** A long dispute with the creditors was settled and firm has to pay ₹ 10,000. In anticipation ₹ 6,000 have already been included in sundry creditors for this purpose. **(xvi)** Stock is reduced by ₹ 3,000. **(xvii)** Capital of the firm, as newly constituted be fixed at ₹ 80,000.

Prepare Revaluation A/c, Partner's Capital A/cs and the Balance Sheet of the new firm.

Solution :

Dr. **Revaluation Account** **Cr.**

Particulars	Amount ₹	Particulars	Amount ₹
To Investments A/c	1,000	By Accrued Income	1,500
To Leasehold Property $\frac{66,000x10}{110}$	6,000	By Bad debts recovered	1,000
To Furniture A/c	3,000	By Plant and Machinery A/c	
To Trade Marks A/c	600	48,000x$\frac{20}{80}$	12,000
To Outstanding bills for repairs	2,000	By Patents A/c	2,000
To Stock A/c	3,000	By Prepaid Insurance	2,000
To Creditors A/c	4,000	By Old Computer	5,000
To Profits transferred to		By P.B.D A/c	1,000
Ajay's Capital A/c 2,450			
Akshay's Capital A/c 1,470			
Abhishek's Capital A/c 980	4,900		
	24,500		**24,500**

Dr. **Partner's Capital Account** **Cr.**

Particulars	Ajay ₹	Akshay₹	Abhishek₹	Particulars	Ajay ₹	Akshay₹	Abhishek₹
To PandL A/c	2,000	1,200	800	By Balance b/d	60,000	45,000	30,000
ToAdvertisements	1,000	600	400	By Reserve	5,000	3,000	2,000
To Goodwill	2,500	1,500	1,000	ByRevaluation	2,450	1,470	980
To Ajay's Capital	-	4,000	16,000	By Akshey's Cap.	4,000	-	-
To Computer	5,000	-	-	By Abhishek Cap.	16,000	-	-
To Ajay's Loan A/c	76,950	-	-				
To Balance c/d	-	42,170	14,780				
	87,450	**49,470**	**32,980**		**87,450**	**49,470**	**32,980**

To Bank A/c (b/f)	-	10,170	-	By Balance b/d	-	42,170	14,780
To Balance c/d	-	32,000	48,000	Bu Bank (Bal Fig)	-	-	33,220
	-	**42,170**	**48,000**		**-**	**42,170**	**48,000**

Balance Sheet Akshay and Abhishek
As on 31 December, 2016

Liabilities	Amount₹	Assets	Amount ₹
Creditors	34,000	Cash at Bank	34,050
Bills Payable	3,000	Debtors	20,000
Outstanding Expenses	2,000	Stock	3,000
Employee's Provident Fund	7,000	Investment	8,000
Outstanding bills For Repairs	2,000	Leasehold property	60,000
Liability from workmen compensation	10,000	Plant and Machinery	60,000
		Furniture	17,000
Ajay's Loan A/c	76,950	Trade Marks	2,400
Capital A/c's		Patents	7,000
Akshay 32,000		Accrued Income	1,500
Abhishek 48,000	80,000	Prepaid Insurance	2,000
	2,14,950		**2,14,950**

Working Notes:

(i) Fall in market value of investment ₹ 3,000 charged from IFR and ₹ 1,000 charged from Revaluation A/c

(ii) Liability of workmen compensation is adjusted by WCR.

(iii) Ajay's share in Goodwill 40,000× $\frac{5}{10}$ =₹ 20,000 is adjusted through capital account of Akshay and Abhishek in their gaine ratio 1:4

(iv) GR = NPSR – OPSR

Akshay: $\frac{2}{5} - \frac{3}{10} = \frac{5}{50}$ Abhishek: $\frac{3}{5} - \frac{2}{10} = \frac{20}{50}$

(v) Bank Balance: 10,000+1,000+33,220-10,170 = ₹ 34,050

(vi) In absence of information amount payable to Ajay is transferred to his Loan A/c

Adjustment of Life Policies in Case of Retirement

- When a joint life policy is taken by the firm on the lives of all the partners, following conditions will arise :

(a) When premium paid is treated as trade expenses :

In this situation surrender value of joint life policy is distributed between all the partners in their old profit sharing ratio and joint life policy will be shown in the balance sheet at surrender value.

i. Joint life policy is recorded at surrender value in the books

Joint Life Policy A/c Dr. (Surrender value on the date of retirement of partner)
    To All Partner's Capital A/c (OPSR)
(Being distribution of surrender value in old ratio)

ii. Remaining Partner's Capital A/c Dr. (NPSR)
    To Joint Life Policy A/c (Surrender value on the date of retirement of partner)
(Joint life policy A/c closed by transferring remaining amount to partner's capital A/c)

Note: Joint life policy is actually surrendered on the date of retirement of a partner and amount is received from insurance company.

i. For amount received from insurance company

Cash A/c Dr. (Surrender value received)
    To Joint Life Policy A/c
(Surrender Value Received)

ii. For amount received from insurance company

Joint Life Policy A/c Dr. (S.V.)
To All Partner's Capital A/c (OPSR)
(Distribution of surrender value received)

(b) When premium paid is treated as capital expenditure :

In this situation, joint life policy already appears in the balance sheet of the firm at surrender value on the date of retirement. Therefore, there is no need to pass any entry in the books. However, if there is revaluation on the date of retirement, then adjustment is made through the revaluation account. Joint life policy A/c appear in the balance sheet at its revalued price. If remaining partner's decide that joint life policy account should not appear in balance sheet, then pass the following entry:

Remaining Partner's Capital A/c Dr. (NPSR)
To Joint life policy A/c
(Joint life policy account closed by transferring it to remaining partner's capital account)

Note: Joint life policy is actually surrendered on the date of retirement of a partner and amount is received from insurance company.

1. On receiving surrender value
Cash A/c Dr. (Surrender value)
To Joint Life Policy A/c
(Cash received on surrender of policy)
2. Joint Life Policy A/c Dr. (Balance amount if any)
To All Partner's Capital A/c (OPSR)
(Joint life policy account closed)

Note : If amount received is less than what is shown in books, reverse entry will be passed.

Illustration 21 :

X, Y and Z are partners sharing profits at 4:3:2 respectively. The surrender value of joint life policy is ₹ 90,000 on the date of retirement of Z. It is decided that joint life policy will not appear in balance sheet. A and B decide to share future profits equally.

Pass the entries under the following conditions :

(i) When premium paid is treated as trade expenses.

(ii) When the Joint Life Policy Account already appears in the balance sheet at its surrender value.

Solution : 1 **JOURNAL**

Date	Particulars	L.F.	Dr. Amount ₹	Cr. Amount ₹
Date of Retirement	Joint Life Policy A/c Dr. To A's Capital A/c To B's Capital A/c To C's Capital A/c (Joint Life Policy recorded on surrender value at the time of C's Retirement)		90,000	 40,000 30,000 20,000
Date Of Retire-Ment	A's Capital A/c Dr. B's Capital A/c Dr. To Joint Life Policy A/c (Being policy account closed)		45,000 45,000	 90,000

or

Date of Retirement	A's Capital A/c Dr. B's Capital A/c Dr. To C's Capital A/c (Share of C's in JLP charged to A and B in their gain ratio1: 3)		5,000 15,000	 20,000

Solution: 2

Date of	A's Capital A/c Dr.		45,000	

Retirement	B's Capital A/c Dr. To Joint Life Policy A/c (Being policy account closed)		45,000	 90,000

Illustration 22 :

A, B, C are partners in a firm sharing profits in the ratio of 5:3:2. On the date of retirement of C. Joint Life Policy appears in balance sheet ₹ 10,000. Firm decide to surrender the policy and receives ₹ 12,000 from insurance company. Pass necessary Journal entries.

Solution:

Date	Particulars	L.F.	Amount ₹ Dr.	Amount ₹ Cr.
	Cash A/c Dr. To Joint Life Policy A/c (Cash received at the time of surrender of policy		12,000	 12,000
	Joint Life Policy A/c Dr. To A's Capital A/c To B's Capital A/c To C's Capital A/c (Balance of joint life policy distributed among the partners)		2,000	 1,000 600 400

Adjustment of Life Insurance policy at the time of Death of a Partner

Death is a universal truth that cannot be avoided. Therefore, a firm may take individual life policies and/or joint life policy on lives of all the partners.

For the purpose of maintaining liquidity and to arrange money to settle the account of deceased partner's legal representative's also life policies are taken by firms on the lives of partners.

Types of Policies :

1. Individual or Separate Life Policy
2. Joint Life Policy

1. **Individual or Separate Life Policy :** The firm can take separate/individual life policy on the life of partners. Premium is paid by firm and it is treated as expense. Therefore, at the end of the year premium A/c is transfer to PandL account. On the death of a partner amount payable to legal representatives of deceased partner is calculate as follows:

Policy amount of deceased partner	
Received from insurance company	**xxx**
(+) Surrender value of policies of survival partners'	**xxx**
Total Amount	**xxx**

Share of deceased partner:

Total amount X profits sharing ratio of deceased partner

Accounting treatment of individual life policy :

Journal Entries

Date	Particulars	L.F.	Amount ₹ Dr.	Amount ₹ Cr.
	1. For premium paid Insurance Premium A/c Dr. To Cash / Bank A/c (Insurance premium paid)			
	2. At the end premium A/c is transferred to PandL A/c Profit and Loss A/c Dr. To Insurance Premium A/c (Premium transferred to P and L A/c)			

	3. For Policy amount due on death of a partner Insurance Company A/c Dr. To Life Policy of Deceased A/c (Policy amount due)			
	4. For Policy amount received Bank A/c Dr. To Life Policy of Deceased Partner A/c (Policy amount received)			
	5. Policy amount of deceased partner+surrender value of policy of surviving partners are distributed between all the partners. Life Policy of Deceased Partner A/c Dr. Life Policies of other Partners A/c Dr. To All Partners Capital A/c (Total amount of policy distributed in all the partners)			

Alternative Method :

Policy amount of deceased partner	**xxx**
(+) Surrender value of policy of surviving partners'	**xxx**
Total Amount	**xxx**

Under this situation share of deceased partner is debited to remaining partners' capital A/c in gaine ratio and credited to deceased partner's capital A/c

Remaining Partner's Capital/ Current A/c Dr.
To Deceased Partner's Capital/Current A/c
(Deceased partners share in policy amount credited to his capital A/c)

Illustration 23 :

A, B and C share profit and losses of the firm in the ratio of 3:2:1. The firm had taken three individual life policies for ₹ 60,000, ₹ 50,000 and ₹ 80,000 for the lives of A, B and C. The firm pays ₹ 10,000,₹ 6,000 and ₹ 4,000 respectively on their policies as premium. The premium in charged to profit and loss A/c of the firm. A died on 1 July 2017 and the amount of his policy is received in full on 3 July. The surrender values of the policies of B and C on the date of death were ₹ 16,000 and ₹ 8,000 respectively which is to be shown in the books.

Pass Journal entries in the books of the firm and show the life policy in the Balance Sheet.

Journal

Date	Particulars	L.F.	Amount ₹ Dr.	Amount ₹ Cr.
April 2017	Insurance Premium A/c Dr. To Cash / Bank A/c (Insurance premium paid)		20,000	 20,000
July 2017	Insurance Company A/c Dr. To Life Policy A/c (Policy amount due)		60,000	 60,000
July 2017	Bank A/c Dr. To Insurance Company A/c (Policy amount received)		60,000	 60,000
July 2017	Life Policy A/c Dr. To A's Capital A/c To B's Capital A/c To C's Capital A/c (Policy amount and surrender value distributed among the partners)		84,000	 42,000 28,000 14,000

Balance Sheet of New Firm

Liabilities	Amount ₹	Assets	Amount ₹
		Life Policy Bond C (Surrender Value)	24,000

2. **Joint Life Insurance Policy on the lives of partners :** A partnership firm may decide to take joint life policy on the lives of all the partners. The firm pays the premium and the amount of policy is payable to the firm on the death of any partner or on the maturity of policy whichever is earlier. The accounting treatment of premium to be paid on joint life policy is made under the following three methods.

(I) When premium paid is treated as trade expense : In the situation accounting entries are:

Journal

Date	Particulars	L.F.	Amount ₹ Dr.	Amount ₹ Cr.
	1. On payment of premium Insurance Premium A/c Dr. To Cash / Bank A/c (Insurance Premium Paid)			
	2. At the end of the year Profit and Loss A/c Dr. To Insurance Premium A/c (Premium transferred to P and L A/c)			
	3. When policy amount becomes due Insurance Company A/c Dr. To Joint Life Policy A/c (Policy amount due)			
	4. For policy amount received Bank A/c Dr. To Insurance Company (Policy amount received)			
	5. For distribution of amount of policy Joint Life Policy A/c Dr. To All Partner's Capital A/c (Policy amount distributed)			

Note : The balance in Insurance Premium A/c (if any) on the date of death of the partner, will be transferred to Joint Life Policy A/c

Illustration 24 :

A, B and C are partners in a firm sharing profits in the ratio of 3:2:1. On 1-4-2013 firm took a joint life policy for ₹ 60,000 paying, ₹ 5,000 as premium annually. Premium paid is treated as business expense. On 5-4-2016 B died and the insurance claim was received on 8-4-2016. Pass the necessary Journal entries in the books of firm.

Solution :

Journal

Date	Particulars	L.F.	Amount ₹ Dr.	Amount ₹ Cr.
2013 April, 1	Insurance Premium A/c Dr. To Bank A/c (Insurance premium paid)		5,000	 5,000
2014 March, 31	Profit and Loss A/c Dr. To Insurance Premium A/c (Premium transferred to P and L A/c)		5,000	 5,000

2014 April, 1	Insurance Premium A/c Dr. To Bank A/c (Insurance premium paid)		5,000	 5,000
2015 March, 31	Profit and Loss A/c Dr. To Insurance Premium A/c (Premium transferred to P and L A/c)		5,000	 5,000
2015 April, 1	Insurance Premium A/c Dr. To Bank A/c (Insurance premium paid)		5,000	 5,000
2016 March, 31	Profit and Loss A/c Dr. To Insurance Premium A/c (Premium transferred to P and L A/c)		5,000	 5,000
2016 April, 1	Insurance Premium A/c Dr. To Bank A/c (Insurance premium paid)		5,000	 5,000
2016 April, 5	Insurance Company A/c Dr. To Joint Life Policy A/c (Policy amount due)		60,000	 60,000
2016 April, 8	Bank A/c Dr. To Insurance Company (Policy amount received)		60,000	 60,000
2016 April, 8	Joint Life Policy A/c Dr. To Insurance Premium A/c (Insurance premium transferred to Joint life policy account)		5,000	 5,000
2017 March, 31	Joint Life Policy A/c Dr. To A's Capital A/c To B's Capital A/c To C's Capital A/c (Joint Life Policy balance credited to partners Cap. A/c)		55,000	 27,500 18,333 9,167

Note : In the year of death of the partner, premium paid is transferred to joint life policy account.

(II) When premium paid is treated as Investment :

The element of investment is implied in life insurance, so some accountants do not consider it as expense but they consider it as an investment. Joint life policy account is debited by the amount of premium paid and shown in assets side of the balance sheets at the end of each year. The balance of joint life policy account is kept equal to the surrender value, so PandL account is debited with the difference of the amount of joint policy A/c and surrender value. The following entries will be passed in the books of firm.

Date	Particulars	L.F.	Amount ₹ Dr.	Amount ₹ Cr.
	1. On the payment of premium Joint Life Policy A/c Dr. To Bank A/c (Insurance premium paid)			
	2. On transferring the difference between the amounts of premium paid and surrender value to P and L A/c			

	Profit and Loss A/c Dr. To Joint Life Policy A/c (Premium transferred to P and L A/c) 3.When policy amount becomes due Insurance Company A/c Dr. To Joint Life Policy A/c (Policy amount due)			
	4. For policy amount received Bank A/c Dr. To Insurance Company (Policy amount received)			
	5. Balance of policy account distributed Joint Life Policy A/c Dr. To All Partner's Capital A/c (Policy amount distributed)			

Illustration 25 :

Pass the Journal entries and prepare Joint Life Policy A/c from the previous example (illustration 24) assuming that premium paid is treated as investment. The surrender value of policy is as follows; on31 March, 2013-Nil; on 31 March 2014-₹2,000; On 31 March, 2015-₹4,000.

Solution: **Journal**

Date	Particulars	L.F.	Amount ₹ Dr.	Amount ₹ Cr.
2013 April, 1	Joint Life Policy A/c Dr. To Bank A/c (Insurance premium Paid)		5,000	 5,000
2014 March, 31	Profit and Loss A/c Dr. To Joint Life Policy A/c (Premium transferred to P and L A/c)		5,000	 5,000
2014 April, 1	Joint Life Policy A/c Dr. To Bank A/c (Insurance premium paid)		5,000	 5,000
2015 March, 31	Profit and Loss A/c Dr. To Joint Life Policy A/c (Premium transferred to P and L A/c)		3,000	 3,000
2015 April, 1	Joint Life Policy A/c Dr. To Bank A/c (Insurance premium paid)		5,000	 5,000
2016 March, 31	Profit and Loss A/c Dr. To Joint Life Policy A/c (Premium transferred to P and L A/c)		3,000	 3,000
2016 April, 1	Joint Life Policy A/c Dr. To Bank A/c (Insurance premium paid)		5,000	 5,000
2016 April, 5	Insurance Company A/c Dr. To Joint Life Policy A/c (Policy amount due)		60,000	 60,000
2016 April, 8	Bank A/c Dr. To Insurance Company (Policy amount received)		60,000	 60,000

2016 April, 8	Joint Life Policy A/c Dr. To A's Capital A/c To B's Capital A/c To C's Capital A/c (Policy amount distributed)		51,000	 25,500 17,000 8,500

Dr. **Joint Life Policy Account** **Cr.**

Date	Particulars	J.F.	Amount₹	Date	Particulars	J.F.	Amount₹
2013 April, 1	To Bank		5,000	2014 March, 31	By Profit and Loss A/c		5,000
			5,000				**5,000**
2014 April, 1	To Bank		5,000	2015 March, 31 March, 31	By Profit and Loss A/c By Balance c/d		3,000 2,000
			5,000				**5,000**
2015 April, 1 April, 1	To balance b/d To Bank		2,000 5,000	2016 March, 31 March, 31	By Profit and Loss A/c By Balance c/d		3,000 4,000
			7,000				**7,000**
2016 April, 1 April, 1 April, 8	To balance b/d To Bank To A's Capital To B's Capital To C's Capital		4,000 5,000 25,500 17,000 8,500	2017 April, 15	By Insurance Company		60,000
			60,000				**60,000**

(III) When premium paid is treated as Investment and joint life policy reserve is credited : Under this method the premium paid on the joint life policy is debited to joint life policy account. The amount of the premium paid is debited to the PandL Appropriation A/c and credited to joint life policy reserve account. The adjustment regarding difference between the premium paid and the surrender value is made through the joint life policy reserve account.

Journal

Date	Particulars	L.F.	Amount ₹ Dr.	Amount ₹ Cr.
	1. On payment of premium Joint Life Policy A/c Dr. To Bank A/c (Insurance premium paid)			
	2. On creation of joint life policy reserve A/c Profit and Loss Appropriation A/c Dr. To Joint Life Policy Reserve A/c (Joint Life Policy reserve created)			
	3. For transferring the difference between the premium paid and surrender value of the policy Joint Life Policy Reserve A/c Dr. To Joint Life Policy A/c (Difference charged to Joint life policy reserve A/c)			

	4. When policy amount becomes due Insurance Company A/c Dr. To Joint Life Policy A/c (Policy amount due)			
	5. For Policy amount received Bank A/c Dr. To Insurance Company (Policy amount received)			
	6. Balance of policy reserve account transferred: Joint Life Policy Reserve A/c Dr. To Joint Life Policy A/c (Balance of reserve A/c transferred to JLP A/c)			
	7. For distribution of amount of policy Joint Life Policy A/c Dr. To Partner's Capital A/c (Policy amount distributed)			

Illustration 26 :

Open the necessary accounts in the books of the firm from the data given in the previous example (illustration 24), if premium paid is treated as on investment and Reserve for Joint life Policy A/c is created.

Dr. **Joint Life Policy A/c** **Cr.**

Date	Particulars	J.F.	Amount ₹	Date	Particulars	J.F.	Amount₹
2013				2014			
April, 1	To Bank		5,000	March, 31	By JLP Reserve		5,000
			5,000				**5,000**
2014				2015			
April, 1	To Bank		5,000	March, 31	By JLP Reserve		3,000
				March, 31	By Balance c/d		2,000
			5,000				**5,000**
2015				2016			
April, 1	To balance b/d		2,000	March, 31	By JLP Reserve		3,000
April, 1	To Bank		5,000	March, 31	By Balance c/d		4,000
			7,000				**7,000**
2016				2017			
April, 1	To balance b/d		4,000	April, 5	By Insurance Company		60,000
April, 1	To Bank		5,000	April, 8	By JLP Reserve		4,000
April, 8	To A's Capital		32,000				
	To B's Capital		21,333				
	To C's Capital		10,667				
			64,000				**64,000**

Dr. **Joint Life Policy Reserve A/c** **Cr.**

Date	Particulars	J.F.	Amount₹	Date	Particulars	J.F.	Amount₹
2014				2014	By Profit and Loss		
March, 31	To JLP		5,000	March, 31	Appropriation A/c		5,000
			5,000				**5,000**
2015				2015	By Profit and Loss		
March, 31	To JLP		3,000	March, 31	Appropriation A/c		5,000

2015 March, 31	To Balance c/d	2,000				
		5,000				**5,000**
2016 March, 31	To JLP	3,000	2015 April, 1	By Balance b/d		2,000
2016 March, 31	To Balance c/d	4,000	2016 March, 31	By Profit and Loss Appropriation		5,000
		7,000				**7,000**
2016 April, 8	To JLP	4,000	2016 April, 1	By Balance b/d		4,000
		4,000				**4,000**

Retirement/Death of a Partner during the accounting year

The following adjustments are to be made, in case of death/ retirement of a partner, in addition to adjustment in capital.

1. Salary, Bonus, Commission and Fees
2. Interest on Capital
3. Drawings and interest on drawings
4. Share in joint life policy or individual life policy
5. Share in profits of firm

Calculation of share in profits :

(i) **On the basis of time :** Under this situation partnership deed may provide that either last year's profit or average profit of last few years may be taken as basis for determining the share of profits of retiring/deceased partner.

Share in profit = Amount of Profit till retirement/death X Profit of sharing ratio of retired/deceased partner

(ii) **On the basis of turnover :** In such cases the share of profit of retired/deceased partner will be computed on the basis of sales till the date of retirement/death of a partner and the profit and sales of last year. Firms profit is computed on sales basis.

Profit share of retired/deceased partner = $\frac{\text{Profit of last year X sales till retirement death}}{\text{Sales of last year}}$

Illustration 27 :

A, B, and C are partner in a firm sharing profits in the ratio of 3:2:1. A died on 31-08-2016. The sales and profit for the year ended on 31-03-2016 were ₹ 2,00,000 and ₹ 48,000 respectively. Find the share of A's profit. (i) On the basis of time (ii) On the basis of turnover.

(Sales from 1-4-2016 to 31-8-2016 ₹ 60000

Solution :

(i) On the basis of time

48000 x 5/12 = ₹ 20,000

A's Share in profit 20000 x 3/6 = ₹ 10,000

Profit and Loss Suspense A/c	Dr.	10,000	
To A's Capital/Current A/c			10,000
(Share of profit transferred to his capital A/c)			

(ii) On the basis of turnover

48,000 / 2,00,000 x 60000 = ₹ 7,200

Profit and Loss Suspense A/c	Dr.	7,200	
To Retiring/ Deceased Partner Capital A/c			7,200
(Share of profit transferred to his capital A/c)			

6. Share in goodwill of the firm

7. Share in profit/loss on revaluation of assets and reassessment of liabilities
8. Share in accumulated profits/loss and reserves

The format of retire/deceased partner's capital A/c

Dr. **Retiring/ Deceased Partners Capital A/c** **Cr.**

Particulars	Amount ₹	Particulars	Amount ₹
To Balance b/d (if any)		By Balance b/d	
To Current A/c (if any) (Balance transfer)		By Current A/c (Balance transfer)	
To Revaluation A/c (Share of loss)		By Remaining Partners Cap. A/c (Share of goodwill)	
To Profit and Loss A/c (Dr. Balance)		By Revaluation A/c (Share of profit)	
To Drawings A/c		By P and L A/c / General Reserve	
To Interest on Drawings A/c		By PandL Suspense A/c (Share of profit of Current Year)	
To P and L Suspense A/c (Share of loss of Current Year)		By J.L.P. A/c (his share)	
To Balance Payable (b/f)		By Self L.P. A/c (his share)	
		By Remaining Partners Capital A/c (Share in surrender value of Life Policies of remaining partners)	
		By Interest on Capital A/c	
		By Salary/Fees/Bonus A/c	

Note : If partner's current accounts are maintained, then firstly, all the adjustments are to be made in the current account, then the final balance of the current account is transferred to capital a/c

Accounting Treatment for Non-Settlement of Final Payment of Retiring Partner and deceased Partner

As per provisions of section 37 of the Indian partnership Act, 1932, if amount of retiring/deceased partner still remains to be paid then:

Retiring partner or legal representative of deceased partner has the choice to get either of the following till the final settlement.

(i) Interest @ 6% p.a. on the balance amount

(ii) Share in the profit earned proportionate to his amount outstanding to total capital

Share profit =

$$\frac{\text{Outstanding amount of outgoing partner X profit from the date of retirement/death of a partner}}{\text{Total Capital}}$$

Illustration 28 :

A, B and C are partners in a firm sharing profits in the ratio of 2:2:1. C retired on 30-09-2016. On this date capital of A, B and C, after all necessary adjustments stood at ₹ 60,000. A and B continued to carry on the business for 6 months without settling the amount of C. During the period of 6 months ended on 31-3-2017 a profit of ₹ 50,000 is earned by the firm. Calculate amount payable to C.

Solution : According to section 37 of the Indian Partnership Act, 1932

Option I : ₹ 60,000 x 6/100 x 6/12 = ₹ 1,800

Option II : ₹ 60,000 x 50,000 /2,00,000 = ₹ 15,000

C should exercise option (ii) since the amount payable to him under this option is more as compared to the amount payable to him under option (i)

Illustration 29 :

Som, Mangal and Budh are partners in a firm. Their Balance Sheet as on 31st March, 2017 was as follows.

Liabilities	Amount ₹	Assets	Amount ₹
Capital:		Buildings	42,000
Som 30,000		Investments	17,000

Mangal 20,000		Joint Life Insurance Policy	15,000
Budh 15,000	65,000	Stock	18,000
Som's Current A/c 7,000		Debtors	16,000
Mangal's Current A/c 3,000	10,000	Budh's Current A/c	2,000
General Reserve	12,000	Cash at Bank	20,000
Bank Loan	28,000		
Joint Life Policy Reserve	15,000		
	1,30,000		**1,30,000**

On 30th September, 2017 Budh expired. Other information is as follows :
(i) He was entitled to salary of ₹ 500 per month and interest on capital at 10% p.a. **(ii)** He withdrew ₹ 3,000 for his daughter's marriage from the firm. **(iii)** His share in profit for current year will be based on last year's profit which was ₹ 6,000. **(iv)** Goodwill is valued at 90% of average profit of last four years. In last four years profits were, ₹ 3,000, ₹ 5,000 ₹ 4,000 and ₹ 6,000 respectively. **(v)** The present value of investment is₹ 20,500 and depreciation is to be charged ₹ 2,000 on Building. **(vi)** Payment received ₹ 30,000 for Joint Life Insurance Policy. **(vii)** Amount due to Budh is paid ₹ 5,750 in cash immediate and balance of amount transferred to his heir's loan account.
Prepare Budh's Capital Account and his Current Account.

Solution: **Dr.** **Budh's Current Account** **Cr.**

Particulars	**Amount ₹**	**Particulars**	**Amount ₹**
To Balance b/d	2,000	By General Reserve	4,000
To Drawing	3,000	By Salary	3,000
To Budh's Capital A/c	15,750	By Interest on Capital	750
		By PandL Suspense A/c (share in profit)	1,000
		By Som's Current A/c	750
		By Mangal's Current A/c	750
		By Revaluation A/c	500
		By Joint Life Policy	10,000
	20,750		**20,750**

Dr. **Budh's Capital Account** **Cr.**

Particulars	**Amount ₹**	**Particulars**	**Amount ₹**
To Budh's Executor A/c	30,750	By Balance b/d	15,000
		By Budh's Current A/c	15,750
	30,750		**30,750**

Dr. **Budh's Executor Account** **Cr.**

Particulars	**Amount ₹**	**Particulars**	**Amount ₹**
To Cash A/c	5,750	By Budh's Capital A/c	30,750
To Budh's Executor Loan A/c	25,000		
	30,750		**30,750**

Working Note:

(i) In absence of provisions in partnership deed profits are shared equally.

(ii) Salary, interest on capital and share in profit is credited to his capital account for 6 months.

(iii) Share in profits ₹ 6,000 x$\frac{6}{12}$x $\frac{1}{3}$= ₹ 1,000

(iv) Average profit = $\frac{3,000+5,000+4,000+6,000}{4}$ = ₹ 4,500

Budh's share in goodwill 40,00$x\,\frac{1}{3}$ =₹ 1,500

(v) Share in profit on revaluation 15,00$x\,\frac{1}{3}$ =₹ 500

(vi) Budh's share in Joint Life Policy

Entries:

Som's Current A/ Dr. 750
Mangal's Current A/c Dr. 750
To Budh's Current A/c 1500

(5) Dr. Revaluation Account Cr.

Particulars	Amount ₹	Particulars	Amount ₹
To Buildings A/c	2,000	By Investments	3,500
To Profit	1,500		
	3,500		**3,500**

B's share in Profit on Revaluation : 1,500 x$\frac{1}{3}$ = 500 ₹

(6) B's share in Joint Live Policy

Dr. Joint Life Policy Account Cr.

Particulars	Amount ₹	Assets	Amount ₹
To Balance b/d	15,000	By J.L.P Reserve A/c	15,000
To Som's Current A/c	10,000	By Bank A/c	30,000
To Mangal Current A/c	10,000		
To Budh's Current A/c	10,000		
	45,000		**45,000**

Illustration 30 :

A, B and C were partners in a firm sharing profits in the ratio 5:3:2. On 1-3-17 their Balance Sheet was as follows:

Balance Sheet
As at 31 March, 2017

Liabilities	Amount ₹	Assets	Amount ₹
Creditors	21,000	Goodwill	10,000
Reserves	6,000	Buildings	20,000
Investment Fluctuation Reserve	2,000	Machinery	30,000
Workmen Compensation Reserve	10,000	Investments	10,000
Capitals A/c's		Patents	11,000
A 40000		Stock	10,000
B 25000		Debtors	8,000
C 15000	80,000	Cash	19,000
		Advertisement Expenses	1,000
	1,19,000		**1,19,000**

A died on 12-6-2017. It was agreed among his executors and the remaining partners that :

(i) Goodwill to be valued at two and half years purchase of the average profits of the previous 4 years, which were

Years	2016-17	2015-16	2014-15	2013-14
Profits	₹ 13000	₹ 12000	₹ 20000	₹ 15000

(ii) Patents valued at ₹ 8500, Machinery at ₹ 28000, Investments at ₹ 11000, Stock at ₹ 12000, Buildings at ₹ 25000 and Bad-debts at ₹ 500 **(iii)** Share in profits will be calculated on the basis of last year profits. **(iv)** Interest on capital be provided @ 10% p.a. **(v)** They had of Joint Life Policy ₹ 30000 and the annual premium has been charged to PandL A/c **(vi)** His Drawings up to date of death was ₹ 2400 and interest on drawings was ₹ 200 **(vii)** Liability against workmen compensation is determined ₹ 4000 **(viii)** Salary ₹ 12000 p.a. **(ix)** ₹ 28650 to be paid immediately to the executors of A and the balance transferred to his (executors) Loan Account. Prepare A's Capital Account and A's Executor's Account.

Solution : Dr. A's Capital Account Cr.

Particulars	Amount ₹	Particulars	Amount ₹
To Goodwill	5,000	By Balance b/d	40,000

To Advertisement Expenses	500	By Interest on capital	800
To Drawings	2,400	By Reserve	3,000
To Interest on Drawings	200	By Investment Fluctuation Reserve	1,000
To A's Executor A/c	78,650	By Workmen Compensation Reserve	3,000
		By Revaluation A/c	1,500
		By B's Capital A/c	11,250
		By C's Capital A/c	7,500
		By PandL Suspense A/c	1,300
		By Salaries A/c	2,400
		By Life Policies ₹ 30000 x 5 / 10	15,000
	86,750		**86,750**

Working Notes :

(i) Interest on Capital40000x$\frac{10}{100}$x$\frac{73}{365}$= ₹ 800 ;

(ii) Salary 12,000x$\frac{73}{365}$= ₹ 2,400

(iii) Share in Profits13000x$\frac{73}{365}$x$\frac{5}{10}$= ₹ 1300

(iv) Share in Goodwill: Average Profit =$\frac{13000+12000+20000+15000}{4}$= ₹15,000;

Goodwill = 15,000x2.5 = ₹ 37,500

A's share in Goodwill = 37,500x$\frac{5}{10}$=₹ 18,750 is adjusted through capital account of B and C in their Gaine ratio 3:2

(v) WCR 10,000 A's Share 6,000x$\frac{5}{10}$= ₹ 3,000

(-) WCL -4,000

Surplus ₹ 6,000

(6) Dr. Revaluation Account Cr.

Particulars	Amount ₹	Particulars	Amount ₹
To Patent A/c	2,500	By Buildings A/c	5,000
To Machinery A/c	2,000	By Investment A/c	1,000
To Bad debts	500	By Stock A/c	2,000
To Profit	3,000		
	8,000		**8,000**

Dr. A's Executors Account Cr.

Particulars	Amount ₹	Particulars	Amount ₹
To Bank	28,650	By A's Capital A/c	78,650
To A's Executor's Loan A/c	50,000		
	78,650		**78,650**

Illustration 31 :

A, B and C were carrying on business with the following assets with effect from 1-4-2017. Furniture ₹ 18,000, Machine ₹ 72,000, Cash ₹ 10,000, Debtors ₹ 20,000. Their profit sharing ratio was 5:3:2. Capital is also shared in the same ratio. B died on 30-9-2017. His son claimed his father's interest in the firm.

The following was the settlement : **(i)** Allow his capital to his credit on the date death. **(ii)** Give 5% p.a. interest on his capital. **(iii)** He had been drawings @ ₹ 600 per month, which he withdrew at the beginning of each month. He is allowed to retain these drawings as a part his share of profit. **(iv)** Interest @ 6% p.a. be charged on his drawings. **(v)** Goodwill was valued twice the average profit, which were ₹ 21,000. Prepare B's personal Account.

Solution: Dr. B's Capital Account Cr.

Particulars	Amount ₹	Particulars	Amount ₹
To Drawings	3,600	By balance b/d	3,6000

To Interest on Drawings $3600 \times \frac{3.5}{12} \times \frac{6}{100}$	63	By Interest on Capital $36000 \times \frac{5}{100} \times \frac{6}{12}$	900
		By P and L Suspense A/c	3,600
To B's Executor A/c	49,437	By A's Capital A/c	9,000
		By C's Capital A/c	3,600
	53,100		**53,100**

Working Notes:

(i) Balance sheet is prepared to find out the capitals of the partners

Balance Sheet

Liabilities	Amount ₹	Assets	Amount ₹
Partners' Capital (Bal. Figure)		Cash	10,000
A 60000		Debtors	20,000
B 36000		Furniture	18,000
C 24000	1,20,000	Machinery	72,000
	1,20,000		**1,20,000**

As the total capital is ₹ 1,20,000., which is to be distributed in ratio 5 : 3 : 2

(ii) Goodwill of the firm : ₹ 21,000 x 2 = ₹ 42,000

B's share in goodwill $42{,}000 \times \frac{3}{10}$= ₹ 12,600 is adjusted through the capital account of A and C in Gain ratio of 5:2.

(iii) B's share in profit is equal to his drawings.

(iv) Interest on drawing is calculated for $\frac{6+1}{2}$=3.5 months.

Illustration 32 :

Khanna, Seth and Mehta were partners in a firm sharing profits in the ratio of 3:2:5. On 31.12.2016 the Balance Sheet of Khanna, Seth and Mehta was as follows:

Liabilities	Amount ₹	Assets	Amount ₹
Capitals:		Goodwill	3,00,000
Khanna 3,00,000		Land and Buildings	5,00,000
Seth 2,00,000		Machinery	1,70,000
Mehta 5,00,000	10,00,000	Stock	30,000
General Reserve	1,00,000	Debtors	1,20,000
Loan from Seth	50,000	Cash	45,000
Creditors	75,000	Profit and Loss A/c	60,000
	12,25,000		**12,25,000**

On 14th March 2017, Seth died. The partnership deed provided that on the death of a partner the executor of the deceased partner is entitled to: **(i)** Balance in Capital Account; **(ii)** Share in profits up to the date of death on the basis of last year's profit; **(iii)** His share in profit/loss on revaluation of assets and re-assessment of liabilities, is calculated on the basis of following: **(a)** Land and Buildings was to be appreciated by ₹ 1,20,000; **(b)** Machinery was to be depreciated to ₹ 1,35,000 and Stock to ₹ 25,000, **(c)** A provision of two and half percent for bad and doubtful debts was to be created on debtors. (iv) The net amount payable to Seth's executors was transferred to his loan account, which was to be paid later.

Prepare Revaluation Account, Partners Capital Accounts, Seth's Executors A/c and the Balance Sheet of Khanna and Mehta who decided to continue the business keeping their capital balances in their new profit sharing ratio. Any surplus or deficit to be transferred to current accounts of the partners.

Solution: Dr. **Revaluation Account** **Cr.**

Particulars	Amount ₹	Particulars	Amount ₹
To Machinery A/c	35,000	By Land and Buildings A/c	1,20,000
To Stock A/c	5,000		
To Provision of Bad-debts A/c	3,000		

To profit transferred: Khanna's Capital A/c 23100 Seth's Capital A/c 15400 Mehta's Capital A/c 38500	77,000		
	1,20,000		**1,20,000**

Dr. **Partner's Capital Account** **Cr.**

Particulars	Khanna ₹	Seth ₹	Mehta ₹	Particulars	Khanna ₹	Seth ₹	Mehta ₹
To Goodwill	90,000	60,000	1,50,000	By balance b/d	3,00,000	2,00,000	5,00,000
To PandL A/c	1,82,000	12,000	30,000	By General Reserve	30,000	20,000	50,000
To P and L Suspense	-	2,400	-	By Revaluation	23,100	15,400	38,500
To Seth's Executor A/c	-	1,61,000	-				
To Balance c/d	2,45,100	-	4,08,500				
	3,53,100	**2,35,400**	**4,08,500**		**3,53,100**	**2,35,400**	**5,88,500**

Dr. **Seth's Executors Account** **Cr.**

Particulars	Amount ₹	Particulars	Amount ₹
To Seth's Executor's Loan A/c	2,11,000	By Seth's Capital A/c By Seth's Loan A/c	1,61,000 50,000
	2,11,000		**2,11,000**

Balance Sheet Khanna and Seth
As at 14 March, 2017

Liabilities	Amount ₹	Assets	Amount ₹
Capital A/c: Khanna 2,45,100 Mehta 4,08,500	6,53,600	Land and Buildings Machinery Stock	620000 135000 25000
Creditors	75,000	Debtors 1,20,000	
Seth's Executor's Loan A/c	2,11,000	(-) PBD 3,000	117000
P and L Suspense A/c	2,400	Cash	45000
	9,42,000		**942000**

Working Notes:

(i) Seth's share in Loss $60{,}000 \times \frac{73}{365} \times \frac{2}{10} =$ ₹2,400

(ii) Adjustment Capital:

Total adjusted capital of Khanna and Mehta is 2,45,100+4,08,500=₹ 6,53,600 (capital of the new firm)

Khanna's capital $6{,}53{,}600 \times \frac{3}{8} =$ ₹ 2,45,100

Mehta's capital $6{,}53{,}600 \times \frac{5}{8} =$ ₹ 4,08,500

Summary

- **Retirement of a partner :** An existing partner may decide to leave firm due to ill health, old age, misunderstanding or mutual consent. A partner leaving the firm is known as retiring partner.
- **Retiring partner/outgoing partner :** The partner who leaves the firm is known as outgoing partner
- **Modes or ways of retirement** (i) By giving notice in writing to all other partners;(ii) by the virtue of an express agreement and (iii) with the consent of all the partners.
- **Problems arising at the time of retirement of a partner :** (i) Calculation of new profit sharing ratio and gaine ratio (ii) valuation and accounting treatment of goodwill. (iii) Revaluation of assets and reassessment of liabilities (iv) Adjustment of accumulated profits/losses and reserves (v) Adjustment of capital (vi) Settlement of the amount payable to retiring partner.

- **New profit sharing ratio:** New profit sharing ratio is the ratio in which remaining partners will share the future profits. (NPSR = OPSR + GR)
- **Gain Ratio :** The ratio in which old partners acquire retiring partner's share of profits is called the gain ratio. (G.R. = NPSR-OPSR)
  If is necessary to calculate gain ratio because the amount of goodwill is to be paid by remaining partners to retiring partner in their Gain Ratio.
- **Accumulated Profits/Losses and Reserves :** These items balance should be transferred to capital account of all partners in their old profit sharing ratio.
- **Settlement of amount due to the retiring partner:** The amount due to a retiring partner has to be paid to him over as lumpsum or transferred to his loan account. His loan may be payable with or without interest on investment.

Glossary

- **Retirement of a partner :** The partner who leaves the firm is known as retiring partner.
- **New profit sharing ratio :** New profit sharing ratio = Old profit sharing ratio - Gain Ratio
- **Gain Ratio :** New Profit Sharing Ratio- Old Profit Sharing Ratio
- **Joint Life Policy (JLP) :** Joint Life Policy means an insurance policy which is taken up by the firm on the lives of all the partners collectively.
- **Individual Life Policy (ILP) :** Individual Life Policy is taken by the firm in the name of an individual partner of the firm.
- **Surrender Value :** This is the value, which the insurance company will pass on to the firm if the policy is discontinued.

Questions for Exercise

Multiple Choice Questions :

1. A, B and C are partners sharing profits in the ratio of 2:2:1. On retirement of B, goodwill was valued at ₹30,000. Find the contribution of A and C to compensate B:
(a) ₹ 20,000 and ₹ 10,000 **(b)** ₹ 8,000 and ₹ 4,000
(c) ₹ 20,000 and ₹ 10,000 **(d)** ₹ 15,000 and ₹ 15,000

2. X, Y, Z were partners sharing profits in ratio of 5:3:2. Goodwill does not appears in the books, but it is agreed to be worth ₹1,00,000. X retires from the firm and Y and Z decide to share future profits equally. X's share of goodwill will be debited to Y's and Z's capital A/cs in ratio:
(a) 1/2: 1/2 **(b)** 2:3 **(c)** 3:2 **(d)** None

3. A, B and C are partners sharing profits in the ratio 1/2 , 3/10 and 1/5. B retires from the firm, A and C decide to share the future profits in 3:2. Calculate gain ratio.
(a) 1:2 **(b)** 3:2 **(c)** 2:3 **(d)** None

4. At the time of retirement of a partners, firm gets........ from the insurance company against the joint life policy.
(a) Policy value for the retiring partner and surrender value for the rest
(b) Surrender value **(c)** Policy amount **(d)** None of these

5. B, C, D are partners sharing profits in the ratio 7:5:4. D died on 30^{th} June 2017 and profits for the year 2016-2017 were ₹ 12,000. How much share in profits will be credited to D's Account?
(a)₹ 3,000 **(b)** ₹ 750 **(c)** Nil **(d)** ₹ 1,000

6. The balance of joint life policy account as shown in the balance sheet represents:
(a) Surrender value of a policy **(b)** Annual premium of Joint Life Policy
(c) Total premium paid by the firm **(d)** Amount receivable at the maturity of the policy

7. After the death of a partner, amount payable to him is received by:
(a) Government **(b)** by his son **(c)** Executors of deceased partner **(d)** None

8. How is the premium paid on the JLP of the partners treated? It is ------ to the ------- accounts:
(a) Credited, Partner's Current A/c **(b)** Credited, Profit and Loss A/c
(c) Debited, Partner's Capital A/c **(d)** Debited, Profit and Loss A/c

9. A, B, C are partners sharing profits and loss in 5:3:2. The firm's balance sheet as on 31-3-2017 shows reserve balance of ₹ 25,000. Profit of the year ₹ 50,000. Joint Life Policy of ₹ 1,00,000, Fixed, assets of ₹ 1,20,000. On 1st June C died and on same date the executors of C will get along with capital:
   (a) Share in joint life policy **(b)** Share in reserves
   (c) Proportionate share of profit upto the date of death **(d)** All of the above
10. Joint Life Policy amount received by a firm is distributed in------
   (a) Opening Capital Ratio **(b)** Closing Capital Ratio
   (c) Old profit sharing ratio of partners **(d)** New profit sharing ratio of partners

Very Short Answer type Questions :

1. What is meant by retirement of a Partner?
2. State any two modes of retirement?
3. What is Joint Life Insurance Policy?
4. What is Surrender Value?
5. A, B and C are partners in a firm sharing profits in the ratio of 1/2: 3/10: 2/10. Calculate New profit sharing ratio and Gain ratio when: (i) A retires. (ii) B retires. (iii) C retires.
   Ans. : New profit sharing Ratio: (i) 3:2 (ii) 5:2 (iii) 5:3 Gain Ratio: (i) 3:2 (ii) 5:2 (iii) 5:3
6. A, B and C are partners in a firm sharing profits in the ratio of 2:1:2. A retires and his share is entirely taken by B. Calculate New profit sharing ratio.
   Ans.: New profit Sharing Ratio: 3:2
7. A, B and C are partners in a firm sharing profits in the ratio of ¼: 2/5: 7/20. B retires and his share is taken by A and C in the ratio of 1:2. Calculate New profit sharing ratio and Gain ratio.
   Ans.: New profit Sharing Ratio: 23:37 Gain Ratio: 1:2
8. A, B and C are partners in a firm sharing profits in the ratio of 4:3:1. B retires selling his share of profit to A and C for ₹8,100, ₹3,600 being paid by A and ₹ 4,500 by C. Calculate New profit sharing ratio and Gain ratio.
   Ans.: New profit Sharing Ratio: 2:1 Gain Ratio: 4:5
9. A, B and C are partners in a firm sharing profits in the ratio of 4:3:2. A retires and new profit sharing ratio of B and C will be 2:1. Calculate Gain ratio.
   Ans.: Gain Ratio: 3:1
10. A, B and C are partners in a firm sharing profits in the ratio of 3:4:1. A retires. He surrendered 2/3rd of his share in favour of B and remaining in favour of C. Calculate new profit sharing ratio and Gain ratio.
   Ans.: New profit sharing Ratio: 3:1 Gain Ratio: 2:1

Short Answer type Questions :

1. When final payment of a retiring partner is settled out at the time of retirement? Give rights of partners under Section 37 of Indian Partnership Act, 1932?
2. What do you mean by Gain ratio? How is it calculated?
3. Distinguish between sacrifice ratio and Gain ratio of partners?
4. A, B and C are partners in a firm sharing profits in the ratio of 2:3:4. C retires and the goodwill of the firm is valued at ₹45,000. Goodwill appeared in the books at ₹27,000. Pass necessary journal entries for treatment of goodwill.
5. A, B and C are partners in a firm sharing profits in the ratio of 5:3:2. B retires and the goodwill of the firm is valued at ₹ 21,000. Pass necessary journal entries for treatment of goodwill.
6. A, B and C are partners in a firm sharing profits in the ratio of 1:2:3. B retires and balance of his capital account after making all adjustments stands at ₹1,00,000. A and C agreed to pay him ₹1,30,000 in full settlement of his account. Pass necessary journal entries for treatment of goodwill, if the new profit sharing ratio is 1:3.
7. A, B and C are partners in a firm. A retires on 1st January, 2014. On the date of retirement, ₹80,000 is due to him in all. It is agreed to pay him this amount in instalments every year at the end of the year. Prepare A's Loan A/c in the following cases :
   (i) Four yearly instalments plus interest @10% p.a. **(ii)** Three instalments of ₹ 25,000 including interest @ 10% p.a. on the outstanding balance and the balance including interest in the fourth year.

8. A, B and C are partners in a firm whose books are closed on March 31st each year. A died on 30-6-17 and according to the agreement, the share of profits of a deceased partner upto date of death is to be calculated on the basis of the average profits for the last five years. The net Profits/Loss for the last 5 years have been: ₹ 14,000, ₹18,000, ₹ 22,000, ₹(10,000)Loss, ₹ 16,000 respectively. Calculate A's share of the profits up to the date of death and pass necessary Journal entry.
Ans.:₹ 1000
9. X, Y and Z are partners sharing profits in the ratio 3:2:1. X died on 10-4-2017. The sales and profits for 2016 were ₹ 2,00,000 and ₹ 20,000 respectively, sales from 1-1-17 to 10-4-17 was ₹ 120000. Find the share of X's profit.
Ans. : ₹ 6000
10. A, B and C are equal partners in a firm. They were insured separately for ₹ 30000, ₹ 25000 and ₹ 40000. The premium is paid by the firm. A died and the policy money is received from the Insurance Company. The surrender values of the of policies of B and C was ₹ 3000 and ₹ 6000, Pass necessary Journal entries.

Essay type Questions :

1. How is Partner's share determined on the retirement or death? Explain.
2. What problems do arise on retirement or death of a partner and how are they settled?
3. How is accounting done for joint life insurance policy and several life insurance policies in the books of a firm? Explain.
4. What are the different methods of making payment due to a retiring partner? Explain.

Answers of Multi Choice Questions

Q.No.	**1**	**2**	**3**	**4**	**5**	**6**	**7**	**8**	**9**	**10**
Ans.	B	B	A	B	B	A	C	D	D	C

Numerical Questions :

1. X, Y and Z were partners in a firm sharing profits in the ratio of 1/2: 1/3: 1/6 respectively. The Balance Sheet of the firm on 31st December, 2016 stood as follows:

Liabilities	**Amount(₹)**	**Assets**	**Amount(₹)**
Creditors	9,500	Cash at Bank	1,250
Bills Payable	2,500	Debtors 8,000	
Reserve Fund	6,000	Less: Provision for DD 250	7,750
Capitals:		Stock	12,500
X 20,000		Motor Vans	4,000
Y 15,000		Machinery	17,500
Z 12,500	47,500	Building	22,500
	65,500		**65,500**

Y retires from the firm on the above date subject to the following conditions: **(a)** Goodwill of the firm be valued at ₹ 9,000 and is not to be shown in the books of the firm. **(b)** Machinery would be depreciated by 10% and motor vans by 15%, **(c)** Stock would be appreciated by 20% and Buildings by 10%. **(d)** The provision for doubtful debt would be increased by ₹ 975. **(e)** Liability for workmen's compensation to the extent of ₹ 825 would be created. It was agreed that X and Z would share profits in future in the ratio of 3:2 respectively. You are required to prepare the Revaluation A/c, Capital A/c of partners and Balance Sheet of the firm after the retirement of Y.

Also solve if it is assumed that partners decided to show the assets and liabilities at their old book values.

Ans.: (i) Revaluation profit ₹ 600, Y's loan A/c ₹ 20,200, capital A/c X ₹ 22,400, Z ₹ 11,500 B/s₹ 66,925 **(ii)** Ans. Memorandum Revaluation A/c profit ₹600,capital A/c X ₹ 22,040,Z ₹ 11260 B/S₹65500(Total).

2. A, B and C are partners sharing profits in the ratio of 4:3:2. Their Balance Sheet on 31st March, 2017 was as follows:

Balance Sheet

Liabilities	**Amount(₹)**	**Assets**	**Amount(₹)**
Creditors	33,000	Cash	10,400

Employee'sProvident Fund	4,000	Debtors	15,000
General Reserve	27,000	Stock	30,000
Capital:		Machinery	50,000
A 70,000		Land and Building	1,00,000
B 45,000		Profit and Loss A/c	3,600
C 30,000	1,45,000		
	2,09,000		**2,09,000**

The firm had a Joint Life Insurance Policy for ₹ 40,000. The surrender value of the policy was ₹ 13,500 as on 31st March 2017. B retires on the above date on the following conditions :

(a) Land and Buildings are undervalued by ₹ 20,000. **(b)** Goodwill is to be valued at ₹ 18,000. **(c)** A provision for doubtful debts of 5% is to be created and Machinery be written down by 10% and Stock by 5%. **(d)** A provision of ₹ 1,500 be made in respect of legal charges. **(e)** Joint Life Policy will appear in Balance Sheet.

B to be paid ₹ 5,000 and balance be transferred to his loan account. Prepare Revaluation Account, Partners' Capital Accounts and Balance Sheet of A and C.

Ans. : Revaluation profit ₹ 11,250; B's Loan A/c ₹ 62,050; Capital A/c A₹ 87,400 C ₹ 38,700; B/S ₹ 2,26,650

3. A and B are partners sharing profits in the ratio of A 1/2, B 1/3 and transfer to reserve 1/6. Their Balance Sheet as at 31st March, 2017 was as follows:

Liabilities	Amount(₹)	Assets	Amount(₹)
Employee's Provident Fund	18,000	Goodwill	15,000
Reserve Fund	12,000	Plant	90,000
Sundry Creditors	10,000	Patents	4,400
Profit and Loss A/c	24,000	Stock	30,000
Capitals:		Investments	20,000
A 80,000		Debtors 20,000	
B 40,000	1,20,000	Less: Provision 400	19,600
		Cash	5,000
	1,84,000		**1,84,000**

B retires on 1st April 2016. The terms were: **(i)** Goodwill is to be valued at ₹ 50,000. **(ii)** Value of Patents is to be increased by ₹ 3,000, but Plant was found over-valued by ₹ 15,000. **(iii)** Provision for doubtful debts should be 5% on debtors and provision for discount should also be made on debtors and creditors at 3%. **(iv)** Out of insurance which was entirely debited to profit and Loss Account ₹ 870 be carried forward as unexpired insurance. **(v)** Investments were revalued at ₹ 16,000. Half of these investments were taken over by B. **(vi)** There is a claim for Workmen's Compensation to the extent of ₹ 5,000.

B was paid off in full. A borrowed the necessary money from the bank on the security of plant and stock to pay off B. Prepare Revaluation Account, Capital Accounts and the Balance Sheet of A.

Ans.: Revaluation Loss ₹ 21,000; Bank Loan ₹ 47,000; Capital A/c A ₹ 60,000; B's ₹ 1,39,700

4. R, S and T were partners in a firm sharing profits in 2:2:1 ratio. On 31-3-2017, their Balance Sheet was as follows:

Liabilities	Amount (₹)	Assets	Amount (₹)
Bank loan	12,800	Cash	51,300
Sundry Creditors	25,000	Bills Receivable	10,800
Capitals		Debtors	35,600
R 80,000		Stock	44,600
S 50,000		Furniture	7,000
T 40,000	1,70,000	Plant and Machinery	19,500
Profit and Loss A/c	9,000	Buildings	48,000
	2,16,800		**2,16,800**

S retired from the firm on 1-4-2017 and his share was ascertained on the revaluation of assets as follows : Stock ₹ 40,000; Furniture ₹6,000; Plant and Machinery ₹ 18,000; Buildings ₹ 40,000; ₹ 1,700 were to be provided for doubtful debts. The goodwill of the firm was valued at ₹ 12,000.

S was to be paid ₹ 18,080 in cash on retirement and the balance in three equal yearly instalments.

Prepare Revaluation Account, Partners' Capital Accounts, S's Loan Account and Balance Sheet on 1-4-2017.

Ans. : Revaluation Loss ₹ 16,800; S's Loan A/c ₹ 33,600; Capital A/c R ₹ 73,680; T ₹ 36,840; B/s ₹ 1,81,920

5. The Balance Sheet of A, B and C who were sharing profits in proportion of their capitals, stood as follows on 31st March, 2017.

Liabilities	Amount (₹)	Assets	Amount (₹)
Sundry Creditors	6,000	Cash at Bank	5,500
Employee's Provident Fund	900	Sundry Debtors 5,000	
A's Capital A/c	16,000	Less: Provision 100	4,900
B's Capital A/c	12,000	Stock	8,000
C's Capital A/c	8,000	Plant and Machinery	8,500
Contingency Reserve	9,000	Factory Land and Buildings	25,000
	51,900		**51,900**

B retires and the following adjustments of the assets and liabilities have been agreed upon before the ascertainment of the amount payable by the firm to B: **(a)** That the stock be depreciated by 6% **(b)** That the provision for doubtful debts be brought upto 5% on debtors. **(c)** That the factory Land and Building be appreciated by 20%. **(d)** That a provision of ₹ 770 be made in respect of outstanding legal charges. **(e)** That the goodwill of the entire firm be fixed as ₹ 10,800 and B's share of the same be adjusted into the accounts of A and C who are going to share in future in the proportion of 5/8: 3/8 (No goodwill account is to be raised). **(f)** That the entire capital of the firm as newly constituted be fixed at ₹ 28,000 between A and C in the proportion of 5/8:3/8 after passing entries in their accounts for adjustments(i.e. actual cash to be paid off or to be brought in by the continuing partners as the case may be).

Pass the necessary journal entries to give effect to the above arrangements and prepare the Balance Sheet of A and C after transferring the amount due to B to separate loan account in his name.

Ans.: Revaluation profit ₹ 3,600; B's Loan ₹ 19,800; Capital A/c A₹ 17,500; C ₹ 10,500; B/s ₹ 55,470

6. J, H and K were partners in a firm sharing profits in the ratio of 5:3:2. On 31-3-2017 their Balance Sheet was as follows:

Liabilities		Amount(₹)	Assets		Amount(₹)
Creditors		42,000	Land and Buildings		1,24,000
Investment Fluctuation Fund		20,000	Motor Vans		40,000
Profit and Loss A/c		80,000	Investments		38,000
Capitals:			Machinery		24,000
J	1,00,000		Stock		30,000
H	80,000		Debtors	80,000	
K	40,000	2,20,000	Less: Provision	6,000	74,000
			Cash		32,000
		3,62,000			**3,62,000**

On the above date H retired and J and K agreed to continue the business on the following terms:

(i) Goodwill of the firm was valued at ₹ 1,02,000. **(ii)** There was a claim of ₹ 8,000 for workmen's compensation. **(iii)** Provision for bad debts was to be reduced by ₹ 2,000. **(iv)** H will be paid ₹ 14,000 in cash and the balance will be transferred to his loan account, which will be paid in four equal yearly instalments together with interest @ 10% p.a. **(v)** The new profit sharing ratio between J and K will be 3:2 and their capitals will be in their new profit sharing ratio. The capital adjustments will be done by opening current accounts. Prepare Revaluation Account, Partner's Capital Accounts and Balance Sheet of the new firm.

Ans.: Revaluation loss ₹ 6,000; H's Loan₹ 1,24,800; Capital A/c J ₹ 1,05,120; K ₹ 70,080; B/s ₹ 3,81,680; Current A/c J ₹ 31,680(Cr.); K ₹ 31680(Dr.)

7. Following is the Balance Sheet of A, B and C as at 31st March, 2017, who have agreed to share profits and losses in proportion of their capitals.

BALANCE SHEET as at 31st March, 2017

Liabilities		Amount (₹)	Assets		Amount (₹)
Capitals A/c's:			Land and Building		2,00,000
A	2,00,000		Machinery		3,00,000
B	3,00,000		Closing Stock		1,00,000
C	2,00,000	7,00,000	Sundry Debtors	1,10,000	
General Reserve		35,000	Less: Provision for D.D	10,000	1,00,000
Workmen's Compensation Reserve		15,000	Cash at Bank		1,00,000
Sundry Creditors		50,000			
		8,00,00			**8,00,000**

On 31st March,2017, A desired to retire from the firm and the remaining partners decided to carry on the business. It was agreed to revalue the assets and reassess the liabilities on the following basis: **(i)** Land and Buildings to be appreciated by 30%. **(ii)** Machinery be depreciated by 20%. **(iii)** There were Bad Debts of ₹ 17,000. **(iv)** The claim on account of Workmen's Compensation was estimated at ₹ 8,000. **(v)** Goodwill of the firm was valued at ₹ 1,40,000 and A's share of Goodwill to be adjusted against the capital Account of the continuing partners B and C who have decided to share future profits in the ratio of 4:3 respectively. **(vi)** Capital of the new firm in total will be the same as before the retirement of A and will be in the new profit sharing ratio of the continuing partners. **(vii)** Amount due to A be settled by paying ₹ 50,000 in cash and the balance by transferring to his Loan Account, which will be paid later on.

Prepare Revaluation Account, Capital Accounts of partners and Balance Sheet of the firm after A's retirement.

Ans.: Revaluation Loss ₹ 7,000; A's Loan ₹ 2,00,000; Capital A/c B ₹ 4,00,000; C ₹ 3,00,000; B/s ₹ 9,58,000, Bank 2,65,000

8. A, B and C partners sharing profits and losses in the ratio of 2:2:1. C retires on 31st March, 2017. The Balance Sheet of the firm as at 31st December, 2016 stood as follows:

Liabilities		Amount (₹)	Assets	Amount (₹)
Capital A/c's:			Land and Building	10,00,000
A	6,00,000		Investment	1,25,000
B	6,00,00		Stock	2,50,000
C	4,00,000	16,00,000	Sunday Debtors	4,00,000
General Reserve		4,00,000	Cash at Hand	1,00,000
Sundry Creditors		1,00,000	Cash at Bank	2,25,000
		21,00,000		**21,00,000**

In order to arrive at the balance due to C, it was mutually agreed that. **(i)** Land and Buildings be valued at ₹ 12,00,000. **(ii)** Investments to be valued at ₹ 1,00,000. **(iii)** Stock be taken at ₹ 3,00,000. **(iv)** Goodwill be valued at two years' purchase of the average profit of the past five years. Goodwill will not appear in the books of reconstituted firm. **(v)** C's share of profits up to the date of retirement be calculated on the basis of average profit of the preceding three years. The profits of the preceding five years were as under:

Year	2012	2013	2014	2015	2016
Profit (₹)	1,80,000	2,20,000	3,00,000	2,75,000	3,25,000

(vi) Amount payable to C is to be transferred to his Loan Account carrying interest 10% p.a.

You are required to prepare the Revaluation Account, Partners' Capital Accounts, and the Balance Sheet as at 31st March. 2017.

Ans: Revaluation profit ₹ 2,25,000; C's Loan ₹ 6,44,000; Capital A/c: A ₹ 7,98,000; B ₹ 7,98,000; B/S ₹ 23,40,000

9. P, Q and R were partners in a firm sharing profits in 2:2:1. The partnership deed provided that on the death a partner, his executors will be entitled for the following. **(i)** Interest on capital @ 12% p.a. **(ii)** Interest on drawings @ 18% p.a. **(iii)** Salary ₹ 12000 p.a. **(iv)** Share in the profits the firm (up to the date death) on the basis previous year's profits.

P died on 31-5-2017. His capital was ₹ 80,000 as on 31st March, 2017. He had withdrawn ₹ 15,000 and interest on his drawings was calculated as ₹ 1,200. The profit the firm for the previous year ended 31-3-2017 was ₹ 30,000. Prepare P's capital Account to be presented to his executors. (Ans : Amount due to P's executors ₹ 69400)

10. A, B and C are partners sharing profits in the ratio of 3:2:1. They had a Joint life policy ₹ 60,000 and the annual premium₹ 4,000 has been charged to Profit and Loss Account every year. Accounts are closed on 31, March annually. C died on 1st August 2017. Beside his of capital and insurance money, C's legal representatives are entitled to:

(i) Interest on capital at 10% per annum up to the date death. **(ii)** His share of profits based on average profits of the last three years. **(iii)** His share goodwill which is to be calculated at three year's purchase of the average profit of last 4 Years. C's capital on 1-4-2017 stood at ₹ 90,000 and his drawings from that date to the date death amounted to ₹ 5,500.

Profits for the last four years were ₹ 16,000, ₹ 26,000, ₹ (6,000) Loss, ₹ 34,000

Prepare C's Capital Account.

Ans. : ₹ 1,07,250

11. P, Q and R were partners in a firm sharing profits in the ratio 3:2:1. Their Balance sheet was as follows.

Balance Sheet as at 31-12-2016

Liabilities	Amount (₹)	Assets	Amount (₹)
Creditors	30,000	Cash	40,000
Bills Payable	40,000	Stock	40,000
General Reserve	60,000	Debtors	70,000
Capital A/c's:		Building	2,00,000
P 1,30,000		Land	3,00,000
Q 2,00,000		Goodwill	30,000
R 4,00,000	7,30,000	P & L A/c (Loss of the year 2016)	1,50,000
		Loan to R	30,000
	8,60,000		**8,60,000**

R died on 14-3-2017. The partnership deed provided for the following on the death a partner.

(i) Goodwill of the firm was to value at 3 years purchase of the average profit of last 5 years.

Years	2015	2014	2013	2012
Profits	₹ 70,000	₹ 80,000	₹ 1,10,000	₹ 2,20,000

(ii) R's share of profit or loss till the date of his death was to be calculated on the basis of the profits or loss for the year ending on 31-12-16. You are required to calculate the followings:

(i) Goodwill of the firm and R's share of goodwill at the time of his death.

(ii) R's share in the profit or loss of the firm till the date of his death.

Prepare R's Capital Account at the time of his death to be presented to his executors.

Ans.:₹ 3,78,000

12. P, Q and R were partners in a firm. Their Balance Sheet as at 31st March, 2017 was as follows:

Balance Sheet
As at 31 March, 2017

Liabilities	Amount (₹)	Assets	Amount (₹)
Sundry Creditors	25,000	Cash	6,000
Reserve Fund	20,000	Stock	12,000
Capital A/c's:		Bills Receivables	6,000

	P	15,000		Debtors	15,000
	Q	10,000		Investments	15,000
	R	10,000	35,000	Buildings	26,000
			80,000		**80,000**

The Partnership deed provides that the profits be shared in the ratio 2:1:1 and that in the event death of a partner, his executors will be entitled to be paid out;

(i) The Capital's to his credit at the date of Balance sheet. **(ii)** His proportion of reserve at the date of Balance sheet. **(iii)** His proportion of profits of the last 3 years, plus 10% and **(iv)** By way goodwill, his proportion of the total profits for the three preceding years. **(v)** share in profits on revaluation of buildings which is ₹ 4000 **(vi)** The net profits of last 3 years: ₹ 5000, ₹ 16000 and ₹ 17000.

R died on 30-06-2017. He had withdrawn ₹ 5000 up to the date of his death. The investments were sold at par and R's executors were paid off.

Prepare Partner's Capital Accounts, R Executor's Account and Balance sheet of surviving partners P and Q.

Ans.: R's Executor ₹ 24,100. Cap A/c P ₹ 19,000; Q ₹ 12,00; B/s ₹ 64,100

13. A, B and C are partners in a firm sharing profits in the ratio 2:2:1. The firm had taken a Joint Life Policy of ₹ 80000 on the lives all the partners on 1-4-2012. The firm pays annual premium ₹ 6000. The surrender value of the policy is as under:

31-3-13 Nil, 31-3-14 ₹ 2000; 31-3-15 ₹ 4000 and 31-3-16 ₹ 6000

C died on 1-6-2016. Prepare the necessary accounts in the books the firm. **(i)** If Premium paid is treated as trade expenses, **(ii)** premium paid is treated as an investment, **(iii)** premium paid is treated as investment and reserve is created.

14. A, B and C are partners sharing profit in 3:2:1 ratio. Their Balance Sheet as at 31st March, 2017 was as follows:

Balance Sheet as on 31-03-2017

Liabilities			Amount (₹)	Assets	Amount (₹)
Bills Payable			12,000	Cash in hand	12,000
Creditors			14,000	Bank	13,700
General Reserve			12,000	Debtors	12,000
Capital A/c's:				Bills Receivable	4,300
	A	20,000		Stock	1,750
	B	12,000		Investment	13,250
	C	8,000	40,000	Buildings	21,000
			78,000		**78,000**

B died on 30-06-2017 and according to the deed of the partnership his executors were entitled to be paid as under:

(i) The capital to his credit at the time of his death and interest there on @ 10% p.a.. **(ii)** His proportionate share of General Reserve. **(iii)** His Share of profit for the intervening period based on the sales during that period. Sales were calculated as ₹1,20,000. The rate of profit during past three years had been 10% on sales. **(iv)** Goodwill according to his share of profit to be calculated by taking twice the amount of the profits of the last three years less 20%. The profits of previous three years were: ₹8,200; ₹9,000; ₹9,800. The investment were sold at par and his executers were paid out. Prepare B's Capital Account and his executer's account.

Ans. : ₹34,700.

4

Dissolution of Firm

Learning objectives :

After going through this Chapter you will be able to :

- Understand the meaning of dissolution of firm and dissolution of partnership and differentiate between the two.
- Learn the process of constructing Realisation Account on dissolution of firm.
- Know accounting entries on firm's dissolution and prepare necessary ledger accounts.
- Learn accounting for insolvency of one or all partners applying Garners V/s Murray Rule or not applying this rule.

Meaning of dissolution of Firm

According to section 39 of Indian Partnership Act, 1932, "termination of partnership among all partners is called dissolution of the firm".

When partnership among all the partners is terminated, it is called dissolution of firm. On the dissolution of firm, the assets of the firm are sold and liabilities are paid off and out of the remaining amount, if any, the accounts of the partners are settled.

Meaning of Dissolution of Partnership

Dissolution of partnership denotes termination of relationship of a partner with all the remaining partners. Under such a case the business of the firm is not closed and remaining partners, if they like, may continue the business of the firm.

Example :

On the death, insolvency or retirement of a partner or on expire of a specified time, the partnership is dissolved, but firm may or may not be dissolved, which depends upon the partnership agreement. Thus, dissolution of partnership is not the dissolution of the firm. After dissolution of partnership, the firm can continue its business. But dissolution of the firm is the dissolution of partnership. On dissolution of firm, all the activities of business are closed.

The firm and partnership both are dissolved under the following cases :

1. When all the partners make an agreement to dissolve the firm.
2. When all the partners or all except one is declared insolvent.
3. When business of the firm became illegad.
4. In case of partnership at will, one partner has notified the other partners to terminate or close the business.
5. When the court issues orders for the termination of firm.

Modes of Dissolution

Circumstances of Dissolution of a Partnership Firm : According to section 40 to 44 of Indian Partnership Act the firm is dissolved under the following circumstances.

1. **Dissolution by Agreement-** Partners may dissolve the firm by agreement at any time.

2. **Compulsory Dissolution-** The firm is compulsorily dissolved under the following **circumstances**-
   (i) If the business of the firm has become illegal.
   (ii) If any partner of the firm is citizen of enemy country.
   (iii) If all or all but one partners are declared insolvent.
   (iv) If the maximum number of partners in a firm has become more than 50 (20 in banking business) in an ordinary business.
3. **Dissolution by Notice-** If partnership is at will, by giving a notice of dissolution by any partner to others.
4. **Dissolution by court-** On application by a partner, the court may issue orders for dissolution of the firm-
   (i) Where a partner has become of unsound mind,
   (ii) Where a partner has become in any way permanently incapable of performing his duties as a partner,
   (iii) Where a partner is guilty of misconduct,
   (iv) Where a partner willfully commits breach of agreement relating to management of the of affairs of the firm,
   (v) Where a partner has, in any way, transferred the whole of his interest in the firm,
   (vi) Where the business of the firm cannot be carried on except at a loss, and
   (vii) Where the court is satisfied as to the grounds, which render the firm to dissolve.

(5) Dissolution on the happening of certain contingencies- Under this, happening of the following events may render the firm dissolved-
   (i) Where a partnership is for a specified time, on the expiry of such time,
   (ii) Where a partnership is formed to do a certain work, the firm is dissolved soon after the completion of that work.
   (iii) On the death of any partner.
   (iv) On declaration of insolvency of any partner by the court.

Difference between Dissolution of Partnership and Dissolution of Firm

Basis of Difference	Dissolution of Partnership	Dissolution of Partnership Firm
(1) Meaning	Partnership is an agreement between two or more persons to carry on legal business, any change in the agreement will cause dissolution of partnership.	Dissolution of partnership firm denotes closure of partnership business where all business activities are discontinued.
(2) Circumstances	Partnership is dissolved when a new partner is admitted, or on retirement or death of a partner and change in profit sharing ratio or any other such reason.	Dissolution of partnership firm is either by agreement among the partners or by the intervention of court.
(3) Continuance of Business	When partnership is dissolved, the firm may continue the business under the same name.	On dissolution of the firm, business activities can not be continued.
(4) Termination	On termination of partnership, partnership firm is not closed.	On termination of the partnership firm closure of business is compulsory.

Settlement of Accounts on Dissolution

Section 48, 49 and 55 of Indian partnership Act specify the mode of settlement of accounts on the dissolution of a partnership firm. These are as follows :

(A) All the amount of loss and deficiency of capital, if any, shall be first paid, out of profits, next out of capital and lastly, if necessary, will be realized from the partners in their profit sharing ratio.

(B) Amount realised from the sale of assets and the amount brought in by the partners shall be applied in the following manner-

(i) Payment to secured creditors.

(ii) Payment to outside debts of the firm ratably.

(iii) Out of the remaining amount, the loan advanced by partners will be paid off ratably.

(iv) There after the balance of the partner's capital accounts will be paid off.

(v) If some amount remains, it will be divided among the partners in their profit sharing ratio.

On dissolution of the firm, out of sale proceeds of assets received first of all outside debts will be paid off. Remaining amount will utilized in paying partner's loans and lastly in returning the capitals of the partners. Private debts of partners are paid out of their private assets. After making payment to private debts, if some surplus remains, the same shall be used for making payment to firm's debts. (sec. 49).

Provisions of section 48 of Indian partnership Act, 1932 relating to settlement of accounts at the time of dissolution:

(1) All losses including the deficiency of capital shall be paid off as under:-

- (a) First of out of profits,
- (b) Then out of Capitals,
- (c) In the end, if necessary, the partners will bring the amount in their respective profit sharing ratio.

(2) All the assets of the firm including the cash brought in by the partners will be used as under:-

(a) In paying all the debts of the firm including the loan given by spouse of the partner.

(b) In returning capital of the partners ratably.

(3) If there any balance remains, it will be distributed by the partners in their profit sharing ratio.

In other words it can be summerised that the balance available will be used in the following order-

- (a) For payment of expenses incurred in selling assets and disposing off the liabilities.
- (b) Outside creditors or debts including that of the spouse shall be paid off.
- (c) For paying partners loans.
- (d) For returning capital of partners.
- (e) After all the above liabilities from (a) to (d) are paid off and some amount remains in balance, it will be distributed by the partners in their profit sharing ratio. (Sec.48).

Accounting Procedure on Dissolution of firm

From the date of dissolution, usual business activities are closed and the working of disposing of assets and payment of liabilities, commences. The following accounts are opened in order to meet the above procedure :

(i) Reallsation Account (ii) Bank/Cash Account.

(iii) Partners Capital Accounts (iv) Other necessary Accounts.

Realisation Account : On the dissolution of the firm, the assets of the firm are sold and from the amount realized out of this the liabilities of the firm are paid off. For this purpose one specific account is opened, which is known as Realisation Account. This account is of nominal nature. The purpose of opening this account is to find out the amount of profit or loss on realizing sale proceeds of assets and payment of liabilities.

Except balance of Cash or Bank Account, Partners Loan Accounts, Reserves and undistributed Profits, Partners current Account, etc., rest all assets and liabilities are transferred to Realisation Account. Sale proceeds of assets, assets taken over by partners, payment of liabilities and expenses of realization are all recorded in this Account. The balance of this Account shows profit or loss on realization, which is divided by the partners in profit sharing ratio and recorded in partner's capital or current accounts.

Difference between Realisation Account and Revaluation Account

Basis of Difference	Realisation Account	Revaluation Account
(1) Object or Purpose	Realisation A/c is opened to record realisation of assets and payment of liabilities on dissolution of the firm.	Revalutation A/c is opened to record increase or decrease in the value of assets and liabilities at the time of admission, retirement or death of a partner.
(2) Compulsion	On dissolution of the firm Realisation Account is compulsurily opened.	On the change in organisation of firm revalution account may not be opened, even then the amount of profit or loss can be ascertained.
(3) Time of Preparation	This account is opened at the time of dissolution of the firm to close books of accounts.	At the time of reorganisation, if firm continues its business, this account is opened.
(4) Expenses	At the time of dissolution, some expenses are incurred in realising assets and paying liabilities, which are called realisation expenses. These are debited to realisation A/c.	At the time of reorganisation of firm revaluation of assets and liabilities is done by firm's accountant, so expenses are required to be incurred.
(5) Entries	The balances of all assets except cash and bank balance are transferred to Realisation A/c on debit side. On the credit side balances of all external liabilities, except -reserves, undistributed profits and capital and current accounts of partners and their loan account are transferred to its credit side	In this account on debit side only reduction in the value of assets and increase in liabilities are recordes and on credit side only increase in the value of Assets and decrease in liabilities are recorded.

Accounting Entries Regarding Dissolution

1. For transfer of Assets (except Cash and Bank balance)

   Realisation A/c Dr.

   To Sundry Assets A/c (By name)

   (Being assets transferred at their book values)

2. When Liabilities are transferred (expect Partners Capital, Current General Reserve, Profit & Loss Account, Reserve Fund and Loan Accounts)

   Sundry Liabilities A/c Dr. (By name with the amount given in Balance Sheet)

   To Realisation A/c

   (Being balances of liabilities transferred)

3. When assets are sold for cash

   Cash/Bank A/c Dr. (With the amount of sale price of assets)

   To Realisation A/c

   (Being Cash realised from sale of Assets)

4. When assets is taken over by a partner

   Partner's Capital A/c Dr. (With the amount of agreed value by partners)

   To Realisation A/c

   (Being assets taken over by the partner)

5. When liabilities transferred are paid off

Realisation A/c Dr. (With the amount of payment)

To Cash/Bank A/c

<u>(Being liabilities paid in cash/ by cheque)</u>

6. When some of the liability is taken over by a partner

Realisation A/c Dr. (With the amount of agreed value by partners)

To Partner's Capital A/c

<u>(Being liability taken over by a partner)</u>

7. When realisation expenses paid off

Realisation A/c Dr. (With the amount of actual payment)

To Cash/Bank A/c

<u>(Being reailsation expenses paid off)</u>

8. When Realisation A/c depicts credit Balance (Profit)

Realiastion A/c Dr. (Amount of profit in profit sharing ratio)

To Partner's Capital A/c

<u>(Being profit on realization distributed)</u>

9. When Realisation A/c shows debit balance (loss)

Partner's Capital A/c Dr. (Amount of Loss on Profit sharing Ratio)

To Realisation A/c

<u>(Being loss on realization transferred)</u>

10. When a partner pays realisation expenses

Realisation A/c Dr. (Actual amount paid by partner)

To Partner's Capital A/c

<u>(Being expenses paid by the partners)</u>

Note: If a partner undertakes the responsibility for payment of realisation expenses personally, no entry will be passed in the books of the firm for the payment of these expenses.

11. When a partner acts as an agent for realisation of assets, the entry for his commission.

Realisation A/c Dr. (With the amount of commission/remuneration payable)

To Particular Partner's Capital A/c

<u>(Being commission allowed to a partner)</u>

Importance Note: Sometimes, liabilities are not transferred to Realisation A/c. Under such a case, liabilities are paid off directly. In case if there is any profit or loss, the amount of such profit or loss only will be transferred to Realisation A/c.

12. The entry will be as under :

Sundry Liabilities A/c Dr. (Book value of liabilities)

Realisation A/c Dr. (Excess payment amount)

To Cash/Bank A/c (Actual amount paid)

<u>(Being liabilities paid off and loss transferred)</u>

13. When liabilities are discharged for amount less than book value :

Sundry Liabilities A/c Dr. (Book value of liabilities)

To Cash/Bank A/c (Amount actual payment)

To Realiastion A/c (Profit transferred)

<u>(Being liabilities disposed and profit transferred)</u>

Notes:

(1) The following items, which are on assets side of Balance Sheet are not transferred to Realisation Account :
Cash and bank balance, balance (Dr.) of profit & loss A/c, deferred revenue expenses (directly transferred to partner's capital accounts in profit sharing ratio except cash and bank balance)

(2) The item on Liabilities side of Balance Sheet such as partner's capital or/and current account balances, Partner Loan A/c, General Reserve, credit for Balance of Profit & Loss A/c, other undistributed profits are not transferred to Realisation Account. But except for capital and current account, and partners loan, remaining a/cs are directly transferred to partners capital accounts in their profit sharing ratio.

(3) Partner's private assets are first used to meet their personal liabilities and excess if any may be used for making payment to firm's obligations, in case partner's capital account shows debit balance or firm's assets are less than firm's liabilities.

(4) When nothing is given in the question for payment to external creditors it should be assumed that the same are discharged at book value.

(5) When realisation value of an asset is not given, it should be regarded as valueless.

14. When partner's loan are discharged

Partner's Loan A/c	Dr.	(Amount paid, normal book value)
To Cash/Bank A/c		

(Being partner's loan paid off)

15. When undistributed profit are distributed

General Reserve A/c	Dr.	(Book Value)
Reserve Fund A/c	Dr.	(Book Value)
Profit & Loss A/c	Dr.	(Book Value)
To partner's Capital Accounts		(Profit sharing ratio)

(Being undistributed profit, distributed)

16. When there is any undistributed loss given :

Partner's Capital A/c	Dr.	(Profit sharing ratio)
To Profit & Loss A/c		(Book Value)

(Being undistributed loss transferred)

17. When deficiency in capital is brought in by a partner

Cash/Bank A/c	Dr.	(With the amount of cash brought)
To partner Capital A/c		

(Being shortage of capital brought in cash)

18. Balance of Capital Accounts of Partners when paid off

Partner's Capital A/c	Dr.	Balances
To Cash/Bank A/c		Amount paid

(Balance of capital with drawn)

Important Note:

After passing aforesaid entries the Cash/Bank A/c will be closed automatically.

(1) Assets and liabilities not shown in Balance Sheet

(a) Some assets with physical presence do not appear in Balance Sheet since they were completely written off. But some amount is realized on their sales, because the same are in useable condition. The following entry will be passed :

Cash/Bank A/c	Dr.	
To Realisation A/c		

(Being amount realized from sale of assets)

(b) Some of the liabilities not appearing in Balance Sheet are also to be disposed of, for example bills discounted and dishonoured, amount payable under guarantee or a legal case in pending, etc. When payment of such liabilities is made, the following entry will be passed :

Realisation A/c Dr.

To Cash/Bank A/c

(Contingent liabilities paid off)

(2) When an asset not shown in Balance Sheet is utilized in paying the debts not shown in Balance Sheet, no entry is required to be passed.

(3) Similarly if an asset, which is shown in Balance Sheet is given away to creditors, which is also shown in Balance Sheet, in part or full payment of his dues, no entry will be passed.

(4) When an asset not recorded in Balance Sheet is used for payment to recorded debt, no entry will be passed. But if some dues still remain to be discharged; the entry for this payment will be passed.

(5) When a recorded asset is used for passing unrecorded debts, no entry is passed in books.

Treatment of Goodwill on Dissolution :

(i) If goodwill appears in Balance Sheet, it is transferred to Realisation A/c as other assets are transferred.

(ii) If goodwill is not appearing in Balance Sheet, it is not to be valued.

(iii) If some amount is realized from goodwill, debit Cash/Bank A/c and credit Realisation A/c.

(iv) If goodwill is taken over by a partner, Capital A/c of said partner will be debited and Realisation A/c will be credited.

(v) If nothing is mentioned in the question regarding its realiastion, the value of goodwill is treated as zero.

Important : If nothing is mentioned in the question regarding payment of external debts, it must be assumed that they are paid in full.

Instructions for Treatment of Different Reserves on Dissolution

S.No.	Name of Reserve	Transfer to Realisation A/c	Transfer to Partner's Capital A/c
1.	Worksmen Compensation Fund	If there is any claim against it.	If there is no claim against it.
2.	Investment Fluctuation Fund	In case investment fluctuation fund exists in the Balance Sheet.	In case, there is no investment fluctuation fund in Balance Sheet.
3.	Joint Life Policy Reserve	If Joint life policy A/c appears on asset side of Balance Sheet.	If Joint Life Policy Account does not appear in Balance Sheet.
4.	Plant Replacement Fund	-	When machine or plant A/c does not appear on asset side of Balance Sheet
5.	Contingent Fund	-	Always transfer to partner's Capital Accounts.

Specimen of Realisation Account

Particulars	Amount (₹)	Particulars	Amount (₹)
To Sundry Assets A/c (at Book Value)		By Sundry Liabilities (at Book Value)	
Buildings		Creditors	
Machinery		B/P	
Furniture		Bank Loan	
Stock		Other Liabilities	
Debtors		By Bank Account	
Other Assets		(Realisation value of Assets)	
To Bank A/c (Realisation Exp. paid)		By Partners Capital A/c	

To Bank A/c (Creditor B/P and other Liabilities Paid) To Partners Capital A/c (Liabilites taken over) To Bank A/c (Premium paid) To Partner's Capital or Current A/c (if Profit) (BF)		(Assets taken over by partners) By Partner's Loan A/c (Discount on his loan) By Partner's Capital or current A/c (If Loss) (BF)	

Bank or Cash Account : On its debits side, balance of cash or bank (opening), amount received from sale of assets, and amount brought in by partners will be written. On its credit side payment for debts and expenses along with the payment made to partners loan and their capital accounts are shown. When cash and bank both accounts appear in the Balance Sheet only one account should be shown and the balance of other account should be transferred to the account opened.

Partner's Capital Accounts : On credit side write balances of capitals, credit balance of partner's current account, share of profit on realization, the amount of liability taken over by him, share in reserve and other undistributed profit and deficiency of capital brought in by him are recorded. On its debits side write debit balance of capital/current account share of loss on realisation, amount of assets taken over by him (agreed value), share of undistributed Losses etc.

Other Necessary Accounts : Partner's loan accounts, partner's current accounts. Reserves and undistributed profits accounts undistributed losses A/c and deficiency A/c, if all partners become insolvent etc., may be required to be opened at the time of dissolution.

Illustration 1 :

Tarun and Varun decided to dissolve the firm. The Balance Sheet as at 31 Dec. 2015 was as follows :

Balance Sheet As on 31 Dec., 2015

Liabilities	Amount (₹)	Assets	Amount (₹)
Creditors		Cash in hand	10,000
B/P	1,20,000	Debtors	1,00,000
G/R	20,000	Stock	4,00,000
Varun's Loan	30,000	Furniture	10,000
Capital :	1,10,000	Machinery	2,80,000
Tarun 400000		Buildings	80,000
Varun 200000	6,00,000		
	8,80,000		**8,80,000**

They distributed profit equally. Assets were realized as follows : Debtor's ₹ 84,000, stock ₹ 3,60,000, Machinery ₹ 2,24,000, Buildings ₹ 1,20,000 and paid to Creditors at 5% discount in full settlement. Realisation expenses ₹ 6000 paid. Prepare necessary journal entries and accounts.

Journal

Date	Particulars	L.F.	Amount (₹) Dr.	Amount (₹) Cr.
2015	Realisation A/c Dr.		8,70,000	
31 Dec.,	To Stock A/c			4,00,000
	To Debtors A/c			1,00,000
	To Furniture A/c			10,000

To Machinery A/c			2,80,000
To Building A/c			80,000
(Balance transfer to Realisation A/c)			
Creditor's A/c Dr.		1,20,000	
B/P A/c Dr.		2,000	
To Realisation A/c			1,40,000
(Balance transfer to Realisation A/c)			
Cash A/c Dr.		7,88,000	
To Realisation A/c			7,88,000
(Realised from assets)			
Realisation A/c Dr.		1,34,000	
To Cash A/c			1,34,000
(Liabilities paid)			
Realisition A/c Dr.		6,000	
To Cash A/c			6,000
(Realisation expenses paid)			
Tarun's Capital A/c		Dr.	41,000
Varun's Capital A/c Dr.		41,000	
To Realisation A/c			82,000
(Realisation loss transferred)			
General Reserve A/c Dr.		30,000	
To Tarun's Capital A/c			15,000
To Varun's Capital A/c			15,000
(General Reserve distributed)			
Varun's Loan A/c Dr.		1,10,000	
To Cash A/c			1,10,000
(Loan paid)			
Tarun's Capital A/c Dr.		3,74,000	
Varun's Capital A/c Dr.		1,74,000	
To CashA/c			5,45,000
(Final payment made)			

Realisation A/c

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
2015	To Debtors A/c	1,00,000	2015	By Creditor's A/c	1,20,000
Dec., 31	To Stock A/c	4,00,000	Dec., 31	By B/P A/c	20,000
	To Furniture A/c	10,000		By Cash A/c	7,88,000
	To Machinery A/c	2,80,000		Debtors 84,000	
	To Building A/c	80,000		Stock 3,60,000	
Dec., 31	To Cash A/c	1,34,000		Machinery 2,24,000	
	Creditor's 1,14,000			Buildings 1,20,000	
	B/P 20,000			By Capital A/c	82,000
Dec., 31	To Cash A/c (Expenses)	6,000		Tarun's 41,000	
				Varun's 41,000	
		10,10,000			**10,10,000**

Partner's Capital A/c

Particulars	Tarun (₹)	Varun (₹)	Particulars	Tarun (₹)	Varun (₹)
To Realisation A/c	41,000	41,000	By Balance b/d	4,00,000	2,00,000
To Cash A/c	3,74,000	1,74,000	By General Reserve	15,000	15,000
(Final Payment B/F)					
	4,15,000	**2,15,000**		**4,15,000**	**2,15,000**

Varun's Loan A/c

Particulars	Varun (₹)	Particulars	Varun (₹)
To Cash A/c	1,10,000	By Balance b/d	1,10,000
	1,10,000		1,10,000

Cash A/c

To Balance b/d	10,000	By Realisation A/c (Liablities paid)	1,34,000
To Realisation A/c	7,88,000	By Realisation A/c (Expenses)	6,000
(Sundry Assets)		By Varun's Loan A/c	1,10,000
		By Tarun's Capital A/c	3,74,000
		By Varun's Capital A/c	1,74,000
	7,98,000		**7,98,000**

Illustration 2 :

M/s A and B dissolove the firm on 31 Dec., 2012. The Balance Sheet was as follows :

Liabilities	Amount (₹)	Assets	Amount (₹)
Trade Creditors	5000	Cash in Hand	900
B's Loan	8000	Furniture	600
General Reserve	1800	Book Debts	4000
Capital A 10,000		Stock in Trade	1600
B 5,000	15000	Investment	4000
A's Current A/c	3600	Land & Buildings	21000
		Goodwill	500
		B's Current A/c	800
	33,400		**33,400**

B took furniture at 2/3 of its value. Book – debts realized at 5%, stock sold for ₹1000 and a loss on sale of buildings ₹3000. Investments taken by A at 90% of its book value. A typewriter costing ₹ 1000, which was not shown in the books, realized from ₹ 500. Creditors are paid at 10% discount. A paid realiastion expenses ₹ 800.

Make necessary journal entries and accounts to close the books of firm.

Journal

Date	Particulars	L/F	Amount (₹) Dr.	Amount (₹) Cr.
2012	Realisation A/c Dr.		31,700	
Dec., 31	To Furniture A/c			600

	To Book Debt A/c			4,000
	To Stock in Trade A/c			1,600
	To Investment A/c			4,000
	To Land & Building A/c			21,000
	To Goodwill A/c			500
	(Assets transferred to realisation A/c)			
Dec., 31	Trade Creditor's A/c Dr.		5,000	
	To Realisation A/c			5,000
	(Liabilities transferred to realisation A/c)			
Dec., 31	Cash A/c Dr.		21,500	
	To Realisation A/c			21,500
	(Realised from assets)			
	Realisation A/c Dr.		4,500	
	To Cash A/c			4,500
	(Creditor paid off)			
Dec., 31	A's Current A/c Dr.		3,600	
	B's Current A/c Dr.		400	
	To Realisation A/c			4,000
	(Partners took the assets)			
Dec., 31	Realisation A/c Dr.		800	
	To A/s Current A/c			800
	(Realisation expenses paid by A)			
Dec., 31	A's Current A/c Dr.		3,250	
	B's Current A/c Dr.		3,250	
	To Realisation A/c			6,500
	(Realisation loss transferred)			
Dec., 31	B's Loan A/c Dr.		8,000	
	To Cash A/c			8,000
	(B's Loan Paid off)			
Dec., 31	General Reserve A/c Dr.		1,800	
	To A's Current A/c			900
	To B's Current A/c			900
	(General reserve transferred)			
Dec., 31	B's Capital A/c		Dr.	3,550
	To B's Current A/c			3,550
	(Balance of Current A/c transferred)			
Dec., 31	A's Capital A/c Dr.		1,550	
	To A's Current A/c			1,550
	(Balance on Current A/c transferred)			
Dec., 31	A's Capital A/c Dr.		8,450	
	B's Capital A/c Dr.		1,450	
	To Cash A/c			9,900
	(Balance of Capital A/c paid off)			

Realisation A/c

Particulars	Amount (₹)	Particulars		Amount (₹)
To Furniture A/c	600	By Trade Creditors		5,000
To Book Debt's A/c	4,000	By Cash A/c		21,500
To Stock A/c	1,600	Book Debt	2000	
To Investment A/c	4,000	Stock	1000	
To Land & Buildings A/c	21,000	Land & Buildings	18000	
To Goodwill A/c	500	Typewriter	500	
To Cash A/c (Creditor's)	4,500	By A's Current A/c		3,600
To A's Current A/c	800	By B's Current A/c		400
		By Current A/c		6,500
		A	3250	
		B	3250	
	37,000			**37,000**

Partner's Capital A/c

Particulars	A ₹	B ₹	Particulars	A ₹	B ₹
To Current A/c	1,550	3,550	By Balance b/d	10,000	5,000
To Cash A/c	8,450	1,450			
	10,000	**5,000**		**10,000**	**5,000**

Partner's Capital A/c

Particulars	A ₹	B ₹	Particulars	A ₹	B ₹
To Balance b/d	-	800	By Balance b/d	3,600	-
To Realisition A/c	3,250	3,250	By General Reserve	900	900
To Realisition A/c	3,600	400	By Realisation A/c	800	-
			By Capital A/c	1,550	3550
	6,850	**4,450**		**6,850**	**4,450**

Cash A/c

Particulars	Amount (₹)	Particulars	Amount (₹)
To Balance b/d	900	By Realisation A/c	4,500
To Realisation A/c	21,500	By B's Loan A/c	8,000
		By A's Capital A/c	8,450
		By B's Capital A/c	1,450
	22,400		**22,400**

llustration 3 :

X, Y and Z started partnership business on 1st January, 2013. They decided to distribute profit and loss in the ratio of 5:3:2. They invested capital ₹ 80,000, ₹ 60,000 and ₹ 40,000 respectively. In partnership dead there was a provision for 5% interest on capital withdrawal ₹ 12,000, ₹ 16,000 and ₹ 8,000 respectively. Profit for 2013, was ₹ 40,000 before charging interest on capital. The relations between partners were not good. Hence, they decided to dissolve the firm on 31st December, 2013. From the sale of assets ₹ 1,60,000 is realised and cash was ₹ 13,000. Creditors were ₹ 48,000, it was paid off at a discount of 10 percent. Reserves were ₹ 3,000. Realisation expenses paid ₹ 1800.

Prepare necessary ledger accounts to close the books of the firm.

Solution :

Profit & Loss Appropriation Account For the year ending 31 Dec., 2013

To Interest on Capital		By Net Profit	40,000
X 4,000	9,000		
Y 3000			
Z 2000			
To Capital Account	31,000		
X 15,500			
Y 9,300			
Z 6,200			
	40,000		**40,000**

Partner's Capital A/c

Particulars	X ₹	Y ₹	Z ₹	Particulars	X ₹	Y ₹	Z ₹
To Drawings	12,000	16,000	8,000	By Balance b/d	80,000	60,000	40,000
To Balance c/d	87,500	56,300	40,200	By Interest on Capital	4,000	3,000	2,000
				By P & L App. A/c	15,500	9,300	6,200
	99,500	72,300	48,200		99,500	72,300	48,200
To Realisation	29,500	17,700	11,800	By Balance b/d	87,500	56,300	40,200
To Cash A/c	59,500	39,500	29,000	By Reserve A/c	1,500	900	600
	89,000	**57,200**	**40,800**		**89,000**	**57,200**	**40,800**

Memorandum Balance Sheet as on 31 Dec., 2013

Liabilities	Amount (₹)	Assets	Amount (₹)
Creditors	48,000	Cash	13,000
Reserve	3,000	Sundry Assets (B/F)	2,22,000
Capital	1,84,000		
X 87,500			
Y 56,300			
Z 40,200			
	2,35,000		**2,35,000**

Realisation A/c

Particulars	Amount (₹)	Particulars	Amount (₹)
To Sundry Assets	2,22,000	By Creditor A/c	48,000
To Cash A/c (Creditor's)	43,200	By Cash A/c (Sundry Assets)	1,60,000
To Cash A/c (Real. Exp.)	1800	By Capital A/c	59,000
		X 29,500	
		Y 17,700	
		Z 11,800	
	2,67,000		**2,67,000**

Cash A/c

Particulars	Amount (₹)	Particulars	Amount (₹)
To Balance b/d	13,000	By Realisation A/c	43,200
To Realisation A/c	1,60,000	By Realisation A/c	1,800
		By X Capital A/c	59,500
		By Y Capital A/c	39,500
		By Z Capital A/c	29,000
	1,73,000		**1,73,000**

Illustration 4 :

A, B and C are partners sharing profit and losses in the ratio of 3 : 1 : 1. They decided to dissolve their partnership on 31st March, 2010, on which date their Balance Sheet was as under :

Balance Sheet as on 31 March, 2010

Liabilities	Amount (₹)	Assets	Amount (₹)
Creditors	6,000	Cash	3,200
Loan	1,500	Debtors 24,200	
Capital		Less : PBD 1,200	23,000
A 27,500		Stock	7,800
B 10,000		Furniture	1,000
C 7,000	44,500	Sundry Assets	17,000
	52,000		**52,000**

It was decided : (1) A takes furniture for ₹800 and debtors of book value ₹20,000 for ₹ 17,200 and agreed to pay ₹ 6,000 to creditors (2) B takes stock for ₹ 7,000 and some of sundry assets for ₹ 7,200. This amount is 10% less than book- value. (3) C takes remaining sundry assets at 90% of book value less ₹ 100 discount and also agrees to make payment of firm's loan with interest. Interest on loan is ₹ 30, which is not recorded in books (4) Expenses of dissolution amounted to ₹ 270. Rest of debtors sold to a debt collection agency for 50% of book value. Prepare necessary Ledger Accounts to close the books of the firm.

Solution :

Realisation A/c

Particulars	Amount (₹)	Particulars	Amount (₹)
To Sundry Assets		By Creditors	6,000
Debtor 24,200		By Loan	1,500
Stock 7,800		By Provision for Bad debts	1,200
Furniture 1000		By A's Capital A/c (800+17200)	18,000
Sundry Assets 17,000	50,000	By B's Capital A/c	14,200
To A's Capital (Creditors)	6,000	(Stock 7000+S. Assets 7200)	
To C's Capital A/c (1500+30)		By C's Capital A/c (S. Assets 8000)	8,000
Loan & Interest	1,530	By Cash A/c (Debtor 50% of 4200)	2,100
To Cash A/c (Exp.)	270	By Partners Capital A/c (Loss)	6,800
		A 4080, B 1360, C 1360	
	57,800		**57,800**

Partner's Capital A/c

Particulars	A ₹	B ₹	C ₹	Particulars	A ₹	B ₹	C ₹
To Realisation	18,000	14,200	8,000	By Balance b/d	27,500	10,000	7,000
To Realisation	4080	1360	1,360	By Realisation	6,000	-	1,530
To Cash A/c	11,420	15,560	-	By Cash A/c	-	5,560	830
	33,500	15,560	9,360		33,500	15,560	9,360

Cash A/c

Particulars	Amount (₹)	Particulars	Amount (₹)
To Balance b/d	3,200	By Realisation A/c	270
To Realisation A/c	2,100	By A's Capital A/c	11,420
To B's Capital A/c	5,560		
To C's Capital	830		
	11,690		**11,690**

Important Notes : Value of Assets of ₹ 7,200 = 7,200 x 100/90 = ₹ 8,000. Thus the value of Sundry Assets taken over by C = ₹ 17,000 – 8,000 = ₹ 9,000 x 90% = ₹ 8,100 – 100 = ₹ 8,000

Insolvency of Partners

After passing entries regarding dissolution of the firm in capital accounts of the partners, it is possible that Capital Accounts of one or more partners may show debit balance. In case, such partner is solvent, he will bring the debit balance of his Capital Account in the firm. But if such partner has been adjudged as insolvent, he will not be in a position to bring his deficiency in the firm. Deficiency of Capital of such partner will be borne by solvent partners.

Before the year 1903, deficiency of insolvent partner used to be borne by solvent partners in profit sharing ratio. But in that year the court of England awarded a decision in the case of **Garner v/s Murray**. According that decision, solvent partners have to bear the loss due to insolvency of a partner in the Capital Ratio. The details of this case are sunder :

Facts of Garner v/s Murray Case

Garner, Murray and Wilkinson were partners in a firm sharing profits and loss equally. The firm was dissolved on 30th June, 1900, when assets were sold and liabilities were disposed off. After this, the Balance Sheet of the firm was as under :

Liabilities	Amount (₹)	Assets	Amount (₹)
Capitals :		Cash / Bank	1,916
Garner	2,500	Deficiency of Wilkmson's Capital	263
Murray	314	Realisation Loss	635
	2,814		**2,814**

Wilkinson was declared insolvent and nothing could be realized from his private estate. His total liability for the firm was for 263 + 1/3 of ₹ 635 = 475. The problem before the court was about the distribution of this deficiency by Garner and Murray.

Decision awarded in the case : In accordance with the decision awarded by the court that solvent partners shall bear the insolvency loss in the ratio of their Capitals just before firm's dissolution. This decision was awarded on the ground that realisation loss is not a business loss or this loss is different from business loss.

Interpretation of the case : On the basis of decision awarded in the case following two points are to be noted :

(1) The loss of Insolvency of a partner shall be borne by solvent partners in the ratio of their respective Capitals.

(2) Solvent partners shall bring their share of loss on realisation in cash.

Ratio of Capital refers to the balances of Capital standing in the Balance Sheet just prior to dissolution.

Example : If Balance Sheet of the firm is prepared on 31st December every year, then for the ratio, balances of Capitals will be taken standing in Balance Sheet as on 31st December, just before dissolution. It is applicable in case of fixed Capitals.

When Capital Accounts are fluctuating, then adjustment in Capitals will be made for the amount of undistributed profit & losses appearing in the Balance Sheet just before dissolution. Thus the ratio of adjusted Capitals will be material for this purpose.

Note : In the absence of clear instructions in question, it should be solved applying the provisions of Garner V/s Murray case.

When Garner V/S Murray case not applicable

Nothing has been provided in Indian Partnership Act, 1932 as regards the applicability of Garner V/S Murray Rule. As such deficiency of insolvent partner should be borne by solvent partners in their respective profit sharing ratio.

Illustration 5:

Deepak, Kapil and Bharat are partners sharing profit in 3 : 2 : 1 ratio. Their Balance Sheet as on 31-3-2014 was as follows :

Balance Sheet as on 31st March, 2014

Liabilities	Amount (₹)	Assets	Amount (₹)
Creditors	1,40,000	Cash	24,000
B/P	1,00,000	Debtors	1,20,000
General Reserve	54,000	Stock	1,80,000
P & L A/c	18,000	Buildings	3,84,000
Capital		Capital : Bharat	24,000
Deepak 2,64,000			
Kapil 1,56,000	4,20,000		
	7,32,000		**7,32,000**

The firm was dissolved on that date. Building and Stock were sold for ₹ 5,28,000. Realisation expenses amounted to ₹ 6000. Debtors worth ₹ 3,000 were declared as bad. Creditors were paid in full. Bharat was declared Insolvent and ₹ 5,100 only could be recovered from his private estate.

Prepare Realisation A/c and Partner's Capital Accounts. Apply Garner V/S Murray Rule, assuming that solvent partners do not bring their share of loss on realisation in cash.

Realisation A/c

Particulars	Amount (₹)	Particulars	Amount (₹)
To Debtors A/c	1,20,000	By Creditors A/c	1,40,000
To Stock A/c	1,80,000	By B/P	1,00,000
To Buildings A/c	3,84,000	By Cash A/c (Assets Realised)	6,45,000
To Cash A/c		Building - 5,28,000	
Creditors 1,40,000		Debtor's - 1,17,000	
B/P 1,00,000	2,40,000	By Partners Capital A/c	45,000
To Cash A/c (Realisation Exp.)	6000	D 22,500, K-15,000, B- 7500	
	9,30,000		**9,30,000**

Partner's Capital A/c

Particulars	Deepak ₹	Kapil ₹	Bharat ₹	Particulars	Deepak ₹	Kapil ₹	Bharat ₹
To Balance b/d	-	-	24,000	By Balance b/d	2,64,000	1,56,000	-
To Realisation	22,500	15,000	7,500	By Cash A/c	-	-	5,100
To Bharat Capital	9000	5,400	-	By General Reserve	27,000	18,000	9,000
To Cash A/c	2,68,500	1,59,600	-	By P&L A/c	9,000	6,000	3,000
				By Deepak Capital	-		9,000
				By Kapil Capital	3,00,000		5,400
	3,00,000	1,80,000	31,500		3,00,000	1,80,000	31,500

Working Note : Deficiency of Bharat's Capital ₹ 14,000 will be borne by Deepak and Kapil in their Capital Ratio (3,00, 000 : 1,80,000) or 5 : 3, assuming that their Capitals are fluctuating. This ratio has been ascertained as under:-

Ascertainment of Capital Ratio

Particulars	Deepak ₹	Kapil ₹
Capital	2,64,000	1,56,000
+ General Reserve	27,000	18,000
+ P&L A/c	9000	6000
	3,00,000	1,80,000

Cash A/c

Particulars	Amount (₹)	Particulars	Amount (₹)
To Balance b/d	24,000	By Realisation A/c (Creditors)	1,40,000
To Realisation A/c	6,45,000	By Realisation A/c (B/P)	1,00,000
To Bharat Capital A/c	5,100	By Realisation A/c (Exp.)	6000
		By Deepak Capital	2,68,500
		By Kapil Capital	1,59,600
	6,74,100		**6,74,100**

Illustration 6 :

A, B and C sharing profit in 5 : 3 : 2 respectively are partners in a firm. The Balance Sheet of the firm at the date of dissolution on 31st December, 2013 was as under :

Balance Sheet as on 31 March, 2013

Liabilities	Amount (₹)	Assets	Amount (₹)
Bills Payable	40,000	Cash at Bank	8000
Creditors	1,00,000	Bill's Receivable	32,000
Capital :		Debtor's	1,40,000
A 80,000		Capital of C	60,000
B 40,000	1,20,000	Stock	20,000
	2,60,000		**2,60,000**

A was appointed to realise the assets and distribute the amount on dissolution who was to be given 5% as remuneration on the amount collected from Bills Receivable, Stock and Debtors. He furnished following information for realization of Assets- B/R ₹30,000, Debtors ₹1,20, 000 and Stock ₹ 50,000. Creditors were paid ₹ 94,000 in full payment. The amount of B/R was paid in full. Realisation expenses amounted to ₹ 4,000. C was declared insolvent and ₹ 4,000 only could be realized from his private estate.

Prepare Realisation A/c and Partner's Capital Accounts assuming that Garner V/S Murray rule is applicable and solvent partners will bring cash for their respective share of loss on realisation.

Solution :

Realisation A/c

Particulars	Amount (₹)	Particulars	Amount (₹)
To Bill Receivable A/c	32,000	By Bill Payable A/c	40,000
To Debtors A/c	1,40,000	By Creditors A/c	1,00,000
To Stock A/c	60,000	By Cash A/c	
To Cash A/c		B/R 30,000	
Creditors 94,000		Debtors 1,20,000	
B/R 40,000	1,34,000	Stock 50,000	2,00,000
To Cash A/c (Realisation Expenses)	4000	By Partners Capital A/c (Loss)	
To A's Capital (Remuneration)	10,000	A - 20,000	
		B - 12,000	
		C - 8000	40,000
	3,80,000		**3,80,000**

Partner's Capital A/c

Particulars	A ₹	B ₹	C ₹	Particulars	A ₹	B ₹	C ₹
To Balance b/d	-	-	20,000	By Balance b/d	80,000	40,000	-
To Realisation	20,000	12,000	8000	By Realisation	10,000	-	-
To C's Capital	16,000	8,000		By Cash A/c	20,000	12,000	4000
To Cash A/c	74,000	32,000		By A's Capital	-	-	16000
				By B's Capital	-	-	8000
	1,10,000	**52,000**	**28,000**		**1,10,000**	**52,000**	**28,000**

Cash A/c

Particulars	Amount (₹)	Particulars	Amount (₹)
To Balance b/d	8000	By Realisation A/c	1,34,000
To Realisation A/c	2,00,000	By Realisation A/c	4000
To A's Capital A/c	20,000	By A's Capital A/c	74,000
To B's Capital A/c	12,000	By B's Capital A/c	32,000
To C's Capital A/c	4000		
	4,00,000		**4,00,000**

Illustration 7:

A, B and C are equal partners. Their capital as on 31st March, 2014 were ₹ 2,40,000, ₹ 1,20,000 and ₹ 40,000 respectively. It was decided to dissolve the firm on this date. Amount realized from the sale of different assets was ₹ 1,64,000. Realisation expenses incurred were ₹ 4,000. C was declared insolvent and a sum of ₹ 0.40 in a rupee was realised from his private estate. Prepare necessary ledger accounts to close the books of the firm.

Solution :

Balance Sheet as on 31 March, 2014

Liabilities	Amount (₹)	Assets	Amount (₹)
Capital A/c	4,00,000	Sundry Assets (B.F.)	4,00,000
A 2,40,000			
B 1,20,000			
C 40,000			
	4,00,000		**4,00,000**

Realisation A/c

Particulars	Amount (₹)	Particulars	Amount (₹)
To Sundry Asset's	4,00,000	By Cash A/c (Assets Realised)	1,64,000
To Cash A/c (Exp.)	4000	By Partners Capital A/c	2,40,000
		A 80,000	
		B 80,000	
		C 80,000	
	4,04,000		**4,04,000**

Partner's Capital A/c

Particulars	A ₹	B ₹	C ₹	Particulars	A ₹	B ₹	C ₹
To Realisation	80,000	80,000	80,000	By Balance b/d	2,40,000	1,20,000	40,000
To C's Capital	16,000	8000	-	By Cash A/c	80,000	80,000	16,000
To Cash A/c	2,24,000	1,12,000	-	By A's Capital			16,000
				By B's Capital			8000
	3,20,000	**2,00,000**	**80,000**		**3,20,000**	**2,00,000**	**80,000**

Cash A/c

Particulars	Amount (₹)	Particulars	Amount (₹)
To Realisation A/c	1,64,000	By Realisation A/c	4000
To A's Capital A/c	80,000	By A's Capital A/c	2,24,000
To B's Capital A/c	80,000	By B's Capital A/c	1,12,000
To C's Capital A/c	16,000		
	3,40,000		**3,40,000**

Liability of Minor Partner in case of Insolvency of Partners on Dissolution of firm

According to the provision of Indian partnership Act, the liability of a minor partner is limited to the capital employed by him along with the profit earned. As regards the payment to firm's debts, only his capital in the firm may be used. His private estate is not liable for firm's dues. In case, if all the partners of the firm (other than minor) become insolvent even then minor's private estate is not liable to meet firm's debts though, his private estate may be capable to meet them.

Illustration 8 :

A, B and C are partners sharing profit in 3:2:1 ratio. They decided to dissolve the firm on 31st December, 2014, on which date their Balance Sheet was as under :

Balance Sheet as on 31 March, 2014

Liabilities	Amount (₹)	Assets	Amount (₹)
A's Capital A/c	25,000	Cash	600
B's Capital A/c	15,000	Sundry Assets	36,000
		C's Capital Overdrawn	3400
	40,000		**40,000**

Amount realized from sale of assets ₹30,000. C became insolvent and only ₹ 1,200 could be collected from his private estate. Prepare necessary ledger accounts to close the books of the firm assuming that the Garner V/s Murray rule is not applicable.

Realisation A/c

Particulars	Amount (₹)	Particulars	Amount (₹)
To Sundry Assets	36,000	By Cash A/c (Assets Realised)	30,000
		By Partners Capital A/c	6,000
		A 3000	
		B 2000	
		C 1000	
	36,000		**36,000**

Partner's Capital A/c

Particulars	A ₹	B ₹	C ₹	Particulars	A ₹	B ₹	C ₹
To Balance b/d	-	-	3400	By Balance b/d	25,000	15,00	-
To Realisation	3000	2000	1000	By Cash A/c	-	-	1200
To C's Capital	1920	1280	-	By A's Capital	-	-	1920
To Cash A/c	20,080	11,720	-	By B's Capital	-	-	1280
	25,000	**15,000**	**4,400**		**25,000**	**15,000**	**4,400**

Cash A/c

Particulars	Amount (₹)	Particulars	Amount (₹)
To Balance b/d	600	By A's Capital A/c	20,080
To Realisation A/c	30,000	By B's Capital A/c	11,720
To C's Capital A/c	1,200		
	31,800		**31,800**

Summary

- **Dissolution of Firm and Partnership :** (1) When all partners enter into agreement to dissolve the firm, (2) When all partners leaving one are declared insolvent, (3) When business of the firm become illegal, (4) when the partner, in case of partnership at will, given notice to all to dissolve the firm, (5) When court has issued orders for dissolution.
- **Types of dissolution :** (1) Dissolution by agreement, (2) Compulsory dissolution, (3) dissolution by giving notice, (4) dissolution by the court, (5) Dissolution on the happening of certain contingence.
- **Accounts to be prepared on dissolution :** (1) Realisation Account, (2) Bank/Cash Account, (3) Partner's Capital Accounts, (4) Other necessary accounts.

- **Garner V/s Murray Rule :** According to this decision, deficiency of insolvent partner is borne by solvent partners in the ratio of their capital balances on the date of dissolution. Excluding all transactions related to dissolution, remaining solvent partners bear the loss in their capital ratio.

Glossary

- **Dissolution of Firm :** Termination of partnership among all partners.
- **Dissolution of Partnership :** Only partnership is dissolved, firm is not dissolved.
- **Realisation Account :** This Account is opened on dissolution in which all assets and liabilities are transferred. Assets are realized and payment of liabilities is done through this account. Profit or Loss of this account on dissolution is divided in profit sharing ratio of partners.
- **Garner V/s. Murray :** These are names of two partners in a firm in England. The decision awarded by court propounding the famous rule on distribution of deficiency of a partner who becomes insolvent by the solvent partners.

Questions for Exercise

Multiple Choice Questions :

1. At the time of dissolution of the firm balance of bad debts account is transferred to :
   (a) Debtors A/c (b) Bad debts A/c
   (c)Realisation's A/c (d) Capital a/c
2. On the dissolution of partnership firm, losses will be charged first :
   (a) Out of profit (b) From Partner's Loan A/c
   (c) From Partner's Capital A/c (d) From Partner's Personal resources
3. On the dissolution of firm, to close goodwill account, it is transferred to :
   (a) Revaluation's A/c (b) Partner's Capital A/c
   (c) Realisation A/c (d) Profit & Loss A/c
4. In which ratio, capital deficiency of an insolvent partners is distributed among solvent partners, when Garner vs. Murray Rule applies :
   (a) Profit – Loss Ratio (b) Opening Capital Ratio
   (c) Capital ratio before charging dissolution profit or loss (d) Equal Ratio
5. When Garner vs. Murray Rule applies, realization loss will be borne by the partner's in :
   (a) Equal Ratio (b) Profit & Loss Ratio
   (c) Capital Ratio (d) None of the above

Very Short Answer Type Questions :

1. On the dissolution of the firm, from debtors worth ₹ 50,000 realised ₹ 45,000. Make necessary journal entry at the time of dissolution of the firm.
2. What was name of insolvent partner in Garner V/s. Murray case? In which ratio his loss was distributed.
3. What is Realisation account?
4. What is dissolution of partnership firm?
5. What is the sequence for payment at the time of dissolution of firm?
6. What do you mean by dissolution of firm by court order?
7. At the time of dissolution capitals of the partners of the firm were ₹ 20,000, liabilities ₹ 15,000 and cash balance ₹ 1000; Amount realized from sundry assets ₹ 9,000. What is loss on realization?
   Answer: ₹ 25,000

Short Answer Type Questions :

1. Explain the Garner V/s. Murray rule.

2. "There is a difference between dissolution of partnership and dissolution of firm". Explain this statement.
3. A, B and C's profit sharing ratio is 1 : 2 : 2. Before debiting realization loss partners capitals balances are ₹ 3000 (Dr.) ₹ 6000 (Cr.) and ₹ 2000 (Cr.) respectively and realization loss ₹ 5000. A became insolvent, give journal entry for distributing the deficiency of A.
4. Himi and Shreekant are partners. As 31st March, 2012 their Capita wasl ₹ 1,00,000 and ₹ 50,000 and creditors were ₹ 30,000. On that date firm dissolved and realization value of assets is ₹ 90,000. Prepare Realisation Account on dissolution.
5. In which circumstances compulsory dissolution happens?
6. State the modes of dissolution of partnership firm.
7. How capital accounts are closed on dissolution of partnership firm?
8. State any two circumstances under which partnership is deemed to be dissolved.
9. State the rules of preparation of realization account on dissolution of partnership firm.
10. State any two grounds on which a court can pass orders for dissolution of a firm.
11. Kapil one of the partner, agreed to take over the creditor's of ₹ 25,000 for ₹ 22,000. Pass necessary journal entry at time of dissolution of the firm.

Essay Type Questions :

1. What is difference between realization account and revaluation account?
2. Under what circumstances a firm may be dissolved?
3. What do you mean by the Garner vs. Murray rule. How it is applied in case of fixed capital method and fluctuating capital method. Explain.
4. Explain the method of accounting for settlement of accounts at the time of dissolution.

Answers of Multiple Choice Questions

Question No.	(1)	(2)	(3)	(4)	(5)
Answer	C	A	C	C	B

Numerical Questions :

1. Ramesh, Naresh and Mahesh are partners in a firm sharing profit and losses in the ratio of 3 : 2 : 1. They decided to dissolved partnership firm on 31st December, 2014, on which date the Balance Sheet of the firm stood as follows :-

Balance Sheet as on 31st December, 2014

Liabilities	Amount (₹)	Assets	Amount (₹)
Creditors	20,500	Cash in Hand	6000
Mrs. Ramesh Loan	8000	Debtors	9000
Joint Life Policy fund	20,000	Joint Life Policy	14,000
Capital		Investment	20,000
Ramesh 50,000		Stock	8000
Naresh 10,000	60,000	Machinery	40,000
		Mahesh Capital A/c	11,500
	1,08,500		**1,08,500**

The following transactions took place on dissolution :

(1) Joint life Policy was surrendered for ₹15,000. (2) Ramesh took Investments for ₹ 17,500 and agreed to discharge his wife's Loan. (3) Ramesh took stock for ₹ 7,500 and debtors worth ₹ 5000 for ₹ 4,000, (4) Machine was sold for ₹ 50,000 and Debtors (remaining) realized 50% of book value. (5) realization expenses amounted to ₹ 1,000.

(6) ₹ 3,000 were realized from the sale of investments, which were not recorded in books. Give necessary journal entries to close the books of the firm and also prepare necessary ledger accounts.

Answer: Profit on Realisation ₹ 27,000.

2. Gopesh and Rakesh were partners sharing profit equally. They decided to dissolve the firm. The following was their Balance sheet as on 31st December, 2014 :-

Balance Sheet as on 31st December, 2014

Liabilities	Amount (₹)	Assets	Amount (₹)
Creditors	30,000	Bank	20,000
General Reserve	20,000	Debtors	40,000
Capital		Stock	20,000
Gopesh 44,000		Furniture	8000
Rakesh 44,000	88,000	Plant & Machinery	50,000
	1,38,000		**1,38,000**

Realisation from the assets was as under: (1) Gopesh took Plant Machinery and furniture for 10% less than book value, (2) Rakesh took stock and goodwill for ₹ 35,000 and ₹ 37,000 were realized from Debtors. (4) Creditors were paid at a discount of 5%. Give necessary journal entries to close the books of the firm and prepare necessary accounts.

3. X, Y and Z are partners sharing profit in 2:2:1 ratio. Partners decided to dissolve the firm on 31st March, 2010, on which date Balance Sheet was as follows:-

Balance Sheet as on 31st March, 2010

Liabilities	Amount (₹)	Assets	Amount (₹)
Creditors	2500	Cash at Bank	4500
General Reserve	5000	Debtors 6500	
Current A/c X	2500	Less P.F.B. & D.D. 500	6000
Current A/c Y	1500	Stock	5000
Capital		Investments	5000
X 10,000		Furniture	4000
Y 5000		Plant & Machinery	6000
Z 5000	20,000	Current A/c Z	1000
	31,500		**31,500**

₹10,000 was realized from Plant & Machine, ₹ 6,000 from furniture, full amount from debtors and ₹ 4,000 from stock. Investments were taken over by Z at book value. Creditors were paid at 10% discount and expenses of realization were ₹ 100. An assets of the value of ₹ 550 was not recorded in books, which was taken by X for ₹ 450. There was a liability of ₹ 100, which was not entered in books. Close the books of the firm and prepare necessary ledger accounts.

Answer: Profit on realization ₹ 2,500.

4. Tanu and Manu sharing profits in 3 : 1 ratio are partners in a firm. They agreed to dissolve the firm. The assets of the firm (expect cash ₹ 2,000) realized ₹ 1,08,500. The liabilities on the date of dissolution were as under: creditors ₹ 40,000, Capital Tanu ₹ 1,00, 000 (Cr.), Manu's Capital A/c ₹ 10,000 (Dr.), Profit & Loss A/c ₹ 8,000 (Dr.), Realisation Expenses ₹ 1,000. It was ascertained that an investment worth ₹ 2,000 was not recorded in the books, which was taken by a creditor for ₹ 1,500. Remaining creditors were paid ₹ 36,500 in full settlement. Prepare Realisation Account, Partner's Capital Accounts and Cash Account.

Answer: Loss on Realisation ₹ 9,000.

5. Ram, Rahim and Karim sharing Profit in 2 : 2 : 1 ratio are partners in a firm. They decided to dissolve the firm on 31st March, 2012, on which date their Balance Sheet was as under:-

Balance Sheet as on 31st March, 2012

Liabilities	Amount (₹)	Assets	Amount (₹)
Creditors	4,000	Cash in Hand	4,000
Capital		Debtors 2600	
Ram 10,000		Less – P.F.B.D. 600	2,000
Rahim 4000		Stock	4,000
Karim 2000	16,000	Fixtures and other Assets	10,000
	20,000		**20,000**

The assets were realised as under :- Fixtures and other Assets ₹ 9,000, Stock ₹ 4,520, Debtors ₹ 1,800, Creditors were paid off ₹ 3,800 in full settlement. Realisation expenses incurred ₹ 120. Prepare necessary accounts to close the books of the firm.

Answer : Less on Realisation : ₹ 600.

6. The following Balance Sheet reveals the position of M/s. Rakesh and Deepak as on 31st December, 2017.

Balance Sheet as on 31st December, 2017

Liabilities	Amount (₹)	Assets	Amount (₹)
Creditors	1,900	Stock	3,600
General Reserve	1,000	Book Debts	6,000
Capital		Furniture	200
Rakesh 5,500		Plant & Machinery	900
Deepak 4,000	9,500	Profit & Loss A/c	1,700
	12,400		**12,400**

Book debts were realised at a discount of 7 ½%, stock was sold for ₹ 3,000, Plant & Machine for ₹ 700 and furniture for ₹ 250. Partners share profits and losses equally. Prepare necessary accounts on dissolution.

Answer: Loss on Realisation ₹ 1,200.

7. X, Y and Z are partners in a firm sharing profit and loss in the ratio of 4 : 3 : 3. On 31st December, 2015 it was decided to dissolve the firm on which date their Balance Sheet was as under:-

Balance Sheet as on 31st December, 2015

Liabilities	Amount (₹)	Assets	Amount (₹)
Creditors	80,000	Cash	6,000
Capital		Debtors 90,000	
X 80,000		Less : P.F B.D. 5,000	85,000
Y 60,000	1,40,000	Stock	1,20,000
		Z Overdrawn	9, 000
	2,20,000		**2,20,000**

Y was appointed to realise the assets and amount so collected to be distributed. He will get 5% of the amount collected from stock and debtors and he will bear all expenses. Y reports about his collection as under: ₹ 96,000 was realised from stock and ₹ 72,000 from debtors and creditors were paid of ₹ 76,000 in full settlement. ₹ 1,000 was paid to an outstanding creditor not appearing in Balance Sheet.

Z was declared Insolvent and only ₹ 7,720 could be collected from his private estate. Apply the Garner V/s. Murray rule. Prepare Realisation A/c, Partners' Capital Accounts and Cash Account to close the books of the firm.

8. A, B and C are partners sharing profits and losses in the ratio of 5 : 3 : 2 respectively. The business was dissolved on 31st March, 2008, on which date the Balance Sheet of the firm was as under:-

Balance Sheet as on 31st March, 2008

Liabilities	Amount (₹)	Assets	Amount (₹)
Creditors	2,00,000	Cash at Bank	10,000
Capital		Debtors	90,000
A 20,000		Stock	1,20,000
B 80,000		Motor Car	20,000
C 40,000	1,40,000	Machinery	1,00,000
	3,40,000		**3,40,000**

Amount realised from the sale of Machinery ₹ 50,000 and stock ₹ 38,000. B took over Motor car for ₹ 24,000. ₹ 40,000 was realised from Debtors. Deficiency of Capital of any partner will be borne by other partners in their profit sharing ratio. A was declared as insolvent and nothing could be realised from his estate. Prepare necessary accounts on dissolution.

Answer : Loss on Realisation ₹ 1,80,000.

9. The partnership between Ram and Shyam was dissolved on 31st March, 2010. Ram's Capital was ₹ 17,000 and Shyam's ₹ 3,000. Shyam owed ₹ 2,000 to the firm and the firm owed ₹ 10,000 to Ram and ₹ 20,000 was payable to Sundry Creditors. The books of the firm showed cash and furniture of ₹ 300 and ₹ 1,200 respectively. Profits and Losses were to be divided in the ratio of 2 : 1. The assets representing the above liabilities realised ₹ 40,000 (Other than cash, furniture and ₹ 2,000 payable by Shyam). Ram took furniture at an agreed price of ₹ 800. Liabilities were discharged at book value. Realisation expenses incurred were ₹ 200. Prepare Balance Sheet before the date of dissolution and necessary Accounts to close the books on dissolution.

Answer: Loss on Realisation ₹ 7,100.

10. The Balance Sheet of Ram, Shyam and Mohan on 31st March, 2014 was as follows:-

Balance Sheet as on 31st March, 2014

Liabilities	Amount (₹)	Assets	Amount (₹)
Creditors	40,000	Cash at Bank	12,000
General Reserve	30,000	Debtors	20,000
Capital		Stock	40,000
Ram 50,000		Plant & Machinery	40,000
Shyam 30,000	80,000	B/R	20,000
		Mohan Capital overdrawn	18,000
	1,50,000		**1,50,000**

Mohan was declared insolvent and could contribute only ₹4,000. The firm was dissolved and the amount realised from assets was: Sundry Debtors ₹ 15,000, B/R ₹ 14,000, Stock ₹ 32,000, Plant & Machinery ₹ 28,000, realization expenses ₹ 5,000. Prepare Accounts to close firm's books.

Answer : Realisation A/c Loss ₹ 36,000.

11. A, B and C are equal partners in a firm. The Balance Sheet as on 31st March, 2012 was as under:-

Balance Sheet as on 31st March, 2012

Liabilities	Amount (₹)	Assets	Amount (₹)
Creditors	90,000	Cash	10,000
Capital		Debtors	1,10,000
A 10,000		Stock	60,000
B 60,000		Goodwill	20,000
C 40,000	1,10,000		
	2,00,000		**2,00,000**

The firm was dissolved on the above mentioned date. A becomes insolvent. ₹ 80,000 was realised from firm's debtors and ₹ 50,000 from stock. Creditors were paid ₹ 86,000 in full satisfaction. Realisation expenses amounted to ₹ 4,000. A could not bring anything for his deficiency. Prepare Realisation A/c, Partner's Capital Accounts and Cash Account.

Answer: Loss on Realisation ₹ 60,000.

12. Kapil, Bharat, Vivek and Bhavesh are equal partners. The firm was dissolved on 31st March, 2006 on which date Balance Sheet was as follows:-

Balance Sheet as on 31st March, 2006

Liabilities	Amount (₹)	Assets	Amount (₹)
Creditors	16,000	Debtors	50,000
Bank overdraft	4,000	Stock	30,000
Capital		Kapil Capital overdrawn	20,000
Vivek 60,000		Bharat Capital overdrawn	10,000
Bhavesh 30,000	90,000		
	1,10,000		**1,10,000**

Amount realised from debtors 20% less than book value and from stock ₹ 4,000. Doubtful debts were of ₹ 2,000 which was not mentioned in Balance Sheet was discharged for ₹ 1,600. A became insolvent and only ₹ 6,000 could be realised from him. Realisation expenses amounted to ₹ 4,800. The Garner V/S Murray Rule is applied. Prepare necessary ledger accounts to close the books of the firm.

Answer: Loss on Realisation ₹ 42,400.

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5

Company Accounts
Issue of Shares and Debentures

Learning objectives :

The study of this chapter would enable you to understand :

- Meaning and characteristics of a company
- Kinds of companies
- Classification of companies
- Share and kinds of shares.
- Difference between equity shares and preference shares
- Kinds of share capital of a company.
- Disclosure of share capital in the Balance Sheet of a company
- Accounting treatment of issue of shares at par and at premium
- Accounting treatment of issue of shares for cash and for consideration other than cash
- Under subscription and over subscription of shares
- Sweat equity shares, Right shares, Employee stock option plan and Escrow Account.
- Meaning, characteristics and types of debentures
- Difference between shares and debentures
- Accounting treatment of issue of debentures
- Disclosure of debentures in Balance Sheet
- Meaning and accounting treatment of issue of debentures for consideration other than cash
- Issue of debentures as collateral security and issue of debentures according to the conditions of redemption
- Meaning of Interest on Debentures and Accounting treatment
- Writing off discount or loss on issue of debentures

Issue of shares

Meaning and Definitions of company

A company or a joint stock company is an organization incorporated by a group of persons through the process of law to undertake a business. A company is an artificial person and is separate from its members. Share capital of a company is divided into units, a part of this is called share. The owners of share/shares of share capital of a company are known as members or shares holders.

''Company means a company incorporated under this Act or under any previous company law''- section 2 (20) of the Companies Act, 2013.

'' A company is an artificial person created by law having a separate entity with perpetual succession and a common seal. ''- Prof. Haney

Thus, we can say that a company is an artificial person, created by law and has a separate entity from its members and perpetual succession, It executed, its work through a common seal.

Characteristics of Company :

Following are the characteristics of a Company :

1. It is an entity incorporated under the Companies Act, 2013 or any previous company law.

2. It is an artificial and intangible person.

3. Entity of a company is separate from its members.

4. A company has perpetual succession.

5. In a company limited by shares, liability of its members is limited.

6. The shares of a company are freely transferable, except in case of private company.

7. The company is managed by a board of directors elected by the shareholders.

8. A company has a common seal.

Kinds of companies :

There are three types of companies, i.e. (1) One person company; (2) Private company, and (3) Public company.

(1) One person company :

''One person company means a company, which has only one person as a member.''- Section 2 (62) of Companies Act, 2013.

This type of company incorporated as private company.

One person company differs from sole proprietary firm because in a one person company, liability of the member is limited and it has separate entity, while in sole proprietary firm, liability of the proprietor is extends to the business assets and private assets.

(2) Private company :

According to section 2 (68) of Companies Act, 2013 private company means a company having a minimum paid up share capital of one lakh rupees or such higher paid up share capital as may be prescribed, and which by its articles-

(a) restricts the right to transfer its shares;

(b) rimits the number of its members to two hundred (except in case of one person company); and

(c) prohibits any invitation to the public to subscribe for any securities of the company.

A private company must have at least 2 members. The name of a private company ends with the words, ''Private Limited.''

(3) Public Company :

According to section 2 (71) of Companies Act, 2013, a public company is a company which:

(a) is not a private company;

(b) has a minimum paid up share capital of 5 lakh rupees or such higher amount as may be prescribed;

(c) seven or more members are required to form the company; and

(d) is a private company, being a subsidiary of a company which is not a private company.

This section provides that a private company, which is subsidiary of a public company shall be deemed to be public company.

There is no restriction on the maximum number of members in a public company. The name of a public company ends with the word 'Limited'.

Classification of Companies

(A) Kinds of companies on the basis of Liability:- Companies may be of two types (1) Company limited by shares (2) Company limited by guarantee.

(1) Company limited by shares- A company having the liability of its members limited by the memorandum to the amount, if any, unpaid on shares respectively held by them is termed as '' a company limited by shares.'' Section 2 (22) of the Companies Act, 2013.

For example, if Ram held 6000 shares of ₹10 each of X Ltd, on which he has paid ₹7 per share already, then his liability will be limited to remaining amount i.e. (₹ 3 x 6000) = ₹18,000.

(2) Company limited by Guarantee "It is a company having the liability of its members limited by the memorandum to such amount as the members may respectively undertake to contribute to the assets of the company in the event of it being wound up." as per sect 2 (21) of the Companies Act, 2013. In a company limited by guarantee, liability of its members is limited to the amount stated in the memorandum. Members can not be called to pay the amount exceeding what is mentioned in memorandum.

(B) Unlimited Company- According to section 2 (92) of the Companies Act, 2013- "A company not having any limit on the liability of its members is unlimited company." In such a company liability of its members is unlimited.

Share capital of a company

Share capital means the amount that a company can raise by issue of shares or has raised by issue of shares. The capital of a company is divided into units of small denominations (like- ₹ 1, ₹ 5, ₹ 10, or ₹ 100) and each such unit is called a share. For example, in a company the total capital of ₹ 100,00,000 is divided into 10,00,000 units of ₹ 10 each, then each unit of ₹ 10 is called a share of ₹ 10 each. In this case, the company is said to have 10,00,000 shares of ₹ 10 each and the nominal value of the share will be ₹ 10.

Kinds of shares

Under the provisions of section 43 of the Companies Act, 2013 the share capital of a company can be of two types- (1) Preference shares capital; and (2) Equity shares capital.

(1) Preference shares :

Preference shares are the shares which carry the following two preferential rights :

(i) Preferential right to receive dividend, which will be paid as a fixed amount or calculated at a fixed rate, it may be free of or subject to income tax, before payment to equity sharesholders; and

(ii) Preferential right to return of capital on winding up of the company before equity sharesholders. Holders of preference shares are called preference shareholders.

Classes of Preference shares :

On the basis of some special rights, preference shares may be the following types :

1. Non cumulative Preference shares:

Non cumulative preference shares are the preference shares, holders of which do not have the privilege to receive arrears of dividends in future. If a company did not pay dividend on its preference shares due to non profit or insufficient profit, then holders of these preference shares do not have the right to receive arrears of dividend.

2. Cumulative Preference shares :

Cumulative preference shares are those share holders who have a right to receive their arrears of dividend before payment of dividend to equity shareholders.

3. Participating Preference shares :

If the Articles of Association of a company provide that after payment of dividend to equity shareholders, the preference shareholders have a right to participate in surplus profits, these shares are called participating preference shares.

4. Non participating Preference shares :

The preference shares, holders of which do not carry the right to share in the surplus left after paying the dividend to equity shareholders are known as Non Participating Preference shares.

5. Convertible Preference shares :

The preference shares, holders of which provide a right that they can convert their shares into equity shares upto a certain date, are called convertible Preference shares.

6. Non Convertible Preference shares:

Non Convertible Preference shares are those preference shares, holders of which do not carry a right to convert their shares.

7. Redeemable Preference shares:

The Preference shares, which can be redeemed by the company on or earlier than a certain date, are called Redeemable Preference Shares.

8. Irredeemable Preference shares:

The Preference shares, which can be redeemed by the company, at the time of winding up are called Irredeemable Preference shares. The Company Act, 2013 does not permit issue of irredeemable preference shares. Redemption means to refund the amount.

(2) Equity shares :

According to Companies Act, 2013, equity/ordinary shares are those shares, which are not preference share. Equity shares are most commonly issued. Holders of these shares are real ownes of the company who have a right to maximum 'risks and rewards' of the company. In case of winding up of the company, the share capital is refunded after redemption of preference share capital.

Difference between Equity share and Preference share

S.No.	Basis	Equity Share	Preference Share
1.	Rate of dividend	Rate of dividend is decided by the board of directors and approved by shareholders.	Rate of dividend is pre decided and fixed.
2.	Right of dividend	Dividend is paid after payment of dividend to preference shares.	Dividend is paid before it is paid on equity shares.
3.	Arrear of dividend	If dividend is not declared during the year, it is not accumulated to be paid in the coming years.	Arrear of dividend is paid only on 'cumulative preference share'.
4.	Convertibility	Equity shares are non convertible.	If the terms of issue provide, preference shares may be converted into equity shares.
5.	Redemption	These are irredeemable during the life of a company. A company may buy back its equity shares.	Preference shares are redeemable after a specified period, during the life of a company.
6.	Voting Right	Equity shareholders have voting rights in all circumstances.	Generally preference shares have no voting rights.
7.	Refund of capital	Equity share capital is repaid after refund of preference share capital on winding up.	On winding up, preference share capital is repaid before refund of equity share capital.

Kinds of share capital of a company :

According to part-I of schedule III of the Companies Act, 2013, a company has to show, each class of share capital as (i) Authorised capital; (ii) Issued capital; and (iii) subscribed capital.

(i) Authorised capital : According to section 2(8) of the Companies Act 2013 “Authorised capital or nominal capital means such capital as is authorised by the memorandum of a company to be the maximum amount of share capital of the company”.

The maximum amount of capital stated in the memorandum of association of the company is known as Authorised Capital. Under this each class of shares i.e. Preference shares and Equity shares are stated separately.

(ii) Issued Capital : According to section 2 (50) of the **C**ompanies Act, 2013, “Issued capital means such capital as the company issues from time to time for subscription”.

Thus, Issued capital is a part of authorised capital which the company has issued for subscription. The nominal value of shares issued by the company to the public for cash or for consideration other than cash are included in Issued capital.

(iii) Subscribed capital : According to section 2 (86) of the **C**ompanies Act, 2013, "Subscribed capital means such part of the capital which is for the time being subscribed by the members of the company."

Thus, subscribed capital is a part of issued capital, which is subscribed.

(iv) Called up capital : According to section 2 (15) of the Companies Act, 2013. "Called up capital means such part of the capital, which has been called for payment".

Thus, the part of subscribed capital which has been called from shareholders by the Company.

(v) Paid up capital : According to section 2 (64) of the Companies Act, 2013, "Paid up share capital means such aggregate amount of mony credited as paid up as is equivalent to the amount received as paid up in respect of shares issued and also includes any amount credited as paid up in respect of shares of the company, but does not include any other amount received in respect of such shares, by whatever name called".

Example:

X Ltd. has authorised capital of ₹ 10,00,000 divided into 50,000 equity shares of ₹ 10 each and 50,000 9% preference shares of ₹ 10 each. The company invited applications for all these shares. Applications were received for all the preference shares and for 45000 equity shares by the company. All the amount regarding shares has been called and received by the company. Ram holds 5000 equity shares, has not paid final call at₹ 2 per share. Explain, how share capital will be shown in the Balance Sheet. Give notes to accounts also.

Solution :

Extract of Balance sheet of X Ltd. as at..........

Particulars	Notes No.	Amount of Current Year ₹	Amount of Previous Year ₹
EQUITY AND LIABILITIES :			
1. Shareholder's Fund :			
(a) Share Capital	1.	9,40,000	

Notes to Accounts :

	Particulars		Amount ₹
1.	Share Capital : Authorised capital: 50,000 Equity shares of ₹10 each		5,00,000
	50,000 9% Preference shares of ₹10 each		5,00,000
			10,00,000
Issued Capital :			**Amount ₹**
	50,000 Equity shares of ₹10 each		5,00,000
	50,000 9% Preference shares of ₹10 each		5,00,000
			10,00,000
Subscribed and paid up capital :			
	45000 Equity shares of ₹ 10 each		
	Fully called up	4,50,000	
	Less : Calls in arrear (5000 x ₹ 2) =	10,000	4,40,000
	50,000 9% Preference shares of ₹ 10 each		
	fully called and paid up		5,00,000
			9,40,000

Calls in Arrears : The amount called by the company in respect of share capital, which is not paid by the shareholders is called calls in arrears. This amount is snown in Notes to Accounts as deduction from called up capital under the head share capital. As per Table-F, a company can charge interest on calls in arrear @ 10% per annum.

Calls in Advance : A company, if its articles so provide, may accept the amount in respect of uncalled call money. This is called Calls in Advance. This amount is shown in the Balance Sheet under the sub head 'other current liabilities' of the head 'current liabilities'. As per table-F a company may allowe interest on Calls in Advance @ 12% per annum.

(vi) Reserve capital : Reserve capital means the portion of the uncalled capital to be reserved. This is decided by passing a special resolution. It can be called up in future in case of winding up.

Format of company's Balance sheet

As per part I of schedule III of the Companies Act, 2013 the prescribed format of Balance Sheet is given below :

Name of the company : ....

Balance sheet as at....................

Particulars	Notes No.	Amount of Current Year ₹	Amount of Previous Year ₹
I EQUITY AND LIABILITIES			
1. Shareholder's Funds			
(a) Share capital			
(b) Reserves and surplus			
(c) Money received against share warrants			
2 Share application money pending allotment			
3 Non current Liabilities			
(a) Long term borrowings			
(b) Differed Tax Liabilities (Net)			
(c) Other long term liabilities			
(d) Long term Provisions			
4. Current Liabilities			
(a) Short term borrowings			
(b) Trade payables			
(c) Other current Liabilities			
(d) Short term Provisions			
TOTAL			
II ASSETS			
1. Non current Assets			
(a) Fixed Assets			
(i) Tangible Assets			
(ii) Intangible Assets			
(iii) Capital work-in-Progress			
(iv) Intangible Assets under Development			
(b) Non current Investments			
(c) Deffered Tax Assets (Net)			

(d) Long- term Loans and Advances			
(e) Other Non current Assets			
2. Current Assets			
(a) Current Investments			
(b) Inventories			
(c) Trade Receivables			
(d) Cash and cash Equivalents			
(e) Short term Loans and Advances			
(f) Other current Assets			
TOTAL			

Issue of share :

A company can issue its shares (1) for consideration other than cash; or (2) for cash.

1. **Issue of shares for consideration other than cash :** When a company issues its shares as consideration for purchase of business, assets or services, it is called issue of shares for consideration other than cash.
2. **Issue of shares for cash :** When a company receives amount in cheque, demand draft or in other form, against issue of shares then it is called issue of shares for cash.

   On issue of shares amount may be payable in two ways :

   (i) In one lump sum on application : When shares are issued and payable fully in a single instalment on application.

   (ii) Shares payable in instatements : When amount on issue of shares is payable at different stages such as on application, on allotment and on one or more calls.

   A public company may issue shares on either of the following terms:-

   (A) Issue of shares of par : When share are issued at a price equal to face or nominal value, it is called issue of shares at par. For example, if a shares of ₹10 is issued at ₹10 by a company.

   (B) Issue of shares at Premium : When shares are issued at a higher price than the face value, it is called issue of shares at Premium. For example, if a share of ₹ 10 is issued at ₹ 15 each.

In past companies could issue shares at discount but now as per section-53 of the Companies Act, 2013 a company shall not issue shares at discount, except as provided in section 54 sweat equity shares may be issued at discount.

Procedure for issue of shares

A company has to follow the guidelines issued by Securities and Exchange Board of Indian (SEBI) and Companies Act, 2013 in respect of issue of shares. For the issue of shares the following procedure is being followed :

(1) Issue of Prospectus : For issue of shares a public company issues Prospectus. According to section 2 (70) of the Companies Act, 2013 'Prospectus' means, any notice, circular, advertisement or other document inviting offers from the public for the subscription, or purchase of any securities of a body corporate or say Prospectus is an invitation to the public for purchase of securities of the company. Generally, Prospectus contains history of the company, main objects, present business, knowledge about the project and management of the company etc.

(2) Application of shares : In response to the invitation given through the prospectus, the persons intending to subscribe to the shares of company, deposit their applications. On prescribed form along with the application money to the banker of the company. The amount deposited along with the application form is called 'Application money. As per section 39 (2) of the Companies Act the amount payable on application on every security shall not be less than 5% of the nominal amount of security or such other percentage or amount as may be specified by SEBI by making regulation on this behalf. As per this, amount payable on application on every security shall not be less than 25% of the issue price of the security.

(3) Allotment of shares : Allotment of shares means distribution of shares among the applicants. The Board of Directors makes the allotment of shares according to various provisions of the Act. An applicant becomes a shareholder after allotment of share(s) to him.

A public company can allot the shares after following the following provisions:

(i) Minimum subscription : As per section 39(1), no allotment of any securities of a company offered to the public for subscription shall be made, unless the amount stated in the prospectus as the minimum amount has been subscribed and the sum payable on application for the amount so stated has been paid to and received by the company by cheque or other instrument. As per SEBI Guidelines a company cannot allot the shares until it receives at least 90% subscription of the whole of the issue.

(ii) As per section 40(3), all monies received on application from the public for subscription to the securities shall be kept in a separate bank account in a scheduled bank.

(iii) Period to receive minimum subscription : According to section 39(3), if the stated minimum amount has not been subscribed and the sum payable on application is not received within a period of 30 days from the date of issue of the prospectus or such other period as may be specified by the Securities and Exchange Board of issue the amount received shall be returned within such time and manner as may be prescribed. The amount of shares issued for consideration other than cash will not be included for calculating minimum subscription.

(iv) Before issue of shares to the public, a company has to apply to one or more stock exchange to get permission to trade its shares. Name of such stock exchange(s) will be stated in the prospectus, where such application is filed.

(4) Dispatch of allotment letters : Letters of allotment are sent by the company secretary to those applicants to whom shares are allotted. The number of shares allotted are mentioned in the allotment letter and it is demanded to be paid a certain allotment amount on each share (If whole amount is not demanded with application) upto a specific date.

The applicants to whom no shares are allotted are issued letter of regret together with the refund of application money.

(5) Filing Allotment Return to Registrar : When the allotment of shares is over the company is required to submit a return of allotment to the Registrar of the Companies within 30 days from the date of allotment or extended date by the Registrar. A declaration is given along with allotment return by company secretary or a director that all legal formalities were followed by the company in this connection.

(6) Share certificate : Share certificate is a basic evidence of title of a member on shares specified in it. According to section 46(1) of the Companies Act, 2013, "A certificate, issued under the common seal of the company, specifying the shares held by any person, shall be prima facie evidence of the title of the person to such shares". In case of joint owners, delievery of share certificate to the owner named first is deemed to deliever to all owners.

Calls on shares : After the amount called with application and allotment, the balance of amount payable on shares if any, the company call**s** this amount in instatements. Each of such instatement is called 'call on shares'. Calls on shares are made according to the provisions laid down in the Articles of Association. If a company has not its Articles of Association or rules are not laid down in it, in that case the company adopts Table-F of the Companies Act, 2013, which are as follows :

(i) There shall be a gap of at least one month between two consecutive calls.

(ii) The amount called on a call shall not exceed 25% of the nominal value of shares.

(iii) Shareholders shall be informed at least 14 days before the last day of the call to pay the amount.

(iv) Amount of call on all shares of a category should be equal.

(v) If any shareholder fails to pay the amount of allotment and/or calls up to due dates, then the company may charge interest on arrear amount from due date of payment to the actual date of payment @ 10% per annum as per table-F.

(vi) Sometimes, a few shareholders pay the uncalled amount to the company along with allotment or call money, which is related with future calls. If it is specified in the Articles of Association of the company and the Board of Directors find suitable they can accept the amount of calls in advance. As per Table-F interest @ 12% per annum may be allowed on this amount received in advance for the period of advance.

Journal Entries for Issue of shares

1. In case of issue of shares for consideration other than cash.

The shares may be issued as against purchase of business, assets and services other than cash.

The journal entries to be made are as under:

(i) On purchase of Business or Assets

Individual Assets A/c Dr.

To vendor's A/c

(Sundary assets purchased)

(ii) On issue of shares to vendor as consideration

(a) If shares are issued at per

Vendors A/c Dr.

To Share capital A/c

(b) If shares are issued at premium

Vendor's A/c Dr.

To Share capital A/c

To Securities Premium A/c

Calculation of number of shares to be issued : = $\dfrac{\text{Purchase Consideration / Amount Payable}}{\text{Issue Price of a Share}}$

(iii) Issue of shares to Promoters as consideration for services rendered by them:

In corporation Expenses/Goodwill A/c Dr.

To Share Capital A/c

2. **Issue of shares for cash**

(a) If whole amount is payable on application in one lump sum

(i) If shares are issued at par on receipt of application money-

Bank A/c Dr.

To Share Application & Allotment A/c

on allotment of shares :

Share Application & Allotment A/c Dr.

To Share Capital A/c

(ii) If shares are issued at premium on receipt of application money

Bank A/c Dr.

To Share Application & Allotment A/c

on Allotment of shares :

Share Application & Allotment A/c Dr.

To Share Capital A/c

To Securities Premium A/c

(b) If shares payable in instatlments-

(i) On receipt of application money

Bank A/C Dr. (total amount received on application)

To Share Application A/c

(ii) on transfer of application money to share capital A/c

(in case of oversubscription, the entry will be passed with the amount of application money payable on number of shares issued and in other cases it will be passed with the actual application money received.)

Share Application A/c Dr.

To Share Capital A/c

(iii) Amount due on Allotment

1. In case of shares issued at par

Share Allotment A/c Dr.

To Share Capital A/c

2. In case of shares issued at premium

Share Allotment A/c Dr.

To Share Capital A/c

To Securities Premium A/c

(iv) In case of over subscription, on adjustment of excess application money on Allotment.

Share Application A/c Dr.

To Share Allotment A/c

(v) For refund of excess application money (The shareholders to whom refused to allot shares or/and amount received in excess on application)

Share Application A/c Dr.

To Bank A/c

(vi) For receiving of allotment money

Bank A/c Dr.

To Share Allotment A/c

(vii) On amount due on first call

Share First call A/c Dr. (Share allotted X call money per share)

To Share Capital A/c

(viii) For receiving first call money

Bank A/c Dr. (Actual amount received)

To Share First call A/c

(ix) On amount due of second/final call

Second/Final Call A/c Dr. (Amount of call on shares allotted)

To Share Capital A/c

(x) For receiving of second call money

Bank A/c Dr. (Actual amount received)

To Share Second/Final Call A/c

(xi) On receipt of calls-in-advance

Bank A/c Dr. (Amount of Calls-in-advance)

To Calls-in-Advance A/c

Note : General entry for Calls-in-advance can be made along with bank entry at the time of allotment for call money received, as the case made be.

On the adjustment of above calls-in-advance : At the time this call money is due, calls-in-advance is debited along with bank account at the time of amount of this call is paid by other shareholder's. Thus the account is automatically closed.

(xii) Interest on calls-in-advance : Interest on calls-in-advance is payable for the period from the date of receipt of calls-in-advance to the date of calls due at the rate prescribed by Board of Director or at the rate 12% per annum, if the rules of table F apply. If interest is paid in case the entry is -

Interest in Calls-in-advance A/c Dr.

To Bank A/c

At the end of the year this account will be transfered to Statement of Profit and Loss and closed.

(xiii) Calls-in-Arrear : Generally, a seperate entry for calls-in-arrear is not passed. If clearly mantioned in the question, the entry is -

(i) For Calls-in-Arrear

Calls-in-Arrear A/c Dr.

To Share Allotment or Share call A/c

Note : The above entry can be passed jointly with the entry of amount received on allotment or call.

(ii) On the receipt of Calls-in-Arrear

Bank A/c Dr.

To Calls-in-Arrear A/c

(xiv) Interest on Calls-in-Arrear : Interest can be charged on the amount of calls-in-arrear for the period from the date of due of call to the date of receipt of the arrear amount, at the rate of 10% per annum, according to table F or the lesser rate prescribed by Board of Directors. The entry is :

On receipt of Interest on Calls-in-Arrear

Bank A/c Dr.

To Interest on Calls-in-Arrear A/c

Note : At the end of the year interest account will be transferred to statement of Profit and Loss.

Illustration 1 :

XYZ Ltd. purchased a machine worth ₹ 6,00,000 from Bikaner Ltd., and issued equity shares of ₹ 10 each, fully paid in satisfaction of payment. Give the Journal entries in the books of XYZ Ltd., if shares are issued (i) at par, and (ii) at 20% premium.

Solution:

In the books of XYZ Ltd.
Journal Entries

Date	Particulars	L.F.	Amount ₹ Dr.	Amount ₹ Cr.
Date of Purchase	Machinery A/c Dr.		6,00,000	
	To Bikaner Ltd.			6,00,000
	(Being Machinery Purchased from Bikaner Ltd.)			
	(i) If Shares are issued at par :			
	Bikaner Ltd. Dr.		6,00,000	
	To Equity Share Capital A/c			6,00,000
	(Being 60,000 equity shares of ₹ 10 each fully paid allotted to Bikaner Ltd.)			

	(ii) If shares are issued at 20% premium Bikaner Ltd. Dr. To Equity Share Capital A/c To Securities Premium A/c (Being 50,000 equity shares of ₹ 10 each issued at a premium of 20%)		6,00,000	 5,00,000 1,00,000

Working Note : In case of shares issued at 20% premium, number of shares to be issued will be :

$$\frac{\text{Amount Payable}}{\text{Issue Price of Share}} = \frac{6,00,000}{₹\,10 + (20\% \text{ of } ₹\,10)} = \frac{6,00,000}{12} = 50,000 \text{ Shares}$$

Illustration 2 :

Gama Ltd., issued 2000 equity shares of ₹100 each at par to public on April 01, 2016. Whole amount was payable at the time of application. Applications were received for all the shares. Last date of application was 30 April, 2016. Allotment of the shares was made on 15 may, 2016. Give necessary journal entries in the books of Gama Ltd.

Solution :

In the books of Gama Ltd.
Journal Entries

Date	Particulars	L.F.	Amount ₹ Dr.	Amount ₹ Cr.
2016 April 30	Bank A/c Dr. To Equity Share Application & Allotment A/c (Being application money received for 2000 equity share @ ₹ 100 each)		2,00,000	 2,00,000
May 15	Equity Share Application & Allotment A/c Dr. To Equity Share Capital A/c (Being application money transferred to equity Share Capital Account)		2,00,000	 2,00,000

Illustration 3 :

Jaipur Ltd. issued 20,000 equity shares of ₹10 each at par, payable as ₹ 3 on application, ₹ 4 on allotment and the balance on call. All the shares were taken up and all the payments were duly received. Give necessary journal entries.

Solution :

In the books of Jaipur Ltd.
Journal Entries

Date	Particulars	L.F.	Amount ₹ Dr.	Amount ₹ Cr.
	Bank A/c Dr. To Equity Share Application A/c (Being application money received for 20,000 equity share @ ₹ 3 each)		60,000	 60,000
	Equity Share Application A/c Dr. To Equity Share Capital A/c (Being application money transferred to equity Share Capital Account)		60,000	 60,000

	Equity Share Allotment A/c Dr.		80,000	
	To Equity Share Capital A/c			80,000
	(Being allotment money due on 20,000 equity shares @ ₹ 4 each)			
	Bank A/c Dr.		80,000	
	To Equity Share Allotment A/c			80,000
	(Being allotment money received)			
	Equity Share First & Final Call A/c Dr.		60,000	
	To Equity Share Capital A/c			60,000
	(Being first & Final call money due on 20,000 equity shares @ ₹ 3 each)			
	Bank A/c Dr.		60,000	
	To Equity Share First & Final Call A/c			60,000
	(Being Equity Share First & Final Call money received)			

Issue of Shares at Premium

When shares are issued at a price higher than the face value, it is said issue of shares at premium. For example, a share with face value of ₹ 10 is issued at ₹ 14. Here it is said (14 - 10) = ₹ 4 per share as premium.

Premium on share may be collected either with application, allotment or call. But in absense of information, it is assumed that premium is collected with the allotment. Securities premium is capital profit to the company. It is shown as 'Securities Premium Reserve' under the head 'Shareholder Funds' and sub-head 'Reserves and Surplus' in the 'Equity and Liabilities' part of the Balance Sheet.

Utilization of Securities Premium :

According to section 52(1) of the Companies Act, 2013, the amount of premium received on issue of securities shall be credited to 'Securities Premium Account'. As per section 52(2) of the Companies Act, 2013, the amount of securities premium may be used for the following purpose :-

(i) To issue fully paid bonus shares to the members of the company;

(ii) To write off preliminary expenses of the company;

(iii) To write of the expenses of, or the commission paid on issue of share or debentures or discount allowed on the issue of debentures of the company.

(iv) To provide for premium payable on the redemption of any redeemable preference shares or any debentures of the company.

(v) For the purchase of its own shares (buy-back).

Under subscription of shares

When a company receives less applications than the number of shares offered, it is called less or under subscription. In this case, considering the provision of section 39(1) regarding minimum subscription, allotment of shares is made equal to number of shares applied by all the applicants.

Over subscription of shares

Shares are said to be over subscribed when the number of shares applied for is more than the shares offered for the issue. No company can allot more shares than the shares offered for the issue. A company can allott shares by any of the three alternatives, in the case of over subscription:

(i) Some of the applicants may be allotted shares in full and the applicants to whom no shares are allotted, the application money is refunded.

(ii) All applicants are allotted shares on pro rata basis.

(iii) Some applicants are allotted in full, and some applicants are allotted shares on pro rata basis.

Pro rata Allotment

Pro rata allotment means the ratio of total number of shares allotted to a class of applicants to the total number of shares applied for by that class of applicants. For Example, R Ltd., invites applications for 10,000 shares. Total application received were for 15000 shares. It is decided to allot shares on pro rata basis among all applicants. It means 10,000 shares will be allotted to applicants of 15000 shares. Ratio of application and allotment will be 15000 : 10 000 or 3 : 2. Each applicant of 3 shares shall be allotted 2 shares.

Surplus Application Money

In case of pro rata allotment, excess application money received along with application may be utilized by a listed company, after getting permission of recognized stock exchange, for adjustment of allotment and or call money due.

A non listed company may utilize excess application money towards adjustment of allotment or call money. If it is not clear in the question, excess application money be utilized in adjustment of allotment money due and the surplus money should be refunded to the shareholders.

Illustration 4 :

Sarthak Ltd., issued 10,000 equity shares of ₹10 each to the public. Applications were received for 15000 shares. Amount was payable as follows : on Application ₹ 3, on Allotment ₹ 3, on first call ₹ 2 and on second and final call ₹ 2.

Applicants of 14000 shares were made pro rata allotment and amount of remaining applicants was refunded. Excess application money was utilized to adjust towards allotment money. All the amounts were received in time. Give journal entries in the books of the company.

Solution :

In the books of Sarthak Ltd.
Journal Entries

Date	Particulars	L.F.	Amount ₹ Dr.	Amount ₹ Cr.
	Bank A/c Dr. To Equity Share Application A/c (Being application money received for 15,000 share @ ₹ 3 each)		45,000	 45,000
	Equity Share Application A/c Dr. To Equity Share Capital A/c (Being application money for 10,000 shares transferred to equity Share Capital Account)		30,000	 30,000
	Equity Share Application A/c Dr. To Bank A/c (Being excess application money on 1000 shares refunded)		3,000	 3,000
	Equity Share Allotment A/c Dr. To Equity Share Capital A/c (Being allotment money due on 10,000 shares @ ₹ 3 each)		30,000	 30,000

	Bank A/c Dr. Equity Share Application A/c Dr. To Equity Share Allotment A/c (Being excess application money transferred to share allotment and balance of allotment money received)		18,000 12,000	 30,000
	Equity Share First Call A/c Dr. To Equity Share Capital A/c (Being first call money due @ ₹ 2 each)		20,000	 20,000
	Bank A/c Dr. To Equity Share First Call A/c (Being first call money received)		20,000	 20,000
	Equity Share Second & Final Call A/c Dr. To Equity Share Capital A/c (Being second and final call money due @ ₹ 2 each)		20,000	 20,000
	Bank A/c Dr. To Equity Share Second & Final Call A/c (Being second and final call money received)		20,000	 20,000

Analytical Table

Category	Share Applied	Share Allotted	Amount received on Application ₹	Application Money Transferred ₹	Excess Application Money ₹	Allotment Money due @ ₹ 3	Net Amount Received ₹	First Call @ ₹ 2	Second Call @ ₹ 2
Pro-rata	14000	10000	42,000	30,000	12,000	30,000	18,000	20,000	20,000
Refund	1000	--	3000	returned	--	--	--	--	--

Illustration 5 :

The capital of Sunshine Ltd., was divided into 5000 shares of ₹100 each. The Company issued 2000 shares of ₹100 each at a premium of ₹10 per share, payable as follows: on Application ₹30; on Allotment (including premium) ₹40; on first call ₹20 and balance as and when required. Ram was holds 30 shares has paid all the amount along with first call. Rahim was holds 20 shares failed to pay first call. Pass journal entries in the books of the Company and show these items in the Balance sheet. Assumed that all shares were subscribed.

Solution :

In the books of Sunshine Ltd.
Journal Entries

Date	Particulars	L.F.	Amount ₹ Dr.	Amount ₹ Cr.
	Bank A/c Dr. To Share Application A/c (Being application money received on 2000 shares @ ₹ 30 each)		60,000	 60,000

	Share Application A/c Dr.		60,000	
	To Share Capital A/c			60,000
	(Being application money transferred to Share Capital Account)			
	Share Allotment A/c Dr.		80,000	
	To Share Capital A/c			60,000
	To Securities Premium A/c			20,000
	(Being allotment money due @ ₹ 40 each including ₹ 10 as premium)			
	Bank A/c Dr.		80,000	
	To Share Allotment A/c			80,000
	(Being allotment money received)			
	Share First Call A/c Dr.		40,000	
	To Share Capital A/c			40,000
	(Being share first call money due @ ₹ 20 each)			
	Bank A/c Dr.		40,200	
	To Share First Call A/c			39,600
	To Calls in Advance A/c			600
	(Being first call money received on 1980 shares @ ₹ 20 each and ₹ 20 each on 30 shares received in advance)			

First Call Amount received = (2000 - 20) x ₹ 20 = ₹ 39,600

Calls in Advance on 30 shares of Ram @ ₹ 20 each = ₹ 600

Name of the Company : Sunshine Ltd.

Balance Sheet as at ....

Particulars	Notes No.	Amount of Current Year ₹	Amount of Previous Year ₹
I. EQUITY AND LIABILITIES :			
1. Shareholder's Fund :			
(a) Share Capital	1	1,59,600	
(b) Reserves and Surplus	2	20,000	
4. Current Liabilities			
(c) Other Current Liabilities	3	600	
		1,80,200	
II ASSETS			
2. Current Assets			
(d) Cash and Cash Equivalents		1,80,200	
		1,80,200	

Notes to Accounts :

Particulars	Amount ₹
1. Share Capital :	
Authorised Capital :	
5000 Equity Shares of ₹ 100 each	5,00,000

Issued, Subscribed and paid up capital :		
2000 Equity Shares of ₹ 100 each and		
₹ 80 per share called up	1,60,000	
Less : Calls in Arrear	400	1,59,600
2. Reserves and Surplus :		
Securities Premium		20,000
3. Other Current Liabilities :		
Calls-in-Advance		600

Illustration 6 :

K.S. Ltd. issued 150,000 equity shares of ₹ 100 each at a premium of ₹ 25 per shares on 15th April 2016, payable as follows : on Application ₹ 50; on Allotment ₹ 50 (including Premium) and on first and final call ₹ 25. Applications were received for 140,000 shares by the Company. On 01 June, 2016 the directors made full allotment to the applicants. The last date for allotment money was 30th June, 2016. First and Final call was made on 1st October, 2016 and payable upto 20th October 2016. All the amounts were received on due dates except in the following cases :

- Mahesh holds 1000 shares failed to pay allotment money on due dates, but paid this amount with the first and final call.
- Rama holds 800 shares, has paid first and final call money along with allotment money.

Pass necessary Journal entries. Interest was charged and paid according to table F.

Solution :

Journal of K.S. Ltd.

Date	Particulars	L.F.	Amount ₹ Dr.	Amount ₹ Cr.
2016	Bank A/c Dr.		70,00,000	
April 15	To Equity Share Application A/c			70,00,000
	(Being application money received for 1,40,000 shares @ ₹ 50 each)			
June 1	Equity Share Application A/c Dr.		70,00,000	
	To Equity Share Capital A/c			70,00,000
	(Being application money transferred to Equity Share Capital Account)			
June 1	Equity Share Allotment A/c Dr.		70,00,000	
	To Equity Share Capital A/c			35,00,000
	To Securities Premium A/c			35,00,000
	(Being Equity Share allotment money due on 140000 shares @ ₹ 50 each including ₹ 25 premium)			
June 30	Bank A/c Dr.		69,70,000	
	To Euqity Share Allotment A/c			69,50,000
	To Calls in Advance A/c			20,000
	(Being allotment money received on 139000 shares and calls in advance received on 800 shares @ ₹ 25 each)			

Oct. 1	Equity Share First & Final Call A/c Dr. To Equity Share Capital A/c (Being first & final call due on 140000 shares @ ₹ 25 each)		35,00,000	35,00,000
Oct. 1	Interest on Call in Advance A/c Dr. To Bank A/c (Interest on calls in Advance paid for 3 months)		600	600
Oct. 20	Bank A/c Dr. Calls in Advance A/c Dr. To Equity Share First & Final Call A/c To Equity Share Allotment A/c (Being first and final call money and arrear of allotment money received and calls in advance adjusted)		35,30,000 20,000	35,00,000 50,000
Oct. 20	Bank A/c Dr. To Interest on Calls in Arrear A/c (Being interest on calls in arrear received)		1,534	1,534

Working Notes :

1. Calculation of interest on Calls in Advance (30th June to 01st October)

$$= 20{,}000 \times \frac{12}{100} \times \frac{3}{12} = ₹\,600$$

2. Calculation of Interest on Calls in Arrear (30th June to 20th October)

$$= 50{,}000 \times \frac{112}{365} \times \frac{10}{100} = ₹\,1{,}534$$

Illustration 7 :

Chintu and company Ltd., invited applications to issue 1000 equity shares of 10 each. Amount was payable on application, on allotment, on first call and on second and final call is equal. Applications were received for 2000 shares out of which applications for 200 shares were incomplete and rejected and amount of them was refunded. Mintu, who applied for 300 shares was allotted 100 shares only. He paid application money only. Chintu, who applied for 500 shares was allotted 100 shares. Remaining applicants were allotted shares on pro-rata basis. Application money can be utilized till final call. Give journal entries in journal proper and cash book. (RBSE-2001)

Solution:

Entries are to be given in cash book and journal proper. So all cash transactions will be recorded in cash book and remaining entries will be recorded in journal proper.

Journal of Chintu & Co. Ltd.

Date	Particulars	L.F.	Amount ₹ Dr.	Amount ₹ Cr.
Date of Allotment	Euqity Share Application A/c Dr. To Equity Share Capital A/c (Being application money for 1000 shares transferred		2,500	2,500

Date of Allotment	Euqity Share Allotment A/c Dr.		2,500	
	To Equity Share Capital A/c			2,500
	(Being allotment money due on 1000 shares @ ₹ 2.5)			
Date of Transfer	Euqity Share Application A/c Dr.		1,750	
	To Equity Share Allotment A/c			1000
	To Calls in Advance A/c			750
	(Being application money adjusted and balance transferred to calls in advance)			
Date of Call	Equity Share First Call A/c Dr.		2,500	
	To Equity Share Capital A/c			2,500
	(Being first call money due on 1000 shares @ ₹ 2.5 each)			
Date of Adjustment	Calls in Advance A/c Dr.		500	
	To Equity Share First Call A/c			500
	(Being calls in advance adjusted against first call)			
Date of Call	Equity Share Second & Final Call A/c Dr.		2,500	
	To Equity Share Capital A/c			2,500
	(Being second call money due)			
Date of Adjustment	Calls in Advance A/c Dr.		250	
	To Equity Share Second & Final Call A/c			250
	(Being calls in advance adjusted for 100 shares for second call)			

Dr. **Cash Book** Cr.

Date	Particulars	J.F.	Amount ₹	Date	Particulars	J.F.	Amount ₹
Date of application	To Equity Share Application		5000	Date of refund	By Equity Share Application		750
Date of Receipt	To Equity Share Allotment		1500	Date of Close	By Balance C/d		9750
Date of F.C. Receipt	To Equity Share First Call		2000				
Date of Second call Receipt	To Equity Share Second Call		2000				
			10,500				**10,500**

Working Notes :

(i) Number of applications of pro-rata class = 2000 - 200 (reject) - 500 - 300 = 1000 shares.

(ii) Number of shares allotted to pro-rata class = 1000 - 100 - 100 = 800 shares.

(iii) Amount of application money to be refunded to a shareholder, who has applied for 500 shares but to whom 100 shares were allotted : (500 x 2.5) – (100 x 100) = ₹1025 - ₹1000 = ₹250 Refunded

(iv) Total application money to be refunded = [200 (rejected) x 2.5] + ₹250 = ₹750/-

Illustration 8 :

The following particulars are related to issue of equity shares of RS Ltd. The amount per share was payable as: on application ₹3, on Allotment ₹4, and balance on call. Applications were received for 300,000 equity shares. Category wise allotment was made as follows :

(A) Applicants of 5000 shares were allotted 3000 shares.

(B) Applicants of 107,000 shares were allotted 50,000 shares.

(C) Applicants of 188 000 shares were allotted 47 000 shares.

The excess money received on application was applied towards allotment and call and any balance left was refunded. Give necessary journal entries in the books of RS Ltd. and prepare cash book.

Solution:

Table showing adjustment of application money

Category	Shares Applied	Shares Allotted	Application Money Received @ ₹3 per Share	Adjusted towards			Refund
				Shares Capital @ ₹ 3 per Share	Shares Allotment @ ₹ 4 per Share	Share Call @ ₹ 3 per Share (calls in Advance)	
A	5000	3000	15000	9000	6000	--	--
B	107000	50000	321000	150000	171000	--	--
C	188000	47000	564000	141000	188000	141000	94000
TOTAL	**300000**	**100000**	**900000**	**300000**	**365000**	**141000**	**94000**

Amount received on allotment = (100000 x ₹ 4) - ₹ 365000 = ₹ 35000

Amount received on Call = (100000 x ₹ 3) - 141000 = ₹ 159000

Journal of RS Ltd.

Date	Particulars	L.F.	Amount ₹ Dr.	Amount ₹ Cr.
Date of Allotment	Equity Share Application A/c Dr.		3,00,000	
	To Equity Share Capital A/c			3,00,000
	(Being application money on 100000 shares @ ₹ 3 each transferred to equity share capital A/c)			
Date of Allotment	Equity Share Allotment A/c Dr.		4,00,000	
	To Equity Share Capital A/c			4,00,000
	(Being allotment money due @ ₹ 4 per share)			
Date of Allotment	Equity Share Application A/c Dr.		5,06,000	
	To Equity Share Allotment A/c			3,65,000
	To Calls in Advance A/c			1,41,000
	(Being application money transferred to allotment A/c and to calls in advance A/c)			
Date of First & Final Call	Equity Share First & Final Call A/c Dr.		3,00,000	
	To Equity Share Capital A/c			3,00,000
	(Being Equity Share first & final call due @ ₹ 3 per share)			

Date of First & Final Call	Call in Advance A/c Dr. To Equity Share First & Final Call A/c (Being calls in advance adjusted on equity share first & final call)		1,41,000	1,41000

Dr. **Cash Book (Bank Column)** Cr.

Date	Particulars	J.F.	Amount ₹	Date	Particulars	J.F.	Amount ₹
Date of Receipt	To Equity Share Application A/c		9,00,000	Date of refund	By Equity Share Application A/c		94,000
Date of Allotment Receipt	To Equity Share Allotment A/c		35,000	Date of end	By Balance c/d		10,00,000
Date of Call Receipt	To Equity Share First & Final Call A/c		1,59,000				
			10,94,000				**10,94,000**

Issue of Sweat Equity

Section 2(88) of the Companies Act, 2013 defines the term 'Sweat equity shares' which means such equity shares as are issued by a company to its directors or employees at discount or for consideration other than cash, for providing their know-how or making available rights in the nature of intellectual property rights or value additions, by whatever name called.

Section 54 of the Companies Act, 2013 provides the conditions where a company may issue sweat equity shares of a class of shares already issued, if the following conditions are fulfilled:-

(a) The issue is authorized by a special resolution passed by the company;

(b) The resolution specifies the number of shares, the current market price, consideration, if any, and the class or classes of directors or employees to whom such equity shares are to be issued;

(c) Not less than one year has, at the date of such issue, elapsed since the date on which the company had commenced business; and

(d) Where the equity share of the company are listed on a recognized stock exchange, the sweat equity shares are issued in accordance with the regulations made by the SEBI in this behalf.

Right shares

Sometimes, a company may desire to expand its activities or it may stand in need for more financial resources. In such a situation, the company may issue a part or the whole of its unissued share capital and can arrange financial resources required.

According to section 62 of the Companies Act, 2013 where at any time, a company having a share capital proposes to increase its subscribed capital by the issue of further shares, such shares shall be offered:

To persons who, at the date of the offer, are holders of equity shares of the company in proportion to the paid up share capital on those shares by sending a letter of offer subject to the following conditions, namely-

(i) The offer shall be made by notice specifying the number of shares offered and limiting a time not being less than fifteen days and not exceeding thirty days from the date of the offer within which the offer, if not accepted, shall be deemed to have been declined;

(ii) Unless the Articles of the company otherwise provide, the offer aforesaid shall be deemed to include a right exercisable by the person concerned to renounce the shares offered to him or any of them in favour of any other person; and the notice referred to in clause (i) shall contain a statement of this right;

(iii) After the expiry of this time specified in the notice aforesaid, or on receipt of earlier intimation from the person to whom such notice is given that he declines to accept the shares offered, the Board of Directors may dispose off them in such manner, which is not dis-advantageous to the shareholders and the company.

Journal entries for the issue of right shares are passed in the same way as in the case of initial issue of shares.

Employee Stock Option Plan-ESOP

Employee Stock Option Plan (ESOP) means a scheme under which the company grants option to its directors officers and employee directors to apply for shares of the company, at a price lower than the market price. The employees may or may not exercise the option to subscribe it on their choice. The purpose of offering the shares to employees, directors and officers of the company is to inspire their potential and sense of belongingness. Shares issued under this plan can't be sold by the concerning person in open market within a period of one year from the date of allotment.

As per section 2(37) of the Companies Act, 2013 "employee stock option" means the option given to the directors, officers or employees of a company or of its holding company or subsidiary company or companies, if any, which gives such directors, officers, or employees, the benefit or right to purchase, or to subscribe for, the shares of the company, at a future date, at a pre-determined price.

Escrow Account

Escrow means money and securities deposited to a third party as guarantee under a contract until pre-determined conditions have been fulfilled. As per SEBI guidelines, the company, who is acquirer of its shares under the scheme of buy back is required to open a bank account named Escrow Account. Following deposits are included in it:

(i) Cash deposited with any scheduled commercial bank.

(ii) Bank guarantee issued in favour of any scheduled commercial bank.

(iii) Deposit of frequently traded and freely transferable equity shares and securities with appropriate margin, or

(iv) Combination of above items (i) to (iii).

If the consideration payable under the open offer of buy back is not exceeding ₹100 crores, then the amount to be deposited in Escrow Account will be 25% of the consideration and if the consideration payable is exceeding ₹100 crores then 10% of the balance consideration to be deposited in this account.

The money or securities deposited in Escrow Account can be released with prior permission of SEBI after completion of buy back. In case of non-compliance this can be forfeited.

Issue of Debentures

Debenture is a written acknowledgement of debt issued by a company. Debenture is a document issued under the common seal of a company having terms of repayment of principal and payment of interest at a fixed rate on a fixed date (generally half yearly).

"A debenture is a document given by a company as evidence of a debt to the holder usually arising out of a loan and most commonly secured by a charge"- Top ham

According to section 2(30) of the Companies Act, 2013, "Debenture includes debenture stock, bonds and any other instrument of the company evidencing a debt, whether constituting a charge on the assets of the company or not."

Features of Debentures

1. Debenture is a document or certificate, which acknowledges the debt of a company.
2. Debenture has mode and period of repayment of principal.
3. Rate of interest on the debenture is fixed and interest is paid at regular interval.
4. Debenture holders do not have voting right.
5. It is considered long term borrowings of the company.
6. Debenture may be secured by charge on the assets of the company.

Kinds of Debentures

A company may issue different kinds of debentures. On the basis of the characteristics, these can be classified as under:-

1. **On the basis of security**

(a) **Secured Debentures :** The Debentures which are secured by fixed or floating charge on the assets of the company, are called secured debentures. If the company fails to repay these debentures, the lender can recover his amount by sale of these assets.

(b) **Unsecured Debentures :** The debentures which are not secured by any charge on the assets of the company, are called unsecured or naked debentures.

2. **On the basis of Redemption**

(a) **Redeemable Debentures :** The debentures which are repayable by the company after a specified period of time are called redeemable debentures.

(b) **Irredeemable Debentures :** The debentures which are nor repayable during the lifetime of the company hence repaid only on the winding up of the company, are called irredeemable debentures.

3. **On the basis of Registration**

(a) **Registered Debentures:** The debentures which are registered in the records of the company in the name of its holder. Principal and interest is paid to the registered debenture holders by the company. The transfer of these debentures can be made transfer deed.

(b) **Bearer Debentures:** The debentures which are not registered in the record of the company in the name of its holder. The transfer of these debentures can be made by mere delivery. On the date of interest, payment is made to the holder who produces coupons attached to the debentures.

4. **On the basis of Repayment Priority**

(a) **First Debentures:** The debentures which are repaid first before other debentures, are called first debentures.

(b) **Second Debentures:** The debentures which are repaid or redeemed after the redemption of first debentures are called second debentures.

5. **On the basis of Interest Rate**

(a) **Specific coupon rate Debentures :** The debentures, on which rate of interest is fixed and specified at the time of issue. This interest rate is also called coupon rate. For example, 14% Debentures or 12% Debentures, here 14% or 12% is rate of interest.

(b) **Zero coupon rate Debentures :** These debentures are issued without any rate of interest. To compensate the investors these debentures are issued at heavy discount. The difference between nominal value and issue price of debenture is called total interest for the period of debenture.

6. **On the basis of Conversion**

(a) **Convertible Debentures :** The debentures which can be converted either in shares or in other securities after a specific period are called convertible debentures. If a part of debenture amount is convertible into equity shares, it is known as partly convertible Debentures-(PCD) and if the whole amount of debenture is convertible into equity shares, it is known as Fully Convertible Debenture-(FCD).

(b) **Non Convertible Debentures:** The debentures which are not be convertible into equity shares or other securities are called non convertible debentures.

Following are the differences between shares and debentures :

Difference between Shares and Debentures

S. No.	Basis of Distinction	Share	Debenture
1.	Ownership	Share holders are owners of the Company	Debenture holders are lenders of the Company

2.	Part or Acknowledgement	Share is a part of Capital	Debenture is an acknowledgement of debt
3.	Period	Long term fixed capital is acquired by the issue of shares	Medium and long term funds are acquired by the issue of debentures
4.	Dividend and Interest	Dividend is paid on shares if company earns profit.	Interest is always paid whether company earns profit or not
5.	Repayment	Normally, the amount of shares is not repaid during the life time of the company	The debenture is paid or redeemed after a specific period
6.	Issue at discount	Shares can not be issued at discount	There is no restrictions on the issue of debentures at discount
7.	Security	Shares are not secured	Debentures may or may not be secured by the charge on the assets of the company.
8.	Conversion	Shares can not be converted into any other security	Debentures can be converted into shares
9.	Voting Right	Shareholders have right to attend the annual general meeting and to vote in it.	Debenture holders do not have any voting right.
10.	Risk	There is greater risk on the investment in shares.	In debentures the risk is lesser than shares.

Issue of Debentures

A company can raise its long term loan capital by the issue of debentures. Debentures are normally issued in the same way as shares are issued. The company gives invitation to the public to subscribe to debentures of the company by the issue of prospectus. The intending lender applies in prescribed form along with application money. The company may call for amount of debentures either in lump sum or in instalements like : application, allotment, first call and second call.

Debentures can be issued at par, at premium or at discount. Provision of section 52 and 53 of the Companies Act, 2013 will not be applicable on issue of debentures, or say there is no restriction on issue of debentures at discount. The Companies Act, 2013 has not specified the maximum rate of discount that can be allowed on issue of debentures. So, a company can issue debentures at a price decide by it. Discount on issue of debentures is debited to an account named 'Discount on issue of debentures'. The discount on issue of debenture should be written off from any capital profits or statement of profit and loss during the life time of debentures.

Accounting Entries on the Issue of Debentures

(A) When the amount of Debentures is received in Lump Sum

(i) Debentures are issued at par

* On receipt of Application money

Bank A/c Dr. (Nominal value of Debentures)

To Debenture Application and Allotment A/c

<u>(Being application money received for debentures)</u>

* On transfer of Application money

Debenture Application and Allotment A/c Dr.

To .... % Debenture A/c

<u>(Being transfer of application money to debentures A/c)</u>

(ii) Debentures are issued at premium

Bank A/c Dr. (Amount received)

To Debenture Application and Allotment A/c

(Being application money received for debentures)

Debenture Application and Allotment A/c Dr. (Amount received)

To .... % Debenture A/c (Nominal value)

To securities Premium A/c (Amount of premium)

(Being application money transferred to debenture A/c and securities premium A/c)

(iii) Debentures are issued at discount

(When debentures are issued at a price less than the nominal value)

Bank A/c Dr. (Amount Received)

To Debenture Application and Allotment A/c

(Being application money received)

Debenture Application and Allotment A/c Dr. (Amount received)

Discount on issue of debentures A/c Dr. (Amount of discount)

To .... % Debenture A/c (Nominal Value)

(Being application money transferred to Debenture A/c)

(B) When the amount of Debentures **is** received in Instalments

(in this case accounting for issue of debentures is the same as the accounting for issue of shares)

(i) On receipt of Application money

Bank A/c Dr . (Amount received)

To Debenture Application A/c

(Being Debentures application money received)

(ii) On transfer of Application money to Debenture A/c

Debenture Application A/c Dr.

To .... % Debentures A/c

(Being Debentures application money transferred)

(iii) On making allotment money due

(a) In case of issue of debenture at par

Debenture Allotment A/c Dr. (Amount of call)

To .... % Debenture A/c

(b) In case of issue of debenture at premium

Debenture Allotment A/c Dr. (Amount of call)

To .... % Debenture A/c

To securities Premium A/c (Amount of Premium)

(c) In case of issue of debenture at discount

Debenture Allotment A/c Dr. (Net Amount of call)

Discount on issue of debenture A/c Dr. (Amount of Discount)

To .... % Debenture A/c

(iv) On received of allotment money

Bank A/c Dr.

To Debenture Allotment A/c

(Being Debenture allotment money received)

(v) On making call money due

Debenture call A/c Dr. (Amount of call)

To ....% Debenture A/c

(Being debenture call money due on... debentures @ ₹.......... each)

(vi) On receipt of call money

Bank A/c Dr.

To debenture Call A/c

(Being debenture call money received)

Illustration 9 :

Arvind Ltd. issued 5000 8% Debenture of ₹100 each to public. Applications were received for all these debentures. All the amount of debentures was payable on application. Give journal entries in the books of company, if debentures are issued: (i) At par (ii) At 10% Premium (iii) At 5% Discount.

Solution :

Journal of Arvind Ltd.

Date	Particulars	L.F.	Amount ₹ Dr.	Amount ₹ Cr.
(i)	If Debentures are issued at par :			
	Bank A/c Dr.		5,00,000	
	To Debentures Application A/c			5,00,000
	(Being application money received for 5000 debentures @ ₹ 100 each)			
	Debentures Application A/c Dr.		5,00,000	
	To 8% Debenture A/c			5,00,000
	(Being debenture application money transferred to debentures A/c)			
(ii)	If Debentures are issued at 10% premium :			
	Bank A/c Dr.		5,50,000	
	To Debentures Application A/c			5,50,000
	(Being application money received for 5000 debentures @ ₹ 110 each including premium)			
	Debentures Application A/c Dr.		5,50,000	
	To 8% Debenture A/c			5,00,000
	To Securities Premium A/c			50,000
	(Being application money transferred)			
(iii)	If Debentures are issued it 5% discount :			
	Bank A/c Dr.		4,75,000	
	To Debentures Application A/c			4,75,000
	(Being application money received for 5000 debentures @ ₹ 95 each net of discount)			

	Debentures Application A/c Dr. Discount on issue of Debentures A/c Dr. To 8% Debenture A/c (Being debentures application money transferred)		4,75,000 25,000	 5,00,000

In case of over subscription of Debentures :

If number of applications received towards subscription of debentures are more than debentures to be issued, it is called oversubscription. A company cannot allot more debenture than what is at issue. In such a situation, disposal of excess amount received on oversubscription may be made in any of the following ways:

1. By rejecting excess applications, and refund its amount.
2. Total number of debentures to be issued, allotted on Pro-rata basis among the total applicants and adjust the excess amount of application money towards allotment.
3. A combination of the above two alternatives (1) and (2).

Disclosure of Debentures in Balance sheet :

Debentures and discount on issue of Debentures will be shown in the Balance Sheet as follows :

Debentures: Debentures are shown in the Equity and Liabilities part of the Balance Sheet under the head 'Long Term Liabilities' and sub head 'Long Term Borrowings'. If Debentures are due for redemption within 12 months from date of Balance Sheet then these debentures are shown in the Balance Sheet under the head 'Current Liabilities' and Sub head 'Other current liabilities'.

Discount on issue of Debentures : The amount of Discount on issue of Debentures, which is unamortized on the date of Balance Sheet, is shown in the Assets part of the Balance Sheet under the head 'Non Current Assets' and Sub-head 'Other Non Current Assets'. If a part of unamortized Discount on issue of Debentures is to be written off within 12 months from the date of Balance Sheet, it is shown under the head 'Current Assets' and sub-head 'Other Current Assets'.

Illustration 10 :

Gagan Ltd. issued 5000 8% Debentures of ₹ 100 each at 20% Premium. Amount was payable as follows: 25% on Application, 50% (including Premium) on Allotment, and balance on first and final call. Applications were received for 6500 debentures, out to which 500 applications have been cancelled and remaining applicants were allotted on Pro-rata basis. Give Journal entries in the books of the company and show the items in the Balance Sheet.

Solution :

Journal of Gagan Ltd.

Date	Particulars	L.F.	Amount ₹ Dr.	Amount ₹ Cr.
	Bank A/c Dr. To Debentures Application A/c (Being application money received for 6500 debenture @ ₹ 30 each)		1,95,000	 1,95,000
	Debentures Application A/c Dr. To 8% Debenture A/c To Bank A/c (Being debenture application money transferred and application money for 500 debentures refunded)		1,65,000	 1,50,000 15,000

	Debentures Allotment A/c Dr. To 8% Debenture A/c To Securities Premium A/c (Being allotment money due @ ₹ 60 each out of which ₹ 20 for premium)		3,00,000	 2,00,000 1,00,000
	Debentures Application A/c Dr. Bank A/c Dr. To Debentures Allotment A/c (Being excess application money adjusted and balance of allotment money received in cash)		30,000 2,70,000	 3,00,000
	Debentures first and final call A/c Dr. To 8% Debentures A/c (Being first and final call money due)		1,50,000	 1,50,000
	Bank A/c Dr. To Debenture first and final call A/c (Being debentures first and final call money received)		1,50,000	 1,50,000

Name of the Company : Gagan Ltd.
Balance Sheet as at ....

Particulars	Notes No.	Amount of Current Year ₹	Amount of Previous Year ₹
I. EQUITY AND LIABILITIES :			
1. Shareholder's Fund :			
(b) Reserves and Surplus	1	1,00,000	
3. Non Current Liabilities			
(a) Long Term borrowings	2	5,00,000	
		6,00,000	
II ASSETS			
2. Current Assets			
(d) Cash and Cash Equivalents		6,00,000	
		6,00,000	

Notes to Accounts :

1. Reserves and Surplus		
Securities Premium	1,00,000	
2. Long Term Borrowings		
8% Debentures	5,00,000	

Working Notes :

1. Issue Price = 100 + 20% of 100 = ₹ 120/-
2. Amount due on Application 25% of ₹120 = ₹30/-
3. Amount due on Allotment 50% of 120 = ₹60, out of which ₹20 is for premium and balance (60-20) = ₹40 for Debentures.

4. Amount of Application money adjusted on allotment.

Amount Received 6500 x ₹30	=	₹ 1,95,000
Less : Transferred to Debenture a/c (5000 x 30)	=	₹ 1,50,000
		₹ 45,000
Less: Refund (500 x ₹ 30/-)		₹ 15,000
Excess Application money to be adjusted on allotment		₹ 30,000

Illustration 11 :

Shakti Ltd. issued 10,000 7% Debentures of 100 each at 5% discount, on which ₹ 30 on Application, ₹ 45 on Allotment and balance amount on first and final call, was payable. Give necessary journal entries for the issue of debentures and show the relevant items in the Balance Sheet. Assuming applications were received for all the debentures.

Solution:

Journal of Shakti Ltd.

Date	Particulars	L.F.	Amount ₹ Dr.	Amount ₹ Cr.
	Bank A/c Dr.		3,00,000	
	To Debentures Application A/c			3,00,000
	(Being application money received for 10,000 debenture @ ₹ 30 each)			
	Debentures Application A/c Dr.		3,00,000	
	To 7% Debentures A/c			3,00,000
	(Being debenture application money transferred)			
	Debenture Allotment A/c Dr.		4,50,000	
	Discount on issue of Debenture A/c Dr.		50,000	
	To 7% Debentures A/c			5,00,000
	(Being debenture allotment money due @ ₹ 45 each and discount @ ₹ 5 each debited to discount on issue of debenture A/c)			
	Bank A/c Dr.		4,50,000	
	To Debenture Allotment A/c			4,50,000
	(Being debenture allotment money received)			
	Debentures first and final call A/c Dr.		2,00,000	
	To 7% Debentures A/c			2,00,000
	(Being the first and final call money due on 10,000 debentures)			
	Bank A/c Dr.		2,00,000	
	To Debentures first and final call A/c			2,00,000
	(Being the amount received on first and final call)			

Balance Sheet of Shakti Ltd. As at ....

Particulars	Notes No.	Amount of Current Year ₹	Amount of Previous Year ₹
I. EQUITY AND LIABILITIES :			
3. Non Current Liabilities			

	(a) Long Term borrowings (7% Debentures)		10,00,000
			10,00,000
II	**ASSETS :**		
1.	Non Current Assets		
	(e) Other Non Current Assets (Discount on issue of Debentures)		50,000
2.	Current Assets		
	(d) Cash and Cash Equivalents		9,50,000
			10,00,000

Working Notes :

Amount of first call = 100 – [30 + 45 + 5 (Discount)] = ₹ 20 per debenture

Issue of Debentures for consideration other than cash

When debentures are allotted by a company, to the vendor of assets or vendor of business, to discharge the purchase consideration, this is called issue of debentures for consideration other than cash. Sometimes the consideration can be discharged partly in cash and partly in shares or debentures. If payment is made by the issue of debentures, the accounting entries will be as follows :

(i) On Purchase of Assets :

Assets A/c	Dr.	(Value of Assets)
To Vendors A/c		
(Being purchase of assets)		

(ii) On purchase on business

Assets A/c	Dr.	(Value of Assets individually)
To Liabilities A/c		(Value of liabilities individually)
To Vendors A/c		(Purchase Consideration)
(Being assets and liabilities purchased)		

(iii) On payment made to vendor by issue of Debentures

Vendors A/c	Dr.
To Debentures A/C	
(Being debentures issued to vendor at par)	

Note:

1. If debentures are issued to vendors at premium, the amount of premium will be credited to 'Securities Premium A/c' and the amount of discount will be debited to 'Discount on Issue of Debentures A/c'. If debentures are issued at discount.
2. Calculation of the nominal value of debentures to be issued as purchase consideration:

$$\text{Nominal value of Debentures} = \frac{\text{Amount Payable to vendor Purchase Consideration}}{\text{Issue Price of a debenture}} \text{ X Number of Debenture}$$

Illustration 12 :

Ashoka Ltd. bought a running business from Anuj on 01st April, 2016 with the assets of ₹10, 00,000 and liabilities of ₹120,000. The purchase consideration was paid to Anuj on 01st May, 2016 by the issue of 6% Debentures of ₹100 each. Give necessary journal entries in the books of Ashoka Ltd. If debentures are issued: (A) At par (B) At 10% Premium: (C) At 12% Discount.

Solution :

Journal of Ashoka Ltd.

Date	Particulars		L.F.	Amount ₹ Dr.	Amount ₹ Cr.
2016	Assets A/c	Dr.		10,00,000	
April, 1	To Liabilities A/c				1,20,000
	To Anuj's A/c				8,80,000
	(Being assets and liabilities of Anuj purchased for ₹ 8,80,000)				
(A)	If Debentures are issued at par				
May, 1	Anuj's A/c	Dr.		8,80,000	
	To 6% Debentures A/c				8,80,000
	(Being 8800 6% debentures of @ ₹ 100 each issued at par to Anuj)				
(B)	If Debentures are issued 10% Premium				
May, 1	Anuj's A/c	Dr.		8,80,000	
	To 6% Debentures A/c				8,00,000
	To Securities Premium A/c				80,000
	(Being 8000 6% debentures of @ ₹ 100 each issued to Anuj at a premium of 10%)				
(C)	If Debentures are issued at 12% discount				
May, 1	Anuj's A/c	Dr.		8,80,000	
	Discount on issue of Debentures A/c	Dr.		1,20,000	
	To 6% Debentures A/c				10,00,000
	(Being 10,000 6% debentures of @ ₹ 100 each issued to Anuj at 12% discount)				

Working Notes :

1. Payment to vendor/Anju to be made equal to net assets i.e., Purchase consideration = Assets Taken over – Liabilities taken over ₹ 10, 00,000 – ₹ 120, 000 = ₹ 8, 80, 000.
2. Nominal value of debentures to be issued :

   (a) At par = $8,80,000 \times \frac{100}{100}$ = ₹ 8, 80, 000

   (b) At 10% premium = $8,80,000 \times \frac{100}{110}$ = ₹ 8, 00, 000

   (c) At 12% Discount = $8,80,000 \times \frac{100}{100-(12\% \text{ of } 100)}$ = ₹ 10, 00, 000

Issue of Debentures as collateral security

Collateral or additional security means the security given to lender in addition to the prime security. When a company deposits its debentures, as additional security to secure loan taken from the bank in addition to the principal security, are called debentures as collateral security.

If the bank fails to recover its loan from the principal security, in such a case the bank can sale the debentures holds as collateral security and recover its loan. If the company repays its loan to the bank on due time, the bank has to return these debentures to the company.

Interest is paid by the company only on loan taken from bank. Interest is not paid on debentures issued as collateral security by the company.

Accounting treatment of issue of debentures as collateral security: Debentures issued as collateral security can be treated in accounts in any of the following two ways:

(1) **First Method :** In this method, no journal entry is passed in the books of accounts at the time of issue of debentures as collateral security. Journal entry is passed only for the loan taken from bank or financial institution. The loan would be shown in the 'Equity and Liabilities' part of the Balance Sheet under the head 'Non Current Liabilities' and sub-head 'Long Term Borrowings'. At the same place debentures issued as collateral security will be shown in brackets below the bank loan.

(2) **Second Method :** In this method, accounting entry is passed in the books for issue of debentures as collateral security.

(i) For issue of Debentures as collateral security :

Debentures suspense A/c Dr. (Nominal value of Debentures)

To ....% Debentures A/c

(Being issue of debentures as collateral security)

(ii) On Repayment of Loan :

........% Debentures A/c Dr.

To Debentures suspense A/c

(Being debentures issued as collateral security withdrawn)

Debentures A/c will be shown in the 'Equity and Liabilities' part of the Balance Sheet under the head 'Non Current Liabilities' and sub-head 'Long Term Borrowings' and 'Debenture suspense A/C' is shown as a deduction from the debentures until the loan repaid.

Illustration 13:

SP Ltd. has taken a loan of ₹ 400, 000 from bank of Baroda and put 6% debentures of ₹ 500, 000 to the bank as collateral security. Give journal entries in the books of SP Ltd. and prepare Balance Sheet, If :

(i) Entry has not been passed for issue of debentures as collateral as security.

(ii) Entry has been passed for the issue.

Solution :

(i) If entry has not been passed for the issue of debentures as callateral security :

Journal Entries

Date	Particulars	L.F.	Amount ₹ Dr.	Amount ₹ Cr.
	Bank A/c Dr. To Bank Loan A/c (Being loan taken from Bank of Baroda on the collateral security of 6% debentures of ₹ 5,00,000)		4,00,000	 4,00,000

Balance Sheet of S. P. Ltd.
As at ....

Particulars	Notes No.	Amount of Current Year ₹	Amount of Previous Year ₹
I. EQUITY AND LIABILITIES :			
3. Non Current Liabilities			
(a) Long Term borrowings			

Bank Loan (6% Debentures of ₹ 5,00,000 deposited as collateral Security)		4,00,000	
		4,00,000	
II ASSETS			
2. Current Assets			
(d) Cash and Cash Equivalents		4,00,000	
		4,00,000	

(ii) If the entry has been passed for the issue of debentures

Date	Particulars	L.F.	Amount ₹ Dr.	Amount ₹ Cr.
	Bank A/c Dr.		4,00,000	
	To Bank Loan A/c			4,00,000
	(Being loan taken from Bank of Baroda)			
	Debenture Suspense A/c Dr.		5,00,000	
	To 6% Debentures A/c			5,00,000
	(Being 6% Debentures of ₹ 5,00,000 issued as collateral security)			

Balance Sheet of S. P. Ltd.
As at ....

Particulars	Notes No.	Amount of Current Year ₹	Amount of Previous Year ₹
I. EQUITY AND LIABILITIES :			
3. Non Current Liabilities			
(a) Long Term borrowings	1	4,00,000	
		4,00,000	
II ASSETS			
2. Current Assets			
(d) Cash and Cash Equivalents		4,00,000	
		4,00,000	

Notes to Accounts			
1. Long Term Borrowings			
6% Debentures	5,00,000	Nil	
Less : Debenture Suspense A/c	5,00,000	4,00,000	
Bank Loan (Secured by 6% Debentures)			
		4,00,000	

Illustration 14 :

Adarsh Ltd. issued 7% Debentures of ₹ 400, 000 as follows:

(i) 7% Debentures of ₹ 200, 000 at 10% discount for cash.

(ii) A fixed assets worth ₹ 90, 000 purchased from Ramesh. For its consideration 7% Debentures with a nominal value of ₹100, 000 issued.

(iii) A loan of ₹ 50,000 taken from bank and 7% Debentures of ₹ 100,000 deposited with the bank as collateral security. Give journal entries in the books of Adarsh Ltd. and draw the Balance Sheet.

Solution :

Journal of Adarsh Ltd.

Date	Particulars	L.F.	Amount ₹ Dr.	Amount ₹ Cr.
	Bank A/c Dr.		1,80,000	
	Discount on Issue of Debentures A/c Dr.		20,000	
	To 7% Debentures A/c			2,00,000
	(Being 7% debentures issued for cash at 10% discount)			
	Fixed Assets A/c Dr.		90,000	
	To Ramesh's A/c			90,000
	(Being fixed assets purchased from Ramesh)			
	Ramesh's A/c Dr.		90,000	
	Discount on Issue of Debentures A/c Dr.		10,000	
	To 7% Debentures A/c			1,00,000
	(Being 7% debentures of ₹ 1,00,000 issued to Ramesh at 10% discount)			
	Bank A/c Dr.		50,000	
	To Bank Loan A/c			50,000
	(Being loan taken from bank)			
	Debenture Suspense A/c Dr.		1,00,000	
	To 7% Debentures A/c			1,00,000
	(Being 7% Debentures issued as collateral security)			

Balance Sheet of Adarsh Ltd.
As at ....

Particulars	Notes No.	Amount of Current Year ₹	Amount of Previous Year ₹
I. EQUITY AND LIABILITIES :			
Non Current Liabilities			
Long Term borrowings	1	3,50,000	
		3,50,000	
II. ASSETS			
Non Current Assets			
Fixed Assets		90,000	
Other Non Current Assets	2	30,000	
Current Assets			
Cash and Cash Equivalents		2,30,000	
		3,50,000	

Notes to Accounts :

1. Long Term Borrowings

On % Debentures 4,00,000

Less : Debenture suspense	1,00,000	3,00,000
Bank Loan		50,000
		3,50,000

2. Other Non Current Assets

Discount on issue of Debentres	30,000
(20,000 + 10,000)	30,000

Issue of Debentures According to the conditions of Redemption

A company can issue its debentures at par, at premium or at discount and these debentures may be redeemed either at par or at premium. If the debentures are redeemed at premium, it means the company will pay to debenture holders excess amount than nominal value. This excess amount or premium on redemption of debentures is capital loss to the company. So this amount should be provided for in the books. For this purpose 'Loss on Issue of Debentures A/c' will be debited and 'Premium on Redemption of Debentures A/c' will be credited at the time of issue of such debentures.

The accounting entries for issue of such debentures in different circumstances will be as follows:

(1) When debentures are issued at par and redeemable at par

Illustration 15 :

Radhey Ltd. issued 5000 6% Debentures of ₹100 each at par, which are repayable at par after 5 years. Give journal entries for the issue of debentures in the books of Radhey Ltd.

Solution:

Journal of Radhey Ltd.

Date	Particulars	L.F.	Amount ₹ Dr.	Amount ₹ Cr.
	Bank A/c Dr.		5,00,000	
	To Debentures Application A/c			5,00,000
	(Being application money received fo 5000 debentures @ ₹ 100 each)			
	Debentures Application A/c Dr.		5,00,000	
	To 6% Debentures A/c			6,00,000
	(Being application money transferred to 6% debentures A/c)			

(2) When Debentures are issued at discount and repayable at par.

Illustration 16 :

Shyam Ltd. issued 5000 7% Debentures of ₹100 each at a discount of 2%, which are repayable at par. Give journal entries for the issue of debentures in the books of Shyam Ltd.

Solution:

Journal of Shyam Ltd.

Date	Particulars	L.F.	Amount ₹ Dr.	Amount ₹ Cr.
	Bank A/c Dr.		4,90,000	
	To Debentures Application A/c			4,90,000
	(Being application money received fo 5000 debentures @ ₹ 98 each)			

	Debentures Application A/c Dr. Discount on Issue of Debentures A/c Dr. To 7% Debentures A/c (Being application money transferred to 7% debentures A/c)		4,90,000 10,000	 5,00,000

(3) When Debentures are issued at premium and repayable at par.

Illustration 17:

Green Ltd. issued 2000 10% Debentures of ₹100 each at ₹105 per debenture, which are repayable at par. Give journal entries for the issue in the books of Green Ltd.

Solution :

Journal of Green Ltd.

Date	Particulars	L.F.	Amount ₹ Dr.	Amount ₹ Cr.
	Bank A/c Dr. To Debentures Application A/c (Being application money received for 2000 debentures @ ₹ 105 each)		2,10,000	 2,10,000
	Debentures Application A/c Dr. To 10% Debentures A/c To Securities Premium A/c (Being application money transferred to 10% debentures A/c and securities premium A/c)		2,10,000	 2,00,000 10,000

(4) When Debentures are issued at par and repayable at premium.

Illustration 18 :

Sita Ltd. issued 5000 6% Debentures of ₹100 each at par, which are repayable at 5% premium. Give journal entries for the issue in the books of Sita Ltd.

Solution :

Journal of Sita Ltd.

Date	Particulars	L.F.	Amount ₹ Dr.	Amount ₹ Cr.
	Bank A/c Dr. To Debentures Application A/c (Being application money received fo 5000 debentures @ ₹ 100 each)		5,00,000	 5,00,000
	Debentures Application A/c Dr. Loss on issue of Debentures A/c Dr. To 6% Debentures A/c To Premium on Redimption of Debentures A/c (Being application money transferred to and provided for premium on redemption of debentures)		5,00,000 25,000	 5,00,000 25,000

(5) When Debentures are issued at discount and repayable at Premium.

Illustration 19 :

Ram Ltd. issued 4000 7% Debentures of ₹100 each at a discount of 2%, which are repayable at 4% Premium. Give journal entries for the issue in the books of Ram Ltd.

Solution :

Journal of Ram Ltd.

Date	Particulars	L.F.	Amount ₹ Dr.	Amount ₹ Cr.
	Bank A/c Dr.		3,92,000	
	To Debentures Application A/c			3,92,000
	(Being application money received fo 4000 debentures @ ₹ 98 each)			
	Debentures Application A/c Dr.		3,92,000	
	Discount on Issue of Debentures A/c Dr.		8,000	
	Loss on issue of Debentures A/c Dr.		16,000	
	To 7% Debentures A/c			4,00,000
	To Premium on Redimption of Debentures A/c			16,000
	(Being debentures application money transferred and provided for premium payable on redemption of debentures)			

(6) When Debentures are issued at premium and repayable at premium.

Illustration 20 :

White Ltd. issued 10,000 8% Debentures of ₹100 each at ₹104 per debenture, which are repayable at 5% premium. Give journal entries for the issue of debentures in the books of White Ltd.

Solution :

Journal of White Ltd.

Date	Particulars	L.F.	Amount ₹ Dr.	Amount ₹ Cr.
	Bank A/c Dr.		10,40,000	
	To Debentures Application A/c			10,40,000
	(Being application money received for 10,000 debentures @ ₹ 104 each)			
	Debentures Application A/c Dr.		10,40,000	
	Loss on issue of Debentures A/c Dr.		50,000	
	To 8% Debentures A/c			10,00,000
	To Securities Premium A/c			40,000
	To Premium on Redimption of Debentures A/c			50,000
	(Being debentures application money transferred to 8% debentures A/c and securities premium A/c and provided for premium payable on redemption)			

Disclosure in the Balance Sheet

If the debentures are repayable after 12 months from the date of Balance Sheet then 'Premium on Redemption of Debenture Account' (Personal account) is shown in the 'Equity and Liabilities' part of the Balance Sheet under the head 'Non Current Liabilities' and sub-head 'Other Long Term Liabilities'. If the debentures are repayable within 12 months from the date of Balance Sheet then debentures are shown under the head 'Current Liabilities' and sub-head 'Other Current Liabilities' as 'Current maturities of long term debt'.

In such a case, 'Premium on Redemption of Debentures' is shown in the 'Equity and Liabilities' part of the Balance Sheet under the head 'Current Liabilities' and sub head 'Other Current Liabilities'.

The part of 'Loss on Issue of Debentures', which is to be amortised after 12 months from the date of Balance Sheet is shown in the 'Assets' part of the Balance Sheet under the head 'Non Current Assets' and sub-head 'Other Non Current Assets' and the part of 'Loss on Issue of Debentures', which is to be amortised within 12 months from the date of Balance Sheet is shown under the head 'Current Assets' and sub head 'other current assets'.

Interest of Debentures

Interest on Debentures is paid on quarterly, half yearly or annual basis, as per terms of the issue, at pre decided rate to registered owner of the debentures, by the company. Following are important points to be noted regarding payment of debenture interest :-

1. Interest on Debentures is a charge against the profits of a company and interest is payable whether the company has earned profits or not.
2. Interest is calculated on the face value of debentures at a fixed rate.
3. Interest is not payable on the debentures deposited as collateral security.
4. At the end of the year, balance of 'debentures interest A/c' is transferred to statement of Profit & Loss and will be shown under the head 'finance cost'.
5. At the end of the year outstanding debenture interest whether it is 'Interest Accrued and Due' and 'Interest Accrued but not due' is shown in 'Equity and Liabilities' part of the Balance sheet under the head 'Current Liabilities' and sub-head 'Other current Liabilities'.

Entries for Interest on Debentures and Deduction of tax at source

As per Income Tax Act, if interest payable to a debenture holder exceeds a certain limit, the payment of interest is to be made after deducting tax at source at the rate prescribed (At present it is 10%). It is compulsory to deposit the amount of tax deducted by the company to Central Government by the 7th of next month. This will be deposited in the name of the recipient of interest, for which the company issues TDS Certificate.

Entries for payment of interest will be as follows :

1. When interest is due

Debenture Interest A/c	Dr.	(Gross Amount of Interest)
To Debenture holders A/c		(Net Amount of Interest)
To Tax Deducted at source A/c		(Amount of Tax Deducted)
(Being debenture interest due and income tax deducted)		

Note : If the information regarding TDS is not available, in that case the whole amount of interest is to be credited to debenture holders account and paid.

2. When interest is paid

Debenture holders A/c	Dr.	(Amount paid)
To Bank A/c		
(Being amount of debenture interest paid)		

3. When tax deposited with Government

Tax deducted at source A/c	Dr.	(Amount of Tax)
To Bank A/c		
(Being payment of Income tax made)		

4. At the end, transfer of debenture Interest

Statement of Profit & Loss A/c Dr. (Total Amount of debenture Interest)

To Debenture Interest A/c

(Being debenture interest account is transferred)

Illustration 21 :

Chandani Ltd. issued 5000 14% Debentures of ₹100 each on 01st April, 2016. The issue was fully subscribed. As per terms of the issue, debenture interest is payable on half yearly basis on 30th September and on 31st March each year, after deducting income tax at the rate 10%. Give journal entries for the payment of interest and transfer to statement of Profit & Loss.

Solution:

Journal of Chandani Ltd.

Date	Particulars		L.F.	Amount ₹ Dr.	Amount ₹ Cr.
2016	Debenture Interest A/c	Dr.		35,000	
Sept. 30	To Debenture holders A/c				31,500
	To Tax Deducted at Source A/c				3,500
	(Being debenture interest due and income tax deducted at source)				
Sept. 30	Debentures holders A/c	Dr.		31,500	
	Tax Deducted at Source A/c	Dr.		3,500	
	To Bank A/c				35,000
	(Being debenture interest and income tax paid)				
2017	Debenture Interest A/c	Dr.		35,000	
Mar. 31	To Debenture holders A/c				31,500
	To Tax Deducted at Source A/c				3,500
	(Being debenture interest due and income tax deducted at source)				
Mar. 31	Debenture holders A/c	Dr.		31,500	
	Tax Deducted at Source A/c			3,500	
	To Bank A/c				35,000
	(Being debenture interest and income tax paid)				
Mar. 31	Statement of Profit & Loss A/c	Dr.		70,000	
	To Debenture Interest A/c				70,000
	(Being amount of debenture interest transferred to P & L)				

Writing off Discount/Loss on Issue of Debentures

'Discount on issue debentures' and 'Loss on issue of debentures' are capital losses. These can be written off from securities premium, capital Profits or Capital reserves or Statement of Profit and Loss. The time period to write off these losses is not prescribed in Companies Act, but it is prudent to write off these losses during the life of debentures. Entries for writing off these losses will be as follows:

1. On writing off loss from capital Profits

Securities Premium A/c Dr.

Capital Reserves A/c Dr.

Capital Profits A/c Dr.

To Discount on issue of Debentures A/c

To Loss on Issue of Debentures A/c

(Being loss/discount on issue of debentures written off)

2. On writing off loss from statement of Profit & Loss

Statement of Profit & Loss A/c Dr.

To Discount on issue of Debentures A/c

To Loss on issue of Debentures A/c

(Being discount/loss on issue of debentures written off)

There are two methods of writing off the losses from statement of Profit and Loss.

(1) Equal Installment Method : When debentures are redeemed at the expiry of a period, in that case, total loss is spread over the life of debentures equally and written off.

$$\text{Yearly amount to be written off} = \frac{\text{Total Loss}}{\text{Period of Debentures}}$$

For example : Ramesh Ltd. issued Debentures of ₹1, 00, 000 at a discount of 10% which are repayable at the end of 5th year. In this case (10% of 1, 00, 000) ÷ 5 = ₹ 2000 will be written off in each year from the statement of Profit & Loss.

2. Ratio of outstanding Debentures Method : When debentures are redeemed in installments, the loss is written off in the proportion of debentures outstanding (used) during the year.

Illustration 22 :

Sachin Ltd. issued 1000 6% Debentures of ₹ 100 each at 5% discount on 01st April, 2013, which are repayable at 5% premium. Prepare 'Loss on Issue of Debentures A/c' in the books of the company. If:

(a) debentures are repayable at the end of 5th year; or

(b) debentures are repayable in each year with equal amounts during five years.

Solution:

Total loss on issue of debentures is ₹ 5, 000 (Discount) + ₹ 5000 (Premium on Redemption) = ₹ 10, 000. It is to be written off.

(a) When debentures are repayable at the end of 5th year, during these five years amount of debentures is used equally. So total loss will be distributed equally in 5 years. Loss of (10,000 ÷ 5) = ₹ 2000 will be written off in each year.

Dr. **Loss on Issue of Debentures A/c** Cr.

Date	Particulars	Amount ₹	Date	Particulars	Amount ₹
2013 April, 01	To 6% Debentures A/c	5,000	2014 Mar. 31	By Statement of Profit & Loss	2,000
	To Premium on Redemption of Debentures A/c	5,000		By Balance c/d	8,000
		10,000			**10,000**
2014 April, 01	To Balance b/d	8,000	2015 Mar. 31	By Statement of Profit & Loss	2,000
				By Balance c/d	6,000
		8,000			**8,000**
2015 April, 01	To Balance b/d	6,000	2016 Mar. 31	By Statement of Profit & Loss	2,000
				By Balance c/d	4,000
		6,000			**6,000**
2016	To Balance b/d	4,000	2017	By Statement of Profit & Loss	2,000

April, 01			Mar. 31	By Balance c/d	2,000
		4,000			**4,000**
2017	To Balance b/d	2,000	2018	By Statement of Profit & Loss	2,000
April, 01			Mar. 31		
		2,000			**2,000**

(b) When debentures are repayable in equal installments in each year, during five years :

Amount to be redeemed in each year ₹1,00,000 ÷ 5 = ₹ 20, 000. The ratio of benefit received from debentures or say outstanding amount of debentures at the end of each year before redemption will be ₹ 1,00,000, ₹80,000, ₹ 60,000, ₹40,000 and ₹20,000 respectively. Total loss on issue of debentures will be divided in the ratio 5 : 4 : 3 : 2 : 1 and written off from statement of Profit & Loss accordingly.

2013-14 = $\frac{5}{15}$ x 10,000 = ₹ 3,333; 2014-15 = $\frac{4}{15}$ x 10,000 = ₹ 2,667;

2015-16 = $\frac{3}{15}$ x 10,000 = ₹ 2,000; 2016-17 = $\frac{2}{15}$ x 10,000 = ₹ 1,333;

2017-18 = $\frac{1}{15}$ x 10,000 = ₹ 667;

Dr. **Loss on Issue of Debentures A/c** Cr.

Date	Particulars	Amount ₹	Date	Particulars	Amount ₹
2013	To 6% Debentures A/c	5,000	2014	By Statement of Profit & Loss	3,333
April, 01	To Premium on Redemption		Mar. 31	By Balance c/d	6,667
	of Debentures A/c	5,000			
		10,000			**10,000**
2014	To Balance b/d	6,667	2015	By Statement of Profit & Loss	2,667
April, 01			Mar. 31	By Balance c/d	4,000
		6,667			**6,667**
2015	To Balance b/d	4,000	2016	By Statement of Profit & Loss	2,000
April, 01			Mar. 31	By Balance c/d	2,000
		4,000			**4,000**
2016	To Balance b/d	2,000	2017	By Statement of Profit & Loss	1,333
April, 01			Mar. 31	By Balance c/d	667
		2,000			**2,000**
2017	To Balance b/d	667	2018	By Statement of Profit & Loss	667
April, 01			Mar. 31		
		667			**667**

Illustration 23 :

Saurabh Ltd. issued 3000 7% Debentures of ₹ 100 each at 12% discount on 01st April, 2013, which are repayable ₹ 1, 00, 000 per year from 31st March 2016. Prepare 'Discount on issue of Debentures A/c' for first five years.

Solution :

Total discount is = 12% of ₹ 3 00 000 = ₹ 36, 000/-. Since, debentures are repayable ₹ 100, 000 per year from 31st March, 2016, amount of discount to be written off in the proportion of benefit received out of the amount of debentures.

Statement Showing Amount of Discount to be Written off

Year ended on	Nominal value of Debenture Outstanding before redemption	Ratio	Amount of Discount to be written off = 36,000 x column (3) / 12	
(1)	(2)	(3)	(4)	
31.03.2014	₹ 3,00,000	3	36,000 x 3/12 =	₹ 9,000
31.03.2015	₹ 3,00,000	3	36,000 x 3/12 =	₹ 9,000
31.03.2016	₹ 3,00,000	3	36,000 x 3/12 =	₹ 9,000
31.03.2017	₹ 2,00,000	2	36,000 x 2/12 =	₹ 6,000
31.03.2018	₹ 1,00,000	1	36,000 x 1/12 =	₹ 3,000
		12		**₹ 36,000**

Dr. **Discount on Issue of Debentres A/c** Cr.

Date	Particulars	Amount ₹	Date	Particulars	Amount ₹
2013 April, 01	To 7% Debentures A/c	36,000	2014 Mar. 31	By Statement of Profit & Loss By Balance c/d	9,000 27,000
		36,000			**36,000**
2014 April, 01	To Balance b/d	27,000	2015 Mar. 31	By Statement of Profit & Loss By Balance c/d	9,000 18,000
		27,000			**27,000**
2015 April, 01	To Balance b/d	18,000	2016 Mar. 31	By Statement of Profit & Loss By Balance c/d	9,000 9,000
		18,000			**18,000**
2016 April, 01	To Balance b/d	9,000	2017 Mar. 31	By Statement of Profit & Loss By Balance c/d	6,000 3,000
		9,000			**9,000**
2017 April, 01	To Balance b/d	3,000	2018 Mar. 31	By Statement of Profit & Loss	3,000
		3,000			**3,000**

Summary

Company : A company is an organisation incorporated by a group of persons through the process of law to undertake a business. Its members are called shareholders.

Types of companies : There are three types of companies: (1) One person company; (2) Private Company; and (3) Public Company.

Types of Companies on the basis of liability : (1) Company limited by shares; (2) Company limited by guarantee; and (3) Unlimited Company.

Kinds of shares : Shares of a company can be two types- (1) Preference shares, and (2) Equity shares

Classes of Preference Shares : Preference shares may be of many types, such as :

(1) Non cumulative Preference Shares (2) Cumulative Preference Shares

(3) Participating Preference Shares (4) Non Participating Preference Shares

(5) Convertible Preference Shares (6) Non Convertible Preference Shares

(7) Redeemable Preference Shares (8) Irredeemable Preference Shares

Class of share Capital : To present in Balance Sheet, share Capital is-

(1) Authorised Capital (2) Issued Capital

(3) Subscribed Capital (4) Paid up Capital

Reserve Capital : Reserve Capital means the portion of the uncalled Capital to be reserved. It is decide by passing a special resolution. It can be called up in future and in case of winding up.

Issue of Shares : A Company may issue shares in following ways- (1) For consideration other than cash (2) For cash

Issue price of shares : (1) Issue at par (2) Issue at Premium.

Payment on Shares : On issue of shares for cash a company can call the amount on shares as follows:

(1) In one lump sum on application (2) In installments (Like Application, Allotment and on Calls)

Procedure for issue of shares :

(1) Issue of Prospectus (2) Application for Shares

(3) Allotment of Shares (4) Dispatch of Allotment letters

(5) Filing allotment return to registrar.

Utilization of Securities Premium: A Company may use securities Premium for the following purposes **:** (1) To issue fully paid bonus shares to the members; (2) To write off Preliminary expenses, commission paid on issue of shares and debentures and discount on issue of debentures**;** (3) To provide premium payable on redemption of Preference shares and debentures; and (4) For purchasing of own shares.

Types of Debentures : Debentures are of following different kinds-

(1) Secured Debentures (2) Unsecured Debentures

(3) Redeemable Debentures (4) Irredeemable Debentures

(5) Registered Debentures (6) Bearer Debentures

(7) First Debentures (8) Second Debentures

(9) Fixed Interest Rate Debentures (10) Zero coupon rate Debentures

(11) Convertible Debentures (12) Non convertible Debentures

Issue of Debentures : Debentures may be issued either at per, at premium or at discount. When debentures are issued at a price below the nominal value, it is called issue of debentures at discount.

Issue of debentures for consideration other than cash : When debentures are allotted by a company to the vendor, supplier or for consideration of assets, it is called issue of debentures for consideration other than cash.

Issue of debentures as Collateral Security : When a company deposits its debentures, as additional security to secure loan taken from a bank, in addition to principal security, these are called debentures as Collateral security.

Bond : Bond is an acknowledgement of debt issued by Government, Semi government institutions, or Non Government institutions. Basic difference between Bonds and debentures is **that** bonds are issued without a pre-determined rate of interest while debentures are issued with pre determined rate of interest.

Bonds are some Deep discount bonds and zero coupon bonds.

Glossary

Share : The Capital of a company is divided into units of small denominations (like -₹ 1, ₹ 5, ₹ 10, or ₹ 100 etc.) and each such unit is called Share.

Shares Capital : Shares Capital means the amount that a company can raise or has raised by the issue of shares.

Preference Shares : The share, holders of which carry preferential right to get dividend before equity shareholders and carry preferential right to get return of capital before equity shareholders on winding up of the company is called preference share.

Equity Shares : The share which is not Preference share. Generally, equity shareholders are real owners of the company.

Authorised Capital : The Maximum amount of capital stated in the Memorandum of Association of the company. A Company cannot issue shares above this amount is known as Authorised Capital.

Issued Capital : Issued Capital is a part of Authorised Capital, which the company has issued to public for subscription.

Subscribed Capital : Subscribed Capital is a part of issued capital, which is subscribed.

Called up Capital : The part of subscribed Capital which has been called from shareholders by the company.

Paid up Capital : The part of called up capital which is paid by the shareholders or say, the remaining amount after subtracting calls in arrear from called up capital is paid up Capital.

Minimum Subscription : The minimum amount stated in the prospectus of the Company, for which subscription needs to get from the public. Allotment of shares can be made after receiving the application money on this subscription. Generally minimum subscription is equal to 90% of the total issue.

Share Certificate: A Certificate, issued under the common seal of the company, specifying the shares held by any person, shall be prima facie basic evidence of title of the person to such shares.

Initial Public Offer-(IPO) : Initial public offer means the first time offer to public to subscribe to shares.

Calls in Arrear: The amount called by the company in respect of shares, which is not paid by the shareholders, is called calls in arrears.

Calls in Advance: The amount which has not been called up by the company but has been paid by the shareholders and as per provision in the Articles, accepted by the company, is called calls in Advance.

Under subscription: When a company receives less applications for shares than the number of shares offered, it is called under subscription.

Oversubscription: When the number of shares applied for is more than the shares offered for issue, it is called oversubscription.

Pro-rata Allotment: Pro-rata allotment means the ratio of total number of shares allotted to a class of applicants to the total number of shares applied for, by the applicants of that class.

Allotment of Shares: Allotment of Shares means distribution of shares among the applicants by the Board of Directors of the Company according to various provisions of the Act.

Private Placement of Shares: Any offer of securities or invitation which is not a public issue, to a selected group of persons is called Private Placement of shares.

Sweat Equity Shares: Sweat equity shares mean the equity shares that are issued by a company to its directors or employees at a discount or for consideration other than cash, for providing the know-how or making available intellectual property rights.

Right Shares: A company having share capital where at any time proposes to increase its subscribed capital by the issue of further shares; such shares shall be offered to the equity shareholders on the date of offer. Existing equity shareholders receives these shares according to rights provided in Companies Act. So these shares are called Right Shares.

Employee Stock Option Plan-ESOP: Employee Stock option Plan means an offer granted by the company to its directors, officers and employee to subscribe to its shares at a pre-determined price on a future date.

Escrow Account : Escrow account means the account in which money or securities deposited as a guarantee until pre-determined conditions or work has been fulfilled. A company has to deposit the amount in Escrow Account opened in a bank, for buy back of its shares until the liability meets out.

Debentures: Debentures is a document issued under the common seal of the company as evidence of a debt to the holder.

Questions for the Excersice

Multiple Choice Questions :

1. Total amount of Equity and Liabilities part includes the followings :

(a) Authorised Capital (b) Issued Capital

(c) Subscribed Capital (d) Paid up Capital

2. Premium received on issue of shares is shown on :

(a) Equity and Liabilities part of the Balance Sheet (b) Assets part of the Balance Sheet

(c) Income part of the Statement of profit and Loss (d) Expenses part of the statement of profit and Loss

3. Equity shareholders are:

(a) Customers of the Company (b) Officers of the Company

(c) Creditors of the Company (d) Owners of the company

4. Premium on issue of shares cannot be used :

(a) For issuing bonus shares to members (b) For paying dividend to members

(c) For writing off Preliminary expenses (d) For writing off discount on issue of debentures

5. As per table-F, a company can pay interest on calls in Advance at:

(a) 8% (b) 10% (c) 12% (d) 14%

6. The part of uncalled capital which can be called up only on the company being wound up is called:

(a) Issued Capital (b) Reserve Capital

(c) Capital Reserve (d) Unissued Capital

7. Debentures holders are:

(a) Owners of the Company (b) Customers of the Company

(c) Loan Providers of the Company (d) None of these

8. Debenture holders received:

(a) Profit (b) Dividend (c) Rent (d) Interest

9. Discount on issue of debentures to be written off after 12 months from the date of Balance Sheet or after the period of operating cycle is shown as:

(a) Other noncurrent Assets (b) Other Non current Liabilities

(c) Other current Assets (d) Other Current Liabilities

10. The debentures which can be converted into equity shares are called:

(a) Redeemable Debentures (b) Registered Debentures

(c) Bearer Debentures (d) Convertible Debentures

11. In case of issue of debentures given as collateral security, if on entry is passed, which account will be debited :

(a) Loan Account (b) Debentures Account

(c) Debenture Suspense Account (d) Bank Account

Very Short Answer Type Questions :

1. Define a company.
2. What is one person company?
3. What is meant by share?
4. Name the two types of shares.
5. Give the meaning of Registered Capital.
6. What is meant by issued Capital?
7. What is meant by subscribed Capital?

8. What do you mean by over subscription?
9. What is meant by convertible Preference Shares?
10. What is meant by allotment of shares?
11. What is meant by Pro-rata allotment of shares?
12. What is meant by issue of shares at premium?
13. Under the Companies Act, 2013, can a company issue its shares at discount?
14. Give the meaning of calls in arrears.
15. Give the meaning of Debentures.
16. What is Bond?
17. What is meant by secured Debentures?
18. What is meant by Non Convertible Debentures?
19. What is the difference between shares and Debentures?
20. What is meant by issue of debentures as collateral security?
21. What is the nature of Interest on Debentures?
22. What is meant by Loss on Issue of Debentures?

Short Answer Type Questions :

1. What are the main characteristics of a company?
2. What is a Private Company?
3. What do you mean by company limited by shares?
4. Give four differences between Equity Share and Preference Share.
5. Explain three types of Preference Shares.
6. What is meant by Reserve Capital?
7. State the provisions of section 52 of Companies Act for the utilisation of securities premium Account.
8. What do you mean by minimum subscription?
9. What is meant by Sweat Equity Shares?
10. Write the meaning of the Employee Stock Option Plan.
11. Explain the Escrow Account.
12. What are the kinds of Debentures?
13. Give any four points of difference between shares and Debentures.
14. Explain the meaning and accounting treatment of Issue of Debentures as collateral Security.
15. Taruna Ltd. purchased a building for ₹ 4, 00, 000 and Plant & Machinery for ₹ 2, 60 000 from Hari. The purchase price was paid by issuing 8% Debentures of ₹ 100 each at a premium of 10%. Give necessary journal entries.
16. Abhinav Ltd. issued 2000 9% Debentures of ₹ 100 each at 4% discount, which will be redeemed at 5% Premium. Pass journal entries in the books of Ahbinav Ltd. at the time of issue of Debentures.
17. 'Debentures' outstanding and 'Loss on issue of Debentures' will be shown under which heads of the Balance Sheet.

Essay Type Questions :

1. What do you mean by Company? State its essential features and different types of companies.
2. What is the difference between Equity Share and Preference Share? Explain.
3. Describe different kinds of Share Capital.
4. What is meant by Preference Share? Describe the different kinds of Preference Shares.
5. What is meant by Debenture? Describe the different kinds of Debentures.
6. Write the differences between Shares and Debentures.

Answer of Multiple Choice Questions

Question No.	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)
Answer	d	a	d	b	c	b	c	d	a	d	c

Numerical Questions :

1. Sona Ltd. purchased a machinery of ₹ 10, 00,000 and furniture of ₹ 5, 00, 000 from Mona Ltd. Sona Ltd. paid 40% of the amount by cheque and for the balance amount issued equity shares of ₹ 10 each at a premium of 20%. Pass necessary journal entries to record the above transactions in the books of Sona Ltd.

   Answer: [75, 000 Equity Shares to be issued]

2. Jain Ltd. Purchased a machine of ₹ 6,00,000 from Kamal. 50% of the payment was made by cheque and for the remaining the company issued equity shares of ₹ 10 each at a premium of 20%. Give necessary journal entries in the books of Jain Ltd. for the above transactions.

   Answer: [25000 Equity Shares to be issued]

3. Authorised Capital of Kohinoor Ltd. is ₹ 10,00,000, which is divided into 10,000 Equtiy Shares of ₹ 100 each. Out of these shares 8000 equity shares were issued to the public. The whole nominal value is payable on application. All the shares were subscribed by the public and full amount was paid for. Give necessary journal entries in the books of Kohinoor Ltd.

4. Rakhi Ltd. was registered with an authorized Capital of ₹ 20,00,000 divided into 12,000 equity shares of ₹ 100 each and 8,000 8% Preference shares of ₹ 100 each. 5000 Equity Shares and 2000 8% Preference shares were offered to public on the following terms:

Per Share	Equity Share	Preference Share
Payable on Application	25	25
Payable on Allotment	25	45
Payable on First Call	25	30
Payable on Second & Final Call	25	-

   All the shares were applied for and allotted. All money due was duly received. Give necessary journal entries to record the above transactions in the books of Rakhi Ltd., and show the share capital in the Balance Sheet.

   Answer: [Paid up share Capital ₹ 7,00,000]

5. Gajendra Ltd. offered for subscription 30,000 equity shares of ₹ 10 each to public. Per share amount was payable as follows : On Application ₹ 3, on Allotment ₹ 4, and balance as and when required. Applications were received for 50,000 shares. No share was allotted to the applicants of 10,000 shares, their application money was refunded. Shares were allotted to remaining applicants on pro-rata basis. Allotment money was received in due time. Give journal entries for the above transactions and prepare the Balance Sheet.

   Answer: [Total of Balance Sheet ₹ 2,10,000]

6. Lalita Ltd. was established with an authorized Capital of ₹ 10,00,000 divided into 100,000 equity shares of ₹ 10 each. Company issued 75000 equity shares to the public at ₹ 11 per share, which was payable as follows: ₹ 3 on Application, ₹ 4 (including Premium) on Allotment and balance on first and Final call. Applications were received for 70,000 shares from public. All the amount were received in time expect the following : Ramesh held 1000 shares, failed to pay allotment and first and Final call money. Suresh held 2000 shares, failed to pay first and final call money. Record the above transactions in the cash book and journal of the Company and prepare Balance Sheet.

   Answer: [Paid up Capital ₹ 85,000 and Securities Premium ₹ 69,000]

7. Madhav Ltd. issued 60,000 shares of ₹ 10 each to the public, which were payable as follows: on Application ₹ 2 (Payable on 1st April, 2016); on Allotment ₹ 3 (Payable on 1st June, 2016), on first call ₹ 2.5 (Payable on 1st September, 2016) and on second and final call ₹ 2.5 (Payable on 1st February, 2017). Applications were received for 1,00,000 shares and allotment was made as under:

To Applicants for 50, 000 shares - Fully;

To Applicants for 45, 000 shares - 10, 000 shares; and

To Applicants for 5, 000 shares - nil

Excess money received on application was utilized towards allotment and subsequent calls. Interest on calls in advance was paid as per table-F. Give journal entries to record the above transactions, assuming all amounts were due and received in time.

Answer: [Interest on calls in Advance ₹ 2,750]

8. Hindustan Ltd. issued 50, 000 equity shares ₹ 10 each at ₹ 2 per share premium, to the public, which were payable as follows:

   On Application and Allotment : ₹ 5 per share (including Premium)

   On First call : ₹ 3.5 Per share

   On Second and Final call : ₹ 3.5 Per share

   Applications were received for 85,000 shares. Applicants of 10 000 shares were refused and application money there on were returned. Pro-rata allotment was made to remaining applicants. Excess application and allotment money was adjusted on the sums due on first call. First call money was not received on 150 shares. Second and final call money was not received on 400 shares.

   Give journal entries in the books of Hindustan Ltd. and show the share capital in the Balance Sheet.

   Answer: [Calls in Arrear ₹ 1, 550/-]

9. Rajesh Ltd. invited applications for issuing 30, 000 equity shares of ₹ 10 each at a premium of ₹ 30 per share. The amount was payable as follows: On Application ₹10 per share (including ₹ 8 Premium); on Allotment ₹ 12 per shares (including ₹ 9 Premium); on first and final call – Balance

   Applications for 28 000 shares were received. All the calls were made and duly received, except on 3000 shares held by Hari who failed to pay allotment and first and final call money and on 2000 shares held by Om who didn't pay the first and final call. Give necessary journal entries in the books of Rajesh Ltd. and show the above items in the Balance Sheet.

   Answer: [Amount received on allotment ₹ 3,00,000 and on call ₹ 4,14,000, total of Balance Sheet ₹ 994000]

10. Modern Ltd. offered to public ₹ 10, 000 equity shares of ₹ 10 each at ₹ 11 per share. Amount was payable as follows : on Application ₹ 3, on Allotment ₹ 4 (including Premium) and on first and final call ₹ 4. Applications were received for 12000 shares and directors made allotment on pro-rata basis. Rakesh, who applied for 240 shares paid call money along with allotment money. Sukesh to whom 100 shares were allotted paid allotment money along with call money. Give necessary journal entries.

    Answer: [Arrear of allotment received with call ₹ 340, calls in Advance ₹ 800]

11. Agrasen Ltd. offered 20,000 equity shares of ₹ 10 each to public for subscription. On these, amount was payable as follows: ₹ 3 on Application, ₹ 4 on Allotment and ₹ 3 on First and Final call. Applications were received for 41, 000 shares and allotment was made as follows:

    Applicants of 3000 shares were allotted No shares; Applicants of 10, 000 shares were allotted 100 percent shares; Applicants of 12, 000 shares were allotted 50 percent shares; and Applicants of 16, 000 shares were allotted 25 percent shares.

    Excess money received on application was adjusted on allotment and call. The applicants to whom No shares were allotted, application money was refunded. All money was received in time. Give journal entries in the books of the company.

    Answer: [Amount Refunded ₹ 17, 000, Adjusted on Allotment ₹ 34 000 and Adjusted on call ₹12, 000]

12. A Company issue ₹ 25 000 equity shares of ₹ 100 each to public. Amount on shares was payable as follows :

    (A) ₹ 30 on Application (B) ₹ 50 (including Premium) on Allotment (C) ₹ 30 on First and Final call

Applications were received for 60, 000 shares. No shares were allotted to the applicants of 10, 000 shares and their application money was refunded. Remaining applicants were made Pro-rata allotment. Ganesh, to whom 250 shares were allotted failed to pay first and Final call money. Other shareholder have paid well in time. Give journal entries for above transactions in the book of the Company. [RBSE – 2004]

Answer: [Amount Refund ₹ 3,00,000 Amount adjusted on Allotment ₹ 7,50,000 and Amount received on call ₹ 7,42,500]

13. Yatendra Ltd. issued 6000 11% Debentures of ₹ 100 each to the public. Whole of the amount was payable on application on 1st July, 2016. The company received applications for 8000 debentures. The directors made Pro-rata allotment on 31st July, 2016 and refunded the excess application money. Give necessary journal entries in the books of the Company, if debentures are issued : (i) at par (ii) at 5% Premium (iii) at 4% discount.

    Answer: Excess application money will be refunded (i) ₹ 2,00,000 (ii) ₹ 2,10,000 (iii) ₹ 1,92,000.

14. Tanmay Ltd. issued 2000 9% Debentures of ₹100 each at 20% premium, payable as follows: ₹ 40 on Application, ₹ 45 (including Premium) on allotments, and balance on first and final call. Applications were received for 4000 Debentures. Applicants for 1000 debentures were refused allotment of debentures and 2000 debentures were allotted among remaining applicants. Excess application money was adjusted on allotment. All the amounts were received in time. Give necessary journal entries.

    Answer: [Amount received on Allotment ₹ 50, 000]

15. Rajendra Ltd. issued 15000 12% Debentures of ₹ 100 each at a discount of 5%, payable as follows: 30% on Application, 35% on Allotment and balance on first and final call. Applications were received for whole of the debentures and debentures were allotted. All the amount was received in time except one debenture holder, who held 500 debentures and did not pay the first and final call. Give journal entries and cash book of the company.

    Answer: [Balance of cash Book ₹ 14,10,000]

16. Vishnu Ltd. purchased the business of Vipin with the assets of ₹ 12,00,000 and liabilities of ₹ 1,92,000. Purchase consideration was paid by issuing 7% Debentures of ₹ 100 each. Give journal entries in the book of Vishnu Ltd. for purchase of business and issue of debentures, if debentures are issued (a) at par, (b) at 5% Premium (c) at 4% discount.

    Answer: [No. of debentures to be issued (a) 10, 080 (b) 9600 (c) 10, 500]

17. Gajendra Ltd. took a loan of ₹ 5, 00,000 from the Bank of India and put 7% debentures of ₹ 6,00,000 to the bank as collateral security. Give journal entries in the books of Gajendra Ltd. and draw Balance Sheet.

    (i) If entries are not passed for the issue of debentures as collateral security.

    (ii) If entries are passed for the issue of debentures.

18. Satish Ltd. issued 8% Debentures of ₹ 6,00,000 as follows:

    (i) 8% Debentures of ₹ 3,00,000 at 20% Premium for cash.

    (ii) A computer of ₹ 1,25,000 purchased from Arnav Ltd. for the consideration of it, issued 8% debentures with a nominal value of ₹ 1,50,000.

    (iii) Taken a loan of ₹ 1,00,000 from bank. Deposited to the bank 8% Debentures of ₹ 1,50,000 as collateral security. Give journal entries in the books of Satish Ltd. and prepare Balance Sheet.

    Answer: [Total of Balance Sheet ₹ 6,10,000]

19. Give necessary journal entries for issue of Debentures in the following cases :

    (i) A company issued 1000 12% Debentures of ₹ 100 each at par, redeemable at par.

    (ii) A company issued 2000 8% Debentures of ₹ 100 each at a discount of 10%, redeemable at par.

    (iii) A company issued 5000 7% Debentures of ₹ 100 each at a premium of 5% redeemable at par.

(iv) A company issued 3000 6% Debentures of ₹ 100 each at par, redeemable at 5% premium.

(v) A company issued 4000 8% Debentures of ₹ 100 each at a discount of 2%, redeemable at 4% premium.

(vi) A company issued 5000 7% Debentures of ₹ 100 each at a premium of 5%, redeemable at 6% Premium.

20. Rakesh Ltd. offered to public 12% Debentures of ₹ 8,00,000 of ₹ 100 each. Whole amount was payable on application on or before 01st May 2016. As per terms of the issue, debenture interest was payable on half yearly basis on 30th September and 31st March each year, after deducting income tax at the rate of 10%. Company made allotment of debentures on 1st June 2016. Give journal entries in the books of the company for payment of debenture interest and transfer to statement of Profit and Loss.

    Answer: [Transfer of Debenture Interest to statement of P&L ₹ 80, 000 on 31.03.2017]

21. Z Ltd. issued 5000 12% Debentures of ₹ 100 each at a discount of 4% on 01st April 2015. The debentures were repayable by annual drawing of ₹ 1, 00, 000 starting from 31st March, 2017. Calculate the amount of discount to be written off each year and also prepare 'Discount on issue of Debentures Account' in the books of the company.

    Answer: [Discount to be written off in each year starting from 31.03.2016 ₹ 5000, ₹ 5000, ₹ 4000, ₹ 3000, ₹ 2000 and ₹ 1000 respectively]

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6

Introduction of Financial Statements of Company

Learning objectives :

The study of this chapter would enable you to understand :

- Meaning of financial statements
- Characteristics of financial statements
- Objectives of financial statements
- Format of the Balance Sheet of Company and general instructions for preparation of Balance Sheet
- Format of the statement of profit and loss of Company and general Instructions for preparation of statement of Profit and Loss.

Meaning of Financial Statement

Financial statements mean the statements which show the profitability and financial position of a business at the end of the accounting year. Thus, the financial statements are final product of the financial accounting work. These statements exhibit the financial informations of a concern/enterprise in brief. Thus, "financial statements refer to the statements that show the financial position and results of business activities at the end of the accounting period".

"The term financial statements, as used in modern business, refer to the two statements which the accountant prepares at the end of a period of time for a business enterprise. They are the balance sheet or statement of financial position, and the income statement or profit and loss statement." -John N. Myer

According to section 2(40) of the Companies Act, 2013, "financial statement" in relation to a company, includes-

(i) A balance sheet as at the end of the financial year;

(ii) A profit and loss account;

(iii) Cash flow statement for the financial year;

(iv) A statement of changes in equity, if applicable; and

(v) Any explanatory note.

Provided that the financial statement, with respect to one person company, small company and dormant company, may not include the cash flow statement.

Financial year :

According to section 2 (41) of the Companies act, 2013, financial year in relation to any company or body corporate, means the period ending on the 31st day of March every year and where it has been incorporated on or after the 1st day of January of a year, the period ending the 31st day of March of the following year, in respect where of financial statement of the company or body corporate is made up.

According to section 129 (1) of the Companies Act, 2013, the financial statements of the Company.

(i) Shall give true and fair view of the state of affairs of the Company.

(ii) Comply with the accounting standards notified under section 133, and

(iii) Shall be in the form as may be prescribed in schedule III.

Characteristics of Financial Statements :

(i) Information is presented in monetary form in the financial statements.

(ii) Financial statements are called historical documents because they are related with past period.

(iii) Financial statements present profitability through statement of profit & loss and financial position through Balance Sheet of an enterprise.

(iv) Financial statements make available different types of information to the users of information.

Objectives of Financial Statements :

Financial Statements are such sources of information, which make available different types of information. Different groups of users of financial information like-shareholders, creditors, loan providers, manager, employee, government, bank and financial institutions, tax officers and researchers, etc. use these information for different types of decisions. Thus, the main objective of financial statements are to provide information about financial position, performance and cash flow of the concern so that many users can take economic decisions. In brief, objectives of financial statements are as follows :

1. To provide necessary information in relation to financial position of the business enterprise.
2. To present necessary information relating to profitability of the business enterprise.
3. To provide essential and sufficient information to different groups, which are interested in financial statements.
4. To present base for future decisions.
5. To give true and fair view of profit and Loss and financial position of the business.
6. To provide knowledge about the work done by the business concern for up gradation of social environment.

Balance Sheet of a company

At the end of the each financial year, statement of profit and loss and Balance Sheet are prepared by the company, these are called final accounts. These basic statements of the company should be in the format given in schedule III of the companies Act, 2013. The format of Balance Sheet is given in part-I and, the format of statement of profit and loss in given in part-II of schedule III. General instructions for preparation of Balance Sheet and statement of profit and Loss are also given.

According to schedule III of the Companies Act, 2013, new vertical format of the Balance Sheet is as follows :

PART – I : FORM OF BALANCE SHEET

Particulars	Note No.	Figures as at the end of the current reporting period	Figures as at the end of the previous reporting period
1	2	3	4
Name of the Company................ Balance Sheet as at			
I. EQUITY AND LIABILITIES			
(1) Shareholder's Funds			
(a) Share capital			

(b) Reserves and surplus			
(c) Money received against share warrants			
(2) Share application money pending allotment			
(3) Non-current liabilities			
(a) Long-term borrowings			
(b) Deferred tax liabilities (Net)			
(c) Other long term liabilities			
(d) Long-term provisions			
(4) Current liabilities			
(a) Short-term borrowings			
(b) Trade payables			
(c) Other current liabilities			
(d) Short-term provisions			
Total			
II. Assets			
(1) Non-current assets			
(a) Fixed assets			
(i) Tangible assets			
(ii) Intangible assets			
(iii) Capital work-in-progress			
(iv) Intangible assets under development			
(b) Non-current investments			
(c) Deferred tax assets (net)			
(d) Long-term loans and advances			
(e) Other non-current assets			
(2) Current assets			
(a) Current investments			
(b) Inventories			
(c) Trade receivables			
(d) Cash and cash equivalents			
(e) Short-term loans and advances			

General instructions for preparation of Balance Sheet

1. **Current Asset :** An asset shall be classified as current when it satisfies any of the following criteria:
   (a) It is expected to be realized in, or is intended for sale or consumption, in the company's normal operating cycle.
   (b) It is held primarily for the purpose of being traded.
   (c) It is expected to be realized within twelve months after the reporting date.
   All other assets shall be classified as non-current.
2. **Operating cycle :** An operating cycle is the time between the acquisition of assets for processing and their realization in cash or cash equivalents. Where the normal operating cycle cannot be identified, it is assumed to have **a** duration of twelve months.
3. **Current Liability :** A liability shall be classified as current when it satisfies any to the following criteria :
   (a) It is expected to be settled in the company's normal operating cycle.

(b) It is held primarily for the purpose of being traded.

(c) It is due to be settled within twelve months after the preparation of balance sheet.

All other liabilities shall be classified as non-current.

4. **Trade Receivables :** A receivable shall be classified as a "trade receivable" if it is in respect of the amount due on account of goods sold or service rendered in the normal course of business. Trade receivables include sundry debtors and bills receivables.

5. **Trade Payables :** A payable shall be classified as a trade payable" if it is in respect of the amount due on account of goods purchased or services received in the normal course of business. Trade payables include sundry creditors and bills payables.

6. To disclose the items given in the balance sheet, term schedule was used earlier but now the term 'Notes to Accounts' is used, Now a company shall disclose the following in the notes to accounts :

Explanation of Equity and Liabilities

1. **Shareholder's funds**

   (a) Share Capital : Items to be shown under the head share capital are as follows :

   (i) The number and amount of shares authorized;

   (ii) The number of shares issued, Subscribed and fully paid, and subscribed but not fully paid;

   (iii) At par value per share;

   (iv) A reconciliation of the number of shares outstanding at the beginning and at the end of the reporting period;

   (v) Shares in the company held by each shareholder holding more than 5% shares specifying the number of shares held;

   (vi) For the period of 5 years immediately preceeding the date as at which the balance sheet is prepared.

   (A) Aggregate number and class of shares allotted as fully paid-up pursuant to contract (s) without payment being received in cash.

   (B) Aggregate number and class of shares allotted as fully paid-up by way of bonus shares.

   (C) Aggregate number and class of shares buy back.

   (vii) Calls unpaid, (showing aggregate value of calls unpaid by directors and officers);

   Unpaid calls will be subtracted from subscribed but not fully paid up capital.

   (viii) Forfeited shares (amount originally paid up).

   Share Capital is shown in Notes to Accounts as follows :

Notes No.	Particulars			Amount ₹
1	(a) **Share Capital :**			
	Authorised Capital			
	.... Shares of ₹ .....each			xxx
	Issued Capital :			
	... Shares of ₹ ....each			xxx
	Subscribed and Fully paid up :			
	... Shares of ₹ .... Each		xxx	
	Subscribed but not Fully paid up :			
	... Shares of ₹ ... each ₹ ... called up	xxx		
	Less : Calls in Arrears	xxx	xxx	
	Add: Shares Forfeited A/c		xxx	xxx
	Total			**xxx**

Note : Equity share capital and preference share capital is shown separately.

Illustration 1 :

Sarveshwar Ltd. was registered with an authorized capital of ₹1,20,00,000 divided into 10,00,000 equity shares of ₹ 10 each and20,000 9% preference shares of ₹ 100 each. Company has issued 2,00,000 equity shares of ₹ 10 each to vendors in consideration for supply and assets and it has issued 20,000 9% preference shares of ₹ 100 each on which all amount has been received in cash.

Now the company issued 4,00,000 equity shares of ₹ 10 each at a premium of ₹ 3 per share, payable as follow: ₹ 4 on application, ₹ 5 (including premium) on allotment; and balance as and when required. The Company received applications for all these shares and allotment was made by the company. A shareholder, who holds 5000 shares did not pay the allotment money and remaining shareholders has paid allotment money. Show the above information in the Balance Sheet of the company under 'Equity and Liabilities' Part.

Solution :

Balance Sheet of Sarveshwar Ltd.
as at..................

Particulars	Notes No.	Amount of Current Year ₹	Amount of Previous Year ₹
I. EQUITY AND LIABILITIES :			
1. Shareholder's Funds			
(a) Share Capital	1	63,90,000	
(b) Reserves and Surplus	2	11,85,000	
		75,75,000	

Notes to Accounts:

(1) Share Capital :

Authorised Capital :		
20,000 9% Preference Shares of ₹100 each		20,00,000
10,00,000 Equity Shares of ₹ 10 each		1,00,00,000
		1, 20, 00, 000
Issued Capital :		
20, 000 9% Preference Shares of ₹ 100 each		20,00,000
2,00,000 Equity Shares of ₹ 10 each fully Paid up issued to vendors		20,00,000
4,00,000 Equity Shares of ₹10 each issued to public		40,00,000
		80,00,000
Subscribed Capital :		
Subscribed and fully paid Capital :		
20,000 9% Preference Shares of ₹ 100 each		20,00,000
2,00,000 Equity Shares of ₹ 10 each fully paid up issued to vendors		20,00,000
Subscribed but not fully paid Capital :		
4,00,000 Equity Shares of ₹ 10 each Issued to public, ₹ 6 called up	24,00,000	
Less: Calls in Arrears on 5000 shares @ ₹ 2 =	10,000	23,90,000
Total		**63,90,000**

(2) Reserves and Surplus :

Securities Premium 4, 00, 000 shares @ ₹ 3 each =	12,00,000	
Less: Calls in Arrears on 5000 shares @₹ 3 each =	15,000	11,85,000

(b) Reserves and Surplus :

(i) Reserves and surplus shall be classified as:

(a) Capital Reserve;

(b) Capital Redemption Reserve;

(c) Securities Premium Reserve;

(d) Debenture Redemption Reserve;

(e) Revaluation Reserve;

(f) Shares options outstanding account;

(g) Other reserves (specify the nature and purpose of each reserve and the amount in respect thereof);

(h) Surplus i.e., balance in statement of profit and loss disclosing allocations and appropriations such as dividend, bonus shares and transfer to/from reserves etc.

(ii) A reserve specifically represented by earmarked investments shall be termed as a "fund".

(iii) Debit balance of statement of profit and loss shall be shown as a negative figure under the head "surplus". Similarly, the balance of "Reserves and Surplus," after adjusting negative balance of surplus, if any, shall be shown under the head "Reserves and Surplus" even if the resulting figure is in negative.

Note :

1. "Share Options outstanding Account" is a scheme of employee compensation under which the option is granted to the employees and officers of the company to apply for purchase of certain quantum of shares at a future date, at a predetermined price.

   Generally these shares are offered at lower price (concessional price) than the market price.

2. Preliminary Expenses: According to As-26 Preliminary Expenses should not be shown in the balance sheet but these should be written off in the year of incurring. These expenses should be written off out of securities premium first, then out of statement of Profit & Loss.

3. Discount & Loss on issue of debentures should be written off either in period of debentures or in 5 years, either from capital profit or from the Statement of Profit and Loss.

4. Share issue expenses and underwriting commission should be writing off in 3 to 5 years either from capital profit or from the statement of Profit and Loss.

According to schedule III, Profit & Loss Appropriation Account will not be prepared. It means all appropriations should be shown in Notes to Accounts. For this, see the following illustration :

Illustration 2 :

Vishakha Ltd. has the following balances on 1st April 2016.

	₹
Securities Premium	1,00,000
Debenture Redemption Reserve	2,00,000
Statement of Profit and Loss	(4, 00, 000)

Company earned a profit of ₹ 15,00,000 for the year ended 31st March 2017. It was decided to transfer ₹4,00,000 to General Reserve and ₹4,00,000 to debenture Redemption Reserve. Directors propose a final dividend of ₹2,00,000.

Show the above items in the Balance Sheet and Notes to Accounts.

Solution :

Extract of Balance Sheet of Vishakha Ltd.
as at 31st March 2017

Particulars	Notes No.	Amount of Current Year ₹	Amount of Previous Year ₹
I. EQUITY AND LIABILITIES :			
1 Share holder's Funds			
Reserves and Surplus	1	12,00,000	(1,00,000)
2 Current Liabilities			
Short Term Provisions	2	2,00,000	

Notes to Accounts :			**31.03.2017**
(1) Reserves and Surplus			
(a) Securities Premium			1,00,000
(b) Debenture Redemption Reserves			
Opening Balance		2,00,000	
Transfer from Surplus		4,00,000	6,00,000
(c) General Reserves			
Opening Balance		-	
Transfer from Surplus		4,00,000	4,00,000
(d) Surplus			
Balance of Statement of P&L (opening)		(4,00,000)	
Surplus for the period		15,00,000	
Available for Appropriations		11,00,000	
Less: Appropriations:			
Debenture Redemption Reserves	4,00,000		
General Reserves	4,00,000		
Proposed Dividend	2,00,000	10,00,000	1,00,000
			12,00,000
(2) Short term Provisions :			
Proposed Dividend			**2,00,000**

(c) **Money received against share warrant :** Share warrants is a financial document issued by a public company which provides the right to obtain a certain number of equity shares at a future date to the holders of it. Money received against share warrants cannot be shown as share capital because allotment of shares is yet pending. So, it includes in shareholders' fund showing separately.

(2) **Share Application Money Pending Allotment :** If a company has received application money but allotment of shares has not been made till the date of Balance Sheet, then the money is shown under this head.

(3) **Non-Current Liabilities :** Non-Current liabilities are liabilities which are not a current liabilities. These shall be classified as follows:

(i) **Long Term Borrowings :** Long term borrowings means such loans as taken by the company which are repayable after 12 months from the date of loan. These shall be classified as:

(a) Bonds/Debentures

(b) Term loans

* From Banks

* From Other Parities

(c) Deferred Payment Liabilities

(d) Deposits repayable after 12 months

- Borrowing shall further be sub-classified as secured and unsecured.
- If a part of long term borrowing is repayable within twelve months from the date of Balance sheet, then that part shall be shown as 'Current Maturity of Long Term Debts' under the head 'Other Current Liabilities'.

(ii) Deferred Tax Liabilities (Net) :

Deferred tax - The difference between tax on accounting income and tax on taxable income is called deferred tax. Taxable income is calculated on the basis of related tax law while accounting income is determined on the basis of system of accounting followed by the firm. At present, generally provision for tax is calculated on the basis of taxable income but it can be calculated on the basis of accounting income.

Deferred Tax Liabilities : When accounting income is greater than taxable income then deferred tax liabilities exist.

(iii) Other Long Term Liabilities : Other long term liabilities shall be classified as:

(a) Trade Payable- if payable after 12 months.

(b) Others.

(iv) Long Term Provisions : All the provisions are classified as long term provisions against which the claim is to be settled after 12 months from the date of Balance Sheet. These shall be classified as :

(a) Provision for employee benefits.

(b) Others- Provision for warranties etc.

4. Current Liabilities : The liability, which is due to be settled within twelve months from the date of Balance Sheet. These shall be classified as:

(a) Short Term Borrowings :

(i) Loan repayable on demand:

* From Banks- cash credit and overdraft etc.
* From other parties.

(ii) Deposits

(iii) Other Loans and Advances.

(b) Trade Payables : If it is payable in the period of 12 months or less. For example- Sundary creditors and Bills Payables.

(c) Other current Liabilities : These shall be classified as follows:

(i) Current maturities of long term debts- The amount of debentures or banks loan, which is payable within twelve months from the date of Balance Sheet.

(ii) Interest accrued but not due on borrowings;

(iii) Interest accrued and due on borrowings;

(iv) Income received in advance;

(v) Unpaid dividends;

(vi) The amount in excess of application money received for allotment of securities and due for refund and interest accrued thereon.

(vii) Unpaid matured deposits and interest accrued thereon;

(viii) Debentures matured to pay but not paid and interest accrued thereon;

(ix) Other payables: Such as outstanding expenses, calls in advance and interest thereon, unclaimed dividends, provident fund etc.

(d) Short Term Provisions : All the provisions are classified as short term provisions against which the claim is to arise within 12 months from the date of Balance Sheet. These shall be classified as:

(i) Provision for employee benefits.

(ii) Others- provision for tax, proposed dividend.

(iii) Provision for doubtful debts.

Explanation of Assets

1. Non-Current Assets : The assets which are not classified as current assets.

(a) Fixed Assets : The assets which are intended to held for regular use in the business, not for sale are called fixed assets.

(i) Tangible Assets : Tangible assets are those assets which can be seen and touched physically. Classification is:

(a) Land

(b) Buildings

(c) Plant and Equipment

(d) Furniture and Fixtures

(e) Vehicles

(f) Office equipment

(g) Others

(ii) Intangible Assets: Those assets which do not have any physicaly existence and those that cannot be seen and touched. Classification shall be given as:

(a) Goodwill

(b) Brands/ Trade Marks

(c) Computer Software

(d) Mastheads and Publishing Titles

(Name of a newspaper or magazine published on the top of front page, is called mast heads)

(e) Mining right

(f) Copyrights, Patents, Intellectual Property Rights, Services and operating rights.

(g) Recipes, formulae, models, designs and prototypes.

(h) Licenses and Franchise.

(iii) Capital Work in Progress : Capital work in progress means fixed tangible assets which are under construction such as- Buildings, Plant and Equipment etc.

(iv) Intangible Assets under developments : Such as patents etc. on which work is still in progress.

(b) Non-Current Investments : Those investments which are purchased by a company for holding with it and not for salef or a period more than one year.

(i) Non-Current investments shall be classified as trade investments and other investments.

Trade Investments- Investments made by a company in shares or debentures of other company for the purpose to promote its trade and business are called trade investments.

Other Investments- Investments other than trade investment are called other investments.

Again investments can be classified as:

(a) **Investments in Property :** Property investment means those lands and buildings which are held for the purpose to earn rentals or price appreciation not for **sale**

(i) Production and supply of goods and services and administrative works, or

(ii) Sale during the normal business operations.

(b) Investments in Equity Instruments.

(c) Investments in Preference Shares.

(d) Investments in Government and Trust Securities.

(e) Investments in Bonds and Debentures.

(f) Investments in Mutual Funds.

(g) Investments in partnership firms.

(h) Other Non-Current Investments.

(ii) Investments carried at other than at cost should be separately stated specifying the basis for valuation thereof;

(iii) The following shall be the basis also to be disclosed.

(a) Aggregate amount of quoted investments and market value thereof.

(b) Aggregate amount of unquoted investments;

(c) Aggregate provision for diminution in value of investments.

(c) Deferred Tax Assets: When accounting income in lesser than taxable income then deferred tax assets exist: For example-to calculate accounting income provisions for bad debts is subtracted while to calculate taxable income provision for bad debts is not treated as expense but actual bad debts is treated as expense. As a result accounting income becomes less.

(d) Long Term Loans and Advances: Those loans and advances which are not expected to recover within 12 months from the date of Balance Sheet. These shall be classified as:

(i) Capital Advances : The Advance given for purchase of fixed assets are called Capital Advances. These advances are not realized in cash but converted into fixed assets. So, these are classified as Long Term Loans and Advances.

(ii) Security Deposits : The amount of security deposit given for a period of more than 12 months from the date of Balance Sheet falls in this head. For example- Security deposit given for electricity and telephone

(iii) Other Loans and Advances (specify nature)

(e) Other Non-Current Assets : These assets shall be classified as:

(i) Long Term Trade Receivables : Including trade receivales on deferred credit conditions.

(ii) Others

(iii) Long Term Trade Receivables shall be sub-classified as:

(a) 1. Secured, considered good

2. Unsecured, considered good

3. Doubtful

(b) Allowance for bad and doubtful loans and advances shall be disclosed under the relevant heads separately.

(c) Amount due by directors and other officers of the company should be separately stated.

2. Current Assets : Those assets which are expected to be realized in the company's normal operating cycle or within twelve months after the preparations of balance sheet and these are held primarily for the purpose of being traded shall be classified as:

(A) Current Investments : Those investments which are held for the purpose to convert in cash within the 12 months from the date of purchase. These shall be classified as:

(a) Investment in Equity Instruments;

(b) Investment in Preference Shares;

(c) Investment in Government or Trust Securities;

(d) Investment in debentures or bonds

(e) Investment in Mutual Funds

(f) Investment in Partnership firms.

(g) Other Investments

(B) Inventories : Inventories shall be classifies as:

(a) Raw Material

(b) Work-in-Progress

(c) Finished goods

(d) Stocks in Trade (in respect of goods acquired for trading)

(e) Stores and Spares

(f) Loose Tools

* Goods in transit shall be disclosed under the relevant sub-head of inventories.

* Mode of valuation shall be stated.

(C) Trade Receivables : Receivables received in respect of goods sold or services rendered in normal course of business are called trade receivables. These include debtors and bills receivables to be realized within 12 months mainly.

(i) Allowance for bad and doubtful debts shall be disclosed under the relevant head separately.

(ii) Debts due by directors or other officers of the company should be separately stated.

(D) Cash and Cash Equivalents:

(i) Cash and cash equivalents shall be classified as:

(a) Cash or Balance with Banks

(b) Cheques and drafts in hand

(c) Cash in hand

(d) Others

(ii) Earmarked balance with banks (for example for unpaid dividend) shall be separated stated.

(iii) Balances with banks to the extent held as margin money or security against the borrowings, guarantee, other commitments shall be disclosed separately.

(iv) Banks, deposits with more than twelve months maturity shall be disclosed separately.

Cash Equivalents: These are such highly liquid short term investments which must be readily convertible to amount of cash can be subject to an insignificant risk of changes in volume. Therefore, an investment normally qualifies as a cash equivalent only if it has a short maturity or say, three months or less from the date of acquisition.

(E) Short Term Loans and Advances.

(F) Other Current Assets : Under this head all those current assets in corporate that do not fit into any other assets categories. e.g.: Prepaid expenses, Advance to suppliers, Interest accrued on investments and Advance Tax etc.

Contingent Liabilities and Commitments
(to the extent not provided for)

1. Contingent Liabilities : Contingent liabilities are such liabilities which are not obligations at present but arise by the occurrence or non-occurrence of uncertain future events or say is not sure to occurrence of a liability.

Amount of these is not to be added in total of Balance Sheet. So, the amount of these is shown in Notes to Accounts below the Balance Sheet. Contingent liabilities shall be classified as:

(a) Claims against the company not acknowledged as debt;

(b) Liabilities against the guarantee taken by the company;

(c) Other money for which the company is contingently liable.

2. Commitments: Commitments means an agreement to execute certain obligation in future under certain conditions and at a certain time. Commitments shall be classified as:

(a) Estimated amount of contracts remaining to be executed on capital account and not provided for;

(b) Uncalled liability on partly paid shares- If a company has purchased partly paid shares of other company as investment then uncalled amount on these shares is a commitment to the company since the amount can be paid at any time.

(c) Other commitments- Arrear of dividends on cumulative Preference Shares.

Illustration 3 :

Under which heads will you show the following items in the Balance Sheet of a Company?

(1) Unclaimed Dividend

(2) Securities Premium

(3) Proposed Dividend

(4) Preliminary Expenses

(5) Acceptances

(6) Debentures

(7) Matured Debentures

(8) Calls in Advance

(9) Calls in Arrears

(10) Provision for Tax

(11) Prepaid Insurance

(12) Advances recoverable in cash within the operating cycle.

(13) Uncalled liability on partly paid shares.

(14) Interest accrued and due on secured loan.

(15) Dr. balance of Statement of Profit and Loss

(16) Share issue expenses (to be written off after 12 months)

Solution:

S.No.	Items	Heading	Sub-heading
1.	Unclaimed Dividend	Current Liabilities	Other Current Liabilities
2.	Securities Premium	Shareholder's Funds	Reserves & Surplus
3.	Proposed Dividend	Current Liabilities	Short term Provisions
4.	Preliminary Expenses	(As per note)	-
5.	Acceptance	Current Liabilities	Trade Payables
6.	Debentures	Non-current Liabilities	Long term borrowings
7.	Matured Debentures	Current Liabilities	Other current Liabilities
8.	Calls in advance	Current Liabilities	Other current Liabilities
9.	Calls in Arrears	Shareholders funds	It is deducted from the subscribed but not fully paid Capital.

10.	Provisions for Tax	Current Liabilities	Short term Provisions
11.	Prepaid Insurance	Current Assets	Other current Assets
12.	Advances recoverable in cash within the operating cycle	Current Assets	Short term Loans
13.	Uncalled Liability on partly paid shares	Commitments in notes to account	--
14.	Interest accrued and due on Secured Loans	Current Liabilities	Other Current Liabilities
15.	Debit Balance of Statement of profit & Loss	Shareholders funds	Reserves & surplus (shown as a negative figure) under 'surplus'
16.	Share issue Expenses (to be written off after 12 months)	Non-Current Assets	Other Non-Current Assets

Note : Preliminary Expenses- Not to be shown in Balance Sheet since as per AS-26 these expenses are to be written off in the year in which they are incurred.

Format of statement of Profit and Loss is given in part-II of schedule III of Companies Act, 2013.

For Board Examinations, C.B.S.E. has recommended vide its letters No.43 dated: 02 July, 2013 the following format :

PART – II

STATEMENT OF PROFIT AND LOSS

Name of the company ....

Profit and Loss Statement for the year ended................ (₹ in......)

	Particulars	Note No.	Figures for the current reporting period	Figures for the previous reporting period
I	Revenue from operations		xxx	xxx
II	Other Income		xxx	xxx
III	Total Revenue (I+II)		xxx	xxx
IV	Expenses:			
	Cost of Material Consumed		xxx	xxx
	Purchases of stock-in-trade		xxx	xxx
	Changes-in-inventories of finished goods, Work-in-progress and stock-in-trade		xxx	xxx
	Employee benefits expenses		xxx	xxx
	Finance Costs		xxx	xxx
	Depreciation and amortization expenses		xxx	xxx
	Other Expenses		xxx	xxx
	Total Expenses		**xxx**	**xxx**
V	Profit before tax (III-IV)		xxx	xxx
VI	Tax		xxx	xxx
VII	Profit after tax (V-VI)		**xxx**	**xxx**

General Instructions for preparation of statement of Profit and Loss

1. **Revenue from operations :**

   (A) In respect of a company other than a finance company revenue from operations shall disclose separately in notes

      (a) Revenue from sale of products (Gross)

      Less : Returns

      (b) Revenue from Sale of Services

      (c) Other Operating Revenues like-Sale of Scrap, commission received etc.

      (d) Less: Excise Duty

   (B) In respect of a Finance Company, revenue from operations shall include the following revenues from:

      (a) Interest Income

      (b) Dividend Income

      (c) Net gain/Loss on sale of investments

      (d) Revenue from other financial services

2. **Other Income: Other income shall be classified as :**

   (a) Interest Income

   (b) Dividend Income

   (c) Net gain/Loss on sale of investments

   (d) Other operating income (This type of income will be shown as net income after subtracting relevant expenditure) as:

      (i) Profit on sale of fixed assets

      (ii) Discount received

      (iii) Rent received

      (iv) Transfer fees

      (v) Sundry creditors written off

      (vi) Excess provision for bad debts written back

      (vii) Revenue from project consultancy

      (viii) Fees received from arranging loans

      (ix) Sale of miscellaneous Items like- old newspaper etc.

      (x) Refund of income tax

3. **Expenses :** Expenses shall disclose the following as:

   (a) Cost of Material Consumed: Cost of material consumed means cost of raw material and other materials used in manufacturing of product/goods. Cost of material consumed will be calculated as follows:

   Raw Material Consumed= Opening Inventory (Stock) of Raw Materials + Purchases of Material-Closing Inventory (stock) of Raw Materials.

Note : The items do not become substantial part of finished goods like- stores, fuel, spare parts etc. are not included in raw material. These are shown as 'Other Expenses'.

   (b) Purchase of Stock in Trade : The goods purchased for the purpose of resale by a business concern are called purchase of Stock in Trade. The goods purchased for consumption in the production of other goods, its cost will be added to cost of material consumed.

(C) Changes in Inventories of Finished goods, work-in-Progress and Stock in Trade:

These should be shown as follows:

(i)	Opening Inventory of Finished goods	xxx	
	Less: Closing Inventory of Finished goods	xxx	xxx
(ii)	Opening Inventory of work-in-Progress	xxx	
	Less: Closing Inventory of work-in-Progress	xxx	xxx
(iii)	Opening Inventory of Stock-in-Trade	xxx	
	Less: Closing Inventory of Stock-in-Trade	xxx	xxx
	Total (i + ii + iii)		**xxx**

Note : Net difference of opening inventory and closing inventory may be positive/negative. Negative difference will be shown in (bracket).

(d) Employee Benefit Expenses: Under this, following items will be shown separately:

(i) Salaries and wages, Bonus, cash payment in lieu of leaves.

(ii) Contribution to Provident and other funds like- Gratuity fund, Superannuation fund etc.

(iii) Employee Stock Option Scheme (ESOS), Employee Stock Purchase Plan (ESPP) etc.

(iv) Staff welfare expenses like- canteen expenses, medical Expenses.

(e) Finance Costs: Finance Costs shall be classified as:

(i) Interest Expenses: Payment of interest on long term loan taken from Bank;
Payment of interest on Bank overdraft and cash credit limit;
Payment of interest on debentures, bonds and public deposits

(ii) Other Borrowing Costs:
Discount/Loss on issue of debentures written off;
Premium payable on redemption of debentures;
Loan processing fees
Guarantee Charges
Commission paid for deposit mobilization

(f) Depreciation and Amortization Expenses:

(i) Depreciation: Depreciation is cost of written off tangible fixed assets.

(ii) Amortization: Cost of written off long term intangible assets is called amortization i.e. written off Goodwill, Patents, Technical Know how and Computer Software.

(g) Other Expenses: All other expenses do not come under the heads (a) to (f) will be shown in this head:

(i) Carriage, Carriage inwards and Carriage outwards

(ii) Freight

(iii) Consumption of Loose tools, Spare parts, Stores, Power & fuel.

(iv) Manufacturing Expenses

(v) Rent, Rates and Taxes (Excluding Tax on Income)

(vi) Insurance Expenses

(vii) Discount allowed

(viii) Commission allowed

(ix) Directors fees

(x) Audit fees

(xi) Trade Expenses
(xii) Bad debts written off and Provision for Bad debts
(xiii) Repairs to Machinery, Building and other Fixed Assets
(xiv) Office and administrative expenses
(xv) Telephone and internet expenses
(xvi) Conveyance expenses and travelling expenses
(xvii) Bank Charges
(xviii) Excise Duty paid
(xix) Loss on sale of fixed assets
(xx) Entertainment expenses
(xxi) Business Promotion expenses
(xxii) Courier expenses
(xxiii) Lease Rent
(xxiv) Computer hiring charges
(xxv) Share issue expenses written off
(xxvi) Under writing commission on issue of shares and debentures written off

Illustration 4 :

From the following information for the year ending 31st March, 2017 prepare notes to accounts to calculate the amount to be shown in statement of Profit and Loss against 'Changes in Inventories':

	Opening Inventory ₹	**Closing Inventory** ₹
Finished Goods	6, 50, 000	4, 80, 000
Work-in-Progress	3, 60, 000	5, 00, 000
Stock-in-Trade	7, 00, 000	6, 90, 000
Materials	2, 00, 000	3, 00, 000

Solution :

Particulars	₹	**Year ended 31.03.2017 ₹**
Changes in Inventories of Finished Goods, Work-in-Progress and Stock-in-Trade :		
(a) Opening Inventory of Finished Goods	6,50,000	
Less: Closing Inventory of Finished Goods	4,80,000	1,70,000
(b) Opening Inventory of Work-in-Progress	3,60,000	
Less: Closing Inventory of Work-in-progress	5,00,000	(1,40,000)
(c) Opening Inventory of Stock-in-Trade	7,00,000	
Less: Closing Inventory of Stock-in-Trade	6,90,000	10,000
Total (a+b+c)		**40,000**

Note : Opening and closing Inventory of Materials will be used to calculate cost of Materials Consumed.

Illustration 5:

Following information are extracted from the books of Arnav Ltd. Prepare Statement of Profit and Loss for the year ending 31st March, 2017.

Sales ₹32,00,000; Purchase of Stock-in-Trade ₹ 13,20,000; Salaries ₹ 5,40,000; Wages ₹ 40,000; Bonus ₹ 62,000; Medical Expenses ₹ 18,000; Gratuity paid ₹ 60,000; Contribution to provident fund ₹ 80,000; Printing and Stationery ₹ 25,000; Sales Promotion expenses ₹ 40,000; Interest Paid on Debentures ₹ 70,000; Depreciation on Furniture ₹ 25,000; opening Stock-in-Trade ₹ 1,40,000; Closing Stock-in-Trade ₹ 2,00,000; Sale of scrap ₹ 90,000; and Interest received ₹ 30,000.

Solution:

Arvan Ltd.
STATEMENT OF PROFIT AND LOSS
For the year 31st March 2017

	Particulars	Notes No.	Amount ₹
I.	**Revenue from operations**	1	32,90,000
II.	**Other Income**	2	30,000
III.	**Total Revenue (I+II)**		**33,20,000**
IV	**Expenses**		
	Purchase of Stock-in-Trade		13,20,000
	Changes in Inventories of Stock-in-Trade	3	(60,000)
	Employee Benefit Expenses	4	8,00,000
	Finance Costs	5	70,000
	Depreciation and Amortization	6	25,000
	Other Expenses	7	65,000
	Total Expenses		**22,20,000**
V	**Profit Before Tax (III-IV)**		**11,00,000**

Notes to Accounts :

	Particulars		Amount ₹
1.	Revenue From Operations :		
	Sales	32,00,000	
	Sale of Scrap	90,000	32,90,000
2.	Other Income		
	Interest received	30,000	30,000
3.	Changes in Inventories of Stock-in-Trade		
	Opening Inventory	1,40,000	
	Less: Closing Inventory	2,00,000	(60,000)
4.	Employee Benefit Expenses		
	Wages	40,000	
	Salaries	5,40,000	
	Bonus	62,000	
	Medical Expenses	18,000	
	Contribution to Provident fund	80,000	
	Gratuity paid	60,000	8,00,000
5.	Finance Cost:		
	Interest on Debentures	70,000	

6.	Depreciation and Amortization		
	Depreciation on Furniture	25,000	
7.	Other Expenses:		
	Printing and Stationary	25,000	
	Sales Promotion Expenses	40,000	65,000

Illustration 6 :

From the following information prepare Balance Sheet of Star Ltd. as at 31st March, 2017 according to provisions of Schedule-III of Companies Act, 2013.

	(₹ in 000)
Equity Share Capital	4,000
Preference Share Capital	1,000
Discount on issue of Debentures	300
(Amount to be written off in next 3 years)	
Trade receivables	6,100
Bills Payables	2, 500
Preliminary Expense	300
Securities Premium	3, 000
Debentures	3, 500
Statement of Profit and Loss(Cr)	1, 200
Depreciation on Fixed Assets	800
Gross Fixed Assets	9, 100
Goodwill	50
Inventories	210
Provision for Tax	60

Solution:

STAR Ltd.
BALANCE SHEET
as at 31st March, 2017

(₹ in 000)

Particulars	Notes No.	Amount ₹ 31.03.2017	Amount ₹ 31.03.2016
I. EQUITY AND LIABILITIES :			
(1) Shareholders funds			
(a) Share Capital	1	5,000	
(b) Reserves and Surplus	2	3,900	
(2) Non Current Liabilities			
(a) Long Term Borrowings (Debentures)		3,500	
(3) Current Assets			
(a) Trade Payables (Bills Payables)		2,500	
(b) Short term Provisions (Provision for Tax)		60	
Total		**14,960**	

II	**Assets**			
(1)	Non Current Assets			
	(a) Fixed Assets			
	(i) Tangible Assets	3	8300	
	(ii) Intangible Assets (Goodwill)		50	
	(b) Other Non-Current-Assets	4	200	
(2)	Current Assets			
	(a) Inventories		210	
	(b) Trade Receivables		6,100	
	(c) Other Current Assets	5	100	
	Total		**14960**	

Notes to Accounts

	Particulars		₹	Year ended 31.03.2017 ₹
1.	Share Capital			
	Equity Share Capital		4,000	
	Preference Share Capital		1,000	5,000
2.	Reserves and Surplus			
	Securities Premium	3,000		
	Less: Preliminary Expenses	300	2,700	
	Surplus: Statement of Profit & Loss		1,200	3,900
3.	Tangible Assets			
	Gross Fixed Assets		9,100	
	Less: Depreciation on Fixed Assets		800	8,300
4.	Other Non Current Assets			
	Discount on issue of Debentures (2/3 of ₹ 300)			200
5.	Other Current Assets			
	Discount on issue of Debentures (1/3of ₹300)			100

Note :

(1) Discount on issue of Debenture is to be written off in next 3 years, So 1/3 of ₹300 = ₹100, which is to be written off in next 12 months, will be treated as Current Assets and remaining 2/3 of ₹300 = ₹200 will be shown as Non-Current Assets.

(2) As per As-26 Preliminary Expenses to be written off in the year of incurring. First it should be written off from securities Premium and remaining from Statement of Profit and Loss.

Illustration 7:

Under which heads will you show the following items in the Balance Sheet of a Company?

(1) Computer (2) Computer Software

(3) Loose Tools (4) Provision for Employee Benefits

(5) Debenture Sinking Fund (6) Unpaid Dividend

(7) Public Deposits (8) Guarantee given by the Company

(9) Mortgage Loan (10) Outstanding Salary

(11) Work-in-Progress (12) Building under Construction

Solution :

S.No.	Items	Heading	Sub-heading
1.	Computer	Non-Current Assets	Fixed Assets-Tangible Assets
2.	Computer Software	Non-Current Assets	Fixed Assets-Intangible Assets
3.	Loose Tools	Current Assets	Inventories
4.	Provision for Employee benefits	Non Current Liabilities	Long term provisions
5.	Debenture Sinking Fund	Shareholder's Funds	Reserves and Surplus
6.	Unpaid Dividend	Current Liabilities	Other Current Liabilities
7.	Public Deposits	Non Current Liabilities	Long Term Borrowings
8.	Guarantee Given by the Company	Contingent Liabilities and commitment (In Notes to Accounts under contingent Liabilities)	--
9.	Mortgage Loan	Non Current Liabilities	Long Term Borrowings
10.	Outstanding Salary	Current Liabilities	Other Current Liabilities
11.	Work-in-Progress	Current Assets	Inventories
12.	Building under Construction	Non Current Assets	Fixed Assets – Capital work-in-progress

Illustration 8 :

Under which major heads, the following items will be shown in the statement of Profit & Loss of a Company?

(i) Depreciation on Machine

(ii) Bonus

(iii) Purchase of Stock-in-Trade

(iv) Interest paid on Term Loan

(v) Computer Software written off

(vi) Revenue from Service rendered

(vii) Interest Paid on overdraft

(viii) Loss on issue of Debentures written off

(ix) Contribution to Provident/ Superannuation fund

(x) Bank Charges

(xi) Profit on sale of Plant

(xii) Loan Processing Charges

(xiii) Bad debts written off and Provision for Bad debts

(xiv) Canteen Expenses

(xv) Return of Material Purchased

Solution:

S.No.	Items	Major Head
1.	Deprecation on Machine	Depreciation and Amortization Expenses
2.	Bonus	Employee Benefit Expenses
3.	Purchase of Stock-in-Trade	Purchase of Sock-in-Trade

4.	Interest paid on term loan	Finance costs-Interest Expenses
5.	Computer software written off	Depreciation and Amortization Expenses
6.	Revenue from services rendered	Revenue from operations
7.	Interest paid on overdraft	Finance costs- Interest Expenses
8.	Loss on issue of debentures written off	Finance Costs- other Borrowing Costs.
9.	Contribution to Provident/ Superannuation fund	Employee Benefit Expenses
10.	Bank Charges	Other Expenses
11.	Profit on sale of Plant	Other Income-other Non-operating Income
12.	Loan Processing charges	Finance cost-other Borrowing Costs
13.	Bad Debts written off and Provision for bad debts	Other Expenses
14.	Canteen Expenses	Employee Benefit Expenses
15.	Return of Material Purchased	Cost of Material Consumed (Less in Calculation)

Note :

1. Interest Paid is shown as Interest Expense sunder the head Finance Cost.
2. Expenses regarding loan taken from Banks and Discount/Loss on issue of Debentures will be shown as other borrowing costs under the head Finance cost.
3. Bank Charge is other expenses not finance cost. So it will be shown under the head other Expenses.
4. Return of Material purchased will be substrated in calculating cost of material consumed.

Summary

Financial statements : Financial Statements means the statements prepared at the end of a stated period. Balance Sheet shows firms assets, liabilities, and net worth on a stated date and Profit and Loss statement shows result of performance over a stated period. Financial Statements are the medium by which a firm discloses financial information to external users.

Financial Statements comprise of the following statements :

(i) Statement of financial position or Balance Sheet.

(ii) Statement of Profit and Loss.

(iii) Cash flow statement

Balance Sheet : A statement which represents a record of firm's assets, liabilities and Capital at a particular point of time

Statement of Profit and Loss : A statement which **is** prepare to measure a concern's performance over a specific time period. The statement presents information about revenue earned by a concern and expenses incurred to earn revenue. Net result of this represents net Profit and Loss for that period.

Cash flow statement : The statement of cash flow represents record of a business cash inflows and cash out flows over a period of time. This is different from cash account.

Characteristics of Financial Statements : The following are the Characteristics of Financial Statements:

(i) Information is presented in monetary form in the financial statements.

(ii) These are historical documents.

(iii) These present financial position and Profit and Loss of a concern.

(iv) These supply essential information to users.

Users of financial Statements : Financial Statements are used by various groups of users like- Shareholders, creditors, lenders, managers, employees, Government, Bank and Financial institutions and Tax officers.

Objectives of financial Statements : Main objectives of financial statements are as follows:

(i) To provide information regarding financial position

(ii) To present information about result of operations on Profit and Loss.

(iii) To provide sufficient and essential information to users of financial statements.

(iv) Provide base for future decisions.

(v) To present true and fair view of financial position and Profit and Loss.

(vi) To provide knowledge of work done regarding upliftment of social environment.

Glossary

1. **Financial Statements-** These statements show financial position and result of performance.
2. **Financial year-** Generally, the period that ends at 31st March of each year is called financial year.
3. **Current Assets-** The assets which are expected to be converted into cash, in the normal operating cycle of business or within twelve months from the date of Balance Sheet.
4. **Non-Current Assets-** All the assets other than current assets are termed as Non-Current Assets.
5. **Operating Cycle-** An operating cycle is the time between the purchase of an asset and its realization in cash or cash equivalents.
6. **Current Liabilities-** The liabilities which are expected to be paid in normal operating cycle or within twelve months from the date of Balance Sheet.
7. **Non-Current Liabilities-** The liabilities which are payable after twelve months from the date of balance sheet.
8. **Deferred Tax Liabilities-** Deferred tax liabilities exist when accounting income is greater than taxable income.
9. **Long term Provisions-** All the provisions against which the claim is to be settled after twelve months from the date of balance sheet.
10. **Short Term Loan-** Loan which is repayable within twelve months from the date of loan taken, is termed as short term loan.
11. **Trade Payables-** Payables in respect of purchase of goods or receiving services are called trade payables. These include sundry creditors and Bills Payables.
12. **Liability-** Amount payable in future which is certain/ fixed is called liability.
13. **Provision-** A liability which is known but amount of which can't be determined exactly. So the provision is made to meet the liability.
14. **Reserves-**Reserves are created to strengthen economic condition of the firm and to meet out unforeseen losses.
15. **Fixed Assets-** The assets which are intended to be held for regular use in the business, not for sale are called fixed assets.
16. **Tangible Assets-** The assets which have physical existence and can be seen and touched are called tangible assets.
17. **Intangible Assets-** Those assets which do not have any physical existence and those which cannot be seen and touched.
18. **Capital work-in-progress-** Capital work-in-progress means fixed tangible assets which are under construction.
19. **Trade Investments-** Investments made by a company in shares or debentures of other company for the purpose to promote its trade and business are called trade investments.
20. **Other Investments-** Investments other than trade investments are called other investments.
21. **Investment in Property-** When investment made in any land and building to earn rentals or price appreciation, is not held for use in normal business operations it is called investment in property.

22. **Stock-** Stock means those things or goods which are held for trading purpose in normal course of business operations.

23. **Trade Receivables-** Receivable received in respect of goods sold or service rendered in normal course of business are called trade receivables. It includes sundry debtors and Bills receivables.

24. **Cash Equivalents-** These are such highly liquid short term investments which must be readily convertible to cash and are subject to an insignificant risk of change in value.

25. **Contingent Liability-**Contingent liability are such liabilities which are not an obligation at present but arise by occurrence or non-occurrence of uncertain future events.

26. **Commitments-** Commitment means an agreement to execute certain obligation in future under certain conditions and at a certain time.

27. **Revenue from operations-** Revenue earned by a company through business activities as sale of goods or rendering services is called revenue from operations.

28. **Other Income-** Income earned from sources, other than business activities is called other Income.

29. **Change in Inventories-** Changes in inventories means net difference of opening and closing Inventories of Stock, Work-in-Progress and finished goods available at the firm.

30. **Employee Benefit Expenses-** Expenses related with employees salary, wages and amenities are called employee benefit expenses.

31. **Depreciation-** Depreciation is cost of written off tangible fixed assets.

32. **Amortization-** Cost of written off long term intangible assets is called amortization.

Questions for Exercise

Multiple Choice Questions :

1. Financial Statements are prepared at the time of:

   (a) Inception of Business (b) Winding up of Business

   (c) End of Accounting year (d) None of these

2. The Statement which depicts the financial position of a company is:

   (a) Balance Sheet (b) Cash flow Statement

   (c) Statement of Profit and Loss (d) Statement of changes in equity

3. For which of the following company it is necessary to prepare cash flow statement:

   (a) Inactive company (b) Public Company

   (c) One Person Company (d) Small Company

4. Owners of the company are :

   (a) Shareholders (b) Loan Providers

   (c) Creditors (d) All the above

5. Financial Statements are useful for:

   (a) Employees (b) Managers

   (c) Shareholders (d) All of these

6. For a company financial year ends:-

   (a) On 30 June (b) On 30 September

   (c) On 31 December (d) On 31 March

7. Under which head of the Balance Sheet General Reserve will be shown :-

   (a) Short Term Provisions (b) Share Capital

   (c) Miscellaneous Expenditure (d) Reserves and surplus

8. Number of main heads under 'Equity and Liabilities' part of Balance Sheet of a company is:-
   (a) 1   (b) 2   (c) 3   (d) 4
9. When accounting income exceeds taxable income, it leads to:-
   (a) Deferred tax liabilities   (b) Deferred Tax Assets
   (c) Long Term Loan   (d) None of these
10. Which of the following is not employee benefit expense:-
   (a) Salary   (b) Provident Fund Contribution
   (c) Repair of Factory Machine   (d) Payment of Gratuity

Very Short Answer Type Questions :

1. What is meant by financial Statements?
2. Name the two financial statements prepared by a company.
3. Name the major heads of the Assets part of the Balance Sheet of a Company.
4. Why are financial statements called historical documents?
5. What is operating cycle?
6. Define Trade Payables.
7. What is meant by statement of Profit and Loss?
8. What is meant by Current Liabilities?
9. How are calls in arrear shown in Balance Sheet?
10. What is meant by 'Share Application money, Pending Allotment'?

Short Answer Type Questions :

1. Which statements are included in the financial statements under section 2(40) of the Companies Act, 2013?
2. Write main Characteristics of financial statements.
3. Write four objectives of financial statements.
4. What is meant by current Assets?
5. Explain meaning of Trade Receivables.
6. Write four items to be shown under the head 'Reserves and surplus' of Balance sheet.
7. What is 'Share options outstanding Account'? Explain.
8. Write the name of five sub heads comprising under the head 'Non-Current Assets'?
9. Explain cash Equivalents.

Essay Type Questions :

1. What do you mean by financial statements? Describe Characteristics and objectives of these statements.
2. What do you mean by Balance Sheet? Give its format.
3. What is meant by Profit and Loss Statement? Give its format.
4. Explain Contingent Liabilities and Commitments.
5. Under which heads will you show the following items in the Balance Sheet of a Company?
   (i) Money received against share warrants.   (ii) Provision for Provident Fund.
   (iii) Sundry Debtors and B/R.   (iv) Loan repayable on demand.
   (v) Goodwill, patents and Trade Marks.   (vi) Government Subsidy Reserve.
   (vii) Forfeited shares.   (viii) Share options outstanding
   (ix) Premium on redemption of debentures   (x) Shares in Hindalco Ltd.

6. Under which major head will you show the following items in the Statement of Profit and Loss of a Company?

(i) Rent received (ii) Revenue from Project consultancy

(iii) Revenue from operations-Return (iv) Refund of Income Tax

(v) Leave Encashment Expenses (vi) Profit on sale of Investments

(vii) Transfer Fees (viii) Loss on sale of Investments

(ix) Sale of Scrap (x) Stores and Spare parts used

(xi) Salary and Wages (xii) Manufacturing Expenses

(xiii) Telephone and Internet Expenses (xiv) Share issue expenses written off

(xv) Lease Rent

Answers of Multiple Choice Questions

Question No.	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)
Answer	C	A	B	A	D	D	D	D	A	C

Numerical Questions :

1. From the following information calculate Revenue from operations, Other Income and Total Revenue of a non-financial company:

   Revenue from sales ₹30,00,000; Sales Return ₹6,50,000; Sale of Scrap ₹1,50,000; Interest on Bank Deposit ₹2,00,000; Interest earned on Debentures ₹50,000.

   Answer: [₹25,00,000, ₹2,50,000 and ₹27,50,000]

2. From the following information of Religare Ltd. (a financial Company), calculate Revenue from Operations, other Income and Total Revenue:

   Profit or Sale of Investments ₹5,00,000; Profit on sale of Building ₹4,50,000; Miscellaneous Income ₹50,000; Dividend Received ₹4,00,000; Interest on Loan ₹25,00,000.

   Answer: [₹34,00,000, ₹ 5,00,000 and ₹ 39,00,000]

3. The following balances are taken from Trial Balance of a company :

	₹
Loan from IDBI	5, 00, 000
Plant and Machinery	2, 58, 000
Investments	2, 47, 000
Trade Receivables	2, 25, 000
Inventory	1, 75, 000
Land and Buildings	3, 70, 000
Furniture	45, 000
Debit balance of Statement of Profit & Loss	50, 000
Cash and Cash Equivalents	51, 000

   You are required to draw up assets side of Balance Sheet as per Companies Act, 2013.

   Answer: [Total of Assets side ₹ 13,71,000]

4. The following balances are taken from Trial Balance of a Company:

	₹
1, 20, 000 Equity Shares of ₹ 10 each fully called up	12,00,000
Calls in arrears on 5000 shares @ ₹2 each	10,000
General Reserves	5, 80, 000

Preliminary Expenses	20, 000
Provision for Provident fund	1, 20, 000
Trade Payables	3, 00, 000
Loan from Bank	5, 00, 000
Provision for Doubtful Debt	40, 000

You are required to prepare Equity and Liabilities side of Balance Sheet as per Companies Act, 2013.

Answer: [Total of Equity and Liability Side ₹ 27, 10, 000]

5. Prepare Notes to Accounts on Employee Benefit Expenses from the following information for the year ended 31st March, 2017:

	₹
(i) Entertainment Expenses	1, 50, 000
(ii) Staff Welfare Expenses	2, 70, 000
(iii) Travelling Expenses	80, 000
(iv) Bonus	5, 50, 000
(v) Salaries	18, 70, 000
(vi) Wages	25, 20, 000

Answer: [₹ 52, 10, 00]

6. From the following information prepare Balance Sheet of Suzuki Ltd. as at 31st March, 2017.

	₹
Share Capital	24, 00, 000
Deferred Tax Liabilities	60, 000
General Reserve	6, 00, 000
Balance of Statement of Profit & Loss (Cr)	5, 20, 000
Tangible Fixed Assets	34, 60, 000
Trade Receivables	8, 00, 000
Provision for Doubtful Debts	40, 000
Trade Payables	3, 20, 000
Provision for Tax	80, 000
Proposed Dividend	2, 40, 000

Answer: [Total Balance sheet ₹ 42,60,000]

7. From the following inforamtion, prepare Statement of Profit and Loss of Shubham Ltd. for the year ending 31st March, 2017.

	₹
Sales	45, 00, 000
Cost of Material Consumed	8, 0, 000
Purchase of Stock-in-Trade	30, 00, 000
10% Debentures (Issued on 01.04.2016)	2, 00, 000
Depreciation on Machinery	50, 000
Interest received	60, 000
Wages	1, 80, 000
Salaries	60, 000

Sale of Scrap	10, 000
Opening Stock-in-Trade	3, 00, 000
Closing Stock-in-Trade	5, 00, 000

Answer: [Profit before Tax ₹ 6, 60, 000]

8. From the following information, prepare Balance Sheet of Ganesh Ltd. as at 31st Mach, 2017.

		₹
50, 000 Equity Shares of ₹ 10 each fully paid		5,00, 000
25000 8% Preference Shares of ₹ 10 each fully paid		2, 50, 000
7% Debentures		5, 00, 000
Trade creditors		5, 72, 500
Cash and Cash Equivalents		1, 37, 500
Provision for Tax		85, 000
Goodwill at cost		1, 25, 000
Balance of Statement of Profit & Loss (Dr)		1, 50, 000
Provision for Doubtful Debts		10, 100
Tangible Fixed Assets at cost		25, 00, 000
Other Current Assets		3, 25, 000
General Reserve		10, 25, 000
Short Term Loans		13, 50, 000
Long Term Advances		1, 86, 000
Short Term Advances		56, 500
Securities Premium		2, 37 500
Non- Current Investments		1, 00, 000
Current Investments		12, 600
Sundry Debtors		6, 12, 500
Creditors for Expenses		1, 00, 000
Closing Stock :		
Stores	2, 00, 000	
Finished goods	3, 75, 000	5, 75, 000
Capital work in Progress		1, 00, 000
Accumulated Depreciation on fixed Assets		2, 50,000

Answer: [Total of Balance Sheet ₹ 44, 80, 100]

❑ ❑ ❑

7

Joint Venture Accounts

Learning objectives :

After study of this chapter, you will be able to :

- Understand the meaning and Introduction of Joint Venture.
- Learn the difference between Joint Venture and Partnership.
- Know the method of accounting for Joint Venture.
- When Separate Books are kept for Joint Venture?
- When no Separate Books are kept for Joint Venture?
  (a) When each Venturer keeps records of his transactions only.
  (b) When each Venturer keeps records of his own as well as of other Co-adventurer's transactions.

Meaning and Introduction of Joint-Venture

Joint Venture is a special type of business or venture, which is executed by two or more persons. Such a business or a Venture is undertaken for specific type of business or for a certain period. As soon as that special business is accomplished or specified period is over, Joint Venture business comes to an end itself. The co-venturers divide the profit of Joint Venture or business in a specified pre-determined ratio. Every co-venturer brings his own share of capital for execution of Joint Venture business. Persons agreeing to work in a Joint-Venture are called co-venturers. A Joint Venture is a temporary partnership or it is an association of two or more persons who combine themselves for execution of business. Usually, the purchase and sale of particular articles, imports and exports work, building construction, underwriting of shares or debentures of a Company, purchase of land for developing and selling plots or constructing houses on those plots etc. are the works undertaken under Joint Venture.

Characteristics of Joint Venture

1. A Joint Venture is formed to complete a particular work or to execute a particular business or to undertake particular work to be complete in specified time.
2. Joint Venture comes to end automatically, as soon as that particular work is completed or specific time is over.
3. On dissolution of Joint Venture, account books are closed and Profit/Loss of the Venture is divided by co-venturers.
4. Joint Venture is always for a short period.
5. Joint Venture does not have any particular name. The co adventurers have freedom to run their own business along with Joint Venture.

Difference between Joint Venture and Partnership

S. No.	Basis of Difference	Joint-Venture	Partnership
1.	Title/Name	Joint Venture usually has no name.	Partnership firm always has some name.
2.	Object	The object of Joint-venture is to work for a	Partnership is formed to carry on the

		particular time or for particular business.	business continously.
3.	Registration	Joint Venture business does not require registration.	Partnership firm requires registration necessarily.
4.	Act	There is no separate Act for Joint-Venture.	When Partnership Act, 1932 is applicable for every partnership.
5.	Members	Members participating in Joint-Venture are called co-venturers.	Members participating in partnership are called partners.
6.	No. of Members	Minimum number of members in Joint Venture should be two and there is no prevention on maximum number.	Minimum number of members in partner-ship is two and maximum number is 50.
7.	Relationship	In Joint venture, Co-venturers have personal understanding.	In partnership, partners have relationship.

Accounting Methods for Joint Venture

There are mainly two methods of keeping Joint Venture accounts-

1. Separate set of books is kept for Joint-Venture.
2. No-Separate set of books is kept for Joint-Venture.
   (a) Each co-venturer keeps record of his own transactions only.
   (b) Each co-venturer keeps record of his own as-well-as of other co-adventurers.

1. To keep separate set of books

When all venturers normally belong to same place and Joint Venture business is large or co-venturers have decided to keep separate set of books, then this method of accounting is adopted. This method is based on complete double entry system. Under this method, following accounts are opened-

(1) Joint Venture Account

(2) Joint Bank Account

(3) Co-Venturer's Personal/Capital Accounts.

Under this method co-venturers bring their respective share of capital which is deposited in Joint Bank Account. Joint Bank Account is used for recording all cash transactions, i.e. payment for expenses and purchases as well receipts from sales. Joint Venture Account is like a Trading and Profit & Loss Account. All purchases and expenses are recorded on debit side and sales and other incomes on credit side. Difference in this account shows Profit or Loss which is distributed among the co-venturers on closure of Joint-Venture, Co-venturers withdraw their respective balances from Joint-Bank Account and the books of accounts are closed. Journal entries are passed as under:

1. When cash is brought by co-venturers to contribute share of capital-

   Joint-Bank A/c Dr.

   To Co-Venturer's Personal Accounts

   (Being contribution of cash made by co-venturers)

2. When goods are purchased for Joint Venture

   Joint Venture A/c Dr.

   To Joint Bank A/c

   (Being goods bought in cash)

3. When expenses are incurred and paid by Joint Venture

   Joint Venture A/c Dr.

   To Joint Bank A/c

   (Being expenses paid in cash)

Important Note:- When goods are purchased on credit for Joint-Venture, credit the account of the supplier instead of Joint Bank A/c. If goods are supplied by any co-venturer, his account shall be credited instead of Joint Bank A/c. Similarly, if any expense is paid by co-venturer, his account should be credited.

4&5 When goods are sold on Joint Venture

(i) For Cash Sales: -

Joint Bank A/c Dr.

To Joint Venture A/c

(Being goods sold for cash)

(ii) For Credit Sale: -

Customer's A/c Dr.

To Joint Venture A/c

(Being goods sold on credit)

6. When goods are sold on credit and amount is received from debtor:

Joint Bank A/c Dr.

To customer's A/c

(Being cash received from the Debtor)

Note: If discount is allowed to debtor, or any debtor fails to make payment, i.e. bad debts, debit the account of Joint Venture in both the cases.

7. When goods are bought on credit and the payment is made to creditors/suppliers.

Supplier's A/c Dr.

To Joint Bank A/c

(Being cash paid to supplier)

Note: If discount is received on payment. Joint Venture A/c will be credited with the amount of discount.

8. When a co-venturer takes remaining goods of Joint-Venture

Co-Venturer's A/c Dr.

To Joint Venture A/c

(Being stock taken by co-venturer)

9. If interest on capital is allowed or commission is given to co venturer.

Joint Venture A/c Dr.

To Co-venturer's A/c

(Being interest/commission credited)

10. When Profit on Joint Venture is distributed on its closure.

Joint Venture A/c Dr.

To Co-Venturer's A/c

(Being profit on joint venture distributed)

11. When there is loss on joint Venture, which is to be divided

Co-Venturer's A/c Dr.

To Joint Venture A/c

(Being loss on joint venture distributed)

12. On closure of Joint-Venture, the balances of co-venturer's account are withdrawn:-

Co-Venturer's A/c Dr.

To Joint Bank A/c

(Being balances of co-venturer's paid off)

Note: If the personal account of any co-venturer shows debit balance, then first the payment will be received and then rest of co venturers will be paid off.

Illustration1:

Vivek, Bhavesh and Parth entered into Joint Venture to divide profit equally. On January 1, 2016 they opened a separate Bank Account contributing Vivek ₹ 30,000 Bhavesh ₹ 40,000 and Parth ₹ 90,000. It was also decided to charge interest on such contribution @ 6% per annum. Goods were bought from Anil for ₹ 1,25,000 and Vivek's stock was taken for ₹ 25,000 by Joint Venture. They settled their account with Anil by cheque and paid ₹ 10,600 for other expenses.

Vivek sold goods of the Joint Venture partly for cash for ₹ 80,000 and the remaining goods to Sunil on credit for ₹ 1,20,000, Sunil accepted a bill for the same amount which was then discounted for ₹ 1,17,000. The initial capital was returned to the co-venturers on 31 March, 2016. Vivek was allowed 5% commission on sale for his service.

Pass the Journal entries and open the necessary accounts in the books of Joint Venture assuming the final settlement was made on 31 March, 2016.

Date	Particulars		L.F.	Amount (₹) Dr.	Amount (₹) Cr.
1	Joint Bank A/c	Dr.		1,60,000	
	To Vivek's A/c				30,000
	To Bhavesh's A/c				40,000
	To Parth's A/c				90,000
	(For cash contributed by co-venturers)				
2	Joint Venture A/c	Dr.		1,25,000	
	To Anil's A/c				1,25,000
	(Being goods purchased)				
3	Joint Venture A/c	Dr.		25,000	
	To Vivek's A/c				25,000
	(For stock taken from Vivek's)				
4	Anil's A/c	Dr.		1,25,000	
	To Joint Bank A/c				1,25,000
	(For payment made to Anil)				
5	Joint Venture A/c	Dr.		10,600	
	To Joint Bank A/c				10,600
	(For expenses paid)				
6	Joint Bank A/c	Dr.		80,000	
	To Joint Venture A/c				80,000
	(Goods sold for cash)				
7	Sunil's A/c	Dr.		1,20,000	
	To Joint Venture A/c				1,20,000
	(Goods sold to Sunil on credit)				
8	Bills Receivable A/c	Dr.		1,20,000	
	To Sunil's A/c				1,20,000
	(Acceptance received from Sunil)				

9	Joint Bank A/c Dr.		1,17,000	
	Joint Venture A/c Dr.		3,000	
	To B/R A/c			1,20,000
	(Bill discounted from bank)			
10	Vivek's A/c Dr.		30,000	
	Bhavesh's A/c Dr.		40,000	
	Parth's A/c Dr.		90,000	
	To Joint Bank A/c			1,60,000
	(Capital returned to co-venturers)			
11	Joint Venture A/c Dr.		10,000	
	To Vivek's A/c			10,000
	(Being commission on sales credited to Vivek)			
12	Joint Venture A/c Dr.		2,400	
	To Vivek's A/c			450
	To Bhavesh's A/c			600
	To Parth's A/c			1,350
	(Interest on capital credited)			
13	Joint Venture A/c Dr.		24,000	
	To Vivek's A/c			8,000
	To Bhavesh's A/c			8,000
	To Parth's A/c			8,000
	(Being profit on joint venture credited)			
14	Vivek's A/c Dr.		43,450	
	Bhavesh's A/c Dr.		8,600	
	Parth's A/c Dr.		9,350	
	To Joint Bank A/c			61,400
	(Being final payment made to co-venturers)			

Joint Bank Account

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
2016	To Vivek	30,000	2016	By Anil	1,25,000
Jan., 1	To Bhavesh	40,000	Jan., 1	By Joint Venture A/c	10,600
	To Parth	90,000		By Vivek (return of capital)	30,000
	To Joint Venture A/c	80,000		By Bhavesh (return of capital)	40,000
	To B/R A/c	1,17,000		By Parth (return of capital)	90,000
			Mar., 31	By Vivek (final payment)	43,450
				By Bhavesh (final payment)	8,600
				By Parth (final payment)	9,350
		3,57,000			**3,57,000**

Joint Venture Account

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Anil's A/c	1,25,000		By Sunil's A/c	1,20,000

	To Vivek (stock)	25,000		By Joint Bank A/c	80,000
	To Joint Bank (Exp.) A/c	10,600			
	To B/R A/c (Discounted)	3,000			
	To Vivek (interest)	450			
	To Bhavesh (interest)	600			
	To Parth (interest)	1,350			
	To Vivek (Commission)	10,000			
	To Profit				
	Vivek 8000				
	Bhavesh 8000				
	Parth 8000	24,000			
		2,00,000			**2,00,000**

Vivek's Account

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
2016	To Joint Bank A/c	30,000	2016	By Joint Bank A/c	30,000
Mar., 31	To Joint Bank A/c		Jan.,1	By Joint Venture A/c	25,000
	(Final payment) (B.F.)	43,450		By Joint Venture A/c	10,000
				By Joint Venture A/c	450
				By Joint Venrure A/c	8,000
		73,450			**73,450**

Bhavesh's Account

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
2016	To Joint Bank A/c	40,000	2016	By Joint Bank A/c	40,000
Mar.31	To Joint Bank A/c		Jan. 1	By Joint Venture A/c	600
	(Final payment) (B.F.)	8,600		By Joint Venture A/c	8,000
		48,600			**48,600**

Parth's Account

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
2016	To Joint Bank A/c	90,000	2016	By Joint Bank A/c	90,000
Mar., 31	To Joint Bank A/c	9,350	Jan., 1	By Joint Venture A/c	1,350
	(Final payment) (B.F.)			By Joint Venture A/c	8,000
		99,350			**99,350**

Illustration2 :

Ramesh and Naresh doing business separately as building contractors undertake jointly to construct a building for newly started joint stock company for a contract price of ₹4, 00, 000, payable ₹ 3, 20, 000 by installments in cash and ₹80, 000 in fully paid shares of the company. A Joint Bank Account is opened in Punjab National Bank and all cash transactions are recorded through the Bank. Ramesh and Naresh deposited ₹1, 00, 000 and ₹60, 000 in the Bank respectively.They share profit or loss in the proportion of 2 : 1 respectively. The transactions of joint venture were as follows: - Wages paid ₹1, 00, 000; Purchases of material ₹1, 20, 000; Sundry Expenses paid ₹48, 000; Ramesh gave material from his stock ₹16, 000; Naresh gave material from his stock ₹10, 000; Architect's fees paid by Ramesh ₹ 8, 000.

The contract was completed and the contract price was duly received. The Joint venture was terminated.

Ramesh took all the share of Joint stock Company at price of ₹72, 000 and Naresh took the remaining stock of material of ₹12, 000.

Prepare the necessary accounts for the joint venture.

Joint Venture Account

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Joint Bank A/c (Purchase)	1,20,000		By Joint Bank A/c (Contract Money)	3,20,000
	To Joint Bank A/c (Wages)	1,00,000		By Share of company	80,000
	To Joint Bank A/c (Exp.)	48,000		By Naresh's A/c (Stock)	12,000
	To Ramesh's A/c (Stock)	16,000			
	To Naresh's A/c (Stock)	10,000			
	To Ramesh A/c (Architect fees)	8,000			
	To Share of Co. (Loss)	8,000			
	To Profit				
	Ramesh 68000				
	Naresh 34000	1,02,000			
		4,12,000			**4,12,000**

Joint Bank Account

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Ramesh's A/c	1,00,000		By Joint venture A/c	1,20,000
	To Naresh's A/c	60,000		By Joint venture A/c	1,00,000
	To Joint Venture A/c (Contract Money)	3,20,000		By Joint venture A/c	48,000
				By Ramesh's A/c (Final Payment)	1,20,000
				By Naresh's A/c (Final Payment)	92,000
		4,80,000			**4,80,000**

Ramesh's Account

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Shares of company	72,000		By Joint Bank A/c	1,00,000
	To Joint Bank A/c (B.F.) (Final Payment)	1,20,000		By Joint Venture A/c	16,000
				By Joint Venture A/c	8,000
				By Joint Venture A/c	68,000
		1,92,000			**1,92,000**

Naresh's Account

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Joint Venture A/c	12,000		By Joint Bank A/c	60,000
	To Joint Bank A/c (B.F.) (Final Payment)	92,000		By Joint Venture A/c	10,000
				By Joint Venture A/c	34,000
		1,04,000			**1,04,000**

Illustration 3 :

Mahesh and Suresh of Jaipur entered in a joint venture for a land development scheme. They opened a Bank Account in the joint name by depositing ₹5,00,000 and ₹ 3,00,000 on 1 January, 2015 respectively. They decided to share profit and loss in the ratio 5 : 3.

A part of land purchased for ₹ 6,00,000, ₹ 65,000 was paid for its registration charge, ₹ 90,000 were paid for the expenses of development of land. The land was divided in to 40 plots.

The plots were sold as under: 25 plots at ₹ 35000 each. 07 plots at ₹ 31000 each, brokerage was paid ₹ 40000. The remaining plots were taken at a price of ₹ 22000 for each plot by both equally. Prepare necessary accounts in the books of Joint Venture.

Joint Venture Account

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Joint Bank A/c (Purchases)	6,00,000		By Joint Bank A/c (Sales) (25x35,000)	8,75,000
	To Joint Bank A/c (Registration fees)	65,000		By Joint Bank A/c (7 x 31,000)	2,17,000
	To Joint Bank A/c (Direct Exp.)	90,000		By Mahesh's A/c (Stock) (4 x 22,000)	88,000
	To Joint Bank A/c (Brokerage)	40,000		By Suresh's A/c (Stock) (4 x 22,000)	88,000
	To Profit Mahesh 2,95,625 Suresh 1,77,375	4,73,000			
		12,68,000			**12,68,000**

Joint Bank Account

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Mahesh's A/c	5,00,000		By Joint Venture A/c	6,00,000
	To Suresh's A/c	3,00,000		By Joint Venture A/c	65,000
	To Joint Venture A/c	8,75,000		By Joint Venture A/c	90,000
	To Joint Venture A/c	2,17,000		By Joint Venture A/c	40,000
				By Mahesh's A/c	7,07,625
				By Suresh's A/c	3,89,375
		18,92,000			**18,92,000**

Mahesh's Account

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Joint Venture A/c	88,000		By Joint Bank A/c	5,00,000
	To Joint Bank A/c (B.F.)	7,07,625		By Joint Venture A/c	2,95,625
		7,95,625			**7,95,625**

Suresh's Account

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Joint Venture	88,000		By Joint Bank A/c	3,00,000
	To Joint Bank A/c (B.F.)	3,89,375		By Joint Venture A/c	1,77,375
		4,77,375			**4,77,375**

When Separate Books are not maintained for Joint Venture

When all co-venturers do not live at one place and joint-venture business is not very large then separate set of books may not be maintained for Joint venture. In such a case, co-venturers can maintain Joint-venture transactions in their respective books. Under this case, any one of the following methods may be adopted for recording joint venture transactions.

(a) Each co-venturer keeps record of his own transactions only.

(b) Each co-venturer keeps record of his own as-well-as of other co-venturers transactions.

(a) When each co-venturer keeps record of his own transactions only

Under this method of accounting each co-venturer opens an account in his books.

(i) Joint Venture with………… Account. The nature of this Account is personal account. At the closure of Joint Venture, this account will reveal amount due to or due from other co-venturers.

(ii) Joint Venture with…… Account will be debited with the amount of payments i.e. purchases, expenses incurred etc. and this account is credited with the amount received against sales.

(iii) On remitting cash to other co-venturer the above Account is debited and if cash is received, this Account is credited.

(iv) On closure of the venture, every co-venturer will send to other co-venturer, copy of the Joint Venture with….. Account. On receipt of that copy of Account, each co-venturer will prepare "Memorandum Joint Venture Account". The nature of this Account is that of Trading and Profit & Loss Account.

(v) In Memorandum Joint Venture Account the amount of purchases and all expenses incurred will be written on debit side and the amount of sales on credit side along with the amount of any other income, if any. The debit balance of this account shows the amount of loss and credit balance, the profit.

(vi) On disclosing profit by Memorandum Joint Venture Account for division of the profit "Joint Venture with…….. Account" is debited and Profit & Loss Account credited. In case of loss, reverse entry is to be passed.

Important Notes : Under this method no entry is passed for dispatching goods by one co-venturer to another. The following entries are passed under this method :

1. For purchasing goods by him-self

   Joint Venture with ….. A/c Dr.

   To Cash/Bank Account

2. For payment of expenses by him-self

   Joint Venture with…….. A/c Dr.

   To Cash/Bank A/c

3. For selling goods by him-self

   Cash/Bank A/c Dr.

   To Joint Venture with ………A/c

4. For unsold stock kept by him-self

   Purchases A/c Dr.

   To Joint Venture with……….A/c

5. For own commission and Interest

   Joint Venture with …… A/c Dr.

   To Commission A/c

   To Interest A/c

6. For own share of profit from Joint Venture
   Joint venture with..... A/c Dr.
   To Profit & Loss Account
7. For own share of loss from Joint Venture
   Profit & Loss A/c Dr.
   To joint Venture with.......... A/c
8. For making payment to other co-venturer
   Joint venture with .... A/c Dr.
   To Cash/Bank A/c
9. For receiving payment from other co-venturer
   Cash/Bank A/c Dr.
   To Joint Venture with.......... A/c

Illustration 4:

Kamal and Vimal entered into Joint Venture for purchases and sales of wheat and their profit and loss sharing ratio is 2 : 1, Kamal purchased 100 bags of wheat @ ₹800 each bag and paid carriage ₹ 800, storage godown rent ₹ 600 in cash. Vimal purchased 80 bags of wheat @₹ 610 each bag. Brokerage and carriage paid ₹ 700, godown rent ₹ 400 and insurance premium ₹ 300 paid in cash.

Kamal sold wheat for ₹ 77, 500 and received amount in cash. Vimal sold wheat for ₹ 49,200 and remaining stock taken by Kamal for ₹ 9,200.

Prepare necessary Journal and ledger in the books of both parties.

In the Books of Kamal
Journal

Date	Particulars	L.F.	Amount (₹) Dr.	Amount (₹) Cr.
1	Joint Venture with Vimal's A/c Dr.		80,000	
	To Bank A/c			80,000
	(Being goods purchased)			
2	Joint Venuture with Vimal's A/c Dr.		1,400	
	To Cash A/c			1,400
	(Being rent and carriage paid)			
3	Cash A/c Dr.		77,500	
	To Joint Venture with Vimal's A/c			77,500
	(Being goods sold)			
4	Purchases A/c Dr.		9,200	
	To Joint Venture with Vimal's A/c			9,200
	(Being stock taken over)			
5	Joint Venture with Vimal's A/c Dr.		2,867	
	To P&L A/c			2,867
	(Share in profit from Joint Venture)			

Joint Venture with Vimal's Account

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Bank A/c (Purchase)	80,000		By Cash A/c (Sales)	77,500
	To Cash A/c (Expenses)	1,400		By Purchase A/c (Stock)	9,200
	To P&L A/c (Profit)	2,867			
	To Balance c/d (Due to Vimal)	2,433			
		86,700			**86,700**

In the Books of Vimal
Journal

Date	Particulars	L.F.	Amount (₹) Dr.	Amount (₹) Cr.
1	Joint Venture with Kamal's A/c Dr.		48,800	
	To Bank A/c			48,800
	(Being goods purchased)			
2	Joint Venuture with Kamal's A/c Dr.		1,400	
	To Cash A/c			1,400
	(Being expenses paid)			
3	Cash A/c Dr.		49,200	
	To Joint venture with Kamal's A/c			49,200
	(Being goods sold)			
4	Joint venture with Kamal's A/c Dr.		1,433	
	To P&L A/c			1,433
	(Being share of profit on Joint Venture transferred)			

Joint Venture with Kamal's Account

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Bank A/c (Purchase)	48,800		By Cash A/c (Sales)	49,200
	To Cash A/c (Expenses)	1,400		By Balance c/d	2,433
	To P&L A/c (Profit)	1,433		(Due to Kamal)	
		51,633			**51,633**

Memorandum Joint Venture Account

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Purchase A/c (Kamal)	80,000		By Sales A/c (Kamal)	77,500
	To Purchase A/c (Vimal)	48,800		By Sales A/c (Vimal)	49,200
	To Expenses (Kamal)	1,400		By Kamal's A/c (Stock)	9,200
	To Expenses (Vimal)	1,400			
	To Profit				
	Kamal 2,867				
	Vimal 1,433	4,300			
		1,35,900			**1,35,900**

Illustration 5 :

A of Ahmedabad and B of Delhi entered into a Joint Venture to consign 100 bales to C at Bangalore to be sold at their joint risk. They agree to share profit or loss equally. 'A' sent 50 bales valued ₹ 60, 000 and paid ₹1200 for sundry expenses. 'B' sent 50 bales valued at ₹ 56,000 and paid ₹ 1,000 sundry expenses.

All the bales reached Bangalore in time. However 5 bales were found damaged and 'B' could recover ₹ 5,000 from insurance company for its claim. 'C' sold remaining bales for ₹ 1,30,000. He remitted the balance amount to 'A' after deducting 5% commission on sale and ₹ 1,500 for other expenses. Prepare A's account in the books of B and B's account in the books of A and Memorandum Joint Venture Account.

Memorandum Joint Venture Account

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Purchases A/c (A)	60,000		By Insurance claim (B)	5,000
	To Expenses (A)	1,200		By Sales A/c (C)	1,30,000
	To Purchases A/c (B)	56,000			
	To Expenses (B)	1,000			
	To Commission & Exp. (C)	8,000			
	To Profit				
	A 4400				
	B 4400	8,800			
		1,35,000			**1,35,000**

In the Books of A
Joint Venture with B's A/c

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Bank A/c (Purchases)	60,000		By Cash A/c	1,30,000
	To Bank A/c (Expenses)	1,200			
	To P&L A/c	4,400			
	To Commission (C)	8,000			
	To Bank A/c (b/f)	56,400			
		1,30,000			**1,30,000**

In the Books of B
Joint Venture with A's A/c

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Bank A/c (Purchases)	56,000		By Bank A/c	5,000
	To Bank A/c (Expenses)	1,000		By Bank A/c (b/f)	56,400
	To P&L A/c	4,400			
		61,400			**61,400**

Illustration 6 :

Bharat of Delhi and Anil of Bhilwara entered into Joint Venture for purchase and sale of old machines. It was decided to share profit or loss equally. Anil remitted ₹40, 000 to Bharat. Bharat purchased old machines worth ₹45,000 and paid 2% purchased commission, ₹ 10, 000 for its repairs and ₹ 600 for other sundry expenses. Then he dispatched machines to Bhilwara. Anil took the delivery of the machinery paying ₹2, 000 freight, ₹1, 000 octroi. He sold or for some machines ₹ 85, 000 and kept remaining one for himself at an agreed value of ₹7, 200. His other expenses were: godown rent ₹ 400 and ₹ 1, 800 advertisement and selling expenses. Final settlement was made on joint venture.

Prepare Memorandum Joint Venture Account and Anil's Account in the books of Bharat and Bharat Account in the books of Anil.

Memorandum Joint Venture Account

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Purchases A/c (Bharat)	45,000		By Sales (Anil)	85,000
	To Expenses (Bharat)			By Stock A/c (Anil)	7,200
	Purchase Commission 900				
	Repairs 10000				
	Sundry Expenses 600	11,500			
	To Expenses (Anil)				
	Freight 2000				
	Octroi 1000				
	Godown rent 400				
	Advertisement Exp. 1800	5,200			
	To Profit				
	Bharat 15250				
	Anil 15250	30,500			
		92,200			**92,200**

In the Books of Bharat

Joint Venture with Anil A/c

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Bank A/c	45,000		By Bank A/c	40,000
	To Bank A/c	11,500		By Bank A/c	31,750
	To P&L A/c	15,250			
		71,750			**71,750**

In the Books of Anil

Joint Venture with Bharat A/c

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Bank A/c	40,000		By Bank A/c	85,000
	To Bank A/c	5,200		By Purchase A/c	7,200
	To P&L A/c	15,250			
	To Bank A/c (B.F.)	31,750			
		92,200			**92,200**

(b) Each Co-Venturer recording all the transactions of Joint-Venture :

Under this method of recording transactions every Co-Venturer keeps record of all transactions of Joint Venture. For this purpose two accounts are opened by every Co-Venturer Viz, Joint Venture Account and Co-venture's personal Account. In this case, Joint Venture Account is of the nature of Trading and Profit & Loss Account, which discloses Profit or Loss of the Venture. Under this method every Co-Venturer sends the record of his transactions to the other Co-Venturer from the time to time to enable him to enter those transactions in his books. Then on the closure of Joint-Venture, accounts are settled.

Journal Entries

(1) When goods are purchased by himself and expenses incurred

Joint Venture A/c Dr.

To Cash/Bank Account

(Being goods purchased and expenses incurred)

Note : If goods are purchased on credit, supplier's personal account will be credited instead or cash or Bank A/c.

(2) When goods are sold by himself

Cash/Bank A/c Dr.

To Joint Venture A/c

(Being goods sold by himself)

Note: - If goods are sold on credit, personal account of the purchaser will be debited instead of Cash or Bank.

(3) When goods are purchased and expenses incurred by Co-Venturer

Joint Venture A/c Dr.

To Co-Venturer's A/c

(Being goods purchased and expenses incurred by Co-Venturer)

(4) When goods are sold by Co-venturer

Co-Venturer's A/c Dr.

To Joint Venture A/c

(Being goods sold by Co-Venturer)

(5) For realising interest and commission for himself from Join Venture

Joint Venture A/c Dr.

To Interest A/c

To Commission A/c

(Being interest and commission charge)

(6) For purchasing remaining goods by himself

Purchases A/c Dr.

To Joint Venture A/c

(Unsold stock taken)

(7) For unsold stock taken by Co-Venturer at an agreed venture

Co-Venturer A/c Dr.

To Joint venture A/c

(Stock purchased by Co-Venturer)

(8) For charging Interest and Commission by Co-Venturer

Joint venture A/c Dr.

To Co-venturer's A/c

(Being interest and commission charged by........)

(9) When joint venture discloses profit and distribution the same by Co-Venturers

Joint Venture A/c Dr. (Total Profit)

To P & L A/c (own share)

To co-venturer's A/c (Share of Profit of other Co-venturer)

(Being profit distributed in joint venture)

Note: - in case of **l**oss reverse above entry.

10. For payment of amount to other Co-venturer

Co-venturer's A/c Dr.

To Cash/Bank/B/P A/c

(Being cash remitted, B/P accepted)

(11) When payment is received from other Co-Venturer

Cash/Bank/B/R A/c Dr.

To Co-Venturer's A/c

(Being cash/B/R received)

(12) If he himself gives goods from his shop or godown

Joint Venture A/c Dr.

To sales A/c

(Being goods given for joint venture)

Important Notes: -

(1) When a B/R is received from the customer and discounted from the bank; the amount of discount should be debited to Joint Venture A/c.

(2) If goods supplied from his own stock/shop at cost price, credit purchases account instead of sales account as in Journal entry no.12 above.

(3) If goods are sold on credit, the amount received from the debtor (customer) will be recorded in the books of that Co-Venturer, who receives the remittance? The entry will be-

Cash/Bank A/c Dr. with amount received

Joint Venture A/c Dr. with amount of discount or bad debts

To customer's or debtor's A/c Total amount due from him

(Being amount received from Joint Venture customer, discount allowed or bad debts written off)

(4) When discount is allowed to customer to whom goods were sold on credit or he becomes insolvent (Bad debts), with the amount of discount or bad debts, the entry to be passed by another Co-Venturer is-

Joint Venture A/c Dr.

To Co-venturer's A/c

(Cash discount allowed/baddebts entered in J.V. A/c)

Illustration 7 :

Sunil and Kapil entered into Joint Venture for the purchase of goods from Delhi to be sold at Udaipur and to distribute profit and loss equally. Kapil sent a bank draft to Sunil of ₹ 1,50,000 for purchase of goods on 1st January 2016. Sunil informed that 300 shirts @ ₹ 400 each, 200 Shirts @ ₹ 600 each have been purchased and sent to Udaipur and paid ₹ 5,000 as packing charges.

After receiving goods, Kapil brought goods at his shop and paid ₹ 1,200 as expenses, ₹ 1,300 for advertisement expenses and ₹ 500 for godown rent. Kapil sold 250 shirts for ₹ 550 per shirt and 200 shirts at ₹ 780 per shirt and remaining shirts were taken by Kapil for ₹ 2,500. Both sent statements to each other for their transactions. Prepare journal entries and necessary accounts in the books of both venturers. Remaining payment is made through bank draft.

In the Books of Sunil

Journal

Date	Particulars	L.F.	Amount (₹) Dr.	Amount (₹) Cr.
1	Joint Venture A/c Dr. To Cash A/c (Being goods purchased)		2,50,000	 2,50,000

2	Joint Venuture A/c Dr. To Cash A/c (Being expenses paid)		5,000	5,000
3	Bank A/c Dr. To Kapil's A/c (Cash received from Kapil)		1,50,000	1,50,000
4	Kapil's A/c Dr. To Joint venture A/c (Goods sold by Kapil)		2,93,500	2,93,500
5	Kapil's A/c Dr. To Joint venture A/c (Stock taken by Kapil)		2,500	2,500
6	Joint Venture A/c Dr. To Kapil's A/c (Expenses paid by Kapil)		3,000	3,000
7	Joint venture A/c Dr. To P&L A/c To Kapil's A/c (Profit on joint venture credited)		38,000	19,000 19,000
8	Bank A/c Dr. To Kapil's A/c (Balance amount received)		1,24,000	1,24,000

Joint Venture Account

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Cash A/c (Purchases)	2,50,000		By Kapil's A/c (Sales)	2,93,500
	To Cash A/c (Expenses)	5,000		By Kapil's A/c (Stock)	2,500
	To Kapil's A/c (Expenses)	3,000			
	To P&L A/c	19,000			
	To Kapil's A/c	19,000			
		2,96,000			**2,96,000**

Kapil's A/c

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Joint venture (sales)	2,93,500		By Bank A/c	1,50,000
	To Joint venture (Stock)	2,500		By Joint venture A/c	3,000
				By Joint venture A/c	19,000
				By Bank A/c (B.F.)	1,24,000
		2,96,000			**2,96,000**

In the Books of Kapil Journal

Date	Particulars	L/F	Amount (₹) Dr.	Amount (₹) Cr.
1	Sunil's A/c Dr. To Bank A/c (DD sent to Sunil)		1,50,000	1,50,000

2	Joint Venuture A/c Dr.			3,000	
	To Cash A/c				3,000
	(Expenses paid)				
3	Joint venture A/c Dr.			2,50,000	
	To Sunil's A/c				2,50,000
	(Goods purchased by Sunil)				
4	Joint Venture A/c Dr.			5,000	
	To Sunil's A/c				5,000
	(Expenses paid by Sunil)				
5	Cash A/c Dr.			2,93,500	
	To Joint venture A/c				2,93,500
	(Goods sold)				
6	Purchase A/c Dr.			2,500	
	To Joint venture A/c				2,500
	(Stock taken over)				
7	Joint venture A/c Dr.			38,000	
	To P&L A/c				19,000
	To Sunil's A/c				19,000
	(Profit credited on joint venture)				
8	Sunil's A/c Dr.			1,24,000	
	To Bank A/c				1,24,000
	(Balance amount paid to Sunil)				

Joint Venture Account

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Cash A/c (Expenses)	3,000		By Cash A/c (Sales)	2,93,500
	To Sunil's A/c (Purchases)	2,50,000		By Purchases A/c	2,500
	To Sunil's A/c (Expenses)	5,000			
	To P&L A/c	19,000			
	To Sunil's A/c	19,000			
		2,96,000			**2,96,000**

Sunil's Account

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Bank A/c	1,50,000		By Joint venture A/c	2,50,000
	To Bank (B.F.)	2,500		By Joint venture A/c	5,000
				By Joint venture A/c	19,000
		2,74,000			**2,74,000**

Illustration 8 :

Amar and Kailash sent 100 bales to Suresh for sale in Joint Venture. They decide to distribute profit and loss in 3 : 2 ratio. Amar sent 60 bales @ ₹2800 per bale and paid ₹1200 for carriage and other expenses. Kailash sent 40 bales @ ₹ 2750 per bale and paid ₹ 1000 for carriage and other expenses.

Suresh sold all goods for ₹3,20,000. He spent following expenses for sale : godown rent ₹ 400, selling expenses ₹ 1200, After deducting his expenses and 3% commission, Suresh sent ₹ 2,00,000 to Amar and remaining amount to Kailash. Prepare Joint Venture Account and Co-Venturer Account in the books of both parties.

In the Books of Amar
Joint Venture Account

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Bank A/c (Purchases)	1,68,000		By Suresh"s A/c (Sales)	3,20,000
	To Bank A/c (Expenses)	1,200			
	To Kailash (Purchases)	1,10,000			
	To Kailash (Expenses)	1,000			
	To Suresh (Consignee)				
	Godown rent 400				
	Sundry Exp. 1,200				
	Commission 9,600	11,200			
	To Kailash (Share in profit)	11,440			
	To P&L A/c	17,160			
		3,20,000			**3,20,000**

Kailash's Account

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Suresh A/c (remitted)	1,08,800		By Joint venture A/c	1,10,000
	To Bank (Remittance) A/c	13,640		By Joint venture A/c	1,000
				By Joint venture A/c	11,440
		1,22,440			**1,22,440**

Suresh's (Consignee) Account

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Joint venture A/c (Sales)	3,20,000		By Joint venture A/c	1,600
				By Joint venture A/c	9,600
				By Bank A/c	2,00,000
				By Kailash's A/c	1,08,800
		3,20,000			**3,20,000**

In the Books of Kailash
Joint Venture Account

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Bank A/c (Purchases)	1,10,000		By Suresh A/c (Sales)	3,20,000
	To Bank A/c (Expenses)	1,000			
	To Amar's A/c (Purchases)	1,68,000			
	To Amar's A/c (Expenses)	1,200			
	To Suresh A/c (Consignee)				
	Godown Rent 400				
	Sundry Expenses 1,200				
	Commission 9,600	11,200			
	To Amar's A/c	17,160			
	To P&L A/c	11,440			
		3,20,000			**3,20,000**

Amar's Account

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Kamal's A/c	2,00,000		By Joint venture A/c	1,68,000
				By Joint venture A/c	1,200
				By Joint venture A/c	17,160
				By Bank A/c (Remittance)	13,640
		2,00,000			**2,00,000**

Suresh's (Consignee) Account

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Joint Venture A/c	3,20,000		By Joint Venture A/c	1,600
				By Joint Venture A/c	9,600
				By Amar's A/c	2,00,000
				By Bank A/c (Remittance)	1,08,800
		3,20,000			**3,20,000**

Illustration 9 :

Ravi and Kavi entered in joint Venture for purchase and sale of cloth and decide to distribute profit or loss in 3:2 ratio. Ravi purchased cloth for ₹ 1,00,000 and paid ₹ 1,000 freight, ₹ 200 insurance expenses, ₹ 800 carriage and ₹ 300 sundry expenses. Kavi purchased cloth for ₹ 60,000 and paid ₹ 400 godown rent, ₹ 100 insurance premium and ₹ 100 carriage. Ravi sold the cloth worth ₹ 1,20,000 and Kavi sold cloth for ₹ 76,000. Prepare necessary accounts in the books of both Co-Venturers.

In the Books of Ravi
Joint Venture Account

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Bank A/c (Purchases)	1,00,000		By Bank A/c (Sales)	1,20,000
	To Kavi's A/c (Purchases)	60,000		By Kavi's A/c (sales)	76,000
	To Bank A/c (Expenses)	2,300			
	To Kavi's A/c (Expenses)	600			
	To P&L A/c	19,860			
	To Kavi's (Profit)	13,240			
		1,96,000			**1,96,000**

Kavi's Account

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Joint venture A/c	76000		By Joint venture A/c	60000
				By Joint venture A/c	600
				By Joint venture A/c	13240
				By Bank A/c (B.F.)	2160
		76000			**76000**

In the Books of Kavi
Joint Venture Account

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Bank A/c (Purchases)	60,000		By Bank A/c	76,000

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Bank A/c (Expenses)	600		By Kavi's A/c (sales)	1,20,000
	To Ravi's A/c (Purchases)	1,00,000			
	To Ravi's A/c (Expenses)	2,300			
	To P&L A/c	13,240			
	To Ravi's A/c (Profit)	19,860			
		1,96,000			**1,96,000**

Ravi's Account

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Joint venture A/c	1,20,000		By Joint venture A/c	1,00,000
	To Bank A/c (B.F.)	2,160		By Joint venture A/c	2,300
				By Joint venture A/c	19860
		1,22,160			**1,22,160**

Summary

- **Joint Venture :** Two or more than two persons or companies, firms, organisations enter to execute specific work temperarily at joint risk or to purchase and sell of goods and decide to distribute profit and loss as per agreement. It is called Joint Ventre.
- **Applicability of Joint Venture :** It is appropriate for contracts related to construction of building, to purchase piece of land and divide it in to plots, underwriting contract for shares and debentures, imports exports business

Glossary

Co-Venturers or Co-adventurers : Persons who have agreed to work together by forming temporary partnership.

Joint Bank Account : An account opened by Co-Venturers in their Joint names for recording cash transactions.

Bills discounted : After acceptance is received receiving money prior to the date of maturity.

Questions for Exercise

Multiple Choice Questions :

1. What is the name of trade structure of Joint-Venture-
   (A) Partnership (B) Co-operative society
   (C) Group of people (D) Sole trader
2. The member who participate in Joint Venture is called-
   (A) Manager (B) Co-Venturer
   (C) Partner (D) Shareholder
3. Joint Venture Account is an example of-
   (A) Personal A/c (B) Real A/c
   (C) Nominal A/c (D) None of the Above
4. Maximum number of members in Joint Venture can be-
   (A) Two (B) 20
   (C) Ten (D) No Limit
5. On discounting bill from the Bank by Co-Venturer discount is debited to-
   (A) Discount A/c (B) Joint Venture A/c
   (C) Bank A/c (D) Co-Venturer A/c

Very Short Answer Type Questions :

1. State any two important point of difference in Joint Venture and Partnership?
2. State the maximum and minimum number of Venturers in joint venture?
3. When it is appropriate to keep separate books in Joint Venture?
4. In which ratio profit and loss of Joint Venture is distributed?
5. What is the nature of Memorandum Joint Venture Account?
6. When each Co-Venturer records his own transactions for the joint venture, which accounts will be opened by him? Give only names?
7. When dissolution of joint venture happens?
8. Joint Venture is appropriate for which type of organizations?
9. Which account is credited in Joint Venture for credit purchases?
10. When separate books of Joint Venture are kept, which types of accounts are opened? Give Names.

Short Answer Type Questions :

1. What is the Joint Venture?
2. What is the Memorandum Joint Venture Account? Why is it made?
3. What is the difference between Joint Venture Account and consignment Account?
4. State the methods of accounting for Joint Venture trancations.
5. What are the characteristics of Joint Venture?

Essay Type Questions :

1. What is the meaning of Joint Venture? Write the difference between Joint Venture and Partnership.
2. Explain with example, method of accounting for Joint Venture?

Answer of Multiple Choice Questions

Question No.	1	2	3	4	5
Answer	C	B	C	D	B

Numerical Questions :

1. Deepak and Mukesh entered into Joint Venture for purchase and sale of furniture. They opened a separate bank account Deepak contributing ₹ 80000 and Mukesh ₹ 50,000, It was also decided to share profit and loss in 2:3 ratio. They purchase goods for ₹ 1,00,000; paid brokerage ₹1,000, freight ₹ 5000 and sundry expenses ₹ 10 000; Three months sales ₹ 1,40,000. Remaining stock was taken by Mukesh for ₹ 5,000.

   Give necessary journal entries and prepare Joint Venture, Joint Bank and Co-Venturers Account.

   Answer: Joint Venture Profit ₹ 29,000.

2. A, B and C entered into a Joint Venture sharing profit equally. They opened a separate Bank account in State Bank of India on 1st January, 2015. They deposited ₹ 30,000, ₹ 40,000 and ₹ 90,000 respectively. It is also decided to allow interest on such deposits @ 3% p.a. Goods purchased from D worth ₹ 1,50,000. Stock taken from A worth ₹ 20,000. They paid to D by cheque and paid for carriage and other expenses ₹ 7,600. A sold some goods for ₹ 80,000 in cash and remaining goods sold to E on credit for ₹ 1,60,000. E accepted a bill for same amount. It was discounted from bank ₹ 1,57,000. Initial capital of Co-Venturers returned on 30th June, 2015. It was decided to allow commission on sale @ 5 percent to A for his services.

   Give the Journal entries in the books of Joint Venture and also prepare necessary accounts. It is assumed that final settlement was made on 31st July, 2015.

   Answer: Joint Venture Profit ₹ 45,000.

3. Ram and Shyam were doing business separately as a building contractors. They undertake jointly to construct a building for newly started joint stock company for a contract price ₹ 2,00,000 payable ₹ 1,60,000 by installment

in a cash and ₹ 40,000 in fully paid share of the company. A Joint Bank account is opened. Ram and Shyam deposited ₹ 50,000 and ₹ 30,000 respectively in the Bank. They will distribute profit or loss in proportion of 2:1. The transactions of Joint Venture were as follows: Purchases of Material ₹ 1,40,000, Wages paid ₹ 60,000, Ram gave material from his stock ₹ 10,000, Shyam gave material from his stock ₹ 8,000. Architect's fees paid by Ram ₹ 4,000. Accounts are settled.

The contract was completed and contract price was received. Ram took all the shares for ₹ 32,000 and Shyam took remaining stock for ₹ 6000.

Open the necessary accounts in the books of Joint Venture.

Answer: Joint Venture Loss ₹ 24,000 final payment to Ram ₹ 16,000 and to Shyam ₹ 24,000.

4. Contractor Kapil and Engineer Bharat started joint venture for an Urban Development Project. They opened Joint Bank account separately. Kapil deposited ₹ 1,25,000 and Bharat deposited ₹ 75 000 and they share profit-loss in 2 : 1 ratio. They purchased a piece of land for ₹ 1,50,000 and paid legal expenses ₹ 10,000; land development expenses paid ₹ 40,000. The land was divided in 20 plots. The plots were sold as under : 08 plots at ₹ 20,000 each; 10 plots at ₹ 15,000 each, and the remaining 2 plots were taken at cost price by both Kapil and Bharat equally.

   Open necessary accounts in the books of Joint Venture.

   Answer: Joint Venture Profit ₹ 1,30,000 final payment to Kapil ₹ 2,01,667 and to Bharat ₹ 1,08,333.

5. 'A', 'B' & 'C' are doing business as a building contractors. They undertake jointly for the construction of building for newly started Joint Stock Company at contract price of ₹ 25,00,000, payable ₹ 20,00,000 in cash and ₹ 5,00,000 in debentures of company. Their profit sharing ratio is 1:1:1.

   They opened a separate Joint Bank account and amount deposited into Bank by 'A' ₹ 3,00,000, 'B' ₹ 3,75,000 and 'C' ₹ 2,00,000. The transactions of joint venture were as follows : Purchases of material ₹ 12,00,000 , wages paid ₹ 9,75,000, Purchase of plant ₹ 1,20,000, Architect fees paid by 'A' ₹ 35,000, Concrete mixer by B ₹ 1,25,000 and a Motor Truck is given by C worth ₹ 1,00,000. A took remaining material for ₹ 70,000 and B took concrete mixer for ₹ 60,000 after construction work is completed.

   Plants sold for ₹ 30,000, C took truck for ₹ 4,00,000, contract price received and A took debentures at 20% less then cost price. Joint venture is completed. Prepare necessary accounts in the books of Joint venture.

   Answer: Joint Venture Profit ₹ 45,000 Amount due from A ₹ 1,20,000 Amount payable to B ₹ 4,55,000 and to C ₹ 2,75,000.

6. Pavan's and Pratush entered in to joint venture sharing profit and loss equally. Pavan sent goods worth ₹ 3,00,000 and paid carriage & freight ₹ 10,000 and other expenses ₹ 4,000. Pratush sent goods worth ₹ 2,40,000 and paid consignment expenses ₹ 15,000 and godown rent ₹ 5,000.

   Goods to be sold by Pavan. They decided 2% commission on sales. Pavan sold all the goods for ₹ 6,84,000. Prepare Memorandum Joint Venture Account and Joint Venture with Pavan account in the books of Pratush and Joint Venture with Pratush Account in the books of Pavan. Final payment is made through bank draft.

   Answer: Joint Venture Profit ₹ 96,320 Final Payment ₹ 3,08,160.

7. Pradeep and Praveen agreed to purchase and sell old scooters in a joint venture. They decided to share profit or loss equally. Praveen accepted bill of ₹ 20,000 drawn by Pradeep, which was discounted by Pradeep for ₹ 19,600.

   Pradeep purchased scooters for ₹ 36,000. He paid ₹ 5,000 for repairs of the scooters and these were dispatched to Praveen for sale. Praveen paid ₹ 600 freight ₹ 400 octroi on the receipt of scooters.

   Praveen sold all the scooters through an agent for ₹ 60,000. The agent charged for commission and sales expenses ₹ 4200. Final settlement was completed between both parties.

   Prepare Memorandum Joint Venture Account and Joint Venture with Praveen Account in the books of Pradeep.

   Answer: Joint Venture Profit ₹ 13,400 Total Payment ₹ 28,100.

8. Mahendra and Lalit agreed to purchase and sell T.V. sets. They decided to share profit or loss equally. Mahendra sent a Bank Draft ₹ 2,50,000 in favour of Lalit.

Lalit purchased 20 T.V. sets @ ₹ 20,000 each, and paid freight ₹ 2,000. Mahendra received all sets and sold T.V. set as follows:

No. of Set	Per Set Sales Value ₹	Discount on Sales
02	30,000	10%
10	28,000	--
8	27,000	5%

Mahendra sent draft for remaining balance to Lalit.

In the books of Mahendra, prepare Joint Venture with Lalit's Account and Memorandum Joint Venture Account.

Answer: Joint Venture Profit ₹ 37,200 Final payment ₹ 2,18,600.

9. Shalu and Bunti entered in to Joint venture to purchase and sell imported goods. Shalu took the responsibility for purchase and Bunti for sale. It was decided that Shalu will get interest @ 1% p.a. on the purchase price of goods and Bunti shall get salary of ₹ 500 per month. Shalu drew a bill of ₹ 20,000 on Bunti for 3 months, which was accepted by Bunti. Shalu imported goods worth ₹ 90,000 and sent to Bunti. Shalu paid carriage expenses ₹ 4,000 in dispatching goods. Bunti paid ₹ 1,600 freight and ₹ 1,400 for selling expenses. Bunti sold the whole goods for ₹ 1,30,000, this total work took 3 months' time. Prepare necessary accounts in the books of both parties. Profit is to be distributed equally.

10. Ravi and Vimal entered in to Joint Venture for purchases and sale of blanket. Ravi will purchase goods and Vimal shall undertake the sales. They decided to pay 5% intereste p.a. to Ravi on his investment and also charge interest at same rate on amount received by him. Vimal will get 4% commission on sales. Profit and loss are shared equally.

Ravi purchased on 1 Jan., 2015 2000 blanket ₹ 60 per blanket. He paid packing charge and other expenses ₹ 4,000. Vimal paid freight ₹ 6,000 and sold blanket as follows : 1 Feb., 2015 300 blanket @ ₹ 90 each, 1 July 2015 1000 blanket @ ₹ 100 each, 1 Oct. 2015 500 blanket @ ₹ 84 each.

Vimal sent to Ravi ₹ 20,000 on 1 March, 2015 and ₹ 56,000 on 1 August, 2015. Remaining blankets were taken by Vimal on cost plus 25% above. On 1 Oct. 2015 final settlement was made.

Assumity that each party records all transcations. Prepare necessary accounts in the books of both parties.

Answer: Joint Venture Profit ₹ 43,640; Calulation of Interest 3,600.

11. Sachin and Joni entered in to Joint Venture for purchase and sale of goods. They share profit loss in 3:2. For starting the work Joni sent bank draft to Sachin for ₹ 8,00,000. Sachin purchased goods worth ₹ 10,00,000 and incurred expenses to convert into salable form ₹ 2,35,000. Sachin not expenses as follows : total commission 2.5 percent and sundry expenses ₹ 35,000. Joni took the delivery and paid carriage ₹ 72,000, octroi ₹ 27,500 insurance ₹ 15,000, godown rent ₹ 25,000 and brokrage ₹ 52,000. Joni sold most of the goods for ₹ 17,25,000. Remaining goods were kept by him for ₹ 2,05,000. Prepare necessary ledger accounts in the books of both parties, assuming that all transcations are entered by both parties.

Answer : Joint Venture Profit ₹ 4,43,500; Give Money ₹ 7,61,100.

❑❑❑

8

Consignment Accounts

Learning objectives :

After going through this chapter you will be able to

- Understand the meaning of consignment and the meaning of terms related to consignment.
- Know the distinction between (a) Proforma Invoice & Invoice. (b) Consignment & Sale (c) Consignment & Joint Venture
- Prepare Proforma Invoice and Account sale
- Follow accounting treatment of Consignment transactions in the books of Consignor & Consignee
- Understand the procedure of computation of Commission, Del-credere Commission & Overriding Commission receivable by Consignee
- Know the procedure of valuation of unsold stock with consignee under different conditions
- Understand the treatment and valuation of Normal loss and abnormal loss of goods sent on Consignment
- Learn accounting procedure of goods sent on Consignment at cost price and at invoice price
- Understand the accounting for damaged goods, loss due to carelessness of Consignee and abnormal profit
- Learn accounting for fall in market price of stock, repairing charges on damaged goods and sale of damaged goods
- Calculate profit share and special commission of consignee
- Learn accounting procedure for conversion of Joint Venture into consignment

In these days of globalisation, advertisement and revolution in the means of communication the markets for commodities have expanded from local level to international level. It is the ethical and social responsibility of business to make available particular article to the consumer easily and timely. This is possible only when the business set up agencies at different places. These agents can carry on different commodities to different markets easily. It is necessity of market and to maximise the profit of business. This has given rise to consignment business.

Meaning of Consignment :

When goods are sent by the owner or the Principal to his agent or any other representative on the condition of selling goods on his behalf for which the later will be given commission at a specified rate as remuneration, it is called consignment. The person who sends goods is called consignor. He is responsible for all profits and losses along with all expenses and risk, if any.

Characteristics of Consignment

1. The goods are sent by the consignor to the consignee for the purpose of sale.
2. The relationship between the consignor and the consignee is that of Principal and Agent.
3. Consignment is not sale of goods.
4. Consignee acts as per the instructions of the consignor.
5. Consignee has the right to receive commission on goods sold.

6. The rightful owner of goods is the consignor.
7. Consignee is the Bailee of goods. Security of goods is his responsibility.

Some main terms in Consignment

1. **Consignment-** When goods are sent by Consignor to Consignee for the purpose of sale on which he will be entitled to receive commission it is called Consignment. In this , goods sent by consigner to consignee is called as outward consignment and for consignee, it is inward consignment.
2. **Consignor-** The person who sends goods to the agent for the purpose of sale is called Consignor or the Principal.
3. **Consignee-** The person to whom goods are sent on Consignment is called Consignee.
4. **Commission-** On sale of goods the consignee is entitled to receive consideration called Commission. It is of three types-
   - **(a) Ordinary Commission-** Consignee is given commissions on the selling Price of goods sold or it's Invoice price at a specified percentage. It is the remuneration of the **c**onsignee for work done.
   - **(b) Delcredere Commission-** If Consignee has been given the right to sell goods on credit by the Consignor, there is the possibility of bad debts in such a case**.** This Loss is to be borne by the Consignor. In case the consignee undertakes the responsibility for collecting the debts and to bear the loss of bad debt, or in such a case, he will receive additional commission at a certain rate, which is called Delcredere Commission. This commission is also calculated on total sale in the absence of any clear information.
   - **(c) Over-riding Commission-** If consignor gives right to consignee to sell the goods above invoice price, then a commission is given on excess amount over actual invoice price called overriding commission.
5. **Proforma Invoice –** When goods are sent to the consignee, a Proforma Invoice in the form of an Invoice is sent wi by the consignor. It contains particulars as regards name of goods, number or quantity or weight/measurement, marking, packing etc, to identify the same. The necessary instructions are also given in it for selling goods at Invoice price or at higher than invoice price along with the rate and type of commission.
6. **Advance on consignment-** If consignee sends some amount by cheque or bills receivable in advance prior to sale to the consignor, then it is called as advance on consignment. If bills receivable is discounted by the consignor; the amount written on debit side of Consignment Account is loss.
7. **Account Sale-** After selling the goods, documents containing details regarding quantity and quality of goods sold, selling price, expenses incurred by him, his commission, details of advance given etc,. are mentioned. This document is called Account sale.

Difference between Consignment and Sale

Basics of Difference	Consignment	Sale
(1) Relationship	In consignment, two parties are consignor and consignee	In sale, two parties are purchaser and seller
(2) Ownership	In consignment, ownership in goods remains with the consignor.	In case of sale, ownership is transferred to the buyer as soon as it is sold.
(3) Risk of Loss	In consignment risk of loss and damage remains with the consignor.	In sale of goods, the risk of loss or damage is of the buyer.
(4) Consideration	In case of consignment, consignee receives commission as consideration.	In case of sale of goods, the seller gets profit on sale.
(5) Particulars	In case of consignment proforma invoice is sent.	In case of sale of goods, invoice is given to the purchaser.

Difference between Consignment and Joint Venture

Basis of Difference	Consignment	Joint Venture
(1) Relevant Act	Rules regarding agency or mutual relationship are applicable.	Mutual relationship rules are applicable.
(2) Relationship	In consignment relationship between two parties is of consignor and consignee.	In Joint Venture, relationship between co-venturers is like partnership.
(3) Capital Contribution	In consignment, consignor contributes capital, not the consignee.	In Joint Venture generally all co-venturers contribute towards capital.
(4) Sharing of Profit	In consignment, profit earned belongs to consignor only.	In Joint venture, profit earned is shared by all co-venturers.
(5) Period	The period of working in consignment is more than that of Joint Venture.	Joint venture is a short time temporary partnership.
(6) Account Sale	In consignment, after selling goods, consignee sends account sale.	In Joint venture, transactions related to himself are exchanged by all co-venturers.

Accounting Treatment of Consignment Transactions

Necessary Accounts required in the books of consignor	Necessary Accounts required in the books of consignee
1. Consignment A/c 2. Consignee's A/c 3. Goods sent on Consignment A/c 4. Other accounts : Abnormal Loss A/c	1. Consignor's A/c 2. Commission A/c

Journal Entries Relating to Consignment Transactions

Transactions	Books of Consignor	Books of Consignee
(1) Goods sent on consignment	Consignment A/c Dr. To Goods sent on consignment A/c	No entry is passed when goods are received.
(2) Expenses incurred by consignor	Consignment A/c Dr. To Cash/Bank A/c	No entry is passed for expenses incurred by consignor.
(3) Advance received by consignor	Cash/Bank/B/R A/c Dr. To Consignee's A/c	Consignor's A/c Dr. To Cash or Bank A/c
(4) If B/R discounted by Consignor	Bank A/c Dr. Consignment A/c (for discount) Dr. To B/R A/c	No entry is passed when acceptance is discounted by consignor.
(5) Expenses paid by consignee	Consignment A/c Dr. To Consignee's A/c	Consignor's A/c Dr. To Cash or Bank A/c
(6) Goods returned by consignee	Goods sent on Consignment A/c Dr. To Consignment A/c	No entry is passed for returning goods to consignor.
(7) Goods sold by Consignee	Consignee's A/c Dr. To Consignment A/c	Cash/Bank A/c (Cash Sales) Dr. Debtor's A/c (Credit Sales) Dr. To Consignor's A/c
(8) Amount of Commission of consignee	Consignment A/c Dr. To Consignee's A/c	Consignor's A/c Dr. To Commission A/c

(9) Unsold Stock with Consignee	Goods with Agent A/c Dr. or Unsold Stock A/c Dr. To Consignment A/c	No entry is passed for unsold stock that remained.
(10) Balance received from Consignee	Cash/Bank A/c Dr. To Consignee's A/c	Consignor's A/c Dr. To Cash / Bank A/c
(11) Amount of Profit on Consignment	Consignment A/c Dr. To Profit & Loss A/c	No entry passed in consignee's books.
(12) For Loss on Consignment	Profit & Loss A/c Dr. To Consignment A/c	No entry is required in the books of Consignee.
(13) Closing Goods sent on Consignment A/c	Goods sent on consigment A/c Dr. To Trading A/c	No entry is required.
(14) Transferring commission A/c	No entry	Commission A/c Dr. To Profit & Loss A/c

Valuation of unsold stock

It is necessary to calculate the value of unsold stock so that such unsold stock is brought in the balance sheet of the consignor Valuation of unsold stock is done as under-

(i) Actual value of unsold stock at cost price or market price, whichever is less.

(ii) Add proportionate expenses incurred by the consignor (such as freight, carriage on purchase, export and import duties, loading charges).

(iii) Add proportionate expenses of non-recurring nature incurred by consignee such as freight on loading and unloading, octroi, wages, insurance of goods in transit etc. .

Important Note:-

Expenses of recurring nature (such as warehouse expenses, establishment, carriage on sales, packing expenses, godown rent or charges, advertisement, and other sale expenses) are not considered for valuation of unsold stock. Simple rule is all such expenses, which are incurred to bring the goods into saleable condition and incurred by consignee for bringing the goods upto the warehouse or godown are of non-recurring nature, which are considered for valuation of unsold stock.

Illustration 1:

Mr. Kapil of Udaipur consigned to Mr. Bharat of Bhivadi on 1 June, 2016, 200 cycle @ ₹1,500 per cycle at cost. Bharat accepted of ₹ 1,00,000 B/R on 3rd June 2016. Kapil discounted it from bank at ₹ 90,000 and paid ₹ 3,000 wages, ₹2,000 railway freight and ₹1,000 packing expenses.

Bharat paid ₹ 1,000 for unloading, ₹ 500 octroi and ₹ 2,000 godown rent. Bharat received 5% general commission and 2% delcredere commission. Bharat sold 100 cycles for cash at ₹ 1800 per cycle and 50 cycles on credit @ ₹ 2000 per cycle. Bharat sent account of sale and after deducting expenses and commission on 30 June, 2016. Prepare necessary journal entries in the books of Kapil & Bharat.

In the Books of Kapil (Consignor)

Journal

Date	Particulars	L/F	Amount (₹) Dr.	Amount (₹) Cr.
2016 Jan.,1	Consignment A/c Dr. To Goods Sent on Consignment A/c (200 Bicycles @ Rs. 1500 each sent to Bharat on consignment)		3,00,000	3,00,000

Jan.,1	Consignment A/c	Dr.		6,000	
	To Cash A/c				6,000
	(Expenses paid by consignor)				
Jan., 1	B/R A/c	Dr.		1,00,000	
	To Bharat's A/c				1,00,000
	(B/R received from Bharat)				
Jan., 3	Bank A/c	Dr.		90,000	
	Consignment A/c	Dr.		10,000	
	To B/R A/c				1,00,000
	(Bill discounted from Bank)				
Jan., 30	Consignment A/c	Dr.		3,500	
	To Bharat's A/c				3,500
	(Expenses incurred by Bharat)				
June, 30	Bharat A/c	Dr.		2,80,000	
	To Consignment A/c				2,80,000
	(Goods sold)				
June, 30	Consignment A/c	Dr.		16,000	
	To Bharat's A/c				16,000
	(Commission charged by Bharat)				
June, 30	Unsold Stock A/c	Dr.		77,250	
	To Consignment A/c				77,250
	(Balance of unsold stock)				
June, 30	Consignment A/c	Dr.		21,750	
	To P&L A/c				21,750
	(Profit on Consignment transferred to P&L A/c)				
June, 30	Goods sent on Consignment A/c	Dr.		3,00,000	
	To Trading A/c				3,00,000
	(Goods sent on Consignment transferred to Trading A/c)				
June, 30	Cash A/c	Dr.		1,60,500	
	To Bharat's A/c				1,60,500
	(Balance amount received from Bharat)				

Ledger in the Books of Kapil
Consignment A/c

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
2016 Jan., 1	To Goods sent on Consignment A/c	3,00,000	2016 June, 30	By Bharat A/c (Sales)	2,80,000
Jan., 1	To Cash A/c (Exp.)	6,000	June, 30	By unsold stock A/c	77,250
Jan., 3	To B/R A/c (Discount)	10,000			
June,30	To Bharat's A/c (Exp)	3,500			
June,30	To Bharat's A/c (Com)	16,000			
June,30	To P&L A/c (Profit)	21,750			
		3,57,250			**3,57,250**

Bharat's A/c (Consignee's A/c)

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
June, 30	To Consignment A/c	2,80,000	2016 Jan. 1	By B/R A/c	1,00,000
			June, 30	By Consignment A/c	3,500
			June, 30	By Consigment A/c	16,000
			June, 30	By Cash A/c (b/f)	1,60,500
		2,80,000			**2,80,000**

Goods Sent on Consignment A/c

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
June,30	To Trading A/c	3,00,000	2016 Jan., 1	By Consignment A/c	3,00,000
		3,00,000			**3,00,000**

Stock with Agent / Unsold Stock A/c

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
June,30	To Consignment A/c	77,250	June,30	By Balance c/d	77,250
		77,250			**77,250**

Working Note :

1. Calcucation of Commission

   (1) Normal Commission 2,80,000 x 5/100 = ₹ 14,000

   (2) Delcredere Commission 1,00,000 x 2/100 = ₹ 2,000

   ₹ 16,000

2. Unsold Stock / Stock with Agent : Balance Cycles (200 - 150) = 50

   Price 50 x 1,500 = ₹ 75,000

   Consignment Expenses (Proportionate) 6000/200 x 50 = ₹ 1,500

   Agent Expenses (proportionate) 1500/200 x 50 = ₹ 750

   ₹ 77,250

In the Books of Bharat's (Consignee)
Journal

Date	Particulars	L/F	Amount (₹) Dr.	Amount (₹) Cr.
2016, Jan.,1	Kapil's A/c Dr. To B/P A/c (Acceptance given to Kapil)		1,00,000	1,00,000
June, 30	Kapils A/c Dr. To cash A/c (Expenses incurred)		3,500	3,500
June, 30	Cash proceeds A/c Dr. To Kapil's A/c (Sale proceeds received in cash)		2,80,000	2,80,000

June, 30	Kapil's A/c Dr. To Commission A/c (Commission due)			16,000	16,000
June, 30	Kapil's A/c Dr. To Cash A/c (Balance amount remitted)			1,60,500	1,60,500
June, 30	Commission A/c Dr. To P & L A/c (Commission transferred to P & L A/c)			16,000	16,000

In the Books of Bharat
Kapil's A/c

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
2016 Jan., 1	To B/P A/c	1,00,000	June,30	By Cash A/c	2,80,000
	To Cash A/c (exp.)	3,500			
June 30	To Commission A/c	16,000			
June 30	To Cash A/c (B/F)	1,60,500			
		2,80,000			**2,80,000**

Commission A/c

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
June, 30	To P & L A/c	16,000	June, 30	By Kapil's A/c	16,000
		16,000			**16,000**

Bearing the amount of Bad debts on credit Sales

1. When Delcredere commission is not allowed to the consignee the loss of bad debt will be borne by the consignor.
2. When consignee is allowed Delcredere commission, the loss of bad debts will be borne by the consignee. The amount of Bad debts will be debited in consignee's commission A/c. The following entries are passed.

1. When Bad debt Loss is borne by consignor

Books of Consignor	Books of Consignee
Consignment A/c Dr. with the Amount of To Consignee's A/c Bad Debts	Cash/Bank A/c Dr. (Amount received) Consignor's A/c Dr. (Bad debts) To Consignment Debtors A/c (Credit Sale)

2. When Bad debt Loss in borne by the Consignee

No entry is passed for Bad debts.	Cash/Bank A/c Dr. (Amount received) Commission A/c Dr. (Bad debts) To Consignment Debtors A/c (Credit Sale)

Loss of goods sent on consignment

When some of the goods sent on consignment are lost on the way or in transit or damaged or stolen, its treatment in books depends on the nature and type of loss. Accordingly the loss may be normal or abnormal.

1. Normal Loss : When Loss is incurred due to the present nature of commodity and due to inherent nature of commodity, which is unavoidable it is called normal Loss.

Accounting treatment : No entry is required to be passed for normal loss but the cost of remaining stock (good stock) is inflated by the cost of units lost.

$$\text{Cost of unsold Stock} = \frac{\text{Cost of goods sent on consignment x units of unsold stock}}{\text{Total numberof units (-) Units of Normal Loss}}$$

Illustration 2 :

Mr. Rakesh of Mumbai sent 2000 tons of Coal on consignment @ ₹ 300 per ton. Consigner paid ₹10,000 carriage and ₹ 8,000 for wages. Consignee spent ₹ 2,000 for expenses. Mr. Deepak received 10 per cent less coal. Deepak sold 1500 ton coal @ ₹ 400 per ton. Calculate value of unsold stock.

Solution :

Units of Normal Loss = 2, 000 x 10% = 200

	₹
Remaining good units = 2,000 – 200 = 1, 800 tonnes.	
Total cost of 2,000 units dispatched by consignee	6,00,000
Add :Expenses Incurred by Consignor (10, 000 + 8000)	18, 000
Add : Expenses Incurred by Consignee	2,000
Total Cost of 2,000 tonnes	**6,20,000**

$$\text{Cost of unsold Stock} = \frac{₹\ 6{,}20{,}000}{1{,}800} \times 300\ \text{(tonnes)} = ₹\ 1{,}03{,}333$$

2. Abnormal Loss : The loss of stock which is due to carelessness or abnormal reasons is called abnormal loss. This loss is calculated as under :

(a) **Loss in Transit :** (Loss of stock that occurred before goods reached consignee's Warehouse) - In this case, to get value of abnormal loss proportionate share of consignor's expenses are added in the cost of stock lost. Consignee's expenses are not included.

(b) **Loss of stock in Consignee's Godown :** In this case, value of abnormal loss is caluculated : the cost of goods destroyed by adding proportionate expenses of the consignor as-well-as proportionate non-recurring (Direct) expenses of the Consignee.

Accounting Treatment of Abnormal Loss of stock : This Loss is to be borne by the Consignor, as such, the required entries will be passed in the books of the Consignor only.

(1) When Abnormal Loss Occurs

Abnormal Loss A/c	Dr.	Amount of Abnormal Loss
To Consignment A/c		

(2) If stock is insured and insurance Company admits the claim

Insurance Company A/c	Dr.	With the amount of claim admitted
Profit & Loss A/c	Dr.	With the amount not admitted
To Abnormal Loss A/c		Total amount of claim
Bank A/c	Dr.	Admitted claim received from Insurance Company
To Insurance Company A/c		To Insurance Company

Illustration 3 :

Bharat Cycles Ltd. of Mumbai sent 400 cycles @ ₹200 per cycle to Chandra & Sons of Udaipur. Consigne paid ₹ 1,400 carriage and ₹ 600 for insurance. On the way due to truck accident 100 cycles are fully destroyed and only 1/4 of purchase price is received from them. Then Chandra & Sons sold 240 cycle @ ₹ 250 per cycle and sent the demand draft after deducting ₹ 1,200 for octroi, ₹ 600 for sales expenses, and ₹ 2400 for his commission. Consignor got ₹ 12,500 from insurance Co. for abnormal loss. Calculate the value of abnormal loss and unsold stock. (a) if abnormal loss occurs in transit of goods (b) if abnormal loss occurs at consignee's godown.

Solution :

(a) Calculation of amount of Abnormal Loss in Transit ₹

(1) Cost of 100 cycles = 100 x ₹ 200 = 20,000

Add: Proportionate Expenses of Consignor = $\frac{2,000 \times 100}{400}$ = 500

Total Abnormal Loss 20,500

Less: Amount realized from destroyed cycles 2000 x ¼ x 100 = 5,000

Net Cost of Abnormal Loss 15,500

Less: Amount of the claim admitted & received from Insurance company 12,500

Net Loss to be transferred to Profit & Loss A/c 3,000

(2) Value of unsold stock : 400 – 100 – 240 = 60 cycles

Cost price of 60 cycles @ ₹ 200 12,000

Add: Proportionate Expenses of Consignor (₹ 2,000 x 60) ÷ 400 300

Add: Proportionate Expenses of Consignee (direct) $\frac{1200}{300} \times 60$ 240

Total Cost of 60 cycles 12,540

(3) Abnormal Loss occurs in Consignee's Godown :

Cost of 100 cycles = 100 x ₹200 20,000

Add: Proportionate expenses of Consignor and Consignee 800

₹ 2,000 + 1,200 = $\frac{3,200 \times 100}{400}$ 20,800

Abnormal Loss

Note: The Loss in Consignee's Godown is due to carelessness of the consignee, so this loss will be borne by the Consignee.

Illustration 4 :

On 1 January 2016, Himi Glass Works of Mumbai consigned to Parth of Bhilwara 100 cases at ₹ 16000 on cost. He paid ₹ 1000 Railway freight,₹ 2000 wages. During transit 10 cases were lost and remaining cases were received by Parth. He paid octroi ₹ 1000, sales expenses ₹ 500, godown rent ₹ 500. Parth sold 75 cases @ ₹ 200 per case. Parth received 5% commission on sales and remaining amount was sent to consignor by consignee.

Prepare Consignment and consignee's account in the books of Himi Glass Works.

Solution :

In the Books of Himi Glass Works, Mumbai
Consignment Account

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
2016	To Goods sent on			By Parth's A/c (Sales)	15,000
Jan, 1	Consignment A/c	16,000		By Abnormal Loss	1,900
	To Cash A/c (Exp.)	3,000		By Unsold Stock	3,017
	To Parth's A/c (Exp.)	2,000		By P & L (Loss)	1,833
	To Parth's A/c (Commission)	750			
		21,750			**21,750**

(1) Computation of commission : 15,000 x 5% = ₹ 750

(2) Amount of Abnormal Loss : 10 cases x 160 = ₹ 1,600

Add : Proportionate Consignor's Expenses = ₹ 300 x 10/100 = ₹ 300 = ₹ 1,900

(3) Unsold stock = 100 cases – 10 – 75 = 15 x ₹ 160 = ₹ 2,400

Add: Proportionate Exps. of Consignor = 23,000 x 5/100 = ₹ 450

Add: Proportionate Exps. of Consignee = ₹1,000 x 15/100 = ₹ 167

= ₹3,017

Parth's Account (Consignee's A/c)

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Consignment A/c	15,000		By Cosignment A/c	2,000
				By Cosignment A/c	750
				By Bank A/c (B/F)	12,250
		15,000			**15,000**

Illustration 5 :

Mayank Coal Co. consigned to Dhaval Sales Ltd. 1000 quintal coal @ ₹40 per quintal. He paid loading ₹ 500, railway freight ₹ 3500. Dhaval Sales Ltd. sold 800 quintal coal @ ₹ 60 per quintal and paid sales exp. ₹ 1600, fire insurance ₹ 200. Agent received 5% commission on sales, consignee reported a shortage of 20 quintals coal on the whole consignment. Prepare Consignment Account in the books of Consignor and calculate the value of unsold stock.

Solution :

In the Books of Mayank Coal Co.
Consignment Account

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Goods sent on Consignment A/c	40,000.00		By Dhaval & Sons (Sales) (800x60)	48,000.00
	To Cash A/c (Exp.)	4,000.00		By Unsold stock	8,081.63
	To Dhaval Sales Ltd A/c (Exp.)	1,800.00		$\frac{(40000 + 4000)}{980}$ x180	
	To Parth's A/c (Commission)	2,400.00			
	To P&L A/c (Profit)	7,881.63			
		56,081.63			**56,081.63**

When goods are consigned at Invoice Price and Accounting

When goods are consigned by the consignor at Invoice Price, the following entries will be passed at invoice price: **(1)** Goods sent on Consignment, **(2)** Unsold Stock (opening and closing both) **(3)** Abnormal Loss. But invoice price includes profit also with the cost, means Invoice Price = Cost + Profit. Under such circumstances the effect of the profit will have to be eliminated, only then correct profit on consignment would be known.

The following are the adjusting entries, which are to be passed so as to eliminate the effect oh Profit. The entries will be passed in the books of the Consignor only :

1.	For profit included in the net amount of goods sent on consignment (Net value of goods = Goods sent on consignment - Goods Returned by consignee)	Goods sent on consignment A/c Dr. To Consignment A/c (With the difference between the invoice price and cost price)

2.	For amount of profit included in Opening balance of unsold stock.	Stock Reserve A/c Dr. To Consignment A/c (With the amount of difference)
3.	For profit included in closing balance of unsold stock.	Consignment A/c Dr. To Stock Reserve A/c (With the amount of difference)
4.	For profit included in the value of abnormal loss.	Consignment A/c Dr. To Abnormal Loss A/c (With the amount of difference between invoice price and cost price)

Note 1: While preparing Final Accounts, unsold stock will be shown at Cost Price : Invoice Price - Stock Reserve.

Note 2: In the absence of clear information about solving the problem at Invoice Price or Cost Price, students may solve the question at Cost Price or at invoice price as they like.

Illustration 6 :

Krishna Engineering co. sent 500 Table Fans at @ ₹ 600 per fan to Suman Ele. Store at Invoice Price, which is 25% above the Cost Price. Consignor paid ₹ 5,000 freight ₹ 2,000 packing charges. Consignee sent account of sale showing sale of 400 fans @ ₹ 800 per fan and paid advertisement ₹ 1,000, godown rent ₹ 500. Consignee received commission @ 5% on Invoice Price and 20% above on Invoice Price as additional commission. Prepare Consignment Account at Invoice Price.

Consignment Account

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Goods Sent on Consignment A/c	3,00,000		By Suman Ele. store (Sales) 400 x 800	3,20,000
	To Cash A/c (Exp.) (5000+2000)	7,000		By Goods Sent on Consignment A/c (300000 x 25/125)	60,000
	To Suman Electric store A/c (Exp.) (1000+500)	1,500		By Unsolod stock	61,400
	To Suman Ele. store General Com. 12000 Additional Com. 16000	28,000			
	To Stock Reserve A/c	12,000			
	To Profit & Loss A/c	92,900			
		4,41,400			**4,41,400**

Working Notes :

(1) Calculation of Commission

(i) Ordinary Commission on Invoice Price = 400 x 600 or ₹ 2,40,000, 5% of ₹ 2,40,000 = ₹ 12,000

(ii) Over riding Commission = Excess over Invoice Price 400 x ₹ 200 or 80, 000 x 2% = ₹ 16,000

₹ 28,000

(2) Value of unsold Stock = 500 – 400 =100 Fans x 600 = ₹ 60, 000

Add: Proportionate Expenses of Consignor : 7,000 x 100/500 = ₹ 1,400

Value of Unsold Stock ₹ 61,400

(3) Cost of 100 Fans = 100 x 480 = ₹ 48,000

Add: Proportionate Expenses = ₹ 1,400

₹ 49,400

Therefore Stock Reserve = ₹ 61,400 – 49,400 = ₹ 12 000

Fall in Market Price of Stock

If the market price of unsold sock is less than its Cost Price, it will be valued at market price. It means if any goods are lying either with the Agent or with consignor, its cost is reduced.

Illustration 7:

Mrs. Rekha of Bombay purchased 400 salvar suits @ ₹ 600 per suit and sent to Varsha of Jaipur 200 suits @ ₹ 900 per suit at invoice price. Consignor paid ₹ 5000 as expenses on consignment and consignee sold suits 150 @ ₹ 1000 per suit in cash and paid sundry expenses ₹ 2500. Mrs. Rekha sold 120 suits at ₹ 900 per suit and paid sales expenses ₹ 2000. Due to fall in market value, stock valued at 10% less then cost price. Consignee will get 5% general commission and overriding commission @ 15% on excess amount received over ₹ 900 per suit.

Prepare in the books of Rekha, Consignment Account and Trading and P & L Account.

In the Books of Rekha of Bombay

Consignment Account

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Goods Sent on Consignment A/c	1,20,000		By Varsha (Sales)	1,50,000
				By Unsold Stock	28,250
	To Cash A/c (Exp.)	5,000			
	To Varsha (Exp.)	2,500			
	To Varsha (Commission)				
	General 7500				
	Overriding 2250	9,750			
	To Profit & Loss A/c	41,000			
		1,78,250			**1,78,250**

Working Notes :

(1) Computation of commission (₹)

(i) General Commission ₹1,50,000 x 5% = 7, 500

(ii) Add over riding Commission ₹ 1,50,000 – (150 x 900) = 15,000 x 15% = 2,250

Total Commission **9,750**

(2) Valuation of Stock with Agent

Cost of unsold Stock 50 x 600 = 30,000

Less fall in market price 10% = 3,000 = 27, 000

Add : Proportionate Exp. of Consignor ₹5,000 x 50 /200 = 1,250

28,250

Trading and Profit & Loss Account

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Purchases (400 x 600)	2,40,000		By Goods sent on Consignment	1,20,000
	To Gross Profit	31,200			
				By sales (120 x 900)	1,08,000
				By closing stock at cost	

				80 x 600 = 48000 (-) 10% of 48000 4800	43,200
		2,71,200			**2,71,200**
	To Selling exp.	2,000		By Gross profit (Trading A/c)	31,200
	To Net profit	70,200		By Consignment A/c (Profit)	41,000
		72,200			**72,200**

Sale of Damaged Goods by Consignee

Illustration 8 :

Mr. Hitesh of Bangalore consigned goods to Mr. Mahesh of Ajmer on 1 January, 2015 for ₹30, 000 at cost price. Consignor paid for carriage and insurance ₹ 900. Due to heavy rain fall 10% goods was damaged. Consignee paid clearing charges ₹ 250, godown rent ₹ 200. On 20th February 2015 consignor received ₹ 2500 from Insurance Company. Consignee sent Account sale showing that 2/3 of the remaining goods sold in cash for ₹ 35000 and received ₹ 500 from damaged goods. Consignee sent remaining amount through bearer. Consignee will receive 8% commission on total sales.

Prepare in the books Hitesh, Consignment Account and Abnormal Loss Account.

In the Books of Hitesh
Consignment Account

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Goods sent on Consignment A/c	30,000		By Mahesh's A/c (sales)	35,000
	To Cash A/c (Exp.)	900		By Abnormal Loss A/c	3,090
	To Mahesh (Exp.) (250+200)	450		By Unsold Stock A/c	9,353
	To Mahesh's A/c (Commission 8% of 35000)	2,800			
	To Profit & Loss A/c	13,292			
		47,443			**47,443**

Working Note :

Valuation of Unsold Stock

Cost of total Stock	₹ 30,000
Add : Expenses of Consignor	₹ 900
	₹ 30,900
Less : Abnormal Loss ₹ 30,900 x 10%	₹ 3,090
	₹ 27, 810
Add : Non-recurring expenses of Consignee	₹ 250
Cost of total Goods for valuation	₹ 28,060
Value of Unsold Stock = ₹ 28,060 x 1/3	₹ 9,353

Abnormal Loss A/c

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Consignment A/c	3,090		By Mahesh (Sales of Damaged goods)	500
	To Mahesh (com.) 500 x 8%	40			
	By P & L A/c	130		By Bank A/c	2,500
		3,130			**3,130**

Illustration 9 :

Mr. Harsit of Ahemdabad consigned 300 sarees @ ₹225 per saree to to Gopesh of Udaipur at invoice price (cost price ₹ 150 per saree). Harsit paid expenses ₹ 3000 on consignment. Harsit wrote a bill on Gopesh of ₹ 25,000 for three months, which was accepted by him. Harsit discounts it from bank for ₹ 24,500. Gopesh paid octroi ₹ 900 and sold 250 sarees to Usha for ₹ 200 each, 20 sarees were stolen from godown, Gopesh is entitled 5% general commission, 2% delcredare commission. Accounts are prepared at cost price.

Prepare Consignment Account, Gopesh Account, and Abnormal Loss Account in the books of Harsit and Harsit Account in the books of Gopesh.

In the Books of Harsit
Consignment Account

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Goods sent on Consignment A/c	45,000		By Gopesh A/c (Sales) (250 x 200)	50,000
	To Cash A/c (Expenses)	3,000		By Abnormal Loss	3,260
	To B/R (Discount)	500		By Unsold Stock	4,890
	To Gopesh (Expenses)	900			
	To Gopesh (Commission)				
	Gen. Com. 2500				
	Del. Com 1000	3,500			
	To Profit & Loss A/c	5,250			
		58,150			**58,150**

Working Note :

		₹	
(i)	Ordinary Commission (₹ 50, 000 x 5%)	2,500	
	Delcredere Commission (₹ 50,000 x 2%)	1, 000	
	Total Commission	**3,500**	
(ii)	Valuation of Abnormal Loss		
	Cost of Abnormal Loss of goods (20 x ₹ 150)	3,000	
	Add : Proportionate Exp. of Consignor (3,000 x 20)/300	200	
	Add : Proportionate Exp. of consignee (900 ÷ 300 = 3 x 20)	60	
	Value of Abnormal Loss	3, 260	
(iii)	Valuation of unsold stock (3000 – 2500 – 200 = 30 x ₹150)	=	4,500
	Add : Proportionate Expenses of consignor (₹3,000 x 30) / 300	300	
	Add : Proportionate Expenses of Agent ₹ 900 x 30 / 90 =	90	
	Value of unsold stock	**4, 890**	

Gopesh's A/c

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Consignment A/c	50,000		By B/R A/c	25,000
				By Consignment A/c	900
				By Consignment A/c	3,500
				By Balance c/d	20,600
		50,000			**50,000**

Goods Sent on Consignment A/c

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Trading A/c	45,000		By Consignment A/c	45,000
		45,000			**45,000**

Abnormal Loss A/c

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Consignment A/c	3,260		By P&L A/c	3,260
		3,260			**3,260**

In the Books of Gopesh

Harsit's A/c

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To B/P A/c	25,000		By Cash A/c (Sale)	50,000
	To Cash A/c (Expenses)	900			
	To Commission	3,500			
	To Balance c/d	20,600			
		50,000			**50,000**

Share in Profit to Consignee or Special Commission

Illustration 10 :

Himi Garments of Bangalore sent goods to agent costing ₹33,000 at invoice price, which is 20% higher than cost to Sheela Garments (Agent) of Ahmedabad on consignment. Consigner paid ₹ 1250 for insurance and freight. Agent paid ₹ 250 as clearing charges and establishment expenses ₹ 750. Agent sold 3/4 of goods at cost plus 1/3 for profit. Half of the remaining goods destroyed by the fire. Insurance company accepted the claim for ₹ 4,500, which is settled at 90% of the said amount. Agent will get 5 percent commission on gross sales and, 3 percent delcredere commission. He will also get 5% of the Profit as special commission (after deducting such commission). Prepare Consignment Account, Abnormal loss account in the books of consignor. Consigner received balance amount from consignee through bank draft. Accounting is done at invoice price. (Excluding abnormal loss).

Solution :

Books of Consignor

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Goods sent on Consignment A/c 33000 x 120 / 100	39,600		By Sheela Garments (Sales)	33,000
	To Bank A/c (Expenses)	1,250		By Goods sent on Consignment A/c (39600 – 33000)	6,600
	To Sheela Garments (Expenses) (250+750)	1,000		By Abnormal Loss	4,312.50
	To Sheela Garments (Commission)	2,640		By Unsold Stock	5,137.50
	To Stock Reserve	825			
	To Sheela Garments (Special Commission)	178			
	To Profit & Loss A/c	3,557			
		49,050			**49,050**

Working Notes :

(1)	Valuation of Abnormal Loss (1 - ¾ = ¼ x ½ = 1/8)		(₹)
	Cost of Abnormal Loss = ₹ 33,000 – ¾ (Sale) ₹ 24,750 = 8,250 x ½	=	4,125.00
	Add : Proportionate Expenses (Consignor ₹ 1,250 + consignee ₹250) = ₹ 1500 x 1/8	=	187.50
	Total		4,312.50
(2)	Valuation of Unsold Stock : Unsold Stock (½ of ¼ = 1/8)		
	Cost = ₹ 33,000 x 1/8 = ₹ 4,125 + Proportionate Expenses ₹ 187.50	=	4,312.50
	Add : Stock Reserve (₹ 4,125 x 20%)	=	825.00
	Total		5,137.50
(3)	Calculation of Sale: 33,000 x 3/4 x 4/3	=	33,000
(4)	Computation of Commission		
	General Commission = 5% of ₹ 33,000	=	1,650
	Delcredere Commission = 3% of ₹ 33,000	=	990
			2,640
(5)	Calculation of Special Commission and Net Profit :		
	Profit before charging such commission (₹ 49,050 – 45,315)		3,735
	Less : Special Commission 5% of ₹ 3,735		178
	Net Profit		3,557

Abnormal Loss Account

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Consignment A/c	4312.50		By Insurance Co. (4500 x 90%)	4050
				By P&L A/c	262.50
		4312.50			**4312.50**

Conversion of Consignment into joint Venture

Sometimes the Consignor and consignee take decision in the middle of the process of consignment that the present relationship will be converted into Joint Venture hence the consignee in such a case will be entitled to receive share in profit instead of commission. Unsold stock with consignee will be transferred to Joint Venture Account and transactions will be recorded accordingly. It is called conversion of Consignment into Joint Venture.

Illustration 11 :

Swastik toys of Udaipur sent ₹40,000 toys to Manu toys of Salumber on consignment for sale, on the basis of 5% commission. Consignor paid ₹ 4,000 for packing and carriage. Consignee paid ₹ 1,000 for carrying goods to godown. Consignee sold 80% goods for ₹ 50,000 and paid remaining amount. Consignee denied to work on commission for the remaining goods.

Consignor proposed to consignee for carrying business on joint venture by taking 1/3 share in profit and loss. Consignee accepted it. Consignor sent goods worth ₹ 20,000 to Manu toys of Salmber on joint venture. Swastik toys spent ₹ 2,000 and Manu toys spent ₹ 1,500. Manu toys retain the goods costing ₹ 1,500 at same value and remaining goods sold at ₹ 40,000. Accounts are settled between both parties.

Prepare necessary accounts in the books of both the parties.

In the books of Swastik Toys
Consignment Account

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Goods sent on	40,000		By Manu Toys (sale)	50,000

	Consignment A/c			By Joint venture (Transfer to joint venture a/c) (40,000 x 20%) + (5000 x 20%)	9,000
	To Bank (Expenses)	4,000			
	To Manu Toys (Exp.)	1,000			
	To Manu Toys (com.) (5% of 50,000)	2,500			
	To P & L A/c	11,500			
		59,000			**59,000**

Joint Venture Account

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Consignment A/c (Transfer)	9,000		By Manu toys (sales)	40,000
	To Purchase (goods supplied)	20,000		By Manu toys (Goods Taken)	1,500
	To Bank A/c (expenses)	2,000			
	To Manu Toys (exp.)	1,500			
	To Profit on Joint Venture P&L 6000 Manu toys 3000	9,000			
		41,500			**41,500**

Manu Toys Account

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Consignment A/c	50,000		By Consignment a/c	1,000
				By Consignment a/c	2,500
				By Bank a/c (b/f)	46,500
		50,000			**50,000**
	To Joint venture a/c (sales)	40,000		By Joint venture a/c (Exp.)	1,500
	To Joint venture a/c (Exp.)	1,500		By Joint venture a/c (Share of Profit)	3,000
				By Bank a/c (b/f)	37,000
		41,500			**41,500**

In the Books of Manu's Toys
Joint Venture Account

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Swastik Toys (stock on consignment)	9,000		By Bank A/c (sales)	40,000
	To Swastik Toys (Goods Supplied)	20,000		By Purchase (stock taken)	1,500
	To Swastik Toys (Exp.)	2,000			
	To Bank a/c (Exp.)	1,500			
	To Profit P&L 3000 Swastik Toys 6000	9,000			
		41,500			**41,500**

Swastik Toys Account

Date	Particulars	Amount (₹)	Date	Particulars	Amount (₹)
	To Bank A/c (expenses)	1,000		By Bank A/c (sales)	50,000
	To Commission	2,500			
	To Bank a/c (b/f)	46,500			
		50,000			50,000
	To Bank A/c (b/f)	37,000		By Joint venture (stock)	9,000
				By Joint venture (Goods)	20,000
				By Joint venture (Exp.)	2,000
				By P&L A/c (Profit)	6,000
		37,000			**37,000**

Repairs of Partially Damaged Goods

When some amount is spent for repairing damaged goods to bring them to saleable condition, the Journal entry passed is as follow :

(1) The amount spent on repairing of such goods is treated as Consignment Expenses :

Consignment A/c Dr.

To Cash/Bank A/c

(Being repair charges incurred on partially damaged goods)

(2) Amount of Repairs to be included in the cost of damaged goods :

The cost of damaged goods will be enhanced by the amount spent on their repair to bring them to saleable condition. In this case cost of Abnormal Loss will be determined by adding this amount in cost. In such a case, the amount to be charged to Profit & Loss A/c will be :

Abnormal Loss to be debited to P & L A/c = Cost of Damaged goods + Amount of Repairs – Saleable Amount.

(3) If partly damaged goods become good units after repairing them :

It can be sold at price of good unit, then such amount is added in the cost of unsold stock.

Illustration 12:

Rajendra sent 100 fans @ ₹800 per fan to Narendra on consignment. Consigner paid ₹ 2000 for carriage and other expenses. 20 fans are left unsold with consignee, out of which 8 are damaged. Repairs ₹ 1000 paid to make good the damaged fans. Give the Journal entry for expenses on repairs, if :

(1) Repair expenses are treated as consignment expenses.

(2) Repair expenses included in the value of damaged goods and then the value of damaged fans is ₹400 per fan, then calculate value of abnormal loss too.

(3) After repair the damaged fans can be sold as good fans, then calculate the value of unsold stock.

Solution :

(i) Consignment A/c Dr. 1000

To Cash A/c 1000

(Repair of partially damaged goods debited to Consignment A/c)

(ii) Cost of Abnormal Loss

		₹
Cost price of 8 Fans ₹ 800 each.		6,400
Add : Proportionate Expenses paid by consignor (2000 x 8/100)		160
	6,560	
Add : Repairs of damaged units		1,000

Total Cost of damaged stock	7,560	
Less : Actual value of damaged fans 8 x ₹ 400	3,200	
Abnormal Loss debited to P & L A/c		4,360
(iii) Value of unsold stock		
Cost of 20 fans @ ₹ 800 each	16,000	
Add : Proportionate Expenses paid by consignor (2000 x 20 / 100)	400	
	16,400	
Add : Repairs of damaged units		1,000
Value of unsold stock	17,400	

Summary

- **Consignment :** When goods are sent by the consignor to the Consignee for selling them and for which the later will be entitled to receive commission, is called Consignment. Goods sent by consignor is called outward Consignment and received by consignee is called Inward Consignment.
- **Consignee :** A party to whom goods are sent on consignment which is to be sold to consumers. Is also known as Agent.
- **Consignor :** An owner of goods who dispatches goods on Consignment for sale. He is also known as principal.
- **Advance on Consignment :** This amount is paid by consignee to the consignor before the sale on Consignment as security deposit for goods sent to him.
- **Difference between Consignment and Sale :** In consignment, ownership of goods lies with the consignor, whereas in sale of goods ownership is transferred to buyer.
- **Valuation of Unsold Stock :** It is valued at cost price or market price, whichever is less. There after proportionate expenses incurred by consignor and proportionate non-recurring expenses incurred by Consignee are added.
- **Loss of Goods on Consignment :** The loss may be normal or abnormal. There is no separate accounting treatment for normal loss. The cost of normal loss is absorbed by good units. On the other hand Abnormal Loss is valued and shown separately in Consignment A/c.
- **Consignment of Goods at Invoice Price :** When goods are consigned by the consignor at Invoice Price, in that case the amount of profit remains included in the value of goods sent on consignment. For unsold stock and Abnormal Loss, adjustment is made.
- **Fall in market price of goods :** In this case, unsold sock is valued at market price.
- **Share in Profit to Consignee :** Sometimes Consignor and consignee enter into agreement that the later will receive some share in profit as a special commission in addition to other commissions. In this case consignment A/c will be debited and Agent A/c credited with the amount of such share of profit.
- **Conversion of Consignment into Joint Venture :** Under this case unsold stock of Consignment will be transferred to Joint Venture A/c and there after entries will be passed as in case of Joint Venture.

Glossary

(1) **Account Sale :** This is a document sent by Consignee to the Consignor after the sale showing details of gross sale proceeds, the expenses incurred by him and the amount of commission charged etc.

(2) **Proforma Invoice :** When goods are sent to agent by Consignor, an informative raw-invoice is sent by consignor to consignee, so that consignee will not sell the goods below such price.

(3) **Consignment Account :** During the process of goods sent by consignor to consignee, an account in prepared by the consignor is called as Consignment Account.

(4) **Delcredere Commission :** This commission is allowed to the agent in order to cover the risk of loss due to bad debts.

(5) **Additional Commission :** It is an extra Commission in addition to ordinary Commission usually given for selling goods above Invoice Price.

(6) **Unsold Stock with Agent** : The Stock of goods left after the sale by the consignee is called unsold stock or stock with Agent. It is valued at cost or market price whichever is less and by adding proportionate direct expenses incurred by Consignor and Consignee.

(7) **Normal Loss:** The loss of stock which is unavoidable, natural and is due to inherent nature of commodity is known as normal loss.

(8) **Abnormal Loss:** When loss is caused by theft, fire, pilferage and abnormal breakages etc, it is called Abnormal Loss.

Questions for Exercise

Multiple Choice Questions :

1. Nature of Consignment Account is:

   (a) Real Account (b) Personal Account

   (c) Nominal Account (d) Agent Account

2. What is the relation between consignor and consignee?

   (a) Owner and Employee (b) Purchaser and Seller

   (c) Princpal and Agent (d) Debtors and Creditors

3. The statement of Account, which is sent by the consignee after selling goods is known as :

   (a) Invoice (b) Statement of Sale

   (c) Account of Sale (d) Performa Invoice

4. In Consignment, while valuing remaining unsold stock with consignee, which proportionate expenses of consignee are added :

   (a) Octroi and Freight (b) Godown Rent

   (c) Advertisement expenses (d) Sales expenses

5. Consignor sent goods to consignee on consignment, consignor paid 5% commission on invoice price and 20% above on invoice price. Consignor sent goods worth ₹80000 at an invoice price of ₹ 100000. Which is sold for ₹ 1,10,000 the amount of commission for agent will be :

   (a) ₹ 7, 000 (b) ₹ 8,000 (c) ₹ 10,000 (d) ₹ 5,800

6. Goods sent on consignment worth ₹ 12000 that is 20% above the cost price. The cost of such goods will be:

   (a) ₹ 9,600 (b) ₹ 15 000

   (c) ₹ 14,400 (d) ₹10,000

7. B/R received from consignee ₹ 10,000 consignor discounted from bank for ₹ 9,600. What entry will be passed for discounting the bill ?

(a)	Bank A/c	Dr.	₹ 9,600	
	Discount A/c	Dr.	₹ 400	
	To B/R A/c			₹ 10,000
(b)	Bank A/c	Dr.	₹ 9,600	
	To Consignment A/c			₹ 400
	To B/R A/c			₹ 10,000
(c)	Bank A/c	Dr.	₹ 9,600	
	Consignment A/c	Dr.	₹ 400	
	To B/R A/c			₹ 10,000

(d) Bank A/c Dr. ₹ 9,600

Discount A/c Dr. ₹ 400

To Consignment A/c ₹ 10,000

8. Ramesh sent 250 cycles @ ₹ 200 per cycles at invoice price to Naresh on consignment. It includes 25% profit on cost price, consignor paid expenses ₹ 2000. Consignee informed that 50 cycles remain unsold, those cycles can sell at ₹ 190 per cycle, what will be value of unsold stock :

(a) ₹ 9900 (b) ₹ 9500 (c) ₹ 8400 (d) ₹ 8000

Very Short Answer Type Questions :

1. What is difference between Delcredere Commission and Additional Commission?
2. What is Account sale? Who prepares it?
3. Give two differences between Invoice and Proforma Invoice?
4. An agent is entitled to get Delcredere Commission. What entry he will pass, if a bad debt due to credit sale occurs.
5. Jitu sent goods on consignment at cost ₹ 10,000. He paid ₹ 1000 for carriage and insurance. Agent paid ₹ 2,500 for octroi and ₹ 400 for selling expenses. Agent sold 80% goods. Calculate value of unsold stock

   Answer : ₹ 2,700.
6. Goods sent on consignment at cost plus 20%. Calculate the invoice value of goods costing ₹ 12,000.
7. Anil sent 50 fans box at ₹ 1,000 per fan to Sunil on consignment and paid ₹ 5,000 for consignment expenses. On the way 5 fans was stolen. Sunil took the delivery of remaining fans and paid freight ₹ 800. Calculate the value of abnormal loss.

   Answer : ₹ 5,500
8. If consignee is not entitled for Delcredere commission and ₹ 1,500 due to debtor becomes bad, what entry will be passed in the books of consigner for such bad-debts.
9. Goods lost from consignees godown worth ₹ 10,000. Insurance Co. accepted the claim for ₹ 9,000. In which account such difference will be transferred.
10. 2000 Kg Gur sent on consignment @ ₹ 20 per Kg. 100 kg became abnormal loss. 1500 kg goods sold by consignee. Calculate the value of unsold stock.

    Answer : ₹8421

Short Answer Type Questions :

1. What are the differences between Consignment and Sale ?
2. Give two examples of Normal Loss and Abnormal Loss.
3. What are the differences between Consignment and Joint Venture?
4. What are the differences between Invoice and Proforma Invoice?
5. While calculating value of remaining goods with consignee, which expenses paid by agent are not added?
6. Chandra sent goods worth ₹ 50,000 at invoice price to Shakuntla by adding 25% profit on cost. Expenses for sending the goods were ₹ 1000 and Shankuntla spent ₹ 2000 for receiving the goods. Consignee sold 4/5 part of goods received by him. Calculate the value of unsold stock.

   Answer : ₹ 8600
7. Vivek paid to Bhavesh 5% general commission on sale and 2.5% Del credere commission. Bhavesh sold goods worth ₹ 60,000 including ₹ 40,000 on credit sales. What amount of commission Bhavesh will receive?

   Answer : ₹ 4,000
8. 100 ton coal sent on consignment for ₹ 1300 per ton at invoice price and ₹ 800 per ton at cost price and consignor paid ₹ 20000 for expenses. Agent sold 76 ton coal and paid ₹ 8000 for sales expenses. It is informed that 5 tons coal is found less. Calculate the value of remaining stock with agent.

   Answer : ₹ 19200.

9. Mr. Harish of Mumbai consigned 20 items to Chain Singh of Jaipur at ₹ 1,800 per item at cost. He spent ₹ 2000 on consignment. On the way 4 items are destroyed. Insurance Co. accepted 80% claim. Consignee sold destroyed goods at ₹ 1000. Calculate the value of abnormal loss.

   Answer : ₹ 520

10. Ramesh sent 400 T.V. @ ₹ 1500 per T.V. at invoice price to Naresh on consignment. It includes 25% of cost. Ramesh paid ₹ 2000 for sundry expenses. Naresh sold 350 T.V. at ₹ 1800 per T.V. and Naresh paid ₹ 1000 sales expenses and ₹ 2000 advertisement expenses. Calculate the value of unsold stock.

    Answer : ₹ 60250

EssayType Questions :

1. How valuation is done for unsold stock with consignee?
2. What do you mean by consignment? Explain with example various types of commissions given to consignee.
3. Write the difference between accounting for goods on consignment at cost price and at invoice price. Explain with examples.

Answer of Multiple Choice Questions

Question No.	1	2	3	4	5	6	7	8
Answer	c	c	b	a	a	d	c	c

Numerical Questions :

1. Mr. Bharat of Alwar sent goods to Kapil of Udaipur for ₹ 100000 on consignment and paid sundry expenses ₹ 20000. Kapil sent ₹ 60000 to Bharat in advance. Kapil paid wages and cartage ₹ 4000 and godown rent ₹ 3000. Kapil sold all the goods for ₹ 1,60,000 in cash. 5% commission on sales is payable to consignee. Kapil sent remaining amount to Bharat. Prepare Journal entries is the books of consignor and consignee and also prepare necessary ledger accounts.

   Answer : Profit on consignment ₹ 25,000.

2. Mr. Rakesh of Jaipur appoints Mr. Anil of Bhilwara as his selling agent. Rakesh consigned 100 mobile sets @ ₹ 3000 each set to Anil. Rakesh paid expenses ₹ 2800 and Anil paid clearing charges ₹ 1200. Anil sold 70 mobile @ ₹ 4000 each set in cash and 20 mobile sets @ ₹ 4200 each sold on credit. Selling expenses per mobile set ₹ 25 paid. Anil received 6% General commission and 3% Delcredere commission on credit sales. Prepare necessary accounts in the books of Consignor and Consignee. Value of one set is being out of credit sales?

   Answer : Consignment Profit ₹ 63790 Value of Unsold Stock ₹ 30,400.

3. Bharat Cycle Ltd. of Ajmer appointed Chandra Cycle Store Chitorgarh as his selling agent on the following terms.

   (i) Goods to be sold at invoice price or over.

   (ii) Chandra cycle store will be entitled to get commission of 5% on invoice price and 20% for commission on the value above invoice price.

   (iii) The principal to draw a bill on the agent for 2 months of 60% of invoice price.

   600 cycles were consigned to Chandra cycle store Chittor for ₹ 200 per cycle, which was at invoice price ₹ 250 per cycle. Chandra cycle store met his acceptance on due date. Chandra cycle store sold 540 cycles @ ₹ 280 per cycle. His selling expenses were ₹ 1250 and he remitted the amount due by a Bank Draft. The balance stock was valued at 80% due to damage caused by rains. Prepare the necessary ledger Accounts in the books of the both parties.

   Answer : Profit on Consignment ₹ 29,560.

4. The M. Coal Co. consigned to Mr. Rakesh Sales Ltd. 100 quintals of coal at invoice price of ₹ 40 per quintal. The

company paid ₹ 0.50 per quintal for loading and ₹ 3.50 per quintal for Railway freight. An account sale was received from Mr. Rakesh sales Ltd. showing 800 quintals coal sold at ₹ 60 per quintal, Sales expenses ₹ 1600, insurance ₹ 200, brokerage @ 2% and commission @ 5%. The agent remitted the amount payable by a bank draft and reported a shortage of 20 quintals of coal on the whole consignment. Prepare the necessary accounts in the books of M. Coal Company.

Answer : Consignment Profit ₹ 6 921.63, Unsold Stock ₹ 8,081.63.

5. Krishna Glass Works of Mumbai consigned 100 cases of goods to his agent Chandan at ₹ 20000. It includes 25% on cost price. They also paid freight ₹ 500 and insurance ₹ 1000. In course of transit 20 cases were lost and a claim was made. A sum of ₹ 3200 was received from Insurance co. . The agent took delivery of remaining cases and Chandan paid ₹ 800 custom dutiys, ₹ 80 octroi and ₹ 40 cartage.

   Chandan rendered to their principal an account sale showing that 60 cases were sold for ₹ 14000 and paid brokerage at 1.5%. The agent after deducting the expenses incurred by him and his commission at 5% on gross sales proceeds, remitted the balance due by bank draft. Record the above transactions in the ledger of both parties.

   Answer : Consignment Profit ₹ 1,900, Abnormal Loss ₹ 300, Unsold Stock ₹ 3,730.

6. Kamal Traders consigned 2000 vegetable oil tin @ ₹ 1400 per tin at cost to Himanshi traders and paid railway freight ₹ 20,000. In course of transit 100 tins was Stolen. A sum of ₹ 10,000 is received from insurance company as a claim. Agent took delivery of remaining goods and paid to ₹ 19000 for octroi and ₹ 3000 as selling expenses. He sold ₹ 1700 tins @ ₹ 1500 per tin and charged ₹ 20 per tin sold as commission. Prepare Consignment account and Abnormal Loss account in the books of consignor.

   Answer : Consignment Profit ₹ 99,000, Abnormal Loss ₹ 41,000, Unsold Stock ₹ 2,84,000.

7. Mr. Ram and Co. of Bombay consigned 1000 radio @ ₹ 500 per Radio on cost and ₹ 600 per radio at invoice price to Mayank Radio Co. Ajmer. Mayank Radio Co. sold 700 Radios @ ₹ 750 per radio. In course of transit 50 Radios damaged and agent claimed from insurance co. Agent received commission on invoice price at 10% and above invoice price 25%. Accounting is made at invoice price. Prepare Consignment account in the books of consignor.

   Answer : Consignment Profit ₹ 96, 250, Abnormal Loss ₹ 25, 000, Stock Reserve ₹ 25 000.

8. Mahesh sells goods on behalf of Vijay Sales Corporation on consignment basis. On 1 January, 2015 he had with him a stock of ₹ 20000 on consignment. Mahesh had instructions to sell the goods at cost plus 25% and was entitled to get a commission of 4% on sales in addition to 1% Delcredere commission on total sales for guaranteed collection of all sale proceeds. During the year ended 31 December, 2015 cash sales were ₹ 120000 and credit sales ₹ 105000. Expenses paid by Mahesh related to the consignment ₹ 3000. Bad debts were ₹ 3000 and goods sent on consignment ₹ 200000. From the above particulars prepare Consignment Account in the books of Vijay Sales Corporation.

   Answer : Hint: Cost of Goods Sold ₹ 1,20,000 + 10,5000 = (2,25,000 x 100) 125 = ₹ 1,80,000, Consignment Profit ₹ 30,750, Unsold Stock ₹ 40,000.

9. Deepak of Delhi sent goods on consignment to Vivek of Ranchi and charged profit on proforma invoice price at 25% on cost. The agent received commission @ 7% plus 3% delcredere commission on sales made by him.

   Stock with Agent at the beginning of the year was 20 bales at invoice price of ₹ 5000. The following transactions took place during the year ended 31st December, 2015.

   (i) 100 bales consigned at profroma invoice price ₹ 25000

   (ii) Freight and insurance paid by Deepak ₹ 1000

   (iii) Advance received from Vivek ₹ 10000

   (iv) Sales made by Vivek **:** (a) 50 bales for cash ₹ 12500; (b) 40 bales for credit ₹ 10800

   (v) Advertising expenses paid by agent ₹ 1200 and brokerage allowed by him ₹ 500

   (vi) 15 bales were damaged in transit and ₹ 1400 received as compensation. The damaged cases were sold for ₹ 1100

(vii) ₹ 1500 could not be realized from credit sales.

(viii) The agent remitted the balance amount. Prepare necessary accounts in the books of Deepak.

Answer : Abnormal Loss ₹ 650, Commission ₹ 2,440, Unsold Stock ₹ 3,150

10. Bharat Store consigned goods worth ₹ 80000 at invoice price (cost price ₹ 60000) to Rajasthan Store. He paid carriage and wages ₹ 500, freight ₹ 800 and insurance ₹ 600. The agent paid octroi and freight ₹ 200,Godown rent ₹ 500 and fire insurance ₹ 500. Rajasthan Store sold goods ₹ 40000 on credit and ₹ 24000 for cash. Stock of invoice price ₹ 16000 remains unsold. 5% commission on total sales and 3% delcredare commission on credit sales is payable to consignee. Prepare Consignment Account in the books of Bharat Stores.

Answer : Consignment Profit ₹ 8,920; Unsold Stock ₹ 12,420

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9

Accounting for Non-Trading Organisations and Professional Persons

Learning objectives :

After studying this Chapter you should be able to understand

- Meaning of Non-Trading organistions and books of accounts kept by them
- Meaning of specific items used and their accounting treatment
- Process of preparing Receipts & Payments Account
- Process of preparing Income & Expenditure Account
- Preparing Balance Sheet of Non-trading Organisations
- Preparing Receipts & Payments Account from Income and Expenditure Account
- Preparing opening & closing Balance Sheet from Receipts & Payments Account and Income & Expenditure Account
- Difference between Receipt & Payment Account and Income & Expenditure Account

Trading organisations are established with the object of earning profit. These includes manufacturing organisations, wholesale and retail Trade organisations engaged in purchase and sale of goods and services, rendering ones. On the other hand there are many such organisations which are established with the objective of rendering social and public services. These include literary societies, games & sports club, hospitals, educational institutions, organisations formed for promoting Art and Culture, workers unions, and social welfare societies. They generate Profit/Loss through services rendered by them. Since the nature of work of these organisations is different, so the method of maintaining their accounts is also different. This is called accounting of non-trading organisations. Apart from the above, professional persons are also an important segment of society. The include Doctors, Advocates, chartered Accounts, Architects etc. They do not purchase and sell the articles but earn profit with their intellectual and professional abilities. The nature of activities undertaken by these persons is also different. As such, the accounts kept by them are called Accounts of Professional Persons.

Characteristics of Non-Trading organisations

1. Separate Legal Expression
2. Service Motive
3. Test of efficiency welfare work
4. Sources of Fund-Funds are generated general through receipts from members, governments and other sources.
5. Reinvestment of Funds- These organisations use their income again in welfare work. Income is not distributed among members.
6. Management by elected persons.

Need for Maintaining Accounts : Need for maintaining accounts of these organisations arises from the following reasons:-

(1) Generally these organisations are not established with the objective of earning profits, but it is necessary for the members to know about the surplus or deficiency of funds, which arises on account of the difference in receipt of funds and expenses incurred.

(2) Liquidity position of the society can be known by writing day-to-day income and expenses in the books, so that arrangement of funds may be made in time to meet the objectives of the society.

(3) By maintaining accounts of these societies, the members will have knowledge of assets and liabilities, so that they continue to have the knowledge of Capital fund and may take corrective action in case of shortage of funds.

Difference between Commercial and Non-Commercial Organisations

Reason of Difference	Commecial Organisations	Non-commercial Organisations
(1) Basic Object	To earn profit	To render service and welfare work.
(2) Ownership	Of persons introducing capital.	Persons who donate in capital fund They are called subscribers
(3) To draw financial position	Trading and Profit & Loss account and Balance Sheet are prepared by these organisations.	Receipts & Payments A/c, Income & Expenditure A/c and Balance Sheet are prepared by these organisations.
(4) Consideration or reward	The reward of activities is amount of Profit & Loss.	The reward of their actvities is surplus or defficency
(5) Excess of fund	Excess of income over expenses is distributed amongst the members.	Such amount is reinvested in welfare projects of the organisation
(6) Receipt of Funds	Funds are received through capital invested by owners	Fund are received through subscription, fees and donations from members and outriders.

Books kept by Non-Trading Organisations

These organisations keep the following books, so as to have knowledge about outcome :-

1. **Cash Book :** It is basic and important book kept by these organisations to keep their accounts in which they enter their daily cash transactions to determine the liquidity position. The proforma of cash book for these organisations is different from that which is Kept by trading organisations, because they do not keep one column for cash but many columns, one separate column for every item of income and expenditure. In this manner the analysis of each item of income and expenditure becomes easy. The proforma of such cash book has been given on pages where preparation of Receipts and Payments Account is explained.
2. **Stock Register :** Non-trading organisations keep a Register to keep record of physical assets and long-term useful items, quantity, price and rate along with specific information are mentioned. If the number of such articles is less, only one Register is kept. When the number of articles is large, separate register for each type of article will be kept. For example, games material, furniture, books, plants tools etc. When separate register for each of these articles is kept, counting and verification become convenient.
3. **Membership Register :** These organisations have members. A separate register is maintained for these members in which complete information about them appear. For example, their names, addresses, telephone or mobile numbers, mail I.D, membership fees etc. are written. The information about their leaving the organisation, annual membership fee/subscription is also mentioned there in.

Financial Statements of Non-Trading Organisations

Although it is necessary to keep accounting records for financial and other activities of these organisations to fulfill their objectives of earning profit, yet these organisations may adopt single or double entry system of accounting on the basis of their size. The following three types of Statements are prepared by them:-

1. Receipts & Payments Account
2. Income & Expenditure Account
3. Balance Sheet

Study of certain special items is necessary before we learn to prepare the above statements.

Some Special Items :

These items have been dividend into four categories with a view to make study easy:

(a) Items of fully revenue nature,

(b) Items of fully capital nature

(c) Deemed capital/revenue items according to circumstances

(d) To find out initial capital fund.

(a) Items of fully Revenue Nature : Such transactions, the benefit of which relates with one financial year, are treated as items of revenue nature. These are as follows :

(i) Subscription : It is the main source of income of these organisations. According to the Accounting Concepts the income of current year should be accounted for in the same year. As such we may calculate it with the help of following format easily :

Calculation of Current Years Subscription Amount

Particulars	Amount ₹	
Subscription received during the year (as shown in Receipts and Payments Account)	---	
Add : Current years outstanding subscription	---	
Advance subscription received in previous year (related to current year)		
Less: Outstanding subscription of previous years received during the current year		---
Subscription received in advance related to next year		
Amount to be shown in the credit side of Income and Expenditure Account		---

Above transactions will be shown in current years Balance Sheet as follows :

Balance Sheet (Current Year)

Liabilities	Amount (₹)	Assets		Amount (₹)
Advance subscription	----	Outstanding Subscription		
(Received during current year)		Current Year	----	
		Previous Year	----	----

We can understand above information from the following illustrations :

Illustration 1 :

The following informations related to subscription. How it will be shown in Income and Expenditure Account for the year ending 31st March, 2017 and Balance Sheet on that date :

	31.3.2016 ₹	31.3.2017 ₹
Outstanding subscription of related year	1,20,000	10,000
Advance Subscription of related year	1,100	2,500

During the previous year 1,62,500 received for subscription, out of which 5,000 related to previous years outstanding subscription.

Solution :

Income and Expenditure Account
For the year Ending 31-03-17 (an Extract)

Liabilities	Amount (₹)	Assets	Amount (₹)
		By Subscription (as per working note)	1,66,100

Balance Sheet
As on 31st March, 2017 (An Extract)

Expenditure	Amount (₹)	Income		Amount (₹)
Advance Subscription	2,500	Outstanding Subscription		
		Current year	10,000	
		Previous Year	7,000	17,000

Working Note :

		₹
Calculation of subscription received related to current year:		
Subscription received during the year	1,62,500	
Add : Current year subscription outstanding	10,000	
	1,72,500	
Less : Previous year outstanding subscription received during the year	5,000	
	1,67,500	
Add : Subscription received in advance in previous year	1,100	
	1,68,600	
Less : Subscription received in advance during the year related to previous year	25,000	
	1,66,100	

Illustration 2 :

Following information related to subscription. Show how it will be shown is Income and Expenditure Account for the year ended 31st March, 2017 and Balance sheet on that date

Receipts		Amount (₹)	Payments	Amount (₹)
Advance Subscription				
2015-16	15,000			
2016-17	2,00,000			
2017-18	10,000	2,25,000		

There are 1800 members of the institution from which ₹150 annual subscription per member is taken outstanding subscription for the year ended 31st March, 2016 was ₹ 2000.

Solution :

Income and Expenditure Account
For the year Ending 31-03-17 (an Extract)

Expenditure	Amount (₹)	Income		Amount (₹)
		By Subscription	2,00,000	
		+ Out standing C.Y.	70,000	2,70,000

Balance Sheet
As on 31st March, 2017

Liabilities	Amount (₹)	Assets		Amount (₹)
Advance Subscription	10,000	Outstanding Subscription		
		2015-16	6,000	
		2016-17	70,000	76,000

Note :

1. Current years outstanding subscription is calculated as follows:

	₹
Subscription receivables for current year (1800 x 150)	2,70,000
Less : Current years subscription received	2,00,000
	70,000

2. Outstanding subscription related to 2015-16 yet not received in current year

Outstanding subscription related to 2015-16 yet not received in current year	21,000
Outstanding subscription received during the current year related to 2015-16	15,000
	6,000

2. **Consumable Stores :** Normally number of items of consumable stores are purchased during a year by the institution, of which, stock remains at the end and amount of purchases also remain due at the end. Sometimes advance amount is paid in to them for purchases. Hence, such expenses are shown in Income and Expenditure Account as actual consumption of consumable stores during the year. Such calculation can be done as follows :

Particulars	Amount ₹
Payments during the current year (as per Receipts and Payments Account)	---
Add : Opening stock of such material assuming it is consumed first	---
Less : Closing stock of such material	---
Add : Outstanding amount for purchases at the end of current year	---
Less : Outstanding amount for purchases at the beginning of the year	---
Add : Advance payment for purchases in previous year (It is assumed that such material is consumed during the year)	---
Less : Advance payment during current year for purchases in next year.	---
Amount to be shown on debit side of Income and Expenditure Account (Current year consumption)	---

Balance Sheet

Liabilities	Amount (₹)	Assets	Amount (₹)
Creditors at the end of current year	---	Closing Stock	---
		Advance payment during the year	---

Illustration 3 :

From the following informations, determine expenses on stationary to be shown in Income & Expenditure Account for the year ending 31 March, 2017 and Balance Sheet on that date.

	₹
Stock of stationary on 1-4-2016	5,000
Creditors for stationary on 1-4-16	2,000
Advance paid for stationary on 31-03-16	1,000
Amount paid for stationary during the year 2016-17	25,000

Stock of stationary on 31-03-17	3,000
Creditors for stationary on 31-03-17	1,200
Advance paid for stationary on 31-03-17	13,000

Solution :

Calculation of stationery consume during 2016-17

Particulars	Amount ₹
Amount paid in current year	25,000
Add : Opening stock of stationery	5,000
Add : Opening balance of advance payment	1,000
Add : Amount payable at end of current year	1,200
	32,200
Less : Amount payable (Opening balance)	(2,000)
Less : Closing balance of Advance payment	(1,300)
Less : Closing stock of stationery	(3,000)
Amount of stationary, to be shown on debit side of Income & Expenditure Account	25,900

Balance Sheet

As on 31st March, 2017

Expenditure	Amount (₹)	Income	Amount (₹)
Creditors at the end	1,200	Closing Stock	3,000
		Advance paid during the current year	1,300

3. **Sale Proceeds of Consumable Material :** Sometimes these institutions receive some amount from the sale of consumable material**,** which is shown on credit side of Income & Expenditure Account.
4. **Amount received from sale of scrap :** These institutions possess some material left after consumption. This material is sold and amount received is treated as revenue receipt which is credited to Income & Expenditure Account. For example, packing materials, bottles, grass etc.
5. **Purchase and sale of Magazines etc :** Amount of purchase of magazihes is revenue expenditure which is shown on debit side of Income & Expenditure A/c and proceed received from sale of old newspapers and magazines are revenue receipts and credited to that Account.
6. **Sale proceeds of old games material :** Entertainment club and Games & Sports clubs usually sell old games & sports material. The proceeds from sale treated as revenue receipt and credited to this Account.
7. **Honorarium :** In addition to regular functions of an Institution, sometime outsiders are invited for some special activities, for assets which they are paid honorarium. This amount is treated as revenue payment and debited to this Account.
8. **Profit or Loss from sale of fixed assets :** These Institution possess some fixed assets. When some of these are discarded and sold, the amount received is treated as revenue profit and shortage as revenue loss. Amount of profit is written on credit side and the amount of loss on debt side of this Account. Total amount received will be recorded in Receipts & Payments Account.
9. **Other Revenue Income & Expenditure :** Various receipts which relate to current year, for example interest & dividend received, receipts from recreation, sale of tickets are written on credit side of Income & Expenditure A/c. On the other hand current years general expenses**,** e.g. telephone bill, Electricity bill, Insurance charges, office expenses, salaries, depreciation, stationery etc. are written on debt side of Income & Expenditure A/c. As regards Receipt & Payment Account, all amounts received (may relate to any year) are shown on receipt side, where as all payments made (may relate to any year) are recorded on payment side of Receipts & Payments Account.

(b) **Items of fully Capital Nature :** The benefit of a transaction**,** which is received for more than one year and which is of non-recurring nature is called item of Capital nature.

(1) Legacies : It is the amount which is received by non-profit organisations as per the will of a deceased person. It is not shown in Income & Expenditure Account but is shown in Balance Sheet by adding it to Capital Fund. It is also shown in Receipt & Payment A/c on credit side. If it is received for specific purpose, it will be shown on liability side of Balance Sheet as a separate item or in specific Fund A/c.

(2) Life Membership Fees : It is a capital receipt which is received only once. It is shown on Liabilities side of Balance Sheet either adding to capital fund or as a separate item under the heading Life Membership Fees:

(3) Purchase and Sale of Fixed Asset : It is an item of capital nature. Hence it is shown on asset side of Balance Sheet by adding to relevant asset or separately if it does not exist. When it is sold, the book value of the asset sold will be deducted from the total asset value. Depreciation for current year will be deducted from the relevant asset and the amount of depreciation will be charged and written on debit side of Income & Expenditure A/c. In Receipt & Payment A/c, purchases of assets will be shown on credit side and sale proceeds of the assets on debit side. No other information will be shown.

Illustration 4 :

From the following information, show the information related to furniture in Income and Expenditure Account for the year ending 31st March, 2017 and the Balance-Sheet on that date. Opening balance of furniture ₹ 10,000, during the year₹ 20,000 book value (opening) of furniture was sold for ₹ 18,000 on 31-12-2016 new furniture was purchased on 1-10-16. Depreciate furniture @ 10% p.a.

Solution : **Income and Expenditure Account (31-03-17)**

Expenditure	Amount (₹)	Income	Amount (₹)
To Depreciation	10,750		
To Loss on sale of furniture (20,000 - 1,500 - 18,000)	500		

Balance Sheet (as on 31-3-2017)

Liabilities	Amount (₹)	Assets	Amount (₹)
		Furniture 1,00,000 (+) Purchase of furniture 25,000 (-) Sale of furniture 18,500 (B.V. On date of sale) (-) Depreciation 80,000 x 10% = 8,000 20,000x10% x 9/12 = 1,500 25,000x10% x 6/12 = 1,250 10,750	95,750

In case of Receipts and Payments Account only Sale and Purchase values are shown in respective sides.

Funds :

Accounting for different types of funds will be as under:-

(1) General/Non-Restrictive Fund : Such funds are shown on liabilities side of Balance Sheet by adding to Capital or Endowment Fund.

(2) Specific/Restrictive Fund : Sometimes donations are given by a donor for some specific purpose for which a fund is created which is shown on liabilities side of Balance Sheet. For example specific Prize Fund, Games & Sports Fund, etc. The expenses incurred for this specific work or activity are deducted from the concerned fund and any amount of donations received is added to the amount of such fund.

(3) **Fixed Asset Fund :** The fund created for the purchase of a specific asset is shown on liabilities side of Balance Sheet.

(4) **Endowment Fund :** It is a fund arising from a bequest or a gift, the income of which is used for some specific purpose. As such, it is a capital receipt, since it provides a permanent income to the institution. If the balance of this fund is negative, the balance will be shown on debit side of Income and Expenditure A/c. If the balance is positive it will be shown on liabilities side of the Balance Sheet.

(5) **Annuity Fund :** Sometimes the donor gives donation with specific condition that the insitute shall give a certain amount to specific person for a specific time. Thus, it is a Capital receipt which will be shown on liabilities side of the Balance Sheet and after expiry of a certain period, it will be the property of the institution and will be used as per the gift agreement.

Illustration 5 :

The following informations regarding games fund is given. Show it in the Balance Sheet at the end of accounting year:-

	₹
Opening Balance of Games Fund	2,00,000
Games Fund Expenditure	20,000
Opening Balance of Games Fund Investment	1,50,000
Donations received during the year for games fund ticket	3,000
Interest Received on Investments 10% per a annum	--
Received from sale of games tickets	10,000

Solution :

Balance Sheet

Liatilities		Amount (₹)	Assets	Amount (₹)
Games Fund	2,00,000		Games Fund Investment	1,50,000
(+) Int. on Investment	15,000			
(+) Donations	3,000			
(+) Sale of Tickets	10,000			
	2,28,000			
(-) Expenditure	20,000	2,08,000		

Capital/Revenue Items determined in accordance with the circumstances :

Certain items of income and expenditure are treated as Capital or Revenue according to prevailing circumstances. The main items are as under :

(1) Donations : It is a normal receipt for these Institutions. It may be of two types **:-**

(a) **General Donations :** These donations are received without any specific purpose. If the amount of these donations is small, it is shown on the credit side of the Income & Expenditure Account. When these donations are of big amount, it is shown on liabilities side of the Balance Sheet as these donations are of non-recurring nature. For example, if donation is of ₹200, it is treated as item of revenue nature. Though at what amounts the donations will be treated as of capital nature, will depend upon the decision of the Institution.

(b) **Specific Donations :** When donations are received for specific purpose these are treated as item of Capital nature and will be shown on liability side of Balance Sheet. Expenses incurred for fulfillment of specific purpose will be deducted from the amount of specific donations. In case of Receipts and Payments Account, all amounts received will be recorded on Receipt side and expenses incurred on payment side.

(2) Entrance /Admission Fee : If it is an income of non-recurring nature, it will be shown in Balance Sheet on liability side by adding in Capital Fund. But some authors treat it as revenue income, being a regular source of income. CBSE has given instructions that it should be treated as revenue income, unless otherwise given in the question. For example, if 50% of entrance fee is required to be capitalised, in that case 50% should be added in Capital Fund and rest to be shown in Income & Expenditure Account.

(3) Grants : When some grant is received from the Government or any other Institution by a non-profit organisation, it should be treated as revenue income and should be credited in Income & Expenditure Account. For example, cash grant received for renewal. If grant is received for some specific purpose, it shall be treated as capital receipt and shown in Balance Sheet under that specific fund on liability side. For example, grant received from the Government for the construction of Building. It will be shown in Balance Sheet on liability side under Building Fund. After completion of related work, balance of amount is transferred to Capital Fund and the Building will be shown on Assets side of Balance Sheet.

(4) Calculation of Opening Capital Fund : Every organisation, in order to work regularly require**s** some funds. For Business enterprises call it Capital, but for non-profit organisations, it is Capital Fund. Every year when some surplus is realised from the activities of the organisation, that surplus is added to Capital fund, whereas deficiency is deducting from it. Whenever, Balance Sheet is required to be prepared, we need opening Capital which may not given sometimes in the question. Under such a case initial Capital can be ascertained by preparing opening Balance Sheet, for which the following process is followed-

(a) Computation of items of assets side of Balance Sheet.

(i) Balance of cash to be ascertained from Receipts & Payments A/c.

(ii) Balance of assets at the beginning of the year will be shown on assets Side, but any asset purchased during the year shall not be considered.

(iii) Advance payment made during previous year will be shown.

(iv) Balance of Accrued Income at the end Last year of end.

(v) Stock of Consumable Material, as shown at the end of last year.

(b) Calculation of items of liabilities side :-

(i) Last year's income received in advance

(ii) Outstanding expenses shown at the end of last year

(iii) Last year's amount due for consumable materials or any other amount payable.

(iv) Last year's balances of specific Funds.

(c) Now deduct the total amount under (b) from the total amount under (a) the difference will be the amount of opening Capital Fund. This amount will be shown as opening balance of Capital fund on liabilities side of Balance Sheet.

Format of Statement for Opening Balance Sheet

Liabilities	Amount (₹)	Assets	Amount (₹)
- Outstanding Expenses (at the end of last year) - Income received in Advance (at the end of last year) - Creditors (at the end of last year) - Specific funds (at the end of last year) - Capital Fund (Balancing Figure)		- Cash (Opening Balance of Receipts & Payments Account) - Outstanding Incomes (at the end of last year) - Prepaid Expenses (made last year) - Opening Stock of Consumable goods - Assets (at the end of last year)	

Receipts and Payments Account

Receipts and Payments Account is prepared at the end of financial year with the help of cash Book. All receipts and Payments which are entered in Cash Book are also recorded in Receipts and Payments Account, but in a summary form. For example, if rent is paid 10 times, on different dates, then the total rent paid during the period will be recorded in Receipt and Payments A/c as total Rent paid. Non-trading organisations generally analyse item wise in the Cash Book by drawing necessary columns right from the beginning of the year. In this manner, Non-trading organisations can prepare quite easily Receipts and Payments Account with the help of these extra columns. It is a sort of Memorandum Account, which is not based on double entry system.

Characteristics of Receipts & Payments Account

The main features of Receipts & Payments Account are as follows:-

1. It is the summary of Cash Book, which is prepared in the form of an Account. All receipts are recorded on left hand side of this and all payments on right hand side.
2. It is a real account by nature.
3. All receipts and all payments are shown in this Account which may be for any period. In other words no adjustment is made for outstanding or prepaid expenses, or accrued or unearned income. Non-Cash items are not shown in this Account. For example, depreciation is not shown.
4. Receipts and payments may be revenue or capital nature both are shown in this Account.
5. Distinction between Cash and Bank transactions is not made.
6. It starts with the opening balance of Cash-in-hand or at Bank (or Bank overdraft) and the balance of Cash and Bank is shown at the end.

Procedure for Preparing Receipts and Payments Account :

The procedure for preparing this account is as follows:

1. Opening balance of Cash and Bank is shown on debit side of this account. If there is a credit bank balance (Bank Overdraft) then it is shown on credit side of Receipts and Payments Account.
2. Various items of receipts shown on debit side of Cash Book, the items-wise yearly total of each item will be shown on debit side of this account. Such as, subscription, donation, yearly fees, etc.
3. Various items of payments on credit side of Cash Book. The item-wise yearly total of each item will be shown in credit side of Receipts and Payments Account. Such as, Rent, Salaries, Stationary, Light expenses, office expenses etc. .
4. At the end, cash and Bank balance in the Cash Book will be shown on credit side of Receipts and Payments Account.If there is Bank overdraft at the end, then it will be shown in debit side.

Note: (1) Only cash and bank transactions are shown, which may be of Capital nature or of revenue nature.

(2) All receipts and payments during the current year are shown, whether they are related to this year or any year. It means that current years outstanding income and outstanding expenses will be not shown.

Format of Receipts and Payments Account
for the year ended...........

Receipts		Amount (₹)	Payments	Amount (₹)
To Balance b/d			By Balance b/d (Bank Overdraft)	-------
Cash in hand	-------		By Wages & Salaries	-------
Cash at Bank	-------	-------	By Rent, Rates & Taxes	-------
To Subscriptions		-------	By Insurance	-------
To Donations		-------	By Printing Stationary & Postage	-------
To Sale of scrap and other items and materials		-------	By Advertisement	-------

To Interest of Fixed Deposit	-------	By Telephone Expenses		-------
To Interest from Saving Bank Account	-------	By Honorarium		-------
To Proceeds from Sale of Tickets	-------	By Upkeep of ground		-------
To Grants-in-aid	-------	By Repairs & Renewals		-------
To Sale of Assets & Investments	-------	By Conveyance		-------
To Life Membership Fees	-------	By Audit Fees		-------
To Legacies	-------	By Sports Expenses		-------
To Entrance Fees	-------	By Entertainment Expenses		-------
To Balance c/d	-------	By Fate Expenses		-------
(Bank Overdraft)	-------	By Purchase of Assets & Investments		-------
		By Deposits in F.D		-------
		By News Papers & Periodicals		-------
		By Balance c/d		
		Cash in hand	-------	
		Cash at Bank	-------	-------

Note: Only one amount of Bank Balance will be shown out of the two amounts of Bank Balance. On receipt and payment side.

Difference between Receipts and Payments Account and Cash Book

Basis	Receipts and Payments Account	Cash Book
1. Base	It is prepared from cash book.	It is prepared from each item of receipts and payments and also from bank transactions.
2. Period	It is prepared at the end of each year or on any specific date.	It is written on daily basis throughout the year.
3. Date-wise	Transactions are not shown date-wise.	Transactions are shown date-wise.
4. Side	Out of two sides, left side is called as receipts side and right side is called payment side.	Out of two sides, left side is called as debit side and right side is called as credit side.
5. Nature	It is Memorandum Account.	It is a principal book.
6. Organisations	It is prepared by non-trading organisations.	It is prepared by non-trading organisations as-well-as trading organisations.

Illustration 6 :

From the following Cash Book, prepare Receipts and Payments Account for the period.

Cash Book

			Analysis ₹				
Date	**Particulars**	**Total ₹**	**Subscription**	**Donation**	**Fees**	**Legacies**	**Sale of old Materials**
2016 Apr., - 1	To Balance b/d	5,000					
2016 Apr., - 5	To Fees	3,000			3,000		
2016 May, - 2	To Subscription	6,000	6,000				
2016 May, - 5	To Donations	7,000		7,000			

2016 Aug., - 6	To Subscription	2,500	2,500				
2016 Aug., - 12	To Legacies	8,000				8,000	
2016 Sept.,	- 7	To Fees	2,000			2,000	
2016 Sept., - 7	To Donations	10,000		10,000			
2016 Oct., - 10	To Subscription	9,000	9,000				
2016 Nov., - 11	To Sale of old Material	1,000					1,000
2016 Dec., - 20	To Legacies	2,500				2,500	
2017 Jan., - 25	To Subscription	12,000	12,000				
2017 Feb., - 10	To Subscription	3,500	3,500				
	Total	**71,500**	**33,000**	**17,000**	**5,000**	**10,500**	**1,000**

Credit-side

			Analysis ₹				
Date	**Particulars**	**Total ₹**	**Salaries**	**Stationary**	**Rent**	**Sports Exp.**	**Sundries**
2016 Apr., - 3	By Salaries	3,000	3,000				
2016 Apr., - 8	By Stationary	2,000		2,000			
2016 May, - 7	By Sports Exp.	4,000				4,000	
2016 May, - 15	By Rent	1,000			1,000		
2016 June, - 6	By Sundries	1,500					1,500
2016 June, - 14	By Sundries	500					500
2016 Jul., - 10	By Salaries	13,000	13,000				
2016 Aug., - 10	By Rent	1,000			1,000		
2016 Nov., - 16	By Sports Exp.	2,500				2,500	
2016 Dec., - 18	By Salaries	12,500	12,500				
2017 June, - 20	By Sundries	3,500					3,500
2017 Feb., - 23	By Sundries	4,500					4,500
2017 Feb., - 28	By Stationary	2,500		2,500			
2016 Mar., - 31	By Balance c/d	20,000					
	Total	**71,500**	**28,500**	**4,500**	**2,000**	**6,500**	**10,000**

Solution :

Receipts and Payments Account

for the year ended 31st March, 2017

Receipts	**Amount (₹)**	**Payments**	**Amount (₹)**
To Balance b/d	5,000	By Salaries	28,500
To Subscription	33,000	By Stationary	4,500
To Donations	17,000	By Rent	2,000
To Fees	5,000	By Sports materials	6,500
To legacies	10,500	By Sundries	10,000
To Sale of old materials	1,000	By Balance c/d	12,000
	71,500		**71,500**

Income and Expenditure Account

This Account is prepared by non-trading organisations for their activities performed during a certain year. This Account is a nominal account like Profit & Loss Account. This Account is prepared on of accrual basis. Items of Capital nature are not shown in this Account. All items of income or profit and expenses or losses of revenue nature are shown in this Account related to such period. Adjustments for unpaid and advances are made. Expenses are recorded on left hand side and incomes on right hand side. The difference of this Account is either surplus or deficiency. This Account is prepared with the help of Receipts & Payments Account and additional information provided in question.

Characteristics of Incomes & Expenditure Account :

1. Only items of revenue nature are shown in this Account.
2. It is a nominal account by nature. Hence expenses and losses are shown on debit side and incomes and profit on credit side of this Account.
3. Incomes and expenditures of current accounting period are recorded in this Account only, whether the income is received or not and expenditure is paid or still to be paid.
4. This Account is prepared on accrual concept i.e. adjustment is made for outstanding and advance receipts and payments.
5. It does not have any opening balance. Its closing balance represents surplus or deficiency, which is added or substaracted to Capital Fund in Balance Sheet.

Preparation of Income and Expenditure Account from Receipts and Payments Account

Income & Expenditure Account is prepared by adopting the following procedure :-

1. The opening and closing balances of Cash-in-hand and at Bank appearing in Receipts & Payments Account are not used.
2. The capital receipts and capital payments shown in Receipts and Payments Account are not shown in this Account. These are shown in Balance Sheet.
3. Only items of revenue nature, which relate to current year are shown in this Account after making adjustments for outstanding and advances, which are available from additional information.
4. The following items which are not shown in Receipts and Payments Account are shown in this Account-
   (i) Depreciation written off on fixed Assets (On expenditure side)
   (ii) Loss on sale of fixed assets (on expenditure side)
   (iii) Profit on sale of fixed assets (on income side)
   (iv) If a non-trading organisation undertakes one or more business activities, for example purchase and sale of medicines by the hospital, in such a case a separate Profit & Loss Account is prepared for each business activity and the profit or loss of these activities are then transferred to Income & Expenditure Account.
   (v) The amount of consumable materials used is shown on debit side of this Account.
   (vi) Excess of expenditure over the amount or specific funds us also shown on debit side of this Account.

Preparation of Balance Sheet

The Balance Sheet of a non-trading organisations is prepared in order to assess its financial position on a certain date. It is prepared in the same manner as in case of trading organisations. The word Capital Fund in place of Capital is used for these organisations. Balance Sheet is prepared in the following manner with the help of last year's Balance Sheet, current year's Receipts and Payments Account and additional information given :-

Assets side :

1. The closing balance of cash-in-hand and at Bank show in current years Receipts and Payments Account.
2. Fixed Assets appearing in previous year's Balance Sheet should be adjusted for assets purchased and sold and depreciation written off during the year. Only the adjusted amount will be shown in Balance Sheet. Adjustments in fixed assets will be made as under:-

Assets purchased during year appearing on payment side of Receipts & Payments Account, this amount is added to the previous year's balance of asset. Similarly, if some asset has been sold during the year is still appearing on payment side (debit side) of Receipts & Payments A/c, the book value of such asset should be deducted from the concerned asset of the previous year.

(3) Closing balance of consumable material be shown.

(4) The amount of accrued income of previous year appearing in last year's Balance Sheet should be confirmed to have been received during current year's, which will appear in Receipts & Payments A/c. If such amount is partly recovered, the unrecovered amount will be shown on asset side.

(5) Accrued income for current year should be shown on asset side. It should be ascertained from additional Information given.

(6) Prepaid expenses, if any, as certained from additional information will also be shown on asset side.

Liabilities Side :

(1) Capital Fund should be ascertained from previous year's Balance Sheet, and if it is not given, it should be computed as explained earlier in this Chapter.

(2) If information about outstanding expenses is given in previous year's Balance Sheet, then it should be scanned from current year's Receipts & Payments Account that it is discharged in full or not. If only part payment has been made, the balance unpaid should be shown on liabilities side.

(3) If information about advance income is given in opening Balance Sheet on liabilities side, then it's adjustment will be made only in Receipts &Payments Account and not in Balance Sheet.

(4) The amount of current year's outstanding expenses should be obtained from additional information given. If there is any amount of unpaid expenses, it should be shown.

(5) Such income received during current year, which relate to next year should be ascertained from Receipts & Payments A/c and additional information. Such income is shown on liability side.

(6) The amount of specific donations and specific funds should be as certained from Receipts and Payments Account and additional information. After making adjustment such funds be shown.

(7) If some amount of entrance fee is required to be capitalized, it should be added to Capital fund.

(8) Life membership fee should also be added to Capital fund.

(9) Surplus of Income & Expenditure Account should be addedto and deficiency be deducting from the Capital fund.

Format of Balance Sheet

Liabilities		Amount (₹)	Assets		Amount (₹)
Capital Fund:			Assets :		
Opening Capital Fund	----		Previous Balance	----	
Add/less: Surplus/deficit	----		Add: Purchases in current Year	----	
Add: Capitalised Value of life			Less: book Value of assets sold	----	
membership fees, Entrance fees and			Less: Depreciation	----	----
legacies	----	----	Stock of consumable goods		
Special fund/ Donations	----		Previous Balance	----	
Previous Balance (if any)	----		Add: Purchases during the year	----	
Add: Receipts during the year	----		Less: value of consumed during the year	----	----
Add: Income carried on fund			Outstanding income		----
Investment	----		Prepaid expenses		----
Less: Expenses paid out of fund	----	----	Cash & Bank Balances		----

Creditors for purchases/ Supplies	----		
Outstanding expenses	----		
Income Received in advance	----		
Bank overdraft	----		

Preparation of Income and Expenditure Account from Receipts and Payments Account and given information

Illustration 7 :

From the following Receipts and Payments Account of a club, prepare Income and Expenditure Account for the year ended 31st March, 2017.

Dr. **Receipts and Payments Account for the year ended 31st March, 2017** **Cr.**

Receipts	Amount (₹)	Payments	Amount (₹)
To Cash in hand (Opening)	2,000	By Salaries	50,000
To Cash at Bank (Opening)	1,00,000	By Stationary	2,000
To Subscriptions	1,52,400	By Electricity Expenses	7,000
To Donations	36,000	By Billard Table	50,000
To Interest on Investments	1,800	By Purchase of Investments	60,000
To Entrance fee	18,000	By Sundry Expenses	6,000
To Interest Received from Bank	6300	By Purchase of assets	1,25,000
To Sale of Old Materials	900	By Insurance premium	2,400
		By Cash in hand (closing)	4,000
		By Cash at bank (closing)	11,000
	3,17,400		**3,17,400**

Additional Informations :

(i) Subscription in arrear for the year ended 31st March, 2017 ₹ 1000 and subscription in advance for the year ended 31st March, 2017 ₹ 4000 **(ii)** Insurance premium prepaid at the end ₹ 300 **(iii)** Sundry expenses outstanding ₹ 1,000 **(iv)** 50% Entrance fees is to be capitalised **(v)** Donations are for creating an Endowment Fund.

Solution :

Dr. **Income and Expenditure Account for the year ending 31st March, 2017** **Cr.**

Expenditure		Amount (₹)	Income		Amount (₹)
To Salaries		50,000	By Subscriptions	1,52,400	
To Stationary		2,000	Add: Arrear	10,000	
To Electricity Expenses		7,000		1,62,400	
To Sundry Expenses	6,000		Less: advance	4,000	1,58,400
Add: Outstanding	1,000	7,000	By Interest on Investments		1,800
To Insurance Premium	2,400		By Entrance Fees		9,000
Less: Prepaid	300	2,100	By Interest on Bank Deposits		6,300
To Excess of Income over Expenditure		1,08,300	By Sale of old News papers		900
		1,76,400			**1,76,400**

Illustration 8 :

From a Receipts & Payments Account of a club prepare Income & Expenditure Account for the year ended 31st March, 2017 :

Dr. **Cr.**

Receipts		Amount (₹)	Payments		Amount (₹)
To Balance b/d (Bank)		32,500	By Purchases of Machinery (01-07-16)		6,000
To Subscription			By Salaries		5,000
2015-16	2,000		By Sports Expenses		40,000
2016-17	15,000		By Stationary		10,000
2017-18	500	17,500	By Entertainment Expenses		6,000
To Donations for Sports Fund		30,000	By Balance c/d		
To Government Subsidy		2,000	Cash	6,000	
To Life Membership Fees		30,000	Bank	40,000	46,000
To Interest on Bank Deposits		1,000			
		1,13,000			**1,13,000**

Additional Informations :

(i) Sport fund opening balance ₹ 5000; **(ii)** Stock of stationary opening ₹ 6000, Closing ₹ 1000. Creditors for stationary opening ₹ 3000, closing ₹ 3500; **(iii)** Bank Interest Receivable ₹ 200; **(iv)** Depreciate machinery @ 10% p.a.; **(v)** There are 160 members of **the** club, who contribute ₹ 100 per year for subscription.

Income and Expenditure Account
for the year ending 31st March, 2017

Dr. **Cr.**

Expenditure	Amount (₹)	Income		Amount (₹)
To Salaries	5,000	By Subscription	15,000	
To Sports Expenses	5,000	(+) Accured	1,000	16,000
To Stationary Consumed	15,500	By Govt. Subsidy		2,000
To Enterainment Expenses	6,000	By Bank Interest	1,000	
To Depreciation on Machinery	450	(+) Accured	200	1,200
		By Excess of Expenditure over Income		12,750
	31,950			**31,950**

Working Notes :

		₹
1.	Calculation for games fund is as follows :	
	Opening Games Fund	5,000
	(+) Donation received during the year	30,000
		35,000
	(-) Current year games expenses	40,000
	Amount is to be shown in Income and Expenditure Account (due to excess of expenses over income)	5,000
2.	Value of Stationary consumed is calculated as follows :	
	Opening Stock	6,000
	(+) Cash Payment for purchases	10,000

	16,000
(-) Opening Creditors	3,000
	13,000
(+) Closing creditors	3,500
	16,500
(-) Closing Stock	1,000
Value of stationary consumed	15,500

3. Calculation of depreciation on Machinery 6,000 x 10% x 9/12 = ₹ 450
4. Calculation of outstanding subscription :

	₹
Subscription receivables related to this year (160x100)	16,000
(-) Actual subscription received during the year	15,000
Outstanding subscription at the end of the year	1,000

5. Life member fees is a onetime receipt, hence it is of Capital nature.
6. Government Cash subsidy is a receipt of revenue nature.

When opening Balance Sheet and Receipts and Payments Account are given and from that Income and Expenditure Account and Balance Sheet is to be prepared :

Illustration 9:

Balance Sheet as an 31st March, 2016 and Receipts and Payments Account for the year ending 31st March, 2017 of a club is given below. Prepare Income and Expenditure Account for the year ended 31st March, 2017 and Balance Sheet on that date.

Balance Sheet as on 31st March, 2016

Liabilities		Amount (₹)	Assets		Amount (₹)
Capital Fund	117000		Buildings		30,000
(+) Excess of Income Over Expenditure	5000	1,22,000	Furniture		5,000
			Books		4,000
Subscritption received in Advance		500	7% Environment Fund Investment		40,000
Environment Fund		50,000	7% Fixed deposits with Bank		50,000
			Accured Interest from Bank		500
			Accured subscription		2,000
			Cash in Hand	30,000	
			Cash at Bank	11,000	41,000
		1,72,500			**1,72,500**

Receipts and Payments Account for the year ending 31st March, 2017

Receipts		Amount (₹)	Payments	Amount (₹)
To Balance b/d			By Salaries	1,000
Cash	30,000		By Taxes & Insurance	2,000
Bank	11,000	41,000	By Printing & Stationary	700
To Subscription		12,000	By Repairs	300
To Hall Rent		3,500	By Environment awareness movement expenses	50,000
To Interest on fixed deposit		3,700		
To Donations towards environment fund		6,000	By Balance c/d	

To Interest recd. on environment fund investment	2,800	Cash Bank	1,000 14,000	15,000
	69,000			**69,000**

Additional informations :

1. The numbers of members in the club are 500 and annual subscription payable by each member is ₹ 20.
2. Subscription received during the year for the next year amounted to ₹ 1,000.
3. The rent of the club Hall is ₹ 500 per day and the hall was let out for 10 days in current year.
4. Depreciation is to be provided @ 10% p.a. on all assets.

Solution :

Income and Expenditure Account
for the year ending 31st March, 2017

Dr. **Cr.**

Expenditure		Amount (₹)	Income		Amount (₹)
To Salaries		1,000	By Subscription		10,000
To Taxes & Insurance		2,000	By Interest on F.D. (50,000 x 7%)		3,500
To Printing & Stationary		700	By Hall Rent	3,500	
To Repairs		300	Add : Outstanding	1,500	5,000
To Depreciation					
Building (3000x10%)	3000				
Furniture (5000x10%)	500				
Books (4000x10%)	400	3,900			
To Excess of Income over Expediture		10,600			
		18,500			**18,500**

Balance Sheet as on 31st March, 2017

Liabilities		Amount (₹)	Assets		Amount (₹)
Opening Capital Fund	1,22,000		Building	30,000	
+ Surplus	10,600	1,32,600	(-) Depreciation	3,000	27,000
Subscription received in Advance		1,000	Furniture	5,000	
Environment Fund	50,000		(-) Depreciation	500	4,500
+ Donation recd.	6,000		Books	4,000	
+ Interest related to Current yr.	2,800		(-) Depreciation	400	3,600
	58,800		7% Fixed deposit in bank		50,000
(-) Expenses during the year	50,000	8,800	7% Environment fund investments		40,000
			Accured Interest		300
			Hall Rent Outstanding		1,500
			Subscription Outstanding		500
			Cash in Hand		1,000
			Cash at Bank		14,000
		1,42,400			**1,42,400**

Working Notes :

1. Calculation for subscription is as follows :

		₹
Subscription received during the current year		12,000
(-) Subscription received in Current year related to previous year	2,000	
(-) Subscription received during current year related to next year	1,000	3,000
		9,000
(+) Current year subscription received during the previous year		500
Subscription received related to current year		9,500
Subscription receivable for current year		10,000
Outstanding subscription for current year		500

2. Calculation of interest on fixed deposit is as follows :

	₹
Interest received	3,700
(-) Interest received in current year related to previous year	500
Interest received related to current year	3,200
Current year interest on F.D. @ 7%	3,500
Current year outstanding interest	300

3. Calculation of outstanding rent of Hall :

Current year rent (10x500)	5,000
(-) Received during the year	3,500
Outstanding rent for current year	1,500

Illustration 10 :

From the following information of a club prepare Income & Expenditure Account for the year ended 31 March, 2017 and Balance Sheet on that date :

Balance Sheet as on 31st March, 2016

Liabilities	Amount (₹)	Assets	Amount (₹)
Capital Fund	4,20,000	Buildings	4,00,000
Creditors for Sports Material	10,000	Furniture	20,000
Subscription in Advance	5,000	Bank Balance	10,000
		Subscription Outstanding	5,000
	4,35,000		**4,35,000**

Income and Expenditure Account
for the year ending 31st March, 2017

Expenditure	Amount (₹)	Income	Amount (₹)
To Balance b/d (Bank)	10,000	By Furniture	30,000
To Subscriptions	86,000	By Salaries	10,000
To Donation for poor girls marriage	33,000	By Creditors for Sports Material	25,000
		By General Expenses	11,000
		By Expenses on Marriage of poor girls	42,000
		By Balance c/d (Bank)	11,000
	1,29,000		**1,29,000**

Additional Informations :

(1) On April, 2016 the old furniture was given to Red Cross and new furniture was purchased on October 1, 2017. Depreciation @ 10% p.a. is to be provided on furniture.

(2) On 31st March, 2017, the creditors for sports materials were 4800 and value of sports materials was ₹ 5400.

(3) A payment of ₹ 5,000 for sports material was to be debited to the general expenses.

(4) Outstanding subscription at the end ₹ 2,000 and advance subscription received for next year at the end ₹ 3000.

Solution :

Income and Expenditure Account for the year ending 31st March, 2017

Expenditure		Amount (₹)	Income	Amount (₹)
To Salaries		10,000	By Subscriptions	85,000
To General Exp.	11,000			
(+) Related to Sport Material	5,000	16,000		
To Sports materials consumed		9,400		
To Furniture (Donated to Red Cross)		20,000		
To Depreciation on Furniture (10% x 30,000 x 6/12)		1,500		
To Excess Exp. on marriage of poor girls (42,000 - 33,000)		9,000		
To Excess of Income over Expenditure		19,100		
		85,000		**85,000**

Balance Sheet as on 31st March, 2017

Liabilities		Amount (₹)	Assets		Amount (₹)
Capital Fund	4,20,000		Building		4,00,000
(+) Excess of Income over Exp.	19,100	4,39,100	Furniture	30,000	
Creditors for Sports Material		4,800	(-) Depreciation	1,500	28,500
Advance Subscription		3,000	Subscription Outstanding		2,000
			Stock of Sports Material		5,000
			Cash at Bank		11,000
		4,46,900			**4,46,900**

Working Notes :

1. Amount of subscription for current year is calculated as follows :

		₹
Subscription received in current year		86,000
(-) Previous year outstanding Subscription received during the year	5,000	
(-) Advance subscription for next year	3,000	8,000
		78,000
(+) Outstanding subscription for current year	2,000	
(+) Current year subscription received in advance in previous year	5,000	7,00
		85,000

2.	Payment for sports material in current year	25,000
	(-) Opening creditors for sports material	10,000
		15,000
	(+) Closing creditors for sport material	4,800
		19,800
	(-) Closing stock of sports material	5,400
		14,400
	(-) Payment of sports material transferred to general expenses	5,000
	Amount to be shown in Income and Expenditure	9,400

When Receipts and Payments Account are other Information given and Income and Expenditure Account and Balance Sheet is to be prepared.

Illustration 11 :

A Receipt and payments Account and other information of a medical relief society for the year ended 31st March, 2017 are given below. With the help of these, prepare Income and expenditure Account for the year ending 31st March, 2017 and Balance Sheet on that date.

Receipts	Amount (₹)	Payments	Amount (₹)
To Cash in Hand b/d	7,000	By Salaries	5,000
To Subscription	50,000	By Sundry Expenses	500
To Donation for organising fate	13,500	By Payment for medicines	30,000
To Interest on investments @ 8% p.a. for 10,000		8,000 By Honorarium to doctors	
2016-17		By Consumable Stores	2,500
To Proceeds from fate	10,000	By Machinery purchased	15,000
		By Fate Organising Expenses	21,000
		By Cash in Hand c/d	4,500

Additional Informations :

	1-4-2016 ₹	31-3-2017 ₹
Subscription due	1,000	500
Subscription Received in Advance	500	1,000
Stock of Medicines	10,000	15,000
Amount due to Medicine Suppliers	8,000	12,000
Value of Machinery	21,000	30,000
Value of Building	40,000	38,000

Solution :

Income and Expenditure Account for the year ending 31st March, 2017

Expenditure	Amount (₹)	Income	Amount (₹)
To Medicinces Consumed	29,000	By Subscriptions	49,000
To Honorarium	10,000	By Donation for fate	13,500
To Salaries	5,000	By Proceeds from fate	10,000
To Sundry Expenses	500	By Interest on Investments	8,000
To Consumable Stores	2,500		

To Depreciation on Buildings	2,000			
Machinery	6,000	8,000		
To Fate Expenses		21,000		
To Excess of Income over Expenditure		4,500		
		80,500		**80,500**

Balance Sheet as on 31st March, 2017

Liabilities		Amount (₹)	Assets		Amount (₹)
Capital Fund	1,70,500		Buildings	40,000	
(+) Excess of Expenditure	4,500	1,75,000	(-) Depreciation	2,000	38,000
over income			Machinery	21,000	
Advance Subscription		1,000	(+) Purchases	15,000	
Creditors for medicines		12,000		36,000	
			(-) Depreciation	6,000	30,000
			Stock of medicines		15,000
			Investments		1,00,000
			Subscription outstanding		500
			Cash in Hand		4,500
		1,88,000			**1,88,000**

Working Notes :

		₹	₹
1.	Calculation of amount of current year subscription :-		
	Subscription received in current year		50,000
	(-) Previous year outstanding subscription received during the year	1,000	
	(-) Next year subscription in advance in current year	1,000	2,000
			48,000
	(+) Current year outstanding subscription at the end	500	
	(+) Subscription received in advance for current year in previous year	500	1,000
			49,000

2. Calculation of amount of investments for the purpose of Balance Sheet :

In the question, interest @ 8% on investments ₹ 8000 received. Hence amount of investments will be 8000 x 100/8 = ₹ 1,00,000.

		₹
3.	Amount of medicine consumed is calculated as follows :	
	Payment or medicine during the year	30,000
	(+) Opening Stock of medicine	10,000
		40,000
	(-) Opening creditors for medicine	8,000
		32,000
	(+) Closing creditors for medicine	12,000
		44,000
	(-) Closing stock of medicine	15,000
	Medicine consumed during the year	29,000

4. Donation received to organize fate is of revenue nature. Hence it is shown is Income and Expenditure Account. net amount (13,500 + 10,000 – 21,000) = ₹ 2500, can be shown in income side. Then fate expenses, donation for fate and proceeds from fate will not be shown.
5. Calculation of opening Capital fund :

Balance Sheet as on 31st March, 2016

Liabilities	Amount (₹)	Assets	Amount (₹)
Advance Subscription	500	Building	21,000
Creditors for medicines	8,000	Machinery	40,000
Capital Fund (b/f)	1,70,500	Stock of Medicines	10,000
		Outstanding subscription	1,000
		Investments	1,00,000
		Cash in Hand	7,000
	1,79,000		**1,79,000**

6. Depreciation on Buildings (40,000 - 38,000) = ₹ 2,000
Depreciation on Machinery (21,000 + 15,000 – 30,000) = ₹ 6,000

Illustration 12 :

Prepare Income and Expenditure Account for the year ended 31st March, 2017 and Balance Sheet on that date of a club from the Receipts & Payments Account for the year ended 31st March, 2017 and from additional information

Receipts		Amount (₹)	Payments	Amount (₹)
To Balance b/d		4,000	By Rent Paid	72,000
To Entrance Fees		7,000	By Salaries	65,000
To Special Subscription for a sport tournaments		48,000	By Expenses on sports tournaments	54,000
			By Stationary	40,000
To Rent from Club premises		7,000	By Interest on loan for current year	20,000
To Subscription			By Sports Equipment	25,000
2015-16	3,000		By Balance c/d	33,000
2016-17	2,36,000			
2017-18	4,000	2,43,000		
		3,09,000		**3,09,000**

Additional Information :

On 1st April, 2016, the club owned some sports equipments value of the ₹ 2,00,000 and on 31st March, 2017 all the sports material was valued at ₹ 1,90,000. The club also took a loan of ₹ 2,00,000 during the year 2015-16 @ 10% p.a., Stationary Expenses ₹ 4,000 pertained to previous year stand owing ₹ 5,000, subscription unpaid at the end ₹ 12,000 for current year. Stock of stationary at the end was ₹ 4,000. Entrance fees is to be capitalised.

Solution : **Income and Expenditure Account for the year ending 31st March, 2017**

Expenditure	Amount (₹)	Income		Amount (₹)
To Rent Paid	72,000	By Rent of Club Premises		7,000
To Salaries	65,000	By Subscription	2,36,000	

To Expenses on sports tournaments (Net) (54,000 - 48,000)	6,000	+ Outstanding	12,000	2,48,00
To Stationary Consumed	37,000			
To Interest on Loan	20,000			
To Depreciation on Sports Equipment	35,000			
To Excess of Income over Expenditure	20,000			
	2,55,000			**2,55,000**

Balance Sheet
As on 31st March, 2017

Liabilities		Amount (₹)	Assets	Amount (₹)
Capital Fund	3,000		Sports Equipment	1,90,000
+ Surplus of Income over Expenditure	20,000		Stock of Stationary	4,000
			Accured Subscription	12,000
+ Entrance fees capitalised	7,000	30,000	Cash in hand	33,000
Outstanding Stationary		5,000		
Loan		2,00,000		
Advance Subscription		4,000		
		2,39,000		**2,39,000**

Working Notes :

1. Value of stationary consumed is calculated as follows :

	₹
Payment for Stationery	40,000
(+) Outstanding at the end	5,000
	45,000
(-) Payment made for previous year outstanding	4,000
	41,000
(-) Closing stock of stationery	4,000
Consumed during current year	37,000

2. Amount of depreciation on sports equipment is calculated as follows :

Value of sports equipments at the beginning	2,00,000
(+) New equipment purchased	25,000
	2,25,000
(-) Value of sports equipment at the end	1,90,000
Depreciation on sports equipment	35,000

3. Calculation of opening Capital Fund :

Balance Sheet as on 31st March, 2016

Liabilities	Amount (₹)	Assets	Amount (₹)
Capital Fund (b/f)	3,000	Sports Equipment	2,00,000
Loan	2,00,000	Outstanding subscription	3,000
Outstanding Stationary Expenses	4,000	Cash	4,000
	2,07,000		**2,07,000**

Illustration 13 :

From Receipts and Payments Account for the year ended 31st March, 2017 and other information, prepare Income and Expenditure Account for the year ended 31st March, 2017 and the Balances sheet on that date.

Receipts	Amount (₹)	Payments	Amount (₹)
To Cash in Hand	8,000	By Rent of Hall	4,000
To Subscription	27,000	By Salaries	15,000
To Entrance fees	4,000	By Purchases of sports equipment	20,000
To Sale of refreshments	10,000	By Dance Expenses	5,000
To Sale of Dance Tickets	5,500	By Supply of refreshments	7,000
To Interest on 7% investments for 2016-17	4,200	By Cash-in-hand	19,000
To Legacies	11,300		
	70,000		**70,000**

Additional Informations :

1. Following were the assets and liabilities on 31st March, 2016 and 31st March, 2017.

	31-4-2016 ₹	31-3-2017 ₹
Sport Equipments	7,000	22,000
Subscriptions in arrears	2,000	1,700
Furniture	12,500	11,500
Outstanding Rent	800	400
Advance Subscriptions	500	2,500

2. Entrance fees should be **c**apitalised.

Solution :

Income and Expenditure Account for the year ended 31st March, 2017

Expenditure		Amount (₹)	Income		Amount (₹)
To Rent of Hall	4,000		By Subscription	27,000	
(+) Outstanding Rent (C.Y.)	400		Add : Subscription Advance (P.Y.)	500	
	4,400			27,500	
(-) Outstanding Ren (P.Y.)	800	3,600	Add : Outstanding Subscription	1,700	
To Salaries		15,000		29,200	
To Dance Expenses		5,000	Less : Advance Subscription (C.Y.)	2,500	
To Supply of Refreshment		7,000		26,700	
To Depreciation			Less : Outstanding	2,000	24,700
Furniture (12,500 - 11,500)	1,000		Subscription (P.Y.)		
Sports Equipments			By Sale of Refreshments		10,000
(7,000 + 20,000 - 22,000)	5,000	6,000	By Sale of Dance Tickets		5,500
To Excess of Income Over Expenditure		7,800	By Interest on Investment		4,200
		44,400			**44,400**

Balance Sheet as on 31st March, 2017

Liabilities		Amount (₹)	Assets		Amount (₹)
Capital Fund	88,200		Sports Material	7,000	
(+) Excess of Income over			(+) Purchases	20,000	
expenditure	7,800			27,000	
(+) Entrance fees	4,000		(-) Depreciation	5,000	22,000
(+) Legacies	11,300	1,11,300	Furniture	12,500	
Advance subscription		2,500	(-) Depreciation	1,000	11,500
Outstanding Rent		400	Outstanding subscription		1,700
			Investments		60,000
			Cash-in-hand		19,000
		1,14,200			**1,14,200**

Working Notes :

1. Calculation of opening Capital Fund :

Balance Sheet as on 31st March, 2016

Liabilities	Amount (₹)	Assets	Amount (₹)
Capital Fund (b/f)	88,200	Sports equipments	7,000
Outstanding Rent	800	Subscription in Arrears	2,000
Advance Subscription	500	Furniture	12,500
		Investment (42,000 x 100/7)	60,000
		Cash-in-hand	8,000
	89,500		**89,500**

2. Legacies received are of capital nature. Hence, it is added **to** Capital fund.

Preparation of Balance sheet from Receipts and Payments Account and Income and Expenditure Account

When opening and closing Balance Sheet is to be prepared from Receipts and Payments Account and Income and Expenditure Account, which are given, the following procedure will be adopted:

1. For preparing opening Balance Sheet, opening cash balance (from Receipts and Payments Account) and additional information will be used. Also for outstanding and prepaid information, difference in the items shown in Income and Expenditure Account and Receipts and Payments Account will be taken into account, which is explained here.
2. Debit side of Receipts and Payments Account and credit side of Income and Expenditure Account is compared for calculating the following:

   (i) Outstanding amount of subscription–For opening Balance Sheet and Closing Balance Sheet **(ii)** Advance Income **(iii)** assets sold during current year **(iv)** Items of Capital receipts**,** which is shown directly in Balance Sheet like Endowment Fund, Legacies, special Donation etc.
3. In the same manner, credit side of Receipts and Payments Account and Debit side of Income and Expenditure Account is compared for calculating the following :

(i) Outstanding expenditure of current and previous year **(ii)** Prepaid expenses **(iii)** Stock of consumable items **(iv)** Assets purchased during the year **(v)** Depreciation;

The procedure for this can be understood exclusively from the following illustrations :

illustration 14 :

The Receipts and Payments Account and Income and Expenditure Account of a club for the year ending 31st March, 2017 are as follows :

Receipts and Payments Account for the year ending 31st March, 2017

Receipts		Amount (₹)	Payments	Amount (₹)
To Balance b/d		8,000	By Books Purchased	13,000
To Subscription			By Salaries	14,000
2015-16	5,000		By Advertisement	1,000
2016-17	35,000		By Electricity Expenses	1,500
2017-18	4,000	44,000	By Sundry Expenses	3,000
To Interest		4,000	By Office Expenses	1,000
To Donations to special fund		1,500	By Balance c/d	28,000
To Rent				
2016-17	3,000			
2017-18	1,000	4,000		
		61,500		**61,500**

Income and Expenditure Account for the year ending 31st March, 2017

Expenditure	Amount (₹)	Income	Amount (₹)
To Office Expenses	800	By Interest	3,800
To Salaries	15,000	By Subscription	37,000
To Sundry Expenses	2,800	By Rent	3,000
To Depreciation on building	7,500		
To Electricity expenses	1,500		
To Advertisement	1,200		
To Excess of income over expenditure	15,000		
	43,800		**43,800**

It is informed that assets as on 1-4-2016 included the following and there was no liability on that date :-

Building ₹ 1,60,000, Books ₹ 1,40,000, Furniture ₹ 10,000, and Investments ₹ 45,000. You are required to prepare the Balance Sheets of the club as on 1st April, 2016 and 31st March, 2017.

Solution :

Balance Sheet as on 1st April, 2016

Liabilities	Amount (₹)	Assets	Amount (₹)
Capital Fund (Balancing Figure)	3,68,200	Building	1,60,000
		Books	1,40,000

		Furniture	10,000
		Investments	45,000
		Accrued Interest	200
		Outstanding subscription	5,000
		Cash-in-hand	8,000
	3,68,200		**3,68,200**

Balance Sheet as on 31st March, 2017

Liabilities		Amount (₹)	Assets		Amount (₹)
Capital Fund	3,68,000		Buildings	1,60,000	
Add : Excess Income over Expenditure	15,000	3,83,200	(-) Depreciation	7,500	1,52,500
			Books	1,40,000	
Donation for special fund		1,500	(+) Purchases	13,000	1,53,000
Outstanding Salaries		1,000	Furniture		10,000
Advance subscription		4,000	Investments		45,000
Advance Rent		1,000	Prepaid Office Expenses		200
Outstanding Advertisement		200	Prepaid Sundry Expenses		200
			Outstanding subscription		2,000
			Cash-in-hand		28,000
		3,90,900			**3,90,900**

Working Notes :

1. While preparing opening Balance Sheet opening balances of all assets and cash balance are taken into account. Afterwards, while reconciling various items of Income and Expenditure Account with same items of Receipts and Payments Account following adjustments are available :
   (a) In Receipts and Payments Account subscription of ₹ 5000 is received for 2015-16. It means, it is previous years outstanding. It will be shown in assets side of Opening Balance Sheet.
   (b) In Receipts and Payments Account interest received ₹ 4000 is shown, while in Income and Expenditure Account it is ₹ 3800. Hence difference ₹ 200 is received for 2015-16 in 2016-17. It is shown in assets side of opening Balance Sheet.
2. While preparing closing Balance Sheet, in opening balance of assets, value of newly purchased assets is added and depreciation is deducted. In this question, in opening balance of Buildings depreciation is deducted (as per information available in Income and Expenditure Account) and in opening balance of books, value of new books purchase will be added. (As per information in Receipts and Payments Account) Closing Cash balance from Receipts and Payments Account will also be shown.
3. While preparing closing Balance Sheet, when reconciles Income and Expenditure Account with Receipts and Payments Account, following adjustments are available :
   (a) Outstanding Subscription : In Receipts and Payments Account subscription received for 2016-17 is ₹ 35,000, while in Income and Expenditure Account ₹ 37000. Hence ₹ 2000 is current years outstanding subscription. It is shown in assets side of closing Balance Sheet.
   (b) In Receipts and Payments Account, subscription receives for 2017-18 is shown ₹ 4000. It is advance subscription and it will be shown in liabilities side of closing Balance Sheet.
   (c) In Receipts and Payments Account, rent received for 2017-18 is shown ₹ 1000. It is advance receipts. Hence

it will be shown in liabilities side of closing Balance Sheet.

(d) Salaries ₹ 14000 is shown is Receipts and Payments Account, while ₹ 15000 in Income and Expenditure Account. Hence difference ₹ 1000 is current years outstanding salaries. It will be shown in liabilities side of closing Balance Sheet.

(e) Advertisement ₹ 1000 is shown in Receipts and Payments Account, while ₹ 1200 in Income and Expenditure Account. Hence difference ₹ 200 is current year outstanding advertisement. It is shown in liabilities side of closing Balance Sheet.

(f) Sundry expenses ₹ 3000 is shown in Receipts and Payments Account, while 2800 in Income and Expenditure Account, hence difference amount 200 is current year prepared payment. It will be shown in assets side of closing Balance Sheet.

(g) Office expenses is shown ₹ 1000 in Receipts and Payments Account, while ₹ 800 in Income and Expenditure Account. Hence difference ₹ 200 is current year prepaid payments. It will be shown in assets side of closing Balance Sheet.

Preparation of Receipts and Payments Account from Income and Expenditure Account

Sometimes Income and Expenditure Account and additional information and/or Balance Sheet is given. If it is asked to prepare Receipts and Payments Account from these informations, then following procedure is adopted :

1. All receipts of during current year wether Capital or revenue, related to preceding year or of next year, will be shown in debit side of Receipts and Payments Account.
2. All payments during current year wether revenue or Capital, related to preceeding year or next year, will be shown in credit side of Receipts and Payments Account.
3. Opening and Closing balances of cash and bank will be shown in Receipts and Payments Account at appropriate place.
4. All non-cash items viz. depreciation, provision for bad debts etc, will not be shown, as-well-as profit/loss on sale of assets will not be shown in Receipts and Payments Account.
5. For calculating value of purchase of assets, in opening and closing balances adjustments for depreciation is made.
6. Cash effect of prepaid, advance, outstanding adjustments will be seen on related items. Then, value of such item will be shown in Receipts and Payments Account. For example, in Income and Expenditure Account, rent paid ₹ 5000 is shown and in closing Balance Sheet outstanding rent ₹ 1000 is shown. Then payment for rent ₹ 4000 will be shown in Receipts and Payments Account. Subscription ₹ 15000 in Income and Expenditure Account and advance subscription ₹ 1000 on liabilities side and outstanding subscription ₹ 2000 in assets side of closing Balance Sheet is shown. Then ₹ 14000 will be shown in debit side of Receipts and Payments Account for subscription. Hence effect of adjustments on cash is re-adjusted and actual cash receipts or payments will be shown in Receipts and Payments Account. It can understood from the following :

(a) Item of Income :

	₹
Amount of subscription as shown in Expenditure Account	....
(-) Outstanding subscription at the end of current year	....
(-) Advance subscription received in previous year	....
(+) Previous year outstanding subscription received in current year	....
(+) Advance subscription received in current year	....
Amount of subscription as shown in Receipts and Payments Account of current year	....

(b) Item of Expenses : ₹

Salaries as shown in Income & Expenditure Account	....
(-) Outstanding at the end of current year	....
(-) Salary paid advance in previous year (related to this year)	....
(+) Outstanding salary of previous year (paid in this year)	....
(+) Salary of next year paid in advance in current year	....
Amount of Salary to be shown in Receipts and Payments Account of the current year	....

(c) Calculation of amount paid for stationary/consumables stores etc.

Amount of stationary, which is shown in Income and Expenditure Account	....
(-) Opening Stock of stationary	....
(+) Closing Stock of Stationary	....
(-) Advance paid for stationary in previous year	....
(-) Advance paid for stationery in previous year	....
(+) Advance paid for stationary in current year for next year	....
(-) Creditors at the end of current year for stationary	....
(+) Creditors at the beginning of current year for stationary (i.e. amount paid for previous year in current year)	
Amount of stationary to be shown in Receipts and Payments Account of the current year	....

Illustration 15 :

From Income and Expenditure Account for the year ending 31st March, 2017 and additional information prepare Receipts and Payments Account for the year ending 31st March, 2017 and Balance Sheet on that date.

Income and Expenditure Account
for the year ending 31st March, 2017

Expenditure		Amount (₹)	Income	Amount (₹)
To Salaries		55,000	By Subscription	1,00,000
To Audit fees		2,500	By Entrance fees	5,000
To Insurance		5,500	By Receipts from entertainments	30,000
To Honorarium		10,000	By Rent from hire of ground	10,000
To Stationary		7,500		
To Entertainment Expenses		26,500		
To Depreciation				
Building	5,000			
Furniture	2,000			
Sports equipment	20,000	27,000		
To Excess of Income over expenditure		11,000		
		1,45,000		**1,45,000**

Additional Information :

	31-4-2016 ₹	31-3-2017 ₹
Outstanding Subscription	9,000	15,000
Subscription received in advance	10,000	7,000
Outstanding Salaries	5,000	4,000
Prepaid insurance	-----	500
Stock of Stationary	10,000	5,000
Creditors for Stationary	4,000	2,000

Buildings	1,00,000	2,00,000
Furniture	20,000	18,000
Audit fees	---	2,500
Bank Loan	40,000	40,000
Sports Equipments	50,000	40,000
Cash-in-hand	?	15,000

50% Entrance fees has been capitalized.

Solution :

Receipts and Payments Account
for the year ended 31st March, 2017

Receipts	Amount (₹)	Payments	Amount (₹)
To Balance b/d	92,000	By Salaries	56,000
To Subscription	91,000	By Insurance	6,000
To Entrance fees	10,000	By Honorarium	10,000
To Receipts from Entertainment	30,000	By Stationary	4,500
To Rent from hire of ground	10,000	By Expenses on Entertainment	26,500
		By Buildings	1,05,000
		By Sports equipments	10,000
		By Cash-in-hand	15,000
	2,33,000		**2,33,000**

Balance Sheet
As on 31st March, 2017

Liabilities		Amount (₹)	Assets	Amount (₹)
Capital Fund	2,22,000		Buildings	2,00,000
+ Surplus	11,000		Furniture	18,000
Entrance fees	5,000	2,38,000	Sports equipments	40,000
Bank Loan		40,000	Stock of Stationary	5,000
Outstanding Audit Fees		2,500	Prepaid Insurance	500
Creditors for stationary		2,000	Outstanding subscription	15,000
Outstanding Salaries		4,000	Cash-in-hand	15,000
Advance Subscription		7,000		
		2,93,500		**2,93,500**

Working Notes :

1. Amount of subscription as shown in Receipts and Payments Account :-

		₹
Subscription as per Income and Expenditure amount		1,00,000
(+) Outstanding subscription	9,000	
(+) for 2015-16 received in current year	7,000	16,000
Subscription received in advance for 2017-18 in current year		1,16,000
(-) Outstanding subscription of current year	15,000	
(-) current year subscription received in 2015-16	10,000	25,000
		91,000

2.	Entrance fees as shown in Receipts and Payments Account :	₹
	As per Income and Expenditure Account	5,000
	(+) Capitalised Portion	5,000
		10,000
3.	Salaries as shown in Receipts and Payments Account :	
	As per Income and Expenditure Account	55,000
	(+) outstanding Salaries for 2015-16 received in current year	5,000
		60,000
	(-) Outstanding salaries for 2016-17	4,000
		56,000
4.	Audit fees as shown in Receipts and Payments Account :	
	As per Income and Expenditure Account	2,500
	(-) Outstanding audit fees 2016-17	2,500
		Nil
5.	Insurance expenses as shown in Receipts and Payments Account :	
	As per Income and Expenditure Account	5,500
	(+) Outstanding for 2015-16 paid in current year	500
		6,000
6.	Stationary as shown is Receipts and Payments Account :	
	As per Income and Expenditure Account	7,500
	(+) Stock on 31.3.17	5,000
	(+) Creditors of 2015-16 paid during the year	4,000
		16,500
	(-) Stock on 1.4.16	10,000
	(-) Creditors yet outstanding at the end of current year	2,000
		4,500
7.	Amount of Building as shown in Receipts and Payments Account :	
	Closing Balance	2,00,000
	(+) Depreciation	5,000
		2,05,000
	(-) Opening Balance	1,00,000
	Purchases of Buildings	1,05,000
8.	Amount of sports equipment as shown in Receipts and Payments Account :	
	Closing Balance	40,000
	(+) Depreciation	20,000
		60,000
	(-) Opening Balance	50,000
	Purchases of sports equipment	10,000
9.	Calculation of opening Capital fund :	

Balance Sheet as on 1st April, 2016

Liabilities	Amount (₹)	Assets	Amount (₹)
Capital Fund (b/f)	2,22,000	Buildings	1,00,000

Bank Loan	40,000	Furniture	20,000
Creditors for Stationary	4,000	Sports equipments	50,000
Outstanding Salaries	5,000	Stock of Stationary	10,000
Advance Subscription	10,000	Outstanding subscription	9,000
		Cash-in-hand	92,000
	2,81,000		**2,81,000**

Accounting for Profit/Loss from Trading Activities

Sometimes an organisation does business activities, like a club operates a restaurant or a hospital operates a medical shop. Then for such business activity separate Trading and Profit and Loss Account will be prepared and profit/loss from such activity will be shown in Income and Expenditure Account. Trading and Profit and Loss Account is prepared by a business entity.

Difference between Receipts and Payments Account and Income and Expenditure Account

Base	Receipts and Payments Account	Income & Expenditure Account
1. Objectives	The object of this account is to calculate closing cash balance.	The object of this account is to calculate financial result of organisational activities, i.e. to calculate surplus/deficiency
2. Nature	It is an abstract of Cash/Bank.	It is like Profit and Loss Account.
3. Nature of Receipts	It includes all types of receipts wether revenue or Capital.	It shows only revenue nature receipts.
4. Nature of Payments	It includes all type of payments wether of revenue nature or of Capital nature.	It shows only revenue payments.
5. Side	In debit side receipts and in credit side payments are shown in this account.	In this account, expenses are shown in debit side and incomes are shown in credit side.
6. Adjustments	It is based on cash system of accounting and adjustments are not shown.	It is based on mercantile system of accounting and adjustment are shown.
7. Period of Receipts	It shows all receipts, whether related to any period.	It shows only revenue receipts relates to current year.
8. Period of Payments	It shows all payments whether relates to any period.	It shows only revenue payments relates to current year.
9. Depreciation and losses	It is not shown.	It is shown.
10. Balance of Cash Book	Opening and closing balance of cash are included.	Opening and closing balances of cash book are not included.

Summary

Non-trading Organisation : These are voluntary organisations, which are formed to fulfill social objectives.

Main Books kept by Non-trading organisations : Cash Book, Membership Register and Register for Assets.

Receipts & Payments Account : This Account is merely a summary of Cash book transactions under important headings. It gives a summary picture of various Receipts & Payments for the year. It is a real account by nature. Non-

Cash items are not shown in it. This Account indicates balance of Cash in hand or at Bank at the end of a particular year.

Income and Expenditure Account : This Account is prepared to find out financial results of a period for non-trading organisations. It is prepared just like the Profit & Loss Account. Revenue Income and Expenditure for current year only are recorded in this Account. It is an Account of nominal nature. All adjustments regarding unpaid/prepared expenses along with accrued and unearned incomes etc., are taken into consideration while preparing this Account. The balance of this Account reveals surplus/deficiency for the current year.

Specific Fund : A fund credited for specific object, also known as restrictive fund. This is of Capital nature. All expenses related to specific purpose are charged to this fund. If there is any deficiency due to more expenses, it will be shown in Income & Expenditure account.

General Fund : A fund which is created not for any specific purpose is called General Fund.

Entrance Fee : Lump sum amount received from a new member on his admission is called admission/entrance fee. This amount received is utilized for meeting additional expenses incurred for new members. Hence it is treated as revenue income, unless otherwise given.

Life Membership Fee : In order to become member of an organisation for whole life some members pay a fee in lump sum i.e. once in their life time. It is Capital Receipt, being non-recurring Income.

General Donation : A donation received without any condition. It is shown in Income & Expenditure Account, if the amount is small. If it is of large amount, it should be treated as a Capital Receipt.

Specific Donation : A donation received for some specific purpose. It is of capital nature and is shown in Balance Sheet. It is to be used for that specific purpose.

Grant received from the Government or any other organisation : If a grant is received for specific work. It is Capital receipt to be shown on liability side of Balance Sheet. On the other hand, if it is received for day to day activities, it is treated as revenue receipt and shown Income in Income & Expenditure Account.

Glossary

Subscription : It is the main source of income of a non-trading organisations. It is regular source of income to maintain membership.

Legacy : An amount received by non-trading organisation under will of a deceased person. Generally this amount is to be used for specific purpose.

Honorarium : An amount paid to a person other than the employee is to be of the organisation for rendering services.

Endowment Fund : A fund arising from a gift, the income of which utilized for some specific purpose. It provides permanent income to the organisation since the original gift will remain with it.

Balance Sheet : A statement showing financial position of an organisation on a certain date.

Aid : Amount received from the Government or any other Institution is to meet general or specific purpose called Aid.

Questions for Exercise

Multiple choice questions :

1. The main object of Non trading Organisations is :

(a) To earn profit **(b)** Public welfare work **(c)** To do business **(d)** Non of the above

2. Receipts and Payments Account is a ---------------Account :

(a) Real **(b)** Nominal **(c)** Personal **(d)** None of the above

3. Income and Expenditure Account is a ---------------- Account.

(a) Real **(b)** Nominal **(c)** Personal **(d)** None of the above

4. In Income and Expenditure Account--------------items are shown.

(a) Only revenue **(b)** Only Capital **(c)** Revenue and Capital both **(d)** None of the above

5. Income and Expenditure Account is prepared on the basis of.
   (a) Accrual concept (b) Cash concept (c) Single entry concept (d) None of the above
6. Where the Life Membership Fees will be shown in Income and Expenditure Account and in Balance Sheet?
   (a) In debit side of Income and Expenditure (b) Assets side of Balance Sheet
   (c) In credit side of Income and Expenditure (d) In liabilities side of Balance Sheet
7. In Receipts and Payments Account----------------items are shown.
   (a) Captial (b) Revenue (c) Captial and revenue both (d) None of the above
8. Opening balance 7 sports fund is ₹ 2,00,000. It is invested seperately @ 8% p.a. interest. Expenses incurred ₹ 15,000 during the year on sports tournament. What amount of sports fund will be shown in the Balance Sheet at the end of the year?
   (a) ₹ 2,01,000 (b) ₹ 1,99,000 (c) ₹ 1,85,000 (d) ₹ 2,16,000
9. Opening stock of stationary at the beginning is ₹ 5,000. at the end ₹ 3,000. Stationary purchased for cash during the year for ₹ 20,000. How this transcation will be dealt with in Receipts and Payments Account?
   (a) Payment side ₹ 22,000 (b) Payment side ₹ 20,000
   (c) Payment side ₹ 28,000 (d) None of the above
10. From the following information, calculate the amount of outstanding subscription to be shown as closing Balance Sheet. Opening outstanding subscription ₹ 10,000, subscription received during the year ₹ 20,000, in which opening outstanding subscription received ₹ 6,000 and advance subscription ₹ 7,000 is included. There are 50 members, each pays ₹ 400 annual subscription.
   (a) ₹ 20,000 (b) ₹ 21,000 (c) ₹ 17,000 (d) ₹ 13,000

Very short answer type questions :

1. State two characteristics of a non-trading concerns.
2. Give any two differences between trading organisations and non-trading organisations.
3. Give the name of books-kept by non-trading organisations.
4. Which financial statements are prepared by non- trading organisations?
5. What accounting treatment is made for life membership fees, when Income and Expenditure Account is prepared?
6. What do you understand by legacies?
7. What do you mean by endownment-fund?
8. What is the accounting treatment for specific donation while preparing Income and Expenditure Account?
9. How you will deal with 'General Donation' while recording in Income and Expenditure Account?
10. What do you mean by Income and Expenditure Account?
11. How will you treat sale of an asset while preparing Income and Expenditure Account and closing Balance Sheet?
12. Write the name of such two items and examples, which do not appear in Receipts and Payments Account?
13. If tournament fund is ₹ 50,000 and tournament expenses are ₹ 32,000, how it is treated in Income and Expenditure Account and closing Balance Sheet?
14. Write any two differences between Receipts and Payments Account and Cash book.
15. List any two features of Income and Expenditure Account.

Short Answer type questions :

1. How will you treat ''subscription'' in case of accounts of a club?
2. From the following information, calculate amount of subscription, which will be shown in Income and Expenditure Account :-

		₹
01-04-16	Subscription in Arrears	15,000

	Subscription received in advance	5,000
31-03-17	Subscription in arrears	6,000
	Subscription received in advance	10,000
	Subscription received during the year 2016-17	50,000

Ans. Subscription to be credited to Income & Expenditure Account ₹ 36,000

3. How will you deal with the following cases while preparing Income and Expenditure Account?

	1-4-2016 ₹	31-3-2016 ₹
Stock of stationary	500	200
Creditors of stationary	300	300
Advance paid for stationary	100	150

Amount paid for stationary during 2016-17 was ₹ 2,500.

Ans. ₹ 2,750

4. Book-value of furniture on 1-4-16 is ₹ 50,000. Half of the furniture is sold at a loss of 20% on opening book value on 30-09-16. Furniture is depreciated @ 10% p.a. How above items will be shown in Income and Expenditure Account and in Balance Sheet on that date?

Ans. Loss on sale of furniture ₹ 3,750, Depreciation ₹ 3,750, Balance sheet Furniture ₹ 22,500.

5. How will locker rent of a club be dealt with in Income and Expenditure Account for the year ended 31st March, 2017 and Balance Sheet on that date?

	1-4-2016 ₹	31-3-2017 ₹
Outstanding Locker Rent	500	700
Advance Locker Rent	300	400

Locker rent received during 2016-17 ₹ 5,000.

Ans. In Income and Expenditure Account ₹ 5100; Assets side of Balance Sheet ₹ 700; Liabilities side ₹ 400.

6. Subscription received during the year 2016-17 is as follows :

There are ₹ 100 members of a club, each paying ₹ 300 as annual subscription. How subscription will be shown in Income and Expenditure Account for the year ending 31st March, 2017 and in Balance Sheet on that date.

Ans. Income and Expenditure Account ₹ 30,000; ₹ 1,000 in Liability side; ₹ 5,000 in assets side of closing Balance Sheet.

7. From the following information, how subscription will be shown in Income and Expenditure Account for year ending 31st March, 2017 and in Balance Sheet on that date.

		₹
1-4-16	Subscription in arrears	1,000
	Subscription received in advance	2,000
31-03-17	Subscription in arrears (including 500 related to 2015-16)	3,000
	Subscription received in advance	500
	Subscription received during the year 2016-17	50,000

Ans. Income and Expenditure Account ₹ 55,500 in credit side; Balance sheet outstanding ₹ 2,500 + 500 = ₹ 3,000 in assets side and advance ₹ 500 in liabilities side.

8. Calculate the amount of sundry expenses to be shown in Income and Expenditure Account for the year ending 31st March, 2017 and Balance Sheet on that date from the following information :-

	1-4-2016 ₹	31-3-2017 ₹
Prepaid sundry expenses	100	200
Outstanding sundry expenses	500	400

Sundry expenses paid during the year ₹ 5,000

Ans. ₹ 4,800 in debit side of Income and Expenditure Accounts and ₹ 400 in liabilities and ₹ 200 in assets side.

9. From the following information, calculate the amount of sports fund, which will be shown in Income and Expenditure Account for the year ending 31st March, 2017 and Balance Sheet on that date.

	₹
Sports fund 1-4-16	1,00,000
10% Sports fund investment 1-4-16	1,00,000
Received donation for sports during the year 2016-17	25,000
Interest on sports fund investments	10,000
Expenses on sports event	40,000

Ans. Balance sheet liabilities side ₹ 9,5000, in assets side ₹ 1,00,000

10. From the following information, calculate the amount of medical relief fund, which will be shown in Income and Expenditure Account for the year ending 31st March, 2017 and the Balance Sheet on that date :

	₹
Opening balance of medical relief fund	2,50,000
Donation received towards medical relief fund during the year	70,000
Expenses paid for medical camp during the year	3,50,000

Ans. Income & Expenditure Account ₹ 30,000

11. From the following information, calculate the amount which will be shown in Income & Expenditure Account for the year ending 31st March, 2017 with regard to Environment Fund :

	₹
Enviroment fund	6,00,000
10% Environment fund investment	3,00,000
Expenses incurred on environmental awareness during the year	2,00,000
Donation received towards the environment programmes	50,000
Interest received from fund investment	25,000

Ans. Balance Sheet Liabilities side ₹ 4,80,000, Asset Side, ₹ 3,00,000 and Accured Interest on investment ₹ 5,000

12. From the following information, calculate capital fund of a club as on 1st April 2016 :
    1. Subscription outstanding on 1-4-16 ₹ 3,000.
    2. Opening balance of assets are : Stock of stationary ₹ 5,000, Furniture ₹ 50,000, Buildings ₹ 2,00,000, Rent paid during the year 2016-17 ₹ 6,000, it includes ₹ 1,000 related to previous year. Opening cash balance ₹ 10,000.

Ans. Opening Capital Fund ₹ 2,67,000

13. Prepare Receipts and Payments Account for the year ending 31st March, 2017 from the following information.

	₹
Cash-in-hand opening	10,000
Donation received	50,000
Subscription received	1,00,000
Paid for electricity bill	20,000
Rent ₹1,000 p.m., actually paid for 11 month during the year	
Purchase of computer in cash	50,000
Honorarium paid	19,000

Ans. Closing balance ₹ 60,000.

14. In the following cases how entrance fees will be shown at the end of the year in Income and Expenditure Account and balance Sheet on that date.

    (i) Entrance fees received ₹ 1,00,000 during the year (ii) During the year ₹ 50,000 received as entrance fees out of which 40% is to be capitalised (iii) During the year ₹ 40,000 received as entrance fees should be capitalised.

Ans. (i) Income and Expenditure Account ₹1,00,000; (ii) Income and Expenditure Account ₹ 30,000 and ₹ 20,000 will be added in capital fund in closing balance sheet; (iii) ₹ 40,000 will be added in capital fund in closing Balance Sheet.

15. A club received aid from state government for ₹ 10,00,000 for construction of building on 1-5-16 and from an other organisation ₹ 50,000 for operating its activities on 1-6-16. The club has completed its buildings upto 31 March 2017 and spent ₹ 10,25,000 on it. How the above transactions will be shown in Income and Expenditure Account for the year ending 31st March, 2017 and Balance Sheet on that date.

Ans. Government aid will be added to capital fund in liabilities side of balance sheet and ₹ 10,25,000 will be shown in the head of Building on assets side. Aid from other organisations will be shown in income side of Income and Expenditure Account. (Note : If building is incomplete at the end of the year the amount will be shown seperately on liabilities side as building fund.)

16. From the following prepare Receipts and Payments Account, Income and Expenditure Account and opening Balance Sheet, and closing Balance Sheet.

Receipts and Payments Account
for the year ended 31st March, 2017

Receipts	Amount (₹)	Payments	Amount (₹)
To Balance b/d	5,000	By Expenses	12,000
To Subscription	20,000	By Purchases of assets	10,000
To Sale from assets	5,000	By Balance c/d	8,000
	30,000		**30,000**

Income and Expenditure Account
for the year ended 31st March, 2017

Expenditure	Amount (₹)	Income	Amount (₹)
To Expenses	12,000	By Subscription	20,000
To Depriciation on assets	2,000		
To Loss on sale of assets	1,000		
To Excess of Income over Expenditure	5,000		
	20,000		**20,000**

Balance Sheet
as on 1st April, 2016

Liabilities	Amount (₹)	Assets	Amount (₹)
Capital Fund	25,000	Assets	20,000
		Cash-in-hand	5,000
	25,000		**25,000**

Ans. Capital fund closing ₹ 30,000, Assets closing ₹ 22,000 (20,000 - 2,000 - 6,000 + 10,000), Total of Balance Sheet ₹ 30,000.

Essay type questions :

1. Explain with illustrations the method of preparing Income and Expenditure Account from the Receipts and Payments Account and other information.
2. How will you prepare Receipts and Payments Account?

3. Differentiate between the following :
   1. Cash book and Receipts and Payments Account
   2. Income and Expenditure Account and Receipts and Payments Account
4. Explain the procedure of preparing Receipts and Payments Account from Income and Expenditure Account, Balance sheet and other information.

Answers of Multiple Choice Questions :

Que. No.	1	2	3	4	5	6	7	8	9	10
Ans.	B	A	B	A	A	D	C	A	B	C

Numerical Questions :

1. From the following particulars of a club, prepare the Receipts and Payments Account for the year ended 31st March, 2017.

	₹
Cash-in-hand opening	1,000
Cash at bank opening	2,000
Subscriptions received	30,000
Life membership fees received	5,000
Amount received on sale of old furniture	6,000
7% Investment purchased	15,000
Rent paid	500
General Expenses	700
Salaries paid	800
Honorarium paid	2,000
Newspapers & journals	3,000
Received from sale of old newspapers	100
Sports material purchased	7,000
Wages outstanding at the end	500
Interest on Investment received	1,050
Cash-in-hand (closing)	6,000
Cash at bank (closing)	?

Ans. ₹ 10,150

2. From the following information related to a chartered accountant, prepare Receipts and Payments Account for the year closing 31st March, 2017.

	₹
Fees received for last year	2,000
Fees received for current year	60,000
Fees outstanding for current year	3,000
Receipts from lectures	5,000
Remuneration for assessing answer books received	20,000
Dividend & interest received	17,000
Honorarium received	3,000
Payments :	
Salaries	20,000
Repairs	2,000
Printing & stationary	3,000

Car expenses	25,000
Electricity charges	8,000
Rent	18,000
Personal expenses	4,000
Payment outstanding for purchases of furniture	10,000
Opening cash balance	2,000

Ans. ₹ 29,000 Closing Cash Balance.

3. Prepare Income & Expenditure Account for the year ending 31st March, 2017, on the basis of given Receipts and Payments Account for the year ending 31March, 2017.

Receipts	Amount (₹)	Payments	Amount (₹)
To Balance b/d	12,000	By Rent	9,000
To Entrance fees	3,000	By Salaries	6,000
To Donations	4,000	By Electricity	1,000
To Rent of hall	6,000	By Postage	2,000
To Subscription	20,000	By Repairs	6,000
To Sale of old newspapers	1,000	By Book purchased	5,000
		By Govt. Bond purchased	4,000
		By F.D. with Bank @ 8% (1-4-16)	10,000
		By Balance c/d	3,000
	46,000		**46,000**

Ans. Excess of Income over Expenditure ₹ 10,800

4. From the following information, prepare Income and Expenditure Account for the year ended 31st March, 2017.

Receipts and Payments Account
for the year ended 31st March, 2017

Receipts		Amount (₹)	Payments		Amount (₹)
To Bank Balance b/d		15,000	By Purchases of machinery (1-7-16)		10,000
To Subscription			By Salaries		8,000
2015-16	3,000		By Rent		13,000
2016-17	25,000		By Entertainment expenses		3,000
2017-18	2,000	30,000	By Purchases of 5% Govt. Paper (1-10-16)		15,000
To Donations		1,06,000	By Sundry expenses		5,000
To Rent of hall		5,000	By Cash Balance c/d	7,000	
To Interest on bank deposits		2,000	Bank	1,07,000	1,14,000
To Sale of furniture		10,000			
		1,68,000			**1,68,000**

Additional Information :

1. Depreciation is charged on all assets @10% p.a. 2. Book Value of furniture on 1-4-16 ₹ 30,000. Half of furniture is sold on 30-06-16. 3. Subscription accrued ₹1,000 for current year. 4. Entertainment expenses outstanding ₹ 500 at the end. 5. Rent is payable ₹ 1,000 per month. 6. Donations received for construction of buildings.

Ans. Excess of Expenditure over Income ₹ 2,375.

5. From the following information, prepare Income and Expenditure Account for the year ending 31st March, 2017 and Balance Sheet on that date.

Receipts and Payments Account
for the year ended 31st March, 2017

Receipts	Amount (₹)	Payments	Amount (₹)
To Balance b/d	20,000	By Balance b/d (Bank overdraft)	25,000
To Subscriptions	5,00,000	By Tournament expenses	75,000
To Hire of ground	50,000	By Up keep of field	2,00,000
To Sale of old sports material	25,000	By Printing & stationary	40,000
To life membership fees	60,000	By Electricity expenses	12,000
To Subscription for tournament	1,20,000	By Honorarium	58,000
To Donations	10,00,000	By Grass seeds & soil	40,000
To Entrance fees	25,000	By Investments	10,00,000
		By Purchases of sports material	2,15,000
		By Balance c/d (cash)	1,35,000
	18,00,000		**18,00,000**

Additional Information :

1. Balance at the beginning of the year : Sports material stock ₹ 1,40,000, Play ground ₹ 8,00,000, Subscription receivable ₹ 45,000.
2. Surplus on account of tournament and donations will be kept in reserve for the pavilion purpose.
   Subscription due at the end ₹ 70,000. It was also decided that 50% of sports material should be written off. Stock at the end of stationary ₹ 10,000. Entrance fees is to be capitalized.

Ans. Surplus ₹ 82,500 Capital fund ₹ 9,80,000. Total of closing Balance Sheet ₹ 21,92,500.

6. From the following Receipts and Payments Account and additional information, prepare Income and Expenditure Account for the year ending 31st March, 2017 and Balance sheet on that date.

Receipts and Payments Accounts
for the year ended 31st March, 2017

Receipts		Amount (₹)	Payments	Amount (₹)
To Balance b/d		20,000	By Salaries & Wages	1,40,000
To Subscription			By 10% Investments (Face Value 1,50,000,	
2015-16	8,500		Purchased on 01-10-16)	1,13,000
2016-17	2,30,000		By Fate expenses	7,000
2017-18	2,500	2,41,000	By Upkeep of ground	8,000
To Donations for building		45,000	By Entertainment material	65,000
To Legacies		5,000	By Advance for buildings	16,000
To Sale of old furniture (at book value)		6,000	By Internet charges	1,500
To Govt. grant for construction of building		80,000	By Honorarium	2,000
			By Balance c/d	44,500
		3,97,000		**3,97,000**

Additional Informations :

1. On 31st March, 2016 the society has following assets & liabilities : 10% investments ₹ 1,20,000 (Face value ₹ 1,70,000), Furniture ₹ 80,000, Musical instruments ₹ 13,000, Machinery ₹ 60,000, Subscription in arrears ₹ 17,000, Creditors for entertainment material ₹ 5,000, Subscription received in advance ₹ 2,000 and buildings

fund ₹ 50,000.

2. Charge depreciation @ 20% on furniture and machinery

3. On 31st March, 2017 entertainment material was valued at ₹ 28,000. Internet charges was outstanding ₹ 1500.

4. Each year subscription is paid by 100 members, each paying ₹ 2,400.

5. Payment of entertainment material includes ₹ 2,000 for previous year.

Ans. Surplus ₹ 42700, Op. Capital fund ₹ 2,53,000, Total of closing Balance Sheet ₹ 4,66,700.

7. From the following information relating to a cricket club, prepare Income and Expenditure Account for the year ended 31st March, 2017 and Balance Sheet on that date. An abstract of cash book is given below : (Cash column).

	(₹)		(₹)
Subscription	10,000	Upkeep of field & pavilion	4,000
Admission fees	600	Expenses on tournament	1,400
Sale of old balls, bats	100	Rates & insurance	400
Hire of ground	600	Telephone charges	100
Drawn from bank	8,000	Stationary	200
Subscription for tournament	2,000	General charges	100
Donations	20,000	Honorarium	340
		Grass seeds	60
		Bats & Balls	1,400
		Deposited into Bank	33,300
	41,300		**41,300**

Assets with the club on 1 April, 2016 were as under : Cash at Bank ₹ 6000, Stock of balls etc, ₹ 3000, Stock of Stationary ₹ 400, Subscription due ₹ 1000. Donations and surplus on account of tournament should be kept in reserve for a permanent pavilion. Subscription due at 31st March, 2017 amount to ₹ 1500. Write off 50% of Bats and Balls Account and 25% off stationery Account. Admission fees is to be capitalized.

Ans. ₹ 3,850 Excess of Income over Expenditure, Op. Capital fund ₹ 10,400, Closing Bank Balance ₹ 31,300 Total of B/s ₹ 35,450.

8. Prepare Income and Expenditure Account of a charitable hospital for the year ending 31st March, 2017 and a Balance Sheet on that date from the following informations.

Receipts and Payments Account
for the year ended 31st March, 2017

Receipts	Amount (₹)	Payments	Amount (₹)
To Balance b/d	71,300	By Doctors Honorarium	90,000
To Subscription	4,79,960	By Suppliers of medicines	3,05,900
To Donation	45,000	By Sundry Expenses	4,610
To Life membership fees	1,00,000	By Salaries & Wages	2,75,000
To Interest on investment@ 10% for 2016-17	70,000	By Machine purchase	1,50,000
To Proceeds from a charity show	1,04,500	By Expenses on charity show	27,500
		By Balance c/d	17,750
	8,70,760		**8,70,760**

Additional Informations :

	1-4-2016 ₹	31-3-2017 ₹
Outstanding Salaries & Wages	36,000	48,000

Machinery	2,12,000	3,16,000
Buildings	9,00,000	8,10,000
Outstanding subscription	6,500	8,500
Advance subscription	2,540	3,000
Stock of medicines	89,100	98,000
Suppliers of medicines	40,000	25,000

Ans. Excess of Expenditure over Income ₹ 1,26,610, opening capital fund ₹ 19,00,360, Total of Balance Sheet ₹ 19,49,750.

9. From the following Receipts and Payments Account for the year ended 31st March, 2017 and additional information of a society, prepare Income and Expenditure Account for the year ending 31st March, 2017 and the Balance sheet for the same date.

Receipts		Amount (₹)	Payments		Amount (₹)
To Balance b/d (Cash)		15,000	By Balance b/d (Bank overdraft)		31,000
To Subscription			By Investments		30,000
2015-16	2,000		By Furniture		14,500
2016-17	1,62,000		By Salaries		62,000
2017-18	2,500	1,66,500	By Stationary		8,900
To Proceeds from charity show		20,000	By Entertainment expenses		17,100
To Entrance fees		6,700	By Miscellaneous expenses		14,200
To Interest on investments		4,800	By Balance c/d Cash	5,500	
To Sale of Old Material		1,200	Bank	31,000	36,500
		2,14,200			**2,14,200**

Additional Information :

1. The society has 1800 members paying annual fees of ₹ 100. Subscription amounting to ₹ 900 were still in arrears for 2015-16.
2. Stock of stationary at the beginning ₹ 1,250 and at the end ₹ 870,
3. Salary of ₹ 5,500 is outstanding at the end. Miscellaneous expenses ₹ 1,320 (Opening) outstanding. The society had paid ₹ 5,000 in 2015-16 for telephone expenses, out of which ₹ 1,250 related to 2016-17.
4. Building ₹ 2,45,000 and investments ₹ 65,000 at the beginning of the current year. Depreciate fixed assets by 5%
5. Entrance fees to be capitalized.

Ans. Excess of Income over Expenditure ₹ 85,015; Opening Capital Fund ₹ 2,98,080; Total of Balance Sheet (31-3-17) ₹ 3,97,795.

10. From the following information of a society, prepare Balance Sheets on 1 April, 2016 and 31 March, 2017.

Income and Expenditure Account
for the year ending 31 March, 2017

Expenditure	Amount (₹)	Income	Amount (₹)
To Printing	800	By Tuition fees	11,000
To Advertisement	1,500	By Membership fees	11,500
To Rent	6,000	By Sundry Income	1,300
To Salaries	12,000	By Interest	1,600
To Sundry expenses	1,100		
To Excess of Income over Expenditure	4,000		
	25,400		**25,400**

Receipts and Payments Account
for the year ended 31st March, 2017

Receipts		Amount (₹)	Payments	Amount (₹)
To Balance b/d		4,500	By Printing	750
To Interest			By Advertisement	1,410
2015-16	1,000		By Salary	13,000
2016-17	1,500	2,500	By Furniture	6,700
To Tuition Fees			By Rent	5,200
2016-17	10,000		By Sundry Expenses	1,100
2017-18	1,000	11,000	By Balance c/d	13,740
To Entrance fees		4200		
To Membership fees				
2015-16	3,000			
2016-17	11,500			
2017-18	3,900	18,400		
To Sundry Income		1,300		
		41,900		**41,900**

Additional Information :

1. The following assets were on 31st March, 2016.

	₹
Furniture	40,000
Reference books	10,000
Investments	5,000

Ans. Opening Capital fund ₹ 63,500 and Total of opening Balance Sheet ₹ 63,500; Total of closing Balance sheet ₹ 77,540, Alternative answer: Op. Capital fund ₹ 62,500, Total of opening Balance Sheet ₹ 62,500, Total of closing Balance Sheet ₹ 76,540. (If difference of salary is treated as last year outstanding.)

11. Income and Expenditure Account for the year ending 31st March, 2017 and additional information are given related to a society. Prepare Receipts and Payments Account for the year ending 31st March, 2017 and Balance Sheet on that date.

Income and Expenditure Account
for the year ended 31st March, 2017

Expenditure		Amount (₹)	Income	Amount (₹)
Salaries		2,35,000	Subscriptions	2,50,000
Clinic expenses		30,000	Interest	90,000
Rent		5,000	Donations	40,000
Insurance		2,000	Sundry receipts	3,000
Office expenses		18,000		
Depreciation				
Buildings	37,500			
Furniture	1,200			
Instruments	1,000	39,700		
Excess of income over expenditure		53,300		
		3,83,000		**3,83,000**

Additional Informations :

	31-3-2016 ₹	31-3-2017 ₹
Land & Buildings	20,00,000	19,62,500
Instruments	35,000	39,000
Furniture	20,000	19,800
Govt. Securities	18,00,000	18,00,000
(Face Value : ₹20,00,000)		
Stock of medicines	3,000	1,000
Clinic expenses	2,000	3,000
Outstanding salaries	10,000	15,000
Outstanding subscription	70,000	1,00,000
Advance subscription	2,000	6,000
Cash-in-hand and at Bank	?	1,87,000

Ans. Opening Cash Balance ₹ 1,18,000; Total of Receipts and Payments Account ₹ 4,75,000; Opening Capital Fund ₹ 40,32,000; Total of Closing Balance Sheet ₹ 41,09,300.

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10
Analysis of Financial Statements

Learning objectives :

After studying this chapter, you should be able to understand :

- Meaning definition objectives, nature and characteristics of financial statements
- Objects merits, limitations and process and process of analysis of financial analysis
- Understand process of analysis of financial statements by using techniques of financial statements analysis
- Comparative financial statements :
  - Comparative Balance Sheet - Comparative Statement of Profit and Loss
- Common size dinancial statements :
  - Common Size Balance Sheet - Common Size Statement of Profit and Loss

Of the three steps of accounting process, last step is of summarisation. Under summarisation, similar types of accounting items are collected from different items. This results in summarization of Financial Statements. The object of financial statements is to depict picture of financial position and profitability of the organization. In this manner, financial statements throw light upon the operating results of a business enterprise and its financial position with the help of available information collected systematically at one place. Financial statements are the result of first and second process of accounting, which are prepared with the help of accounting records, accepted accounting principles and conventions. These financial statements are useful for the owners as-well-as for the outside users.

Meaning of Financial Statements :

The end product of financial accounting are the financial statements. These statements contain summarized information about the firm's operations obtained from financial records. Financial statements present the review of financial activities of the organization for a certain period. It is a means of presenting accounting information before internal and external parties. As such the information about the operational profit or loss for a particular period is obtained from the financial statements and the financial position of the organization is known at the end of that period. According to section 2 (40) of Companies Act, 2013 generally a full set of financial statements contain the following:-

1. **Balance Sheet :** It is a statement of assets and liabilities or financial position of an organization at a certain date. It is also called position statement.
2. **Profit and Loss Account :** It shows the net result of business activities for a certain period. It is also known as income statement or statement of profit and loss.
3. **Notes to Accounts and Explanatory Notes :** These are given below the Balance Sheet and statement of Profit & Loss Account. These notes contain detailed description about the items shown there in. Analysed notes are an explanation for the important items related with the accounting policies.
4. **Cash Flow Statement and Segment Report :** These are to be prepared and presented compulsorily according to Accounting Standards 3 and 17 (AS-3 and AS-17) for the following organisations :

(i) Listed Companies, **(ii)** Companies with sales revenue of ₹ 50 crores or more, and **(iii)** Companies which have accepted public deposits of ₹ 10 crore or more. Cash flow statement shows cash in hand, Cash out of hand and cash equivalents.

Whereas financial statements are prepared every year in the prescribed format according to section 129 of the Companies Act 2013 (it does not include Presidential lecture, directors' report and management's opinion and analysis).

Objectives of Financial Statements :

The main objective of these statements is to present a true and fair view of the financial and operational performance and the position of cash flows of an organization for different users, who may be able to take correct financial decisions. These statements are vital source of information for the users; these statements help the users to take proper decisions. The objectives of financial Statements are as under:-

1. To make available such financial data, which are related to financial position of the firm.
2. To reveal operating profits of the firm, which shows effect on its financial position.
3. To provide necessary information for the users of financial statements.
4. To present true and fair picture of the business.
5. To present basis for future activities of the firm.

Nature of Financial Statements

The information of the financial statements is the end result of the following combinations:-

1. Recording business transactions on the basis of authentic evidence or all recorded information is based on evidences.
2. Financial Statements are prepared on the basis of accounting conventions. For examples, due to the convention of conservatism, provision is made in the books for expected future losses, but expected future profits are ignored. On account of this, financial statements become believable and understandable. As such operating results become more authentic.
3. Financial Statements are prepared following accounting conventions. For example, according to the going concern concept, accounts are kept on the assumption that the business will be carried on continuously. On account of this financial statements become more reliable, understandable and comparable.
4. Financial Statements are also affected by personal Judgment. For example, which method of valuation of stock should be followed, this decision will be personal decision of the Management, which affects the financial statements. Thus, personal judgment also plays a vital role in preparing Financial Statements.
5. Financial Statements are important source of financial information, on the basis of which conclusions are drawn about the profitability and financial position of an organization.

Characteristics of Financial Statements :

Financial Statements are indicators of performance efficiency of an organization. The following are the characteristics, which are usually found in Financial Statements :

1. **Sumerization :** Business activities are so large that its users can draw conclusions only by summerising the events. Financial statements infact are conclusions after the process of recording and classification.
2. **Accrual basis :** Generally, business accounts are prepared on accrual basis and not on cash basis.
3. **Expressed in terms of money :** Financial statements are expressesd in terms of money. They are useless in its absence.
4. **Technical Terminology :** Technical terminology for different items is used while preparing these statements.
5. **Based on Assumptions :** These are prepared on this assumption that the particular or specified user is conversant with the process and regulation used in it.
6. **Based on past :** These are based on past data. These are not concerned with future financial processes and regulations.

7. **Based on recognized principles :** Financial statements are prepared on the basis of recognized principles and assumptions under which methods of stock valuation, methods of providing depreciation etc. are used according to recognized principles.

Essentials of Financial Statements :

The Financial statements are important documents of an organisation. These give very useful and valuable information about the profitability and financial position of an enterprise. As such, the following points should be taken into consideration while preparing them :

1. **Intelligible :** The financial statements should be prepared in accordance with the Generally Accepted Accounting Principles that these users may read and understand them easily.
2. **Comparable :** The financial statements should be prepared in such a manner that inter - firm and intra – firm comparsion can be done easily.
3. **Relevant :** The financial statements should contain only relevant information, so that various users can understand them easily.
5. **Factual :** The financial statements should convery factual and accurate information about the position and progress of the organization so that users can assess its true and fair position.
6. **Timeliness :** The financial statements should be prepared and presented during a suitable span of time. Undue delay in presentation reduces its usefulness.

Parties Interested in Financial statements and their Utility

The society and the nation are substantially affected by the activities of every business enterprise. As such many people have interest in financial statements of enterprises. Users of financial statements may be divided in into two groups, internal users and external users.

(A) Internal users :

1. **Shareholders :** They invest in the capital, as such they always have interest in profitability, financial capacity and liquility position of an enterprise. All the information are contained in financial statements.
2. **Management :** Managers are responsible for overall performance of **an** enterprise. Management is responsible for the safety of investments along with profitable use of its resources. As such, they obtain such information from the financial statements, so that they may measure the working efficiency and profit earning capacity of an enterprise. The financial statements for them are as important as hammer and nail for the artisan.
3. **Employees :** Employees will receive bonus on the basis of financial position of the organisation. The financial position of the organization also affects the welfare plans for the employees. As such, they always have interest in knowing financial position of the enterprise.

(B) External users :

1. **Bank and Financial Institutions :** The financial statements are also of great utility for banks and other financial institutions, who provide long term credit facility to the organization, which depends upon its profitability, liquility and solvency, which is obtained from financial statements.
2. **Debenture holders and future investors :** Debenture holders wish to know about the solvency and interest payment capacity of the enterprise, whereas future investors wish to know about the amount of profit, dividends and market position. They all want to know about financial strength of the enterprise, which may be obtained from its financial statements.
3. **Creditors :** They wish to know about liquility and financial strength, which also can be ascertained from the financial statements of the enterprise.
4. **Government & other Departments :** Government wants to know about financial performance from financial statements for making policy decisions and for enactment of Laws, rules and regulations. Other departments of the government, viz, GST department, income tax department, costom duty department etc., and others also need information about sources of revenue etc. use and financial statements for the fulfillment of this purpose.

5. **Researchers and Analysts (or Analysers) :** They also need information from financial statements of the enterprises so as to fulfill their limited objective to analyse and put conclusions before the public and the government.
6. **Trade Associations :** The Chamber of Commerce, the manufacturers associations the non-profit organisations etc., with a view to safe guard the interest of organisations of their respective areas need information. For this they book into financial statements with the objective to find out the trends and conclusions for comparison.
7. **Stock Exchange and Indian Securities Exchange Board :** The financial statements are of great use to above institutions to find out whether the rules framed for the safety of investors are being followed by the organization. They analyse the facts from these financial statements and other information.

Limitations of Financial Statements

The conclusions of financial accounts are given in the financial statements. On the basis of this information more accurate, legitimate and evidential decisions are taken. But the conclusions drawn from such information cannot be regarded final and cent percent accurate. As such the financial statements are also subject to the following limitations, which should be kept in mind while using them for analysis and interpretion.

1. **Historical Facts :** Financial statements are based on historical information, where as most of the users want to know future position . As such financial statements are not very useful.
2. **Based on Estimates :** Financial statements are prepared on the basis of certain accounting principles, conventions, postulates and assumptions, which are also affected by personal gudgement, as such they are not free from bias.
3. **Lack of Qualitative Information :** Financial statements contain information on only those transactions, which are expressed in terms of money. They do not depict those facts which cannot be expressed in terms of money, although they have a great bearing on the financial position of the Business. For example, ability of the management, market position, honesty, are not studied.
4. **Historical Cost :** Financial statements are compiled on the basis of past records, which become historical with the passage of time. They do not show the effect of changes in price level. As such they are like post-mortem.
5. **Not Comparable or Lack of Comparability :** The nature, production capacity, geographical position etc. of two organisations may different, on account of which preparing comparable statements may not be possible.
6. **Hiding Real Position :** On account secret reserves and window dressing the companies hide the real position with certain motives behind it. The data are so presented by accounting manipulation by which the financial position may be shown too good or too bad.
7. **Do not Fulfill Need of all Parties :** These statements do not fulfill the need of all parties having interest in financial statements.

Due to the aforesaid limitations in the present changing situation these statements are neither significant-nor meaningful. How ever, the financial statements are fundamental documents, which furnishe valuable and meaningful information for all concerned and as such have lost no significance.

Analysis of Financial Statements

Only by looking it may be felt that financial statements are groups of figures only, but their significase can not be known till the users (such as management and investors) do not analyse and comment for their objective in particular.

Financial analysis helps in classifying the meaning contained in financial statements. In today circumtances, financial analysis has its own specific significance as a tool for management.

Meaning of Financial Analysis :

Financial statements present a mass of complex data in absolute monetary terms. They hardly reveal about the liquility, solvency and profitability of a business organisation. In financial analysis, the data given in financial statements are classified into simple groups and a comparision of different groups is made with one another to pin point the strong points and the weaknesses of a business. Thus, under financial analysis, first of all an analyst has to choose useful information from financial statements for decision making, then those information are to be arranged in such a manner that important relationships may be revealed and in the end to ascertain conclusions and interpret about such relationships with the help of the techniques of analysis. Thus, it may be said that financial analysis is a method of analyzing financial information, in which useful information is collected from financial statements and relationship is established among them to draw conclusions from them by interpreting in such a manner that the information may be helpful in taking decision.

In the words of Finney and Miller :

"Financial analysis consistst in separating facts according to some definite plan, arranging them in groups according to certain circumstances, and then presenting them in a convenient and easily read and understandable form."

Objectives of Financial Analysis

The interest of the users lie in the analysis of financial statements. As such, the object of analysis of financial statements may be different from the user point of view. For example long terms financiers are concerned with capital structure, future revenue and interest paying capacity of the concern. As such the object of analysis of financial statements will depend upon the fact that for whom analysis is being conducted. The general objectives off analysis are as under :

1. **To Measure Operating Efficiency :** The analysis is conducted on the basis of information given in income statement by means of various techniques of analysis to measure operating efficiency.
2. **To Asses Profitability :** This is also on the basis of information contained in Income statement by using different techniques of analysis.
3. **To Make Inter-Firm and Intra-Firm Comparison :** The analysis of financial statements may be done with the object of comparing results of similar concerns engaged in the same or identical industry. Under intra-firm, comparision may be made by comparing results from year to year of the same concern by self-evaluation.
4. **To Examine Solvency :** Ratio analysis technique of financial analysis can be used to examine short-term and long-term solvency of the organisation.
5. **To Measure Trend :** To measure trend of the financial information of the concern, trend analysis or trend ratio technique can be used.
6. **To Examine Financial Soundness :** Measurement of financial position of the concern may be done by using of various ratios to assess its weaknesses and the strengths.
7. **To Evaluate Progress of Business :** Progress of business and future prospects may be determined by using trend and motivational analysis.
8. **Simple, Brief and Organized Presentation :** The intention of financial analysis is also to present the boring data in simple, brief and organised form.
9. **Helpful in Forecasting :** Effective forecasting, budgeting and planning are possible with the help of historical data.
10. **To Fulfill Needs of Interested Parties :** The various techniques of analysis, financial statements fulfill different necessities of the users.
11. **Judgement or Decision Making :** Scientifically analysis data of is be made for decision making.

Procedure of Financial Analysis

The following is the process of analysing financial statements :

1. **Determination of object and limits of financial Analysis :** First it is necessary to determine the object and limit of financial analysis. For example, the purpose of analysis may be to study the progress of business onlys. Then

only Profit & Loss Account shall be analysed. Similarly, if the object is to study financial position also, then balance sheet will be also analysed. Selection of technique of analysis will depend upon the object and limits of analysis.

2. **Study of Financial Statements :** The next step is to study complete financial data shown in the financial statements to know significance of different items.
3. **Collection of useful Information :** Financial Analyst will collect relevant additional information after studying the financial statements. For example, for the study of future potential, chairman speech, directors report, management report and analysis are to be done.
4. **Reclassification of Information and to Approximate the data :** The data contain in Financial statements should be reclassified according to the object of analysis and the data contained in financial statements should be approximate on the basis of nearest thousand or lakhs in whole numbers. After approximation, the data should be arranged in tabular form.
5. **Comparison :** Absolute data are of no significance. They should be relative in order to make them significant. As such for Inter-firm and Intra-firm comparison, relative figures will be used. For example, to compare various items of financial statements of the same firm may be compared for different years.
6. **Analysis :** Comparable data should be used for analysis according to objectives. For example, Banks and other financial Institution may test the solvency and profitability of a firm. It may be Inter-firm or Intra-firm tests. Similarly the study of the trend of various items of financial statements may also be undertaken.
7. **Interpretation or Drawing Conclusions and Presentation :** Conclusions cannot be drawn without analysis or analysis is useless without drawing Conclusion. As such conclusions should be drawn on the basis of analysed data and then be presented properly only then analysis is useful. In this way, the end product of the Accounting process of financial statements is analysis and presentation, without which recording, classifying and summerizing of business transaction is useless.

Types of Financial Analysis

The analysis of financial statements can be done in four ways :

1. **External Analysis :** External analysis is meant for external users of financial statements. This analysis is done on the basis of published statements since financial analyst cannot approach to various records. This analysis is made by Bankers, Creditors. Researcher and the Government.
2. **Internal Analysis :** When analysis is accomplished by the management of an organisation on the basis of its records, it is called Internal Analysis.

   In the analysis, the analyst has all information (published, unpublished). Thus, it is more authentic and useful for managerial decisions.
3. **Horizontal or Dynamic Analysis :** Under this method every item of financial statements is compared with previous years which is called Intra-firm comparision. For example, the amount of fixed assets of 2016-17 may be compared with figures for 2015-16 & 2014-15. As such it is also known as Dynamic analysis under which various items of one year are compared and measured with the similar items of previous year/years. Under this method the study for the progress and dynamical performance of the organisation is undertaken. The changes may be shown by the following methods-
   (a) Showing percentage increase or decrease in the amount.
   (b) Showing changing by index numbers, which means taking one years figure as base (100) and computing Indices for other years and then comparing the same.
   (c) Actual increase or decrease in the amounts are shown, which means the items of statements for two periods may be compared by putting (+) plus and (-) minus for the changes in amounts. It is a time series analysis. It is useful for long period trend and for planning. Comparing Balance Sheet and Profit & Loss Account or Income statement and trend analysis are the examples of horizontal analysis.

4. **Vertical or static analysis :** Under this analysis, quantitative relationship is established between different items of financial statements for a particular period taking the total as 100. This analysis depicts present relationship on a particular period and do not reveal fluncluations in them. For example, the total of assets side of the Balance sheet is assumed 100 and on this basis percentage for different items of assets side are calculated. It is, therefore, called static analysis, because this analysis does not reveal fluncluations and shows only present relationship. Common size Balance sheet and Profit & Loss account or Income statement are the example of this analysis. Ratio analysis showing mutual relationship between different items of financial statement and that of income statement, is also technique of this analysis. Since the data of one particular period only are taken, it is called Static Analysis.

Both types of analysis, horizontal and vertical are important and required for proper analysis. Both are supplementary to each other and not contradictory to each other.

Different Between Horizontal and vertical Analysis

S.No.	Basis of Difference	Horizontal Analysis	Vertical Analysis
1.	Period	In this analysis the data are required for two or more periods.	In this analysis the data required for one year only.
2.	Usefulness	It is useful for time series analysis.	It is useful in cross sectional analysis.
3.	Component or Items	In this, study is undertaken for tendancy of component for different periods.	In this, study for different items of one period is undertaken.
4.	Comparison	It is one part of comparison.	It is a base for comparison.

Techniques of Financial Analysis

The analytical methods or devices which are used to measure the relationship among various items of financial analysis. The following techniques are usually used at present by an Analyst for analysing financial statements :

1. Comporative Financial Statements
2. Common Size Statements
3. Trend Analysis
4. Ratio Analysis
5. Cash Flow Analysis
6. Fund flow Analysis

All these techniques are not used for all analytical studies. The selection of technique depends upon the object of analysis. For example, an Analyst wishes to test profitability of two Industries in similar trade for a financial year, he will use Ratio-Analysis technique. Other techniques are not suitable for that purpose of these, only first four techniques are required to be studied, since other techniques are not needed under the syllabus.

Limitations of Financial Analysis

Despit many advantages of Financial Statement Analysis, yet has got certain limitations which should be kept in consideration by the users and the analyser. The limitations are as under :-

1. **Only Quantitative Measurement :** The analysis of financial statements is only a quantitative analysis and not a quantitative one. Thus, it is only one side measurement of efficiency evaluation.
2. **Absence of generally Accepted Principles :** Generally Accepted Principles are being framed and made effective on International basis, even then this work is being carried on very slowly. As such, when uniform rules and principles are not adopted, the results of financial statements are not very authentic and consists lack of comparison.

3. **Lack of diagnostive :** Financial analysis only indicates the elements of performance efficiency. It does not offer its diagnosis. It identifies symptoms only.

4. **Limitation of Financial Statements :** Financial Analysis is based on financial statements and these statements also suffer from certain limitations. As such the limitations of financial statements are also the limitations of their analysis. For example, financial statements are based on historical cost, hence there is a question mark on its usefulness in present days.

5. **Do not Reflect Changes in Price Level :** Comparison of figures, statements for two or more years may give misleading result since these statements do not reflect the effect of changes in Price level. For example, to compare cost of production of an enterprise for past five years which are shown in financial statements actual cost may give fallacious result. As such, actual performance cannot be measured correctly with considering the effect of changes in Price Level. On the other hand, if an Analyst keeps in mind the changes in price level while doing financial analysis, the results may be significant and not misleading.

Comparative Financial Statements

Comparative Financial Statements is such a technique of financial analysis in which changes (absolute and /or relative) in the data of items of financial statements are included and presented in the form of statement. It is a comparative study to measure changes in similar individual items of Balance Sheet and statement of Profit & Loss Account for two or more years. In this technique, individual item for one of the two years is taken as base and ratio or percentage of the other similar items is computed for making comparison between them. Thus, Comparative Financial Statements is the study to indicate trend for information of similar items or group of items of financial statements of a business enterprise.

Merits of Comparative Financial Statements :

1. It is an easy and simple presentation of financial data which makes comparison easy.
2. Comparative financial statements indicate the trend of changes in various items which help in forcasting.
3. It is easy to understand the main financial statistics by means of Comparative Financial Statement.
4. Comparative Financial Statements help to know about the health of the enterprise. It indicates the strong points and weak points of the enterprise.
5. With the help of comparative financial statements Intra-firm comparison is possible. The firm’s performance can also be tested with the average performance of the Industry.
6. With the help of analysis of changes and information about the trend, forecasting and planning is made easy.
7. Study of comparative financial statements will assist firm’s creditors and loan providers to take decision about extension of credit facilities.

Preparation of Comparative Balance Sheet

The comparative balance sheet reveals changes in the amount of Assets, Liabilities, and capital of the firm in absolute terms as well as in percentage or ratio from. These changes means increase and decrease in two or more years are compared with the base year. It is the horizontal analysis of Balance Sheet. The following six columns are drawn for its preparation :

First column : In this column the name of every item or component of balance sheet is written.

Second column : In this column note number is written against every item written in column no.1.

Third column : Amounts of previous year are written in this column.

Fourth column : Amounts of current year are written in this column.

Fifth column : Amount of absolute changes in current year as compared to previous year are written.

Sixth column : Percentage for changes in every item (given in column five) are calculated and the same are written in this column.

Percentage change = $\frac{\text{Amount of change for each item as given in column}}{\text{Amount of same item of previous year as given in column}} \times 100$

The format of Comparative Balance Sheet is as follow:-

Format of Comparative Balance Sheet

Particulars	Note No.	Previous Year ₹	Current Year ₹	Absolute Change (Increase/Decrease) ₹	Percentage Change (Increase/Decrease)
1	2	3	4	5 (4-3)	6 ($\frac{5}{3}$x 100)
I. EQUITY AND LIABILITIES					
1. Shareholders' Funds					
(a) Share Capital :	--	--	--	--	--
(i) Equity Share Capital	--	--	--	--	--
(ii) Preference Share Capital	--	--	--	--	--
(b) Reserves and Surplus	--	--	--	--	--
2. Non-Current Liabilities					
(a) Long-term Borrowings	--	--	--	--	--
(b) Long Term Provisions	--	--	--	--	--
3. Current Liabilities					
(a) Short term Borrowings	--	--	--	--	--
(b) Trade Payables (Creditors)	--	--	--	--	--
(c) Other Current Liabilities	--	--	--	--	--
(d) Short-term Provisions	--	--	--	--	--
Total	**--**	**--**	**--**	**--**	**--**
II. ASSETS					
2. Non-Current Assets					
(a) Fixed Assets	--	--	--	--	--
(i) Tangible Assets	--	--	--	--	--
(ii) Intangible Assets	--	--	--	--	--
(b) Non-current Investments	--	--	--	--	--
(c) Long-term Loans and Advances	--	--	--	--	--
3. Current Assets					
(a) Current Investment	--	--	--	--	--
(b) Inventories	--	--	--	--	--
(c) Trade Receivables	--	--	--	--	--
(d) Cash and Cash Equivalents	--	--	--	--	--
(e) Short-term Loans and Advances	--	--	--	--	--
(f) Other Current Assets	--	--	--	--	--
Total	**--**	**--**	**--**	**--**	**--**

Note :- (1) Absolute change and percentage change will be shown in brackets to reflect negative item. **(2)** Change in remaining items of Balance Sheet not shown separately viz:- Money received against Share Warrants, Deferred Tax Liabilities (Net), Long term provisions, other current liabilities, Capital work-in-progress, Intangible assets under development, Deferred tax assets (Net), other long term liabilities, and other current assets (excluding expenses, outstanding income and advance tax).

Illustration 1 :

From the following Balance Sheets, prepare Comparative Balance Sheet.

Particulars	Note No.	31st March 2017 ₹	31st March 2016 ₹
I. EQUITY AND LIABILITIES			
1. Shareholders' Funds			
(a) Share Capital :			
(i) Equity Share Capital		4,00,000	3,00,000
(ii) Preference Share Capital		3,00,000	2,00,000
(b) Reserves and Surplus		--	--
2. Non-Current Liabilities			
(a) Long-term Borrowings		2,00,000	50,000
(b) Long Term Provisions		--	--
3. Current Liabilities			
(a) Trade Payables		1,00,000	75,000
Total		**10,00,000**	**6,25,000**
II. ASSETS			
1. Non-Current Assets			
(a) Fixed Assets		5,40,000	3,60,000
(b) Non-current Investments		40,000	40,000
2. Current Assets			
(a) Trade Receivables		4,00,000	2,00,000
(b) Cash and Cash Equivalents		20,000	25,000
Total		**10,00,000**	**6,25,000**

Solution :

Comparative Balance Sheet as at 31st March, 2016 and 2017

Particulars	Note No.	31 March 2016	31 March 2017	Absolute Change (Increase/Decrease)	Percentage Change (Increase/Decrease)
1	2	3 ₹	4 ₹	5 ₹	6 ₹
I. EQUITY AND LIABILITIES					
1. Shareholders' Funds					
(a) Share Capital :		3,00,000	4,00,000	1,00,000	33.33
(i) Equity Share Capital					
(ii) Preference Share Capital		2,00,000	3,00,000	1,00,000	50.00
(b) Reserves and Surplus					
2. Non-Current Liabilities					
(a) Long-term Borrowings		50,000	2,00,000	1,50,00	300.00
(b) Long Term Provisions					
3. Current Liabilities					
(a) Trade Payables (Creditors)		75,000	1,00,000	25,000	33.33
Total		**6,25,000**	**10,00,000**	**3,75,000**	**60.00**

II. ASSETS					
1. Non-Current Assets					
(a) Fixed Assets (Tangible)		3,60,000	5,40,000	1,80,000	50.00
(i) Tangible Assets		40,000	40,000	--	--
2. Current Assets					
(a) Current Investment		2,00,000	4,00,000	2,00,000	100.00
(b) Cash and Cash Equivalents		25,000	20,000	(5,000)	(20.00)
Total		**6,25,000**	**10,00,000**	**3,75,000**	**60.00**

Illustration 2 :

Form the following summarised Balance Sheets of Y Ltd. , prepare Comparative Balance Sheet.

(₹ in Lakhs)

Particulars	Note No.	31st March 2017	31st March 2016
I. EQUITY AND LIABILITIES			
1. Shareholders' Funds			
(a) Share Capital :			
(i) Equity Share Capital		50.00	50.00
(ii) Preference Share Capital		15.00	20.00
(b) Reserves and Surplus		18.00	15.00
2. Non-Current Liabilities			
(a) Long-term Borrowings		50.00	40.00
(b) Long Term Provisions		2.00	2.20
3. Current Liabilities			
(a) Trade Payables		14.30	13.00
Total		**149.30**	**140.20**
II. ASSETS			
1. Non-Current Assets			
(a) Fixed Assets		105.00	105.00
2. Current Assets			
(a) Trade Receivables		40.00	31.00
(b) Cash and Cash Equivalents		4.30	4.20
Total		**149.30**	**140.20**

Solution :

Comparative Balance Sheet as at 31st March, 2016 and 2017

Particulars	Note No.	31st March 2016	31st March 2017	Absolute Change (Increase/Decrease)	Percentage Change (Increase/Decrease)
1	2	3 ₹	4 ₹	5 ₹	6 ₹
I. EQUITY AND LIABILITIES					
1. Shareholders' Funds					
(a) Share Capital :					
(i) Equity Share Capital		50.00	50.00	--	--
(ii) Preference Share Capital		20.00	15.00	(5.00)	(25.00)

(b) Reserves and Surplus		15.00	18.00	3.00	20.00
2. Non-Current Liabilities					
(a) Long-term Borrowings		40.00	50.00	10.00	25.00
(b) Long Term Provisions		2.20	2.00	(0.20)	(9.09)
3. Current Liabilities					
(a) Trade Payables (Creditors)		13.00	14.30	1.30	10.00
Total		**140.20**	**149.30**	**9.10**	**6.49**
II. ASSETS					
1. Non-Current Assets					
(a) Fixed Assets (Tangible)		105	105	--	--
2. Current Assets					
(a) Current Investment		31.00	40.00	9.00	29.03
(b) Cash and Cash Equivalents		4.20	4.30	0.10	2.38
Total		**140.20**	**149.30**	**9.10**	**6.49**

Comparative Statement of Profit and Loss or Income Statement

Income statement despits particulars of Profit and Loss for a financial year. It is not possible to draw conclusion from the data of a specific period, because it has no comparability. From the comparative study of profit and loss of more than one period, the analyst can draw conclusions for progress of business and for others. Hence, in comparative results from one period to another we can explain the absolute change in figures through percentage change, decrease or increase. It is horizontal analysis of profit and loss account. It is also called as dynamic analysis of Profit & Loss.

Preparation of Comparative Profit and Loss Account or Income Statement

While preparing Comparative Income Statement, the following six columns are to be prepared :

First Column : In this column, all items of Income Statement are written.

Second Column : In this column, Numbers are given against the items in Income Statement.

Third Column : In this column, amounts of previous year are written.

Fourth Column : In this column, the amounts of current year are written.

Fifth Column : In this column, differences in amounts between current period and previous period are recorded.

Sixth Column : In this column, the above difference in column 5 (increase or decrease), expressed as a percentage of previous year's amount, are shown.

$$\text{Percentage change} = \frac{\text{Amount of said item in column fifth}}{\text{Amount of said item in column three}} \times 100$$

Format of Comparative Statement of Profit and Loss or Income Statement

Particulars	Note No.	Previous Year ₹	Current Year ₹	Absolute Change (Increase/Decrease) ₹	Percentage Change (Increase/Decrease)
1	2	3	4	5 (4-3)	6 ($\frac{5}{3}$x 100)
I. Revenue from Operations	--	--	--	--	--
II. Other Income	--	--	--	--	--
III. Total Revenue (I + II)					
IV. Expenses					
(a) Cost of Materials Consumed	--	--	--	--	--
(b) Purchase of Stock-in-Trade	--	--	--	--	--
(c) Change in Inventories of	--	--	--	--	--

Finished Goods, Work-in-Progress and Stock-in-Trade					
(d) Employees benefit Expenses	--	--	--	--	--
(e) Finance Costs	--	--	--	--	--
(f) Depreciation and amortisation Expenses	--	--	--	--	--
(g) Other Expenses	--	--	--	--	--
Total Expenses	**--**	**--**	**--**	**--**	**--**
V. Profit before Tax (III-IV)	**--**	**--**	**--**	**--**	**--**
VI. Less : Income Tax	**--**	**--**	**--**	**--**	**--**
VIII. Profit after Tax (V-VI)	**--**	**--**	**--**	**--**	**--**

Note :-

(1) Absolute change and percentage change will be shown in brackets to reflect negative item.

(2) Material consumed = opening stock of raw materials + purchases – closing stock of raw materials.

(3) Purchase of stock - in - trade = Net purchase of goods for resale minus purchase return.

(4) Revenue from operations : Sales (net of returns), Sale of scap, receipts from services. If finance company then accured Interest, dividend and service changes.

(5) In other income, income from non-trading activities included.

Illustration 3 :

From the following information, prepare Comparative Income Statement.

Particulars	31 March 2016 ₹	31 March 2017 ₹
1	2	3
Revenue from Operations (Sales)	4,00,000	6,00,000
Purchase of Stock-in-Trade (net Purchase)	2,50,000	3,50,000
Change in Inventories of finished Goods, Work-in-Progress and Stock in trade	60,000	60,000
Other Expenses (% of cost of revenue from Operations)	10%	10%
Tax	30%	30%

Solution :

Comparative Income Statement for the year ended 31st March 2016 & 2017

Particulars	Note No.	31 March 2016	31 March 2017	Absolute Change (Increase/Decrease)	Percentage Change (Increase/Decrease)
1	2	3 ₹	4 ₹	5 (4-3) ₹	6 ($\frac{5}{3}$x 100) ₹
I. Revenue from Operations	--	4,00,000	6,00,000	2,00,000	50.00
II. Total Revenue	**--**	**4,00,000**	**6,00,000**	**2,00,000**	**50.00**
III. Expenses					
(a) Purchase of Stock-in-Trade	--	2,50,000	3,50,000	1,00,000	40.00
(b) Change in Inventories of Stock-in-Trade	--	60,000	60,000	--	--

(c) Other Expenses	--	31,000	41,000	10,000	32.26
Total Expenses		3,41,000	4,51,000	1,10,000	32.26
IV. Profit before Tax (II-III)	--	59,000	1,49,000	90,000	152.54
V. Less : Income Tax	--	17,700	44,700	27,000	152.54
VI. Profit after Tax (IV-VI)	**--**	**41,300**	**1,04,300**	**63,000**	**152.54**

Note :-

Cost of Revenue from operations (cost of goods sold = purchases + change in inventories

Hence for 2015-16 other expenses 2,50,000 + 60,000 = 3,10,000 x 10% = ₹ 31,000

For 2016-17 other expenses 3,50,000 + 60,000 = 4,10,000 x 10% = ₹ 41,000

Illustration 4 :

Following information is extracted from Statement of Profit & Loss of Z Ltd. Prepare Comparative Income Statement.

Particulars	31 March 2016 ₹	31 March 2017 ₹
1	2	3
Revenue from Operations	50,00,000	70,00,000
Employees Benefit Expenses	5,00,000	6,00,000
Depreciation and Amortisation Expenses	1,00,000	1,20,000
Purchase of Stock-in-Trade	25,00,000	30,00,000
Change in Inventories of Stock-in-Trade	1,50,000	2,00,000
Other Expenses - Tax Rate 30%	2,00,000	3,00,000

Solution :

Comparative Income Statement
for the year ended 31st March, 2017

Particulars	Note No.	Previous Year	Current Year	Absolute Change (Increase/Decrease)	Percentage Change (Increase/Decrease)
1	2	3 ₹	4 ₹	5 (4-3) ₹	6 ($\frac{5}{3}$ x 100) ₹
I. Revenue from Operations	--	50,00,000	70,00,000	20,00,000	40.00
II. Total Revenue	**--**	**50,00,000**	**70,00,000**	**20,00,000**	**40.00**
III. Expenses					
(a) Purchase of Stock-in-Trade	--	25,00,000	30,00,000	5,00,000	20.00
(b) Change in Inventories of Stock-in-Trade	--	1,50,000	2,00,000	50,000	33.33
(c) Employee Benefit Expenses	--	5,00,000	6,00,000	1,00,000	20.00
(d) Depreciation and Amortisation Expenses	--	1,00,000	1,20,000	20,000	20.00
(e) Other Expenses	--	2,00,000	3,00,000	1,00,000	50.00
Total Expenses		**34,50,000**	**42.20,000**	**7,70,000**	**22.32**
IV. Profit before Tax (II-III)	--	15,50,000	27,80,000	12,30,000	79.35
V. Less: Tax @30%	--	4,65,000	8,34,000	3,69,000	79.35
VI. Profit after Tax (IV-VI)	**--**	**10,85,000**	**19,46,000**	**8,61,000**	**79.35**

Common Size Financial Statements

Common size financial statements are those which show the financial data in vertical form as percentages. Under this method the value of every item of Balance Sheet and Profit and Loss Account (Income statement) is written. Then, these values of individual items are expressed as percentages in relation to respective totals. The items of Profit & Loss Account are expressed as percentages to total income from business activities. Then the individual items of Balance sheet are also presented as percentages, and a Common base is ready for comparison. The financial statements prepared in this manner are called Common Size Financial Statements. Such statements may be prepared for one or two or more than two years. Generally, the vertical analysis is used for inter-firm comparison under which the values of one period are compared with two or more periods. If the Common size statements are prepared only for one company for two or more years this is intra-firm comparison in which values of one period are compared with the values of another period. This is useful for trend analysis.

Common Size Balance Sheet :

Under this items of assets and liabilities sides are presented as percentage to total assets/liabilities. The percentage for items of assets side are calculated taking total assets as 100. Similarly the percentages of items on liabilities side are computed taking total of liabilities side as 100. If this is prepared for more than one year then the trend for each item can be measured. If this is prepared for different firms of the same Industry, it will enable the firm to assess its relative financial soundness, which may help in good financial planning. It is also called 100 percent statement.

Objects of Common Size Balance Sheet :

(1) To analyse change in every item of Balance Sheet.

(2) To measure the trend in each item of assets and liabilities.

(3) To measure the relative financial soundness for different firms in the same industry.

Preparation of common size Balance Sheet :

The following columns are drawn for preparing common-size Balance Sheet.

First column : In this column, items of Balance Sheet are given.

Second Column : In this column, note number given against the item is given.

Third Column : In this column, amounts of each item (assets/liabilities) of previous year are given.

Fourth Column : In this column, amounts of each item (assets/liabilities) of current year are given.

Fifth Column : In this column, percentage relation of each item of previous year to total of previous year Balance Sheet, which is taken as 100 are given.

Sixth Column : In this column, percentage relation of each item of current year Balance Sheet to total of current year of Balance Sheet, which is taken as 100 are given.

For example Total of assets side ₹ 10,00,000 and out of non-current assets the amount of fixed assets is ₹ 4,00,000, then

$$\frac{4,00,000}{10,00,000} \times 100 = 40\%$$ will be written against Fixed Assets.

Note:

1. When comparison is made between two separate firms, amount of each firm is shown separately in column 3 & 4 respectively.
2. If it is prepared for current year figures of a single firm, then column 3 & 5 will not be given.

Common Size Balance Sheets

Particulars	Note No.	Absolute Amount ₹		Percentage of Balance Sheets Total	
		Previous Year	Current Year	Previous Year	Current Year
1	2	3	4	5=(3/total x100)	5=(4/total x100)
I. EQUITY AND LIABILITIES					
1. Shareholders' Funds					
(a) Share Capital :	--	--	--	--	--
(i) Equity Share Capital	--	--	--	--	--
(ii) Preference Share Capital	--	--	--	--	--
(b) Reserves and Surplus	--	--	--	--	--
2. Non-Current Liabilities					
(a) Long-term Borrowings	--	--	--	--	--
(b) Long Term Provisions	--	--	--	--	--
3. Current Liabilities					
(a) Short term Borrowings	--	--	--	--	--
(b) Trade Payables (Creditors)	--	--	--	--	--
(c) Other Current Liabilities	--	--	--	--	--
(d) Short-term Provisions	--	--	--	--	--
Total		**--**	**--**	**--**	**--**
II. ASSETS					
2. Non-Current Assets					
(a) Fixed Assets	--	--	--	--	--
(i) Tangible Assets	--	--	--	--	--
(ii) Intangible Assets	--	--	--	--	--
(b) Non-current Investments	--	--	--	--	--
(c) Long-term Loans and Advances	--	--	--	--	--
3. Current Assets					
(a) Current Investment	--	--	--	--	--
(b) Inventories	--	--	--	--	--
(c) Trade Receivables	--	--	--	--	--
(d) Cash and Cash Equivalents	--	--	--	--	--
(e) Short-term Loans and Advances	--	--	--	--	--
(f) Other Current Assets	--	--	--	--	--
Total		**--**	**--**	**--**	**--**

Note:

1. When comparison is made for two firms, then in column 3 amounts of first firm, in column 4 amounts of second firm, in column fifth percentage change of second firm will be given.
2. If analysis is made for current year items of a firm then column 3 and 5 will not be given.

Illustration 5 :

From the following information ABC Ltd. prepare Common Size Balance Sheet.

Balance Sheets
As On 31st March 2016 and 2017

Particulars	Note No.	31 March 2016 ₹	31 March 2017 ₹
I. EQUITY AND LIABILITIES			
1. Shareholders' Funds			
(a) Share Capital :	--	4,00,000	8,00,000
(i) Equity Share Capital	--		
(b) Reserves and Surplus	--	2,00,000	3,00,000
2. Non-Current Liabilities			
(a) Long-term Borrowings	--	6,00,000	8,00,000
3. Current Liabilities			
(a) Trade Payables (Creditors)	--	4,00,000	1,00,000
Total		**16,00,000**	**20,00,000**
II. ASSETS			
2. Non-Current Assets			
(a) Fixed Assets (Tangible)		10,00,000	17,00,000
3. Current Assets			
(a) Cash and Cash Equivalents		6,00,000	3,00,000
Total		**16,00,000**	**20,00,000**

Solution :

Common Size Balance Sheets
As On 31st March 2016 and 2017

Particulars	Note No.	Absolute Amount ₹		Percentage of Balance Sheet Total	
		31 March 2016	31 March 2017	31 March 2016	31 March 2017
1	2	3	4	5=(3/total x100)	5=(4/total x100)
I. EQUITY AND LIABILITIES					
1. Shareholders' Funds					
(a) Share Capital :	--	4,00,000	8,00,000	25.00	40.00
(b) Reserves and Surplus	--	2,00,000	3,00,000	12.50	15.00
2. Non-Current Liabilities					
(a) Long-term Borrowings	--	6,00,000	8,00,000	37.50	40.00
3. Current Liabilities					
(a) Trade Payables	--	4,00,000	1,00,000	25.00	5.00
Total		**16,00,000**	**20,00,000**	**100.00**	**100.00**
II. ASSETS					
1. Non Current Assets					
(a) Fixed Assets (Tangible)	--	10,00,000	17,00,000	62.50	85.00
(b) Non-current Investments	--	--	--	--	--
2. Current Assets					
(a) Cash and Cash Equivalents	--	6,00,000	3,00,000	37.50	15.00
Total		**16,00,000**	**20,00,000**	**100.00**	**100.00**

Illustration 6 :

Prepare Common Size Balance Sheet of A and C Ltd. from the following Balance Sheets.

Balance Sheets
As On 31st March 2016 and 2017

Particulars	Note No.	31 March 2017 ₹ A Ltd.	31 March 2017 ₹ C Ltd.
I. EQUITY AND LIABILITIES			
1. Shareholders' Funds			
(a) Share Capital :	--	3,00,000	5,00,000
(b) Reserves and Surplus	--	1,00,000	2,00,000
2. Non-Current Liabilities			
(a) Long-term Borrowings	--	2,00,000	3,00,000
3. Current Liabilities			
(a) Short Term Borrowings	1	50,000	1,00,000
(b) Trade Payables	--	1,50,000	2,50,000
(c) Other Current Liabilities	--	2,50,000	1,50,000
(d) Short-term Provisions	--	1,50,000	1,00,000
Total		**12,00,000**	**16,00,000**
II. ASSETS			
1. Non-Current Assets			
(a) Fixed Assets (Trangible) (Net)		5,00,000	6,00,000
(b) Non-current Investments		1,00,000	2,00,000
2. Current Assets			
(a) Inventories		2,00,000	3,00,000
(b) Trade Receivables		1,50,000	2,50,000
(c) Cash and Cash Equivalents		1,00,000	2,00,000
(d) Other Current Assets	2	1,50,000	50,000
Total		**12,00,000**	**16,00,000**

Notes to the Accounts :

Particulars	31 March 2017 ₹ A Ltd.	31 March 2017 ₹ C Ltd.
1. Long-term Borrowings		
(a) Bank	75,000	1,00,000
(b) Debentures	1,25,000	2,00,000
	2,00,000	3,00,000
2. Other Current Assets		
(a) Prepaid Expenses	1,50,000	50,000

Solution :

Common Size Balance Sheets
As On 31st March 2017

Particulars	Note No.	Absolute Amount ₹		Percentage of Balance Sheet Total	
		31 March 2017	31 March 2017	31 March 2017	31 March 2017
1	2	A Ltd. 3	C Ltd. 4	A Ltd. 5	C Ltd. 6
I. EQUITY AND LIABILITIES					
1. Shareholders' Funds					
(a) Share Capital :	--	3,00,000	5,00,000	25.00	31.25
(b) Reserves and Surplus	--	1,00,000	2,00,000	8.33	12.50
2. Non-Current Liabilities					
(a) Long-term Borrowings					
Bank Loan	--	75,000	1,00,000	6.25	6.25
(b) Debentures	--	1,25,000	2,00,000	10.42	12.50
3. Current Liabilities					
(a) Short term Borrowings	--	50,000	1,00,000	4.17	6.25
(b) Trade Payables (Creditors)	--	1,50,000	2,50,000	12.50	15.63
(c) Other Current Liabilities	--	2,50,000	1,50,000	20.83	9.37
(d) Short-term Provisions	--	1,50,000	1,00,000	12.50	6.25
Total		**12,00,000**	**16,00,000**	**100.00**	**100.00**
II. ASSETS					
1. Non-Current Assets					
(a) Fixed Assets (Tangible) (Net)		5,00,000	6,00,000	41.67	37.50
(b) Non-current Investments		1,00,000	2,00,000	8.33	12.50
2. Current Assets					
(a) Inventories		2,00,000	3,00,000	16.67	18.75
(b) Trade Receivables		1,50,000	2,50,000	12.50	15.63
(c) Cash and Cash Equivalents		1,00,000	2,00,000	8.33	12.50
(d) Other Current Assets	2	1,50,000	50,000	12.50	3.12
(e) Prepaid Expenses					
Total		**12,00,000**	**16,00,000**	**100.00**	**100.00**

Common-size statement of Profit & Loss (Income Statement)

In this statement, revenue from operations (Net sales) is taken as 100 and each item on expenses side is shown as its percentage. For example, net sales are ₹ 10,00,000 and purchase of stock-in-trade is ₹ 5,00,000, then purchase of stock-in-trade is 50 percent of net sales.

Objectives of Common-size Income statement :

1. To analyse change in individual items of income statement.
2. To know the efficiency of business.
3. To study the trend of each item of income and expenses.

Preparation Common Size Statements of Profit and Loss :

It is prepared having six columns as follows.

First Column : In this column, name of each item of revenue and expenses **is** written.

Second Column : In this column, note number given against each item of **i**ncome statement is written.

Third Column : In this column, amount of each item of previous year is written. If it is prepared for Comparison of two firms, then amount of each item of a firm is written against the names of items.

Forth Column : In this column, amounts of current year are written. If the statement is prepared for comparison between two firms, then amount of each item of second firm is written against the name of item.

Fifth Column : In this column, percentage of each item of income statement of previous year to revenue form operations (sales) is written.

Sixth Column : In this column, percentage of each item of income statement of current year to revenue from operations (Sales) is written.

Note :

1. When there is comparison between two firms in column 3 & 4, amounts of firms are shown and in column 5 & 6 taking sales as 100 for each firm separately, percentage of each item is written.
2. If calculation is made for current years figure of a firm then column 3 & 5 will not prepared.

Format of Common-Size Statement of Profit and Loss

Particulars	Note No.	Absolute Amount ₹		Percentage of Revenue from Operations	
		Previous Year	Current Year	Previous Year	Current Year
1	2	3	4	5	6
I. Revenue from Operations		--	--	--	--
II. Other Income		--	--	--	--
III. Total Revenue (I + II)					
IV. Expenses					
(a) Cost of Materials consumed		--	--	--	--
(b) Purchases of Stock-in-Trade		--	--	--	--
(c) Change in Inventories of finished Goods, Work-in-progress and Stock-in-Trade		--	--	--	--
(d) Employees Benefit Expenses		--	--	--	--
(e) Financial Costs		--	--	--	--
(f) Depreciation and Amortisation Expenses		--	--	--	--
(g) Other Expenses		--	--	--	--
Total Expenses		--	--	--	--
V. Profit Before Tax (III - IV)		--	--	--	--
VI. Less : Income Tax		--	--	--	--
VII. Profit after Tax (V-VI)		--	--	--	--

Note:

1. If comparison is made between two firms, then in column 3 values of first firm, in column 4 value of second firm, in column 5 percentage of first firm and in column 6 percentage of second firm will be given.
2. When analysis of current years items of a firm is done then column 3 & 5 will not prepared.

Illustration 7 :

Profit and Loss Accounts for the year ending 31st March 2016 & 2017 of A Ltd. are given below. Prepare Common size statement of Profit and Loss.

Statement of Profit and Loss of A Ltd.
for the year ending 31st March, 2016-17

Particulars	Note No.	31 March 2017 ₹	31 March 2016 ₹
Income			
I. Revenue from Operations (Net Sales)		12,00,000	10,00,000
II. Expenses		--	--
(a) Purchases of Stock in Trade		8,00,000	6,00,000
(b) Change in Inventories of finished Goods, Work-in-progress and Stock-in-Trade		1,00,000	1,00,000
(c) Depreciation and Amortisation Expenses		1,00,000	1,20,000
(d) Other Expenses		50,000	80,000
Total Expenses		**10,50,000**	**9,00,000**
III. Profit Before Tax (I - II)		1,50,000	1,00,000
IV. Less : Income Tax		45,000	30,000
V. Profit after Tax (III-IV)		**1,05,000**	**70,000**

Solution :

Common-Size Statement of Profit and Loss
for the year ended 31st March 2016 and 2017

Particulars	Note No.	Absolute Amount ₹		Percentage of Revenue from Operations Total	
		31 March 2016	31 March 2017	31 March 2016	31 March 2017
I. Revenue from Operations		10,00,000	12,00,000	100.00	100.00
II. Total Revenue (I + II)		**10,00,000**	**12,00,000**	**100.00**	**100.00**
III. Expenses					
(a) Purchases of Stock-in-Trade		6,00,000	8,00,000	60.00	66.67
(b) Change in Inventories of finished Goods, Work-in-Progress and Stock-in-Trade		1,00,000	1,00,000	0.00	8.33
(c) Depreciation and Amortisation Expenses		1,20,000	1,00,000	12.00	8.33
(d) Other Expenses		80,000	50,000	8.00	4.17
Total		**9,00,000**	**10,50,000**	**90.00**	**87.50**
IV. Profit Before Tax (III-IV)		1,00,000	1,50,000	10.00	12.50
V. Less : Income Tax		30,000	45,000	3.00	3.75
VI. Profit after Tax (V-VI)		**70,000**	**1,05,000**	**7.00**	**8.75**

Illustration 8 :

From the following Statement of Profit and Loss of Y and Z Ltd., prepare Common-size statement of Profit and Loss.

Particulars	Note No.	31 March 2017 ₹	31 March 2017 ₹
		Y Ltd.	Z Ltd.
Income			
I. Revenue from Operations		18,00,000	20,00,000
II. Other Income		50,000	60,000
III. Total Revenue (I + II)		**18,50,000**	**20,60,000**

IV. Expenses			
(a) Purchases of Stock-in-Trade		10,00,000	12,00,000
(b) Change in Inventories of finished Goods, Work-in-progress and Stock-in-Trade		2,00,000	3,00,000
(c) Employees Benefit Expenses		2,50,000	1,60,000
(d) Other Expenses	2	2,00,000	1,00,000
Total Expenses		**16,50,000**	**17,60,000**
V. Profit before Tax (I - II)		2,00,000	3,00,000
VI. Less : Income Tax		60,000	90,000
VII. Profit after Tax (III - IV)		**1,40,000**	**2,10,000**

Notes to the Accounts :

Particulars	31 March 2017 ₹ Y Ltd.	31 March 2017 ₹ Z Ltd.
Revenue from Operations (Sales)	18,20,000	20,30,000
Less : Returns	20,000	30,000
	18,00,000	20,00,000
Other Expenses		
(a) Administrative Expenses	1,50,000	80,000
(b) Miscellaneous Expenses (Non Operative)	50,000	20,000
	2,00,000	**1,00,000**

Solution :

Common-Size Statement of Profit and Loss
for the year ended 31st March 2017

Particulars	Note No.	Absolute Amount ₹		Percentage of Revenue from operations	
		Y Ltd.	Z Ltd.	Y Ltd.	Z Ltd.
I. Revenue from Operations (Sales) less returns	1	18,00,000	20,00,000	100.00	100.00
II. Other Income		50,000	60,000	2.77	3.00
III. Total Revenue (I+II)		**1,85,000**	**20,60,000**	**102.77**	**103.00**
IV. Expenses					
(a) Purchases of Stock-in-Trade		10,00,000	12,00,000	55.55	60.00
(b) Change in Inventories of finished Goods, Work-in-progress and Stock-in-Trade		2,00,000	3,00,000	11.11	15.00
(c) Employees Benefit Expenses		2,50,000	1,60,000	13.89	8.00
(d) Other Expenses	2				
Administrative Expenses		1,50,000	80,000	8.33	4.00
Miscellaneous expenses (Non Operative)		50,000	20,000	2.78	1.00
Total Expenses		**16,50,000**	**17,60,000**	**91.66**	**88.00**
V. Profit Before Tax (III - IV)		2,00,000	3,00,000	11.11	15.00
VI. Less : Income Tax		60,000	90,000	3.33	4.50
VII. Profit after Tax (V-VI)		**1,40,000**	**2,10,000**	**7.78**	**10.50**

Trend Analysis

It is a method to study financial position of a business on the basis of changes in individual items of financial statements during the period of study in comparison with a particular year. It is necessary to study the data for number of years and analyse them with the object of studying trend of progress or regress of an enterprise. For this purpose, the percentage increase or decrease in every item of financial statement shall be expressed in terms of percentage on the basis of one year(base year) for the same item. Thus by this method, it is possible to test the working efficiency and performance for a number of years of an enterprise. The following three methods are used for analysis of trend of the business.

(i) Trend Percentages : Under this method first of all the inform ation of financial statements of number of years are tabulated. Then increase or decrease of other years is measured taking any one years figure as base. Generally, first year is taken as base year. Thereafter, percentages for increases or decreases in values are calculated :

$$\text{Percentage Increase/Decrease taking value of base year as 100} = \frac{\text{Increase/Decrease in related year (absolute figure)}}{\text{Related value of Base year}} \times 100$$

Illustration 9 :

Following is the information of an enterprise with regard to revenue from operations. Taking as 2012-13 base, calculate trend percentage for measuring the change.

Year	2012-13	2013-14	2014-15	2015-16	2016-17
Income from Operation (in Lakh or Sales ₹)	10	12	9	16.5	18

Solution : **Statement showing Trend of Revenue from Operations**

Year	Net Sales (in Lakh ₹)	Increase or decrease in comparasion to base Year	Increase or decrease in percentage comparasion to base Year
2012-13	10	--	--
2013-14	12	2.00	20%
2014-15	9	(1.00)	(10%)
2015-16	16.5	6.50	65%
2016-17	18.0	8.00	80%

$$\text{Percentage Increase/Decrease taking 2012-13 as base} = \frac{\text{Absolute Increase in any year or decrease}}{\text{Value of Base year}} \times 100$$

For 2013-14 $= \frac{2}{10} \times 100$ or 20% 2014-15 $= \frac{(1.00)}{10} \times 100 = (10\%)$ and so on

Any increase or decrease in the value of each item, as compared to previous year, we cannot draw any conclusion by anaylsing the items of financial statement of trend percentages the change can be understood.

2. Trend Ratio Method : Usually comparison is made with the help of Percentage Trend method. Sometimes trend ratio method may be used for this purpose.

$$\text{Trend Ratio} = \frac{\text{Current year's value of item}}{\text{Base year's value of same item}}$$

In this manner the ratios ascertained are like indices in statistics. On the basis of these data an analyst can analyse and interpret the change in various items.

Illustration 10 :

Calculate trend ratios taking 2012-13 as base for various items of Profit & Loss Account. (in lakh ₹)

Year	2012-13	2013-14	2014-15	2015-16	2016-17
Net Sales	50	52	55	58	65
Purchases of Stock (₹)	25	26	28	30	35
Profit before tax	2	2.5	3	2.5	4

Solution :

(Base Year 2012-13) **Calculation of Trend Ratio** (in lakh ₹)

Year	Net Sales		Purchase of Stock-in-trade		Profit/Loss (Before Tax)	
	Amount ₹	Trend Ratio	Amount ₹	Trend Ratio	Amount ₹	Trend Ratio
2012-13	50	100	25	100	2.0	100
2013-14	52	104	26	104	2.50	125
2014-15	55	110	28	112	3.0	150
2015-16	58	116	30	120	2.5	125
2016-17	65	130	35	140	4.0	200

On the basis of these ratios a financial analyst can measure and analyse the change in the items of Profit & Loss Account.

3. Graphic or Diagrammatic Presentation : The trend can be presented by graph and diagram also. Such presentation is possible for two or more related items. Normally, shareholders of companies since are not the students of commerce. Companies resort to graphic or diagramatic presentation of its progress, so that the shareholders may easily and conveniently understand the progress of the company.

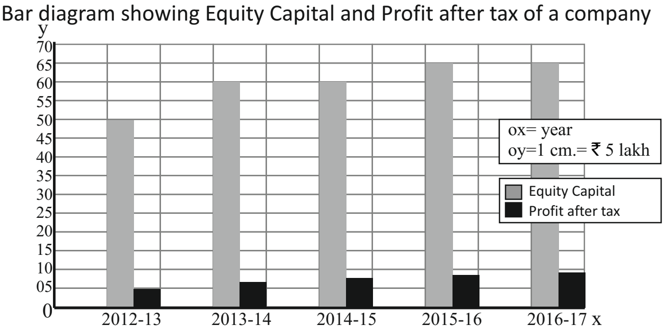
Illustration 11 :

Present the following information of a company regarding equity share capital and profit after tax by preparing bar diagrams and also through graph.

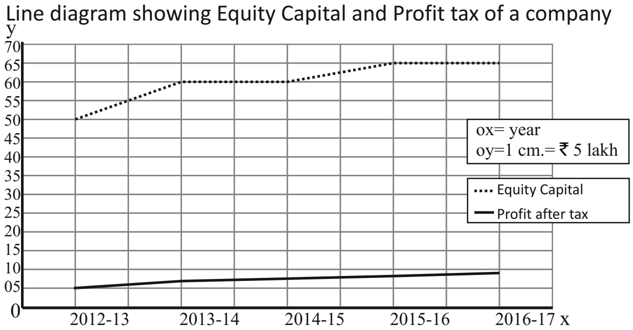
Year	Equity Capital ₹	Profit after Tax ₹
2012-13	50,00,000	5,00,000
2013-14	60,00,000	7,00,000
2014-15	60,00,000	7,50,000
2015-16	65,00,000	8,00,000
2016-17	65,00,000	9,00,000

Solution :

Bar diagram showing Equity Capital and Profit after tax of a company



Line diagram showing Equity Capital and Profit tax of a company



Uses of Trend Analysis

1. Since the data for more than two years are presented, one can easily judge the direction of change.
2. When trend is presented by means of graphs/diagrams, an ordinary person can also know the trend of various items.
3. Presentation of financial statement items in brief is more useful for a layman.

Limitations of Trend Analysis :

While using this method for analysis , the following limitations of the method must be kept in view :-

1. Trend percentages or trend ratios are based on some base year. If base year selected is not a normal year, the results of analysis will be fallacious and wrong.
2. When base year for comparison is not uniform the results of analysis will be contradictory. As such if financial information furnished is not based upon accepted accounting principles or are based on different assumptions, conclusions obtained will be fallacious.
3. Study of trend of one item only is not important, unless for relative comparison trend of other items is not known, so that comparison is made after establishing relationship between them.
4. The study of trend percentages will only reveal absolute and relative change. The test of change in basic data is also vital.

Summary

Financial Statements : Financial statements are the end products of financial accounting, the object of which is to find out financial position of an enterprise on certain data and to obtain the results of activities for certain time period.

A set of Financial Statements : According to section 2(40) of the Companies Act, 2003 financial statements comprise of Balance Sheet, Profit & Loss Account or Income Statement, Accounting Notes, and cash flow statement.

Features of financial Statements : • Summary of Business Activities • Expressed in terms of Money • Prepared on accrual basis • Based on Generally Accepted Accounting Principles • Based on Past

Users of financial Statements :

• **Internal users :** Shareholders, Management, Employees

• **External users :** Banks, Financial Institutions, Debentureholders, Creditors, Future Investors, Government, Researchers, Trade Associations, SEBI etc.

Limitations of Financial Statements : • Based on historical facts • Lack of qualitative information • Lack of comparability • Real position not disclosed • Not unprejudiced • Historical cost or no consideration of changes in price level • Do not consider need of all parties

Financial Analysis : It is the process of establishing relationship between different components of financial statements so that the financial position and performance of an enterprise could be ascertained.

Objectives of Financial analysis : • Assessment operational efficiency • Measurement of profitability

• Assistance in inter-firm and intra-firm comparison • Measurement of liquidity • Assessment of financial soundness • Assessment of business progress • Measuring of trend • Helpful in forecasting.

Limitations of Financial Analysis : (1) It is only a quantitative study (2) Lack generally Accepted Principles (3) Lack of Diagonsis (4) No consideration of price level changes (5) Limitations of financial statements are also the limitations of financial analysis.

Types of financial Analysis : (1) External analysis (2) Internal analysis
(3) Horizontal analysis (4) Vertical analysis

Technique of Financial Analysis :

Comparative Balance Sheet : It is a horizontal analysis under which each and every item of Balance Sheet for more than one year is compared to shwo increase or decrease in absolute as-well-as relative figure and in percentage terms.

Comparative Profit & Loss or Income Statement : It is prepared to compare the change in results of more than one period in absolute figure and in relative percentages.

Common-Size Balance Sheet : In this technique total of assets or liabilities are taken as base (100) and percentages for each item of asset and that of liabilities sides are computed. It is vertical analysis and also called 100% Balance Sheet.

Common-Size Profit & Loss (Income Statement) : Income from business activities i.e. net sales is treated as 100 and percentages for each item of Statement of Profit & Loss are calculated from net sales.

Trend Analysis : Percentages or ratios for different years of an item are calculated taking any one year (usually first)as base to enable comparison for subsequent years. Trend can also be presented in the form of graph or diagram to make comparison easy and simple.

Glossary

- **Horizontal Analysis :** It is the study of change in each item of financial statement.
- **Vertical Analysis :** It is the analysis of the relationship between different components of financial statements.
- **Inter-firm Comparison :** Inter-firm comparison refer to comparison financial statements of two or more firms of the same industry.
- **Intra-firm Comparison :** It refers to comparison of the financial statements data of two or more years of the same firm.
- **Shareholders Fund :** It is fund of shareholders of a Company. It comprises of Share Capital, reserves and surplus, amount receivable against share warrant etc.
- **Non-Current Liabilities :** According to schedule III of Companies Act, 2013, these are long term liabilities e.g. Long term loan, deferred net tax liability, other, long term liabilities and long term prevision etc.
- **Current Liabilities :** According to schedule III of Companies Act, 2013, liabilities which are payable during one operating cycle period are called current liabilities. Sundry creditors, bills payable, short term loans and short term provision etc.
- **Non-Current Assets :** According to schedule III of Companies Act, 2013, it denotes assets which are not current assets i.e. fixed assets. For example, land & building, plant & machinery, furniture, office equipment and loan term investments etc.
- **Tangible Assets :** Those fixed assets which form can be seen and touched, such as office equipment, plant, land & building etc.
- **Intangible Assets :** Those assets which do not have physical form or which can be not seen and cannot be touched goodwill, trademark, patent, knowhow, computer software etc.
- **Current Assets :** According to schedule III of Companies Act, 2013, it refer to such trade items which are realizable within 12 months period or receivable during one financial year. such as, Cash Bank Balance, Short term Investments, Stock of goods, Debtors, B/R. Short term loan, advance etc.

Questions for Exercise

Multiple Choice Questions :

1. Which tool or technique is used for horizontal analysis :
   (A) Balance Sheet (B) Comparative Statements & Trend Analysis
   (C) Common-Size Income Statement (D) Common-Size Balance Sheet
2. In horizontal analysis financial statements of .... according period are necessary :
   (A) Two or more (B) Only one
   (C) (A) and (B) both (D) None of the Above
3. Inter-firm comparison is also called..........
   (A) Time series Analysis (B) Trend Analysis
   (C) Cross sectional Analysis (D) All the Above
4. The most commonly used tools for financial analysis are :
   (A) Ratio Analysis (B) Horizontal Analysis
   (C) Vertical Analysis (D) All the Above
5. In Common-Size Income Statement, various items are presents as a percentage of........
   (A) Revenue from operations (B) Gross Sales
   (C) Net Profit (D) Gross profit
6. Common-Size Balance Sheet is also called........
   (A) Percentage Balance sheet (B) Percentage Income Statement
   (C) Statement of absolute figures (D) None of the above
7. Cost of goods sold =
   (A) Purchase +Direct expenses
   (B) Opening Stock of material+ purchases of material + direct expenses-closing stock of materials
   (C) Opening Stock of material + purchases of material & closing stock of materials
   (D) None of the above
8. The Comparative Balance Sheet persents........changes between each item of balance sheet :
   (A) Relative (B) Absolute
   (C) Absolute & Relative (D) None of the above
9. In Common-Size Balance Sheet, total of equity and liabilities are assumed to be equal to :
   (A) 1 (B) 100 (C) 10 (D) 1000
10. Vertical Analysis is known as :
    (A) Structural Analysis (B) Static Analysis
    (C) Dynamic Analysis (D) None of the above

Very Short Answer Type Questions :

1. Explain the meaning of financial Statement.
2. As per Companies Act, 2013, what are included in a full set of financial statements, write only names.
3. Write any two nature of financial statements.
4. Write any two characteristics of financial statements.
5. Write any two essentials of financial statements.
6. How financial statements are affected by personal judgement.
7. Write any four names of external users of financial statements.

8. Write any four limitations of financial statements.
9. Explain the meaning of financial statements .
10. Write names of types of financial analaysis.
11. Explain four differences between horizontal and vertical anlaysis.
12. What is meant by Comparative Balance Sheet?
13. What is meant by Comparative Income Statement?
14. What is meant by Common-Size Balance Sheet?
15. What is meant by Common-Size Income Statement?
16. What is meant by Trend Analysis?

Short Answer Type Questions :

1. Narrate any four characteristics of financial statements.
2. Write down names of various techniques of financial analysis.
3. Write a format of Comparative Balance Sheet.
4. Prepare Comparative Income Statement from the following informations :

Particulars	Note No.	31 March 2016 ₹	31 March 2017 ₹
Revenue		20,00,000	30,00,000
Other income		4,00,000	3,60,000
Expenses		12,00,000	21,00,000

Ans. : Percentage change 50%, (10%), and 75%

5. From the following information, prepare Common-Size Statement of Profit and Loss.

Particulars	Note No.	31 March 2016 ₹	31 March 2017 ₹
Revenue from operations		20,00,000	36,00,000
Total Expenses		12,00,000	24,00,000
Tax rate		30%	30%

Ans. :

	Percentage of revenue from operations	
	2015-16	**2016-17**
Total Expenses	60%	66.67%
Profit before Tax	40%	33.33%
Profit after Tax	28%	23.33%

6. Calculate trend percentage of revenue from operations from the following information, assume 2010-11 as base

Year	2010-11	2011-12	2012-13	2013-13	2014-15
Net Sales in Laksh (₹)	20	25	28	35	40

Ans. : Trend Percentages 25% , 40%, 75%, 100%

7. Calculate trend ratio of employees benefit expenses from the following information, taking 2011-12 as base.

Year	2011-12	2012-13	2013-14	2014-15	2015-16
Employees related Expenses (₹)	5,00,000	6,00,000	4,50,000	4,00,000	7,00,000

Ans. : Trend Ratios 120, 90, 80, 140

8. Give format of Common-Size Balance Sheet.
9. What do you understand by horizontal and vertical analysis?
10. Is there any conflict between horizontal and vertical analysis?
11. Financial statement analysis is a postmortem of business transactions do you agree.

Ans. Yes, It measures from past information operational efficienty, profitability and financial strength.

12. Which type of financial analysis will be used for inter-firm and intra-firm comparison?

Ans. Horizontal-Intra firm, to or more periods, Vertical- inter-firm for various items oral, single set

13. Time series analysis and static analysis are the an other names of which type of financial analysis.
14. Prepare the format of Comparative Statement of Profit and Loss showing main headings.
15. Prepare Common-Size Balance Sheet from the following Balance Sheet.

Particulars	**31 March 2017 ₹**
I. **EQUITY AND LIABILITIES**	
1. Shareholders' Funds	
(a) Share Capital	15,00,000
2. Current Liabilities	
(a) Trade Payables	5,00,000
Total	**20,00,000**
II. ASSETS	
1. Non-Current Assets	
(a) Fixed Assets (Trangible)	16,00,000
2. Current Assets	
(a) Trade Receivables	4,00,000
Total	**20,00,000**

Ans. :

Share Capital	Current Liabilities	Fixed Assets	Current Assets
75%	25%	80%	20%

16. Prepare Common-Size Balance Sheet from the following Balance Sheet.

Particulars	**31 March 2017 ₹**
I. EQUITY AND LIABILITIES	
1. Shareholders' Funds	
(a) Share Capital :	4,00,000
(b) Reserves and Surplus	2,00,000
2. Non-Current Liabilities	
(a) Long-term Borrowings	1,50,000
3. Current Liabilities	
(a) Short Term Borrowings	1,50,000
(b) Trade Payables	1,00,000
Total	**10,00,000**
II. ASSETS	
1. Non-Current Assets	
(a) Trangible Assets	6,00,000

(b) Intangible Assets		1,00,000
2. Current Assets		
(c) Cash and Cash Equivalents		3,00,000
Total		**10,00,000**

Ans. :

	Share Capital	Reserves and Surplus	LTB	STB	TP	TA	IA	Cash
Percentage Change	40%	20%	15%	15%	10 %	60%	10%	30%

17. Prepare Comparative Balance Sheet from the following information as at 31st March 2017.

Particulars	Note No.	31 March 2017 ₹	31 March 2016 ₹
I. EQUITY AND LIABILITIES			
1. Shareholders' Funds			
(a) Share Capital :			
(i) Equity Share Capital		10,00,000	8,00,000
(b) Reserves and Surplus		4,00,000	3,00,000
2. Non-Current Liabilities			
(a) Long-term Borrowings		6,00,000	5,00,000
3. Current Liabilities			
(a) Trade Payables		5,00,000	4,00,000
Total		**25,00,000**	**20,00,000**
II. ASSETS			
1. Non-Current Assets			
(a) Fixed Assets			
(i) Tangible Assets		16,00,000	13,00,000
(ii) Intangible Assets		1,00,000	1,00,000
2. Current Assets			
(a) Trade Receivables		6,00,000	4,00,000
(b) Cash and Cash Equivalents		2,00,000	2,00,000
Total		**25,00,000**	**20,00,000**

Ans. :

	Share Capital	Reserves and Surplus	LTB	TP	TA	IA	TR	Cash
Percentage Change	25%	33.33%	20%	25%	23.00%	--	50%	--

18. Prepare comparative balance sheet as on 31st March 2017 from the following information.

Particulars	Note No.	31 March 2017 ₹	31 March 2016 ₹
I. EQUITY AND LIABILITIES			
1. Shareholders' Funds			
(a) Share Capital :			
(i) Equity Share Capital		20,00,000	16,00,000

(ii) Preference Share Capital		10,00,000	8,00,000
2. Non-Current Liabilities			
Long-term Borrowings		12,00,000	10,00,000
3. Current Liabilities			
(i) Trade Payables		5,00,000	4,00,000
(ii) Short term provisions		3,00,000	2,00,000
Total		**50,00,000**	**40,00,000**
II. ASSETS			
1. Non-Current Assets			
Fixed Assets		28,00,000	25,00,000
2. Current Assets			
(a) Trade Receivables		12,00,000	10,00,000
(b) Cash and Cash Equivalents		10,00,000	5,00,000
Total		**50,00,000**	**40,00,000**

Ans. :

	ES Cap	PS Cap	LTB	TP	STP	FA	Invest	Cash
Percentage Change	25%	25%	20%	25%	50%	12%	20%	100%

Essay Type Questions :

1. Explain parties interested in financial statements and their utility.
2. Write down limitations of financial statements.
3. Explain objectives of financial analysis.
4. Explain process of financial analysis.
5. Give the format of Common-Size Balance Sheet and Common-Size Statement of Profit and Loss.

Answer of Multiple Choice Questions

Que.	1	2	3	4	5	6	7	8	9	10
Ans.	B	A	C	D	A	A	B	C	B	B

Numerical Questions :

1. From the following Balance Sheets, prepare Comparative Balance Sheet.

Particulars	Note No.	31 March 2016 ₹	31 March 2017 ₹
I. EQUITY AND LIABILITIES			
1. Shareholders' Funds			
(a) Share Capital		15,00,000	20,00,000
2. Non-Current Liabilities			
(a) Long-term Borrowings			
Secured Loan- 10% Debentures		6,00,000	5,00,000
3. Current Liabilities			
(a) Trade Payables		1,00,000	1,20,000
Total		**22,00,000**	**26,20,000**

II. ASSETS			
1. Non-Current Assets			
(a) Fixed Assets			
(i) Tangible Assets		16,00,000	20,00,000
2. Current Assets			
(a) Trade Receivables		4,00,000	3,00,000
(b) Cash and Cash Equivalents		2,00,000	3,20,000
Total		**22,00,000**	**26,20,000**

Ans. :

	Share Capital	10% Debentures	Trade Payables	Tangible Assets	Trade Receivables	Cash and Cash Equivalents
Absolute Change ₹	5,00,000	(1,00,000)	20,000	4,00,000	(1,00,000)	1,20,000
Percentage Change	33.33	(16.67)	20	25	(25)	12

2. Complete the following Comparative Balance Sheet.

Particulars	Note No.	31 March 2016 ₹	31 March 2017 ₹	Absolute Change (Increase/Decrease)	Percentage Change (Increase/Decrease)
1	2	3	4	5	6
I. EQUITY AND LIABILITIES					
1. Shareholders' Funds					
(a) Equity Share Capital		4,00,000	?	1,00,000	25.00
(b) Reserves and Surplus		1,00,000	1,25,000	?	25.00
2. Non-Current Liabilities					
(a) Long-term Borrowings		2,00,000	1,75,000	?	(12.50)
3. Current Liabilities					
(a) Trade Payables		2,00,000	?	1,00,000	50.00
Total		**9,00,000**	**11,00,000**	**2,00,000**	**22.22**
II. ASSETS					
1. Non Current Assets					
(a) Tangible Assets		6,00,000	8,00,000	2,00,000	33.33
(b) Intangible Assets		50,000	?	?	40.00
2. Current Assets					
(a) Trade Receivables		1,00,000	1,50,000	?	50.00
(b) Cash and Cash Equivalents		1,50,000	80,000	(70,000)	(56.67)
Total		**9,00,000**	**11,00,000**	**?**	**22.22**

Ans. : Equity Share Capital : ₹ 5,00,000, Reserves and Surplus- ₹ 25,000, Long-term Borrowings (₹ 25,000), Current Liabilities- ₹ 3,00,000, Intangible Assets - ₹ 70,000 and ₹ 20,000, Trade Receivable- ₹ 50,000, Total of absolute change - ₹ 2,00,000

3. From the following Balance Sheet prepare Comparative Balance Sheet.

Particulars	Note No.	31 March 2016 ₹	31 March 2017 ₹
I. EQUITY AND LIABILITIES			
1. Shareholders' Funds			
(a) Share Capital		10,00,000	1,50,000
(b) Reserves and Surplus		5,00,000	6,00,000
2. Non-Current Liabilities			
(a) Long-term Borrowings		2,00,000	2,25,000
3. Current Liabilities			
(a) Trade Payables		3,00,000	4,00,000
Total		**20,00,000**	**27,25,000**
II. ASSETS			
1. Non-Current Assets			
(a) Fixed Assets (Tangible)		15,00,000	20,00,000
(b) Intangible Assets		1,00,000	3,00,000
2. Current Assets			
(a) Investment		2,00,000	4,00,000
(b) Cash and Cash Equivalents		2,00,000	25,000
Total		**20,00,000**	**27,25,000**

Ans. :

	Share Capital	Reserves and Surplus	LTB	TP	TA	IA	Inv.	Cash
Absolute Change ₹	5,00,000	1,00,000	25,000	1,00,000	5,00,000	2,00,000	2,00,000	(1,75,000)
Percentage Change	50	20	12.5	33.33	33.33	200	100	(87.5)

4. Prepare Comparative Statement of Profit and Loss from the following information.

Particulars	Note No.	31 March 2015 ₹	31 March 2016 ₹
Revenue from Operations		50,00,000	60,00,000
Other Income		4,00,000	5,00,000
Cost of Materials consumed		25,00,000	35,00,000
Other Expenses		3,00,000	7,00,000
Tax Rate		30%	30%

Ans. :

	Total Revenue from Operations	Total Expenses	Profit Before Tax	Profit after Tax
Absolute Change ₹	10,00,000	14,00,000	(3,00,000)	(90,000)
Percentage Change	20	50	(11.54)	(11.54)

5. Complete the Comparative Balance Sheets from the following information.

Particulars	Note No.	31 March 2016 ₹	31 March 2017 ₹	Absolute Change ₹	Percentage Change (%)
1	2	3	4	5	6
I. Revenue from Operations		30,00,000	40,00,000	10,00,000	?
II. Expenses					
(a) Employees benefit expenses		16,00,000	?	6,00,000	37.5
(b) Depreciation and Amortisation Expenses		8,00,000	?	?	25.00
(c) Other Expenses		2,00,000	?	1,00,000	50.00
Total		**26,00,000**	**35,00,000**	**9,00,000**	**34.61**
III. Profit Before Tax (I- II)		4,00,000	?	1,00,000	25.00
IV. Less : Income Tax		1,20,000	1,50,000	30,000	25.00
V. Profit after Tax (III-IV)		**2,80,000**	**3,50,000**	**7,00,000**	**25.00**

Ans. : Employees benefit expenses- ₹ 22,00,000, Depreciation- ₹ 10,00,000, and ₹ 2,00,000, Other Expenses- ₹ 3,00,000, Profit before Tax- ₹ 5,00,000.

6. Prepare Common-Size Balance Sheet from the following information.

Particulars	Note No.	31 March 2017 ₹ x Ltd.	31 March 2017 ₹ y Ltd.
I. EQUITY AND LIABILITIES			
1. Shareholders' Funds			
(a) Share Capital :			
(i) Equity Share Capital		5,00,000	8,00,000
(ii) Preference Share Capital		4,00,000	4,00,000
(b) Reserves and Surplus		2,00,000	3,00,000
2. Non-Current Liabilities			
(a) Long-term Borrowings		3,00,000	4,00,000
3. Current Liabilities			
(a) Short Term Borrowings		2,50,000	2,00,000
(b) Trade Payables		1,00,000	1,50,000
(c) Short-term Provisions		2,50,000	2,50,000
Total		**20,00,000**	**25,00,000**
II. ASSETS			
1. Non Current Assets			
(a) Fixed Assets (Trangible)		12,00,000	18,00,000
2. Current Assets			
(a) Inventories		3,00,000	3,00,000
(b) Trade Receivables		2,00,000	2,25,000
(c) Cash and Cash Equivalents		3,00,000	1,75,000
Total		**20,00,000**	**25,00,000**

Ans. :

Particulars	2016-17 (%)	2016-17 (%)
Equity Share Capital	25	32
Preference Share Capital	20	16
Reserves and Surplus	10	12
Debentures	15	16
Current Liabilities	30	24
	100	**100**
Fixed Assets	60	72
Current Assets	40	28
	100	**100**

7. Complete the Common-Size Balance Sheet.

Particulars	Note No.	Absolute Amount ₹		Percentage of Balance Sheet (%)	
		31 March 2016	31 March 2017	31 March 2016	31 March 2017
I. EQUITY AND LIABILITIES					
1. Shareholders' Funds					
(a) Share Capital :		10,00,000	?	50	48
(b) Reserves and Surplus		3,00,000	4,00,000	15	16
2. Non-Current Liabilities					
(a) Long-term Borrowings		2,00,000	?	10	12
3. Current Liabilities					
(a) Trade Payables (Creditors)		5,00,000	?	25	24
Total		**20,00,000**	**25,00,000**	**100**	**100**
II. ASSETS					
1. Non Current Assets					
(a) Fixed Assets (Tangible)		16,00,000	?	80	72
2. Current Assets					
(a) Cash and Cash Equivalents		4,00,000	?	20	28
Total		**20,00,000**	**?**	**100**	**100**

Ans. : Share Capital- ₹ 12,00,000, Long - term Borrowings - ₹ 3,00,000, Trade Payables (Creditors) - ₹ 6,00,000, Fixed Assets- ₹ 18,00,000, Cash ₹ 7,00,000,

8. Convert the following statement of Profit and Loss to Common-Size Statement of Profit and Loss.

Particulars	Note No.	31 March 2016 ₹	31 March 2017 ₹
Income	1		
I. Income Revenue from Operations		20,00,000	30,00,000
II. Other Income		1,00,000	2,00,000
III. Total Revenue (I + II)		**21,00,000**	**32,00,000**
IV. Expenses			
(a) Purchases of Stock in Trade		12,00,000	6,00,000
(b) Change in Inventories of finished Goods, Work-in- progress and Stock-in-Trade		3,00,000	4,00,000

(c) Employees Benefit Expenses		1,00,000	2,00,000
(d) Other Expenses	2	2,00,000	4,00,000
Total Expenses		**18,00,000**	**26,00,000**
V. Profit Before Tax (III - IV)		3,00,000	6,00,000
VI. Less : Income Tax 30%		90,0000	1,80,000
VII. Profit after Tax (V-VI)		**2,10,000**	**4,20,000**

Notes to the Accounts :

Particulars	Note No.	31 March 2016 ₹	31 March 2017 ₹
Revenue from Operations (Sales)	1	21,00,000	30,75,000
Less : Returns		1,00,000	75,000
		20,00,000	**30,00,000**
Other Expenses	2		
(a) Administrative Expenses		1,20,000	2,50,000
(b) Miscellaneous Expenses (Non Operative)		80,000	1,50,000
		2,00,000	**4,00,000**

Ans. :

	Other income	Purchases	Inventoried	employees exp.	other exp.	N.P. before tax	N.P. After tax
31 st March 2016 (%)	5.00	60.00	15.00	5.00	10.00	15.00	10.50
31 st March 2017 (%)	6.67	53.34	13.33	6.67	13.33	20.00	14.00

9. From the following information, calculate trend ratios of various items of Profit and Loss Account, taking as base 2012-13.

Year	2012 -13	2013 - 14	2014 - 15	2015 - 16	2016 - 17
Total Revenue ₹	10,00,000	11,00,000	12,00,000	15,00,000	18,00,000
Total Expenses ₹	8,00,000	8,00,000	9,00,000	10,00,000	12,00,000
Profit before Tax ₹	2,00,000	3,00,000	3,00,000	5,00,000	6,00,000

Ans. : Trend Ratios :

	2012-13	**2013-14**	**2013-14**	**2014-15**	**2016-17**
Total Revenue	100.00	110.00	120.00	150.00	180.00
Total Exp.	100.00	100.00	112.50	125.00	150.00
N. P. before Tax	100.00	150.00	150.00	250.00	300.00

10. Calculate Trend Percentages from the following information, taking base 2012-13.

	2012-13	**2013-14**	**2014-15**	**2015-16**	**2016-17**
Total Revenue ₹	12,00,000	18,00,000	20,00,000	24,00,000	28,00,000
Total Expenses ₹	8,00,000	10,00,000	15,00,000	18,00,000	22,00,000

Ans. :

	2012-13	2013-14	2014-15	2015-16	2016-17
Trend Percentage of Total Revenue	--	50	66.67	100	133.33
Trend Percentage of Total Expenses	--	25	87.50	125	175.00

11. Calculate Trend ratios from the following figures taking the year ending 31 March, 2012 as base.

Year	31 March 2012	31 March 2013	31 March 2014	31 March 2015	31 March 2016
Net Sales ₹	5,00,000	8,00,000	10,00,000	12,00,000	15,00,000
Total Expenses ₹	3,00,000	4,50,000	6,50,000	7,50,000	10,00,000
Net Profit Before Tax ₹	2,00,000	3,50,000	3,50,000	4,50,000	5,00,000

Ans. :

Year	31 March 2012	31 March 2013	31 March 2014	31 March 2015	31 March 2016
Total Sales	100	160	200	240	300
Total Expenses	100	150	216.67	250	333.33
Net Profit Before Tax	100	170	175	225	250

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11

Ratio Analysis

Learning objectives :

The study of this chapter would enable you to understand :

- Meaning of ratio analysis
- Meaning of ratio and its expression
- Objectives of ratio analysis
- Limitation of ratio analysis
- Precaution in using ratios
- Classification of ratios
  - Liquidity ratios
  - Solvency ratios
  - Activity ratios
  - Profitability ratios
  - Investment analysis ratios

Ratio Analysis

Each item in financial statement is significant in itself till its relation is established with some other item. Figures are important only when their relationship is established with other relevant figures. For example: when profit is related with sales or capital, it indicates whether profit is sufficient or not. Ratio analysis is a method of presenting items or group of items of financial statements, establishing relationship between the items in simple and brief-manner.

Meaning of Ratio : The arithmetical expression of relationship between two numbers is called ratio.

Hunt, William and Donalson-"Ratios are simply a means of highlighting in arithmetical terms the relationship between figures drawn from financial statements."

R.N Anthony-"A ratio is simply one number expressed in terms of another. It is found by dividing one number into the other.'

Expression of Ratio : Normally Ratios can be expressed in the following three forms :

1. **As a pure proportion :** In this method, relationship of two items is directly expressed in proportion. This relationship is obtained by simple division of one number by another. For example, in a business if current assets are ₹100,000 and current liabilities are ₹ 50,000, the ratio between current assets and current liabilities will be ₹ 100,000 ÷ ₹ 50,000 = 2 or say 2:1.
2. **As a rate :** In this method, a quotient is calculated by dividing one figure with another figure, on a certain date or for a period. For example, credit sales made for a year by a businessman is ₹ 500,000 and average debtors during this period were ₹ 100,000, then debtors turnover ratio will be ₹ 500,000 / ₹ 100,000 = 5 or say credit sales are 5 times of average debtors.

3. **As a Percentage :** In this method, the relationship between two items is expressed in percentage. For example, a trader earned a net profit of ₹ 60,000 on sales of ₹ 3,00,000 during a year, then his net profit on sales will be (60,000 × 100 / 3,00,000) = 20%.

Objectives of Ratio Analysis :

Ratio analysis plays a significant role in financial analysis of a concern. By making financial analysis based on ratios we can know about progress or decadence and financial position of a concern. Various parties interested in ratio analysis are : Shareholders, loan providers, suppliers, employees, bank and government. Various objectives of ratio analysis are as follows :

1. **Helpful in financial analysis :** Financial condition of a business concern can be analysed easily with the help of ratios. Ratio analysis based on Balance Sheet and Statement of Profit & Loss provides complete knowledge to investors, banks, loan providers about the concern.
2. **Simplifies Figures :** Ratio analysis converted complex figures into simple and brief data so that they become intelligible.
3. **Knowledge of Liquidity :** Conclusions can be drawn about the liquidity position of a concern with the help of ratio analysis. Liquidity position of a concern is said to be good, if it is capable to meet its current obligations. Liquidity ratios are useful to bank etc.
4. **Knowledge of Long Term Solvency :** Ratio analysis is useful in evaluating the long term solvency along with liquidity position of the concern. This reveals the financial soundness or weakness of the firm. Debt-equity ratio and capital structure ratios are useful for this purpose.
5. **Knowledge of Activity :** Operating efficiency of a concern can be evaluated with the comparative study of current ratios with previous ratios. Various activity ratios like stock turnover ratio, Debtor turnover ratio, Assets turnover ratio etc. measure the efficiency of the concern.
6. **Knowledge of Profitability :** Absolute amount of profit revealed by profit & loss statement is not more important unless its relation is being established with sale or capital invested in the concern. This relation is called profitability. So, accounting ratios are useful to measure the profitability.
7. **Help in Comparison :** On the basis of ratio analysis a firm can be compared with other firm or ratio of a period can be compared with the same ratio of other period. This can provide information about efficiency easily.
8. **Help in Trend analysis :** By the study of different ratios of many years, financial position of the concern can be measured, or say it comes to be known whether firm is improving or deteriorating over years.

Lmitations of Ratio Analysis :

Ratio analysis is a useful tool of financial analysis of a business concern, on the other hand ratio analysis has some limitations also. Therefore, the analyst should keep in view the imitation, of this. These limitations are as follows:

1. **Inherent limitations of accounting** : Ratio are calculated on the basis of financial statements. Financial statements are based on different conventions, concepts of accounting and personal judgments. Therefore, the weakness in the financial statements will also have an impact on ratios. As a result ratio analysis would be misleading.
2. **Affected by window dressing :** Financial statements are affected by window dressing, For example: write off less depreciation than actual depreciation, over stated the closing stock, It is done to show financial position better and to show higher quantum of profits. Therefore, the results of ratio analysis would be wrong.
3. **Comparison based on different accounting policies :** If different accounting policies are followed by a firm in two different periods or by two different firms, in such a case inter period comparison or inter firm comparison will be unbelievable. Therefore, result from comparison of financial statements of such firms will provide misleading informations.
4. **Effect of personal ability and bias of the Analyst :** Conclusions drawn on the basis of ratio analysis are affected by personal ability and bias of the analyst. If the analyst is biased in calculating ratios, the conclusions will also be misleading.

5. **Lack of qualitative analysis :** All monetary transactions are recorded in financial accounting. Ratios are calculated on the basis of financial information revealed in these financial statements. So, ratio analysis express quantitative aspects not qualitative aspects. In ratio analysis no attention is paid towards qualitative factors like-loyalty of managers, goodwill of business, & workers satisfaction etc.
6. **To Comparison other ratios required :** On the basis of a single ratio, neither any comparison can be made, nor any decision can be taken. Hence, it is essential to pay attention over all relating ratios while drawing conclusions, for a good analysis.
7. **Unable to future projections :** Ratio analysis is made on the basis of information obtained from historical accounts, which are based on transaction and events of past. Therefore, inferences drawn from ratio analysis cannot be used in estimate for future.
8. **Lack of knowledge about trend :** Analysis, based on financial statements of a specific year cannot be reliable. It cannot provide knowledge about progress or decline. To find out trend of profitability etc., it is essential that inference should be based on financial statements of many years.

Precautions in using ratios :

Today, ratio analysis is widely used in business world, with the help of it, conclusions about different aspects can be drawn. Deposit this, if ratios are used carelessly, there is a possibility of misleading conclusions and a danger of superfluous situation. Therefore, following precautions should be taken into consideration, while using ratios:-

1. The user must be capable to understand accounting data, then he can draw correct inference with the use of appropriate ratio.
2. To calculate ratios timely, it is essential to provide information timely to the users immediately after preparation of financial statements. The utility and importance of information ends if these are not provided timely to the users.
3. There is a cost, in the way of time and labour, of calculating ratios along with benefits derived from ratios. Ratios should be used until the benefits derived are more than the cost incurred.
4. Only those ratios should be presented before the users which are concerned, so that he can draw speedy correct conclusions.
5. Due to changing scenario, use and scope of ratios are also changed. Therefore, ratios should be properly revised as per changing business conditions.

Classification of Ratios :

(A) Structural Classification :

Basis of structural classification is financial statements-balance sheet and statement of profit and loss of the firm. So these ratios are calculates on the basis of information given in the financial statements. On this basis, ratios are grouped as follows:

1. **Balance Sheet Ratios :** These ratios are called financial ratios. These ratios are calculated between two items or group of items appearing in the balance sheet. Such ratios are- Current ratio, Liquid ratio, Debt-equity ratio, Proprietary ratio and Capital gearing ratio etc.
2. **Statement of Profit and Loss Ratios :** These ratios are called Income statement ratios or Operating ratios also. These ratios are calculated between two items or group of items appearing in the statement of Profit & Loss. Such important ratios are- Gross Profit Ratio, Net Profit Ratio, operating Ratio, ratio of each item of expenses with sales, and Inventory Turnover Ratio etc.
3. **Combined Ratio :** If one Item is drawn from balance sheet and other from statement of profit and loss the ratios calculate such are called combined ratios. Some important ratios are – Return on Capital employed, Return on total assets, Total assets turnover ratio, Average collection period and Earning per share etc.

(B) Functional Classification :

When ratios are grouped on the basis of the needs of the different parties having interest in the business concern such as- banks and financial institutions have interest in the short term liquidity, debenture holders in the long term solvency, investors in profitability of the firm. Therefore, the ratios may be grouped as follows keeping in view, objectives of different parties.

1. **Liquidity Ratios :** Liquidity means, ability of a firm to meet out its current obligations. Liquidity ratios provide knowledge of short term solvency of a concern. These ratios express that the firm is in the position to repay its current obligations by its short term assets or not. Following ratios are calculated to know the liquidity.
   (i) Current Ratio
   (ii) Liquid or Quick Ratio
   (iii) Absolute Liquidity Ratio
2. **Solvency Ratios :** The Solvency ratios show long term solvency position of a concern. These ratios are called Capital structure or Leverage Ratios, also. These ratios enable to know how much money is invested by owners in the firm and how much money is taken from loan providers. Following ratios are calculated to get knowledge about solvency.
   (i) Debt – Equity Ratio
   (ii) Proprietary Ratio
   (iii)Solvency or Debt to total assets Ratio
   (iv) Interest Coverage Ratio
   (v) Capital gearing Ratio
3. **Activity Ratios :** These ratios give us knowledge that capital and assets are used efficiently or not. Higher turnover ratio is an indicator of efficiently utilization of resources, results consequently in an increase in profit. Following ratios are calculated to get knowledge about activity of business.
   (i) Stock Turnover Ratio
   (ii) Trade Receivables Turnover Ratio
   (iii) Average Collection Period
   (iv) Trade Payables Turnover Ratio
   (v) Average Payment Period
   (vi) Total Assets Turnover Ratio
4. **Profitability Ratios :** Profitability means profit earning capacity of the concern, which is measured in relation to sales or investments. The ratios, which help in measurement of the profitability of the organization, are called profitability ratios. These ratios are calculated to get information about profitability.
   (i) Gross Profit Ratio
   (ii) Operating Ratio
   (iii) Operating Profit Ratio
   (iv) Net Profit Ratio
   (v) Return on Investment or ROI
   (vi) Return on Proprietor's Fund
5. **Investment Analysis Ratios :** These ratios are helpful to the shareholders in analyzing the perspective investment in the company. Following ratios analyse the activity of investments.
   (i) Earning Per Share
   (ii) Dividend Per Share
   (iii) Dividend Payout Ratio

LIQUIDITY RATIOS

(i) Current Ratio : Current ratio defines the relationship between current assets and current liabilities of a concern. It is also called 'Working Capital Ratio'.

$$\text{Current Ratio} = \frac{\text{Current Assets}}{\text{Current Liabilities}}$$

Main components of current ratio are current assets and current liabilities.

Current Assets are those assets which can be converted into cash in ordinary course of business, in normal operating cycle or within twelve months after the date of balance Sheet.

Current Liabilities are those liabilities which are to be paid in normal operating cycle or within twelve months from the date of balance sheet.

Following assets are included in current assets :

(i) Current Investments

(ii) Inventories/Stock [Raw material, Finished goods]

(iii) Trade Receivables [Sundry Debtors + B/R- Provision for doubtful debts]

(iv) Cash and Cash Equivalents [Cash, cheques, drafts in hand and cash at bank]

(v) Short Term Loans and Advances

(vi) Other Current Assets [Prepaid expenses, Accrued income. Advance payments & Advance Tax etc.]

Current Liabilities include the following liabilities :

(i) Short Term Borrowings [Loan payable on demand, Bank overdraft, Deposits and Loans and Advances]

(ii) Trade payables [Sundry creditors and Bills Payable]

(iii) Other Current Liabilities [Current maturity of long term debts, Interest accrued on borrowings, Income received in advance, unpaid dividend, outstanding expenses, calls in advance, unclaimed dividend etc.]

(iv) Short Term Provisions [Provision for employees benefits, provision for tax and proposed dividend etc.]

Importance : Current ratio reflects that for every ₹ 1 worth of current liabilities, how much current assets are there. As high the current ratio will be, the security of short term creditors will also be accordingly high. Generally, a current ratio of 2:1 is considered ideal. If, current ratio is higher than 2:1, it is not considered good from the management's point of view. In such a case (i) increase in the stock of the firm treated as unproductive use of money, (ii) Poor collection from debtors, (iii) Poor investment policy and funds are idle in banks. If current ratio is below 2: 1, it reveals the crunch for working Capital in the firm or say the firm has not sufficient resources to meet out current obligations.

Current ratio is quantitative indicator of liquidity position not qualitative. It is calculated on the basis of quantum of current assets. It is possible that a firm has more quantum of current assets than its current liabilities, but major of current assets are idle, in such a case there will not be sufficient funds to pay current liabilities of the firm. Therefore, to measure liquidity position of a business enterprise, this ratio cannot be believed alone.

Illustration 1 :

From the following calculate Current Ratio : Total Assets ₹ 2,00,000; Non-current Assets ₹ 110,000; Shareholders' funds ₹ 1,25, 000; Non-current liabilities ₹ 30,000

Solution :

$$\text{Current Ratio} = \frac{\text{Current Assets}}{\text{Current Liabilities}} = \frac{90000}{45000} = 2:1$$

Current Assets = Total Assets – Non-current Assets

= ₹ 2,00,000 – ₹ 110,000 = ₹ 90,000

Current Liabilities = Total Assets – Shareholders' fund – Non-current liabilities

= ₹ 2,00,000 – ₹ 1,25, 000 – ₹ 30,000 = ₹ 45,000

(ii) Liquid or Quick Ratio : Liquid ratio is calculated to measure of instant paying capacity of the firm. It is also called Quick ratio or Acid test ratio. Liquid ratio reveals the relationship between liquid assets and current liabilities of the concern. Computation formula is :

$$\text{Liquid Ratio} = \frac{\text{Liquid Assets}}{\text{Current Liabilities}}$$

Liquid Assets means those assets which can be converted into cash or cash equivalents promptly. Therefore, liquid assets include all current assets excluding stock and prepaid expenses. These items cannot be easily converted into cash, so these are excluded. Following assets are included in liquid assets:

(i) Current Investments

(ii) Trade Receivables [Debtors + B/R – Provision for Doubtful debts]

(iii) Cash and Cash Equivalents (iv) Short term loans and advances.

Importance : Liquid ratio is considered superior than current ratio in evaluating the liquidity position of the firm because to calculate this ratio, only those assets are included which are liquid. 1:1 is considered as an ideal ratio. The ratio more than 1:1 is considered good but on the other hand, if the ratio is less than 1:1 then it means the firm has to arranged additional funds to repay its current obligations.

Difference between Current Ratio and Quick Ratio

1. **Relationship :** Current ratio reveals the relationship between current assets and current liabilities, whereas quick ratio reveals the relationship between liquid assets and current liabilities.
2. **Objectives :** The purpose of current ratio is to check the ability of firm, whether it can pay its current obligations in a year or not, while the purpose of liquid ratio is to check, whether firm can pay its current obligation immediate or within one month or not.
3. **Ideal Ratio :** Ideal current ratios 2:1. Whereas ideal liquid ratio is 1:1
4. **Actual position :** Current ratio does not depict actual liquidity position of the firm because current assets include stock and prepaid expenses. Current ratio will be higher, if the amount of stock and prepaid expenses is too much whereas liquid ratio depicts actual liquidity position since it does not include stock and prepaid expenses in liquid assets for calculation.

Illustration 2 :

The Balance Sheet of Naresh Ltd. as at 31st March, 2017 is as follows :

Particulars	Note No.	Current Year ₹	Previous Year ₹
I. EQUITY AND LIABILITIES			
1. Shareholders' Funds		1,20,000	
2. Non-Current Liabilities			
(a) Long-term Borrowings (Debentures)		50,000	
3. Current Liabilities			
(a) Trade Payables		25,000	
(b) Short term provisions (Taxation)		5,000	
Total		**2,00,000**	
II. Assets			
1. Non current Assets			
(a) Fixed Assets		1,35,000	
2. Current Assets			
(a) Inventories		30,000	
(b) Trade Receivables		15,000	
(c) Cash and Cash Equivalents		17,500	
(d) Other current assets (Prepaid expenses)		2,500	
Total		**2,00,000**	

From the above information, calculate (a) Current Ratio (b) Liquid Ratio

Solution:

(a) Current Ratio $= \dfrac{\text{Current Assets}}{\text{Current Liabilities}} = \dfrac{\text{₹}\,65,000}{\text{₹}\,30,000} = 2.17:1$

Current Assets = Inventories + Trade Receivables + Cash & Cash equivalents + Other Current Assets (Prepaid expenses)

= ₹ 30,000 + ₹ 15,000 + ₹ 17,500 + ₹ 2500 = 65,000

Current Liabilities = Trade Payables + Short term Provisions = ₹ 25,000 + ₹ 5000 = ₹ 30,000

(b) Liquid Ratio $= \dfrac{\text{Liquid Assets}}{\text{Current Liabilities}} = \dfrac{\text{₹}\,32,500}{\text{₹}\,30,000} = 1.08:1$

Liquid Assets = Current Assets – Inventories – Prepaid Expenses

= ₹ 65,000 – ₹ 30,000 – ₹ 2,500 = ₹ 32,500

Illustration 3 :

From the following information of X Ltd. find out liquidity ratios :

	₹			₹
Long Term Debts	5,60,000	Goodwill		2,00,000
Short Term Debts (Bank Overdraft)	50,000	Tangible Fixed Assets		12,00,000
Short Term Provisions :		Trade Investments		5,00,000
Proposed Dividend	30,000	Marketable Securities		80,000
Provision for Tax	80,000	Inventories		7,80,000
Advance Income Tax	60,000	Debtors	4,00,000	
Trade Paybles	2,40,000	Less : Provision for D/D	40,000	3,60,000
Rent Payable	20,000	Cash and Cash Equivalents		1,60,000
Dividend Payable	60,000			

Solution:

Liquid Ratios are :

(a) Current Ratio $= \dfrac{\text{Current Assets}}{\text{Current Liabilities}} = \dfrac{\text{₹}\,14,40,000}{\text{₹}\,4,80,000} = 3:1$

Current Assets = Marketable securities + Inventories + Debtors – Provision for D/D + Cash and Cash Equivalents + Advance Income Tax

= ₹ 80,000 + ₹ 7,80,000 + ₹ 4,00,000 - ₹ 40,000 + ₹ 1,60,000 + ₹ 60,000 = ₹ 14,40, 000

Current Liabilities = Bank overdraft + Proposed dividend + Provision for tax + Trade Payables + Rent Payable + Dividend payable =

₹ 50,000 + ₹ 30,000 + ₹ 80, 000 + ₹ 240, 000 + ₹ 20, 000 + ₹ 60, 000 = ₹ 4,80,000

(b) Quick/Liquid Ratio $= \dfrac{\text{Liquid Assets}}{\text{Current Liabilities}} = \dfrac{\text{₹}\,6,00,000}{\text{₹}\,4,80,000} = 1.25:1$

Quick Assets = Current Assets – Inventories – Advance Income tax

₹ 14,40,000 – ₹ 7,80, 000 – ₹ 60,000 = ₹ 6,00,000

Working Notes :

(1) Trade Investment is non-current assets.

(2) Provision for doubtful debts has been deducted from debtors.

Illustration 4 :

Calculate Current Ratio and Quick Ratio in following conditions :

(A) Current Assets ₹2,00,000; Stock ₹ 1,00, 000; Working Capital ₹ 1,20,000.

(B) Liquid Assets ₹ 1,00,000; Stock ₹ 15,000; Prepaid expenses ₹ 5000; Working Capital ₹ 64,000.

(C) Current Liabilities ₹ 1,00,000; Creditors ₹ 10,000; Stock ₹ 1,00,000; Working Capital ₹ 3,00,000.

Solution :

It is necessary to know the relationship between current assets, current liabilities and working capital, before we solve these questions.

Working Capital = Current Assets – Current Liabilities

Current Assets = Working Capital + Current Liabilities

Current Liabilities = Current Assets – Working Capital

(A) (i) Current Ratio $= \dfrac{\text{Current Assets}}{\text{Current Liabilities}} = \dfrac{₹\,2,00,000}{₹\,80,000} = 2.5:1$

Current Liabilities = Current Assets – Working Capital = ₹ 2,00,000 – ₹ 1,20,000 = ₹ 80,000

(ii) Quick Ratio $= \dfrac{\text{Liquid Assets}}{\text{Current Liabilities}} = \dfrac{₹\,2,00,000 - 1,00,000}{₹\,80,000}$

$= \dfrac{1,00,000}{₹\,80,000} = 1.25:1$

(B) (i) Current Ratio $= \dfrac{\text{Current Assets}}{\text{Current Liabilities}} = \dfrac{₹\,1,20,000}{₹\,56,000} = 2.14:1$

(ii) Quick Ratio $= \dfrac{\text{Liquid Assets}}{\text{Current Liabilities}} = \dfrac{₹\,1,00,000}{₹\,56,000} = 1.79:1$

Current Assets = Liquid Assets + Stock + Prepaid expenses

= ₹ 1,00,000 + ₹ 15,000 + ₹ 5000 = ₹ 1,20,000

Current liabilities = Current Assets – working Capital

= ₹ 1,20,000 - ₹ 64,000 = ₹ 56,000

(C) (i) Current Ratio $= \dfrac{\text{Current Assets}}{\text{Current Liabilities}} = \dfrac{₹\,4,00,000}{₹\,1,00,000} = 4:1$

(ii) Quick Ratio $= \dfrac{\text{Liquid Assets}}{\text{Current Liabilities}} = \dfrac{₹\,3,00,000}{₹\,1,00,000} = 3:1$

Current Assets = Working Capital + Current Liabilities

= ₹ 3,00,000 + ₹ 1,00,000 = ₹ 4,00,000

Liquid Assets = Current Assets – Stock

= ₹ 4,00,000 - ₹ 1,00,000 = ₹ 3,00,000

Illustration 5 :

(A) If current Ratio is 2 : 5 times and current liabilities are ₹ 80,000, find out current assets.

(B) Calculate current Liabilities, if current assets are ₹ 5,00,000 and current ratio is 2 times.

Solution :

As we know, current Ratio $= \dfrac{\text{Current Assets}}{\text{Current Liabilities}}$

(A) Current Assets = Current Liabilities x Current Ratio = ₹ 80,000 x 2.5 = ₹ 2,00,000.

(B) Current Liabilities $= \dfrac{\text{Current Assets}}{\text{Current Ratio}} = \dfrac{₹\,5,00,000}{2} = ₹\,2,50,000$

Solvency Ratios

(i) Debt-Equity Ratio : Debt-equity ratio indicates the relationship between external equity and internal equity. This ratio indicates how much more short term and long term loan funds have been received by the institution than it Shareholders funds. This ratio is found out to check soundness of long term financial policies of the institution.

$$\text{Debt - equity Ratio} = \frac{\text{External Equities}}{\text{Internal Equities}} \quad \text{or} \quad \frac{\text{Total Debt}}{\text{Shareholder's fund/Networth}}$$

External Equity means total of Long term borrowings, long term provisions and current liabilities.

External Equities = Debentures + Bonds + Mortgage Loan + Bank Loan + Loan from financial institutions + Public Deposits + Long term Provisions + ST Loan + Trade Payables + ST Provisions.

Shareholders' Funds include share Capital and Reserves & Surplus.

Shareholders' Funds = Equity Share Capital + Preference Share Capital + Capital Reserve + Securities Premium + General Reserve + Redemption Reserve + Other Reserve - (Accumulated Loss + Fictitious Assets)

Fictitious Assets : Expenses on issue of shares and debentures, Discount/Loss on issue of debentures etc.

When, accumulated loss and fictitious assets are subtracted from shareholders funds, the balance is called 'Net Worth'. It is also called Equity, Internal Equity or owner's Equity.

Importance : This ratio finds out to know repayment capacity of long term loans by the company. A law ratio provides sufficient safety to long term creditors and a high ratio indicates risky financial position of long term loans of the firm, but high debt equity ratio is favourable to equity shareholders, if earning rate is greater than the rate of interest.

Note : A few scholars are in favour to include only long term debt as debt. In that case debt equity ratio will be:

$$\text{Debt - Equity Ratio} = \frac{\text{Debt}}{\text{Shareholder funds}} = \frac{\text{Long Term Debt}}{\text{Shareholders funds}}$$

Illustration 6 :

Calculate 'Debt-Equity Ratio' from the following information :

	₹		₹
Equity Share Capital	2, 50, 000	8% Debentures	6,00,000
9% Preference Share Capital	1, 50, 000	Bank Loan	2,00,000
General Reserve	80, 000	Creditors	30,000
Securities Premium	70, 000	Bills Payable	20,000
Balance of Statement of P & L	1, 00, 000		

Solution :

$$\text{Debt - Equity Ratio} = \frac{\text{External Equities}}{\text{Internal Equities}} = \frac{₹\,8,50,000}{₹\,6,50,000} = 1.31 : 1$$

External Equities = 8% Debentures + Bank Loan + Creditors + B/P =
₹ 6,00,000 + 2,00,000 + 30,000 + 20,000 = 8,50,000

Internal Equities = Equity Share Capital + Preference Share Capital + General Reserve + Securities Premium + Balance of P & L
= ₹ 2,50,000 + 1,50,000 + 80,000 + 70,000 + 1,00,000 = 6,50,000.

If the debt equity ratio is calculated on the basis of long term loans then,

$$\text{Debt - equity ratio} = \frac{\text{Long Term Debt}}{\text{Shareholders funds}} = \frac{₹\,8,00,000}{₹\,6,50,000} = 1.23 : 1$$

Long Term Debt = ₹ 6, 00, 000 + 2,00,000 = 8,00,000.

Illustration 7 :

From the following information, Calculate 'Debt-Equity Ratio' (based on long term debt):

Total External Liabilities	₹ 3,00,000
Total of Balance Sheet	₹ 8,00,000
Current Liabilities	₹ 50,000

Solution :

$$\text{Debt-Equity Ratio} = \frac{\text{Long Term Debt}}{\text{Shareholders Funds}} = \frac{₹\,2,50,000}{₹\,5,00,000} = 0.5:1$$

Shareholders' Funds = Total of B/S – Total External Liabilities = ₹ 8,00,000 – ₹ 3,00, 000 = ₹ 5,00, 000

Long Term Debt = Total External Liabilities – Current Liabilities = ₹ 3,00,000 – ₹ 50,000 = ₹ 2,50,000

(ii) Proprietary Ratio : This ratio depicts the relationship between proprietor's fund and total assets. This ratio measures to what extent shareholders' funds are invested in financing the total assets of the firm.

$$\text{Proprietary Ratio} = \frac{\text{Proprietor's funds or shareholders funds}}{\text{Total Assets}}$$

Total Assets : Non-Current Assets (Tangible Assets + Intangible Assets + Non-Current Investments + Long Term Loans and Advances) + Current Assets.

Importance : The higher the ratio the better it will be. It indicates sound financial position or say more proprietors' funds are invested in the concern. The lower the ratio the greater is the risk to creditors.

(iii) Solvency Ratio : This ratio depicts the relationship between total external liabilities and total assets of the firm. This ratio shows long term solvency position of the firm. If, proprietary ratio is subtracted from 1 then we will get solvency ratio.

$$\text{Solvency Ratio} = \frac{\text{Total Debts}}{\text{Total Assets}}$$

Total Debt = Debentures + Bonds + Mortgage Loan + Bank Loan + Loan from financial institution + Public Deposits + Long Term Provisions + Short Term Loans + Trade Payables + Short term provisions.

Importance : This ratio exhibits to what extent total loans (Long term and short term) of the firm are secured by total assets, if total assets are more than external liabilities, then more securities will be available to loan providers/creditors. On contrary to this, total assets are less than external liabilities, it is risky financial position.

Illustration 8 :

From the following information, calculate

(i) Debt-Equity Ratio

(ii) Proprietary Ratio

(iii) Solvency Ratio

Long Term Borrowing ₹ 50,000; Long Term Provisions ₹ 75,000; Current Liabilities ₹ 37,500; Non-Current Assets ₹ 2,70,000; Current Assets ₹ 67,500

Solution :

(1) $$\text{Debt-Equity Ratio} = \frac{\text{External equities}}{\text{Internal equities}} \text{ or } \frac{\text{Total Debt}}{\text{Shareholders' fund}} = \frac{₹\,1,62,500}{₹\,1,75,000} = 0.93:1$$

Total Debt = Long Term borrowing + LT Provision + Current liabilities =

= ₹ 50,000 + ₹ 75,000 + ₹ 37,500 = ₹ 1,62,500

Shareholders' Funds = Non-Current assets+Current assets–Total debt = ₹ 270000 + 67500–162500 = 175000

(2) Proprietary Ratio = Proprietor's funds or Shareholders' fund

= Total Assets Total Assets

$$= \frac{₹\,1,75,000}{₹\,3,37,500} = 0.52:1$$

Total Assets = Non-Current Assets + Current Assets = ₹ 270000 + ₹ 675000 = ₹ 3,37,500

(3) Solvency Ratio = $\frac{\text{Total Debt}}{\text{Total Assets}}$ = $\frac{₹\,1,62,500}{₹\,3,37,500}$ = 0.48 : 1

Or Solvency Ratio = 1 – Proprietary Ratio = 1- 0.52 = 0.48

Illustration 9 :

From the following information of Rajani Ltd. calculate (a) Debt-Equity Ratio (b) Proprietary Ratio (c) Solvency Ratio

	₹		₹
Equity Share Capital	₹ 1800 000	Current Liabilities	4,00,000
General Reserve	10,50,000	Goodwill	5,00,000
Balance of Statements of P & L (Loss)	1,50,000	Other Non-Current Assets	25,00,000
8% Debentures	11,00,000	Current Assets	20,00,000
Loan from Bank of India	8,00,000		

Solution :

(a) Debt-Equity Ratio = $\frac{\text{Total Debt}}{\text{Shareholders' funds}}$ = $\frac{₹\,23,00,000}{₹\,27,00,000}$ = 0.85 : 1

Total Debt = [8% Debentures + Loan from BOI] + Current Liabilities

= [₹ 11,00,000 + ₹ 8,00,000] + ₹ 4,00,000 = ₹ 23,00,000

Shareholders' funds = Equity Share Capital + Gen. Reserve + Balance of P & L

= ₹ 18,00,000 + ₹ 10,50,000 + (-₹ 150,000) = ₹ 27,00,000

If Debt-equity ratio is calculated solely on the basis of long term loans then :

Debt-Equity Ratio = $\frac{\text{Long Term Debt}}{\text{Shareholders' funds}}$ = $\frac{₹\,19,00,000}{₹\,27,00,000}$ = 0.70 : 1

(b) Proprietary Ratio = $\frac{\text{Shareholders' Funds}}{\text{Total Assets}}$ = $\frac{₹\,27,00,000}{₹\,50,00,000}$ = 0.54 : 1

Total assets = Goodwill + Other Non-Current Assets + Current Assets =

₹ 5,00,000 + ₹ 25,00,000 + ₹ 20,00,000 = ₹ 50,00,000

(c) Solvency Ratio = $\frac{\text{Total Debt}}{\text{Total Assets}}$ = $\frac{₹\,23,00,000}{₹\,50,00,000}$ = 0.46 :1

(iv) Interest Coverage Ratio: This ratio is also called Debt-Service Ratio. This ratio indicates the relationship between 'Profit before interest and tax' and Interest on long term loans.

$$\text{Interest Coverage Ratio} = \frac{\text{Profit before Charging Interest and tax}}{\text{Fixed Interest Charges}}$$

Importance : This ratio is a measure of the firm's debt service capacity. This ratio indicates how many times the profit of the firm is of the fixed interest charge. The higher the ratio, the more is the interest paying capacity of the firm and safety available to loan creditors. The firm will be unable to cover its fixed interest charge, if the ratio is lower. The profit of a firm should be 6 or 7 times of its interest charge.

Illustration 10 :

Rohini Ltd. has 5% Debenture of ₹ 4,00,000. Its profit before interest and tax is ₹ 1,50,000. Calculate Interest coverage Ratio.

Solution :

$$\text{Interest Coverage Ratio} = \frac{\text{Profit before charging Interest and tax}}{\text{Fixed Interest Charge}}$$

$$= \frac{₹\,1,50,000}{₹\,20,000} = 7.5 \text{ times}$$

Interest on Debentures = 5% of ₹ 4,00,000 = ₹ 20,000

Illustration 11 :

From the following information, calculate 'Debt Service Ratio' and write your comment on it.

Profit After Interest and tax	₹ 1,08,000
Rate of Income Tax 40%; 8% Debentures	₹ 2,50,000

Solution :

'Debt Service Ratio' is another name of Interest Coverage Ratio.

$$\text{Interest Coverage Ratio} = \frac{\text{Profit before Interest and Tax}}{\text{Fixed Interest Charge}}$$

In the question profit is given after interest and tax, while to calculate this ratio, profit must be before interest & tax. So,

$$\text{Profit before Tax} = \frac{\text{Profit After Tax}}{1 - \text{Tax Rate}} = \frac{₹\ 1,08,000}{1-.4}$$

$$= \frac{₹\ 1,08,000}{.6} = ₹\ 1,80,000$$

The above profit of ₹ 1,80,000 is before tax but after interest because income tax is calculated on remaining profit after deducting all approved expenses. So, the amount of interest will be added to this amount to find out profit before interest and tax.

Profit before Interest and Tax = Profit After Tax + Interest Charged = ₹ 1,80,000 + ₹ 20,000 = ₹ 2,00,000

$$\text{Interest Coverage Ratio} = \frac{₹\ 2,00,000}{₹\ 20,000} = 10 \text{ Times}$$

Comment : The above ratio indicates that the firm has earned 10 times profit to interest charge, which is higher than the standard ratio of 6 or 7 times. So the firm can pay interest on its long term loans easily.

Activity Ratios

(i) Stock Turnover Ratio : Stock turnover ratio establishes a relationship between cost of goods sold or say cost of revenue from operations and average stock or inventory. This ratio provides how much sales are made from one rupee of investment in stock of the firm. The ratio considers justification and the adequacy of volume of funds invested in stock by the firm. This ratio is calculated with the help of the following formula :

$$\text{Stock/Inventory turnover ratio} = \frac{\text{Cost of goods sold i.e. cost of revenue from operations}}{\text{Average Stock/Inventory}}$$

Cost of revenue from operations = Cost of material consumed + Purchase of stock in trade + Changes in Inventories + Direct Expenses.

or

Cost of revenue from operations = Revenue from operations – Grass Profit

$$\text{Average Inventory} = \frac{\text{Opening Stock} + \text{Closing Stock}}{2}$$

Sometimes, neither information about cost of goods sold or cost of revenue from operations is available nor this cost can be calculated, in that situation, Inventory turnover ratio will be calculated on the basis of sales or revenue from operations. Its formula will be:

$$\text{Inventory turnover ratio} = \frac{\text{Sales/Revenue from operations}}{\text{Average Inventory}}$$

Importance : It is known by this ratio that the rate at which stock of the firm converted into sales or say stock is properly used or not. The higher the ratio is considered the better it is because the firm earns more profit at the low rate of profit. On the contrary, if the ratio is much lower it is an indicator of unnecessary block of Capital in stock. This situation is an indicator of obsolete stock, over stock or inefficient control on stock.

Illustration 12 :

From the following information, calculate Inventory turnover ratio :

Purchase during the year ₹ 5,00,000; Inventory at the beginning of the year ₹ 2,00,000; Inventory at the end ₹ 1,00,000; Carriage inward ₹ 50,000; Revenue from operations ₹ 10,00,000.

Solution :

$$\text{Inventory Turnover Ratio} = \frac{\text{Cost of Revenue from operations}}{\text{Average Inventory}}$$

$$= \frac{₹\,6{,}50{,}000}{₹\,1{,}50{,}000} = 4.33 \text{ times}$$

Cost of Revenue from operations = ₹ 2,00,000 + ₹ 5,00,000 + ₹ 50,000 – ₹ 1,00,000 = ₹ 6,50,000

$$\text{Average Inventory} = \frac{₹\,2{,}00{,}000 + ₹\,1{,}00{,}000}{2} = ₹\,1{,}50{,}000$$

Illustration 13 :

From the following information calculate Inventory turnover ratio and Average age of Inventory :

Opening Inventory ₹ 58,000; Purchase ₹ 4,84,000; Revenue from operations ₹ 6,40,000; Rate of Gross Profit 25% of Revenue from operations.

Solution :

(i) $$\text{Inventory turnover Ratio} = \frac{\text{Cost of Revenue from operations}}{\text{Average Inventory}}$$

$$= \frac{₹\,4{,}80{,}00}{₹\,60{,}000} = 8 \text{ times}$$

Cost of Revenue from operations = Revenue from operations – Gross Profit

= ₹ 6,40,000 – 25% of ₹ 640,000 = ₹ 4,80,000

Closing Inventory = Opening Inventory + Purchase - Cost of revenue from operations

= ₹ 5,8000 + ₹ 4,84,000 – ₹ 4,80,000 = ₹ 62,000

$$\text{Average Inventory} = \frac{\text{Opening Inventory} + \text{Closing Inventory}}{2}$$

$$= \frac{₹\,58{,}000 + ₹\,62{,}000}{2} = \frac{₹\,1{,}20{,}000}{2} = ₹\,60{,}000$$

(ii) $$\text{Average age of Inventory} = \frac{\text{No. of days/Months in a Year}}{\text{Inventory Turnover Ratio}}$$

$$= \frac{365}{8} \quad \text{or} \quad \frac{12}{8} = 45.63 \text{ days} \quad \text{or} \quad 1.5 \text{ months}$$

Illustration 14 :

From the following data of Minakshi Ltd. Calculate Inventory Turnover Ratio :

Particulars		Amount ₹
Revenue from operations	85,000	
Less : Return	5,000	80,000
Less: Purchase	39,000	
Change in Inventories		

(Opening Inventory – Closing Inventory)		
(15,920 – 14,400)	1,520	
Carriage inwards	1,000	
Wages	2,000	43,520
Gross Profit		36,480

Solution :

Inventory Turnover Ratio = $\dfrac{\text{Cost of Revenue from Operations}}{\text{Average Inventory}}$

= $\dfrac{₹\,43{,}520}{₹\,15.160}$ = 2.87 times

Cost of Revenue from operations = Opening Inventory+ Purchase + Carriage inwards + Wages – Closing Inventory

= ₹ 15920 + ₹ 39000 + ₹ 1000 + ₹ 2000 – ₹ 14,400 = ₹ 43,520 (or)

Cost of Revenue from Operations = Revenue from operations – Gross Profit

= ₹ 80,000 – ₹ 36,480 = ₹ 43,520

Average Inventory = $\dfrac{\text{Opening Inventory} + \text{Closing Inventory}}{2}$

= $\dfrac{15920 + 14400}{2}$ = 15.160

(ii) Trade Receivables Turnover Ratio : This ratio establishes the relationship between net credit sales and average trade receivables. This ratio indicates how far the firm has been successful in credit recovery. If a firm does not recover cash in time from his receivables, its funds will be blocked in receivables unduly. This ratio is calculated by the following formula :

Trade Receivables Turnover Ratio = $\dfrac{\text{Net Credit Revenue from Operations}}{\text{Average Trade Receivables}}$

Note :

(1) Net Credit Revenue from operations = Credit sales – Sales Return

(2) If credit sales is not given in question then, credit sales = Total sales – Cash sales

(3) If information, about net credit revenue from operations is not available then trade receivable turnover ratio will be calculated with the use of amount of total revenue from operations instead of net credit revenue from operations.

(4) Trade receivables will include debtors and bills receivable but provision for bad and doubtful debts will not be substracted from trade receivables.

(5) Calculation of average trade receivables:

$= \dfrac{\text{Opening (Debtors + B/R) + Closing (Debtors + B/R)}}{2}$

Importance : This ratio indicates how quickly cash is recovered from trade receivables. The higher this ratio is the higher the efficiency in the recovery of trade receivables. On the contrary, the lower this ratio is the lower the efficiency in collection of credit sales or trade receivables of the firm or say sales made by the firm to such customers has been unable to recover the amount.

Illustration 15 :

From the following information, calculate trade receivables turnover ratio :

Total revenue from operations for the year	₹ 4,00,000
Cash revenue from operations	20% of total revenue

Trade receivables on 01.04.2016 ₹ 68,000

Trade receivables on 31.03.2017 ₹ 60,000

Solution :

$$\text{Trade Receivables Turnover Ratio} = \frac{\text{Net credit revenue from operations}}{\text{Average Trade Receivables}}$$

$$= \frac{₹\,3{,}20{,}000}{₹\,64{,}000} = 5 \text{ Times}$$

Credit revenue from operations = Total revenue from operations - Cash revenue from operations

₹ 4,00,000 – 20% of ₹ 4,00,000 = ₹ 3,20,000

$$\text{Average Trade Receivables} = \frac{\text{Opening Trade Receivables} + \text{Closing Trade Receivables}}{2}$$

$$= \frac{₹\,68000 + ₹\,60{,}000}{2} = ₹\ 64000$$

(iii) Average Collection Period : Average collection period means the number of days in which amount is recovered by the firm from its trade receivables. This ratio depends mainly on trade receivables turnover ratio.

$$\text{Average Collection period} = \frac{\text{No. of days in a year}}{\text{Trade receivables turnover ratio}}$$

Or

$$\text{Average collection period} = \frac{\text{Average Trade Receivables} \times \text{No. of days in a year}}{\text{Net credit revenue from operations}}$$

Importance : Average collection period reflects the time period required for recovery of trade receivables. This period mainly depends upon trade receivable turnover ratio. The higher the trade receivables turnover ratio, the shorter the average collection period and quality of debtors would be good. Loss of bad debts would also be less. On the Contrary to this, the lower the trade receivables turnover ratio, the longer the average collection period would be, which reflects delay in collection from debtors.

Illustration 16 :

The following balances extracted from the books of Subham Ltd. on 31st March, 2017. Calculate Trade receivables turnover ratio and Average collection period. (Assume 360 days in a year)

Total Gross revenue from operations ₹ 3,00,000; Cash revenue from operation ₹ 60,000; Revenue from operations returns ₹ 21,000; Total Debtors on 31.03.2016 ₹ 8000; Total Debtors on 31.03.2017 ₹ 10,000; Bills Receivables on 31.03.2016 ₹ 4500; Bills Receivables on 31.03.2017 ₹ 6700; Provision for doubtful debts ₹ 2000; & Trade payables on 31.03.2017 ₹ 20,000

Solution :

(i) $$\text{Trade Receivables Turnover Ratio} = \frac{\text{Net credit Revenue from operations}}{\text{Average Trade Receivables}}$$

$$= \frac{₹\,2{,}19{,}000}{₹\ 14{,}600} = 15 \text{ times}$$

Net credit revenue from operations = Total Gross revenue from operations – Cash revenue from operations – Returns.

= ₹ 3,00,000 – ₹ 60,000 – ₹ 21000 = ₹ 219000

$$\text{Average trade receivables} = \frac{\text{Opening (Debtors + B/R) + Closing (Debtors + (B/R)}}{2}$$

$$= \frac{(₹\,8000 + ₹\,4500) + (₹\,10{,}000 + ₹\,6700)}{2} = ₹\,14{,}600$$

(ii) Average Collection Period = $\frac{\text{No. of days in a year}}{\text{Trade receivables turnover ratio}}$

$= \frac{360}{15} = 24$ days

Illustration 17 :

From the following information, calculate opening and closing trade receivables :

Trade receivables turnover ratio = 7 times

Cost of Revenue from operations = ₹ 7,50,000

Gross Profit ratio = 1/3 on cost

Cash Revenue from operations = 30% of total Revenue

Closing trade receivables were ₹ 40,000 more than at the beginning.

Solution :

Total Revenue from operations = Cost of Revenue from operations + Gross Profit

= ₹ 750,000 + (1/3 of ₹ 750,000)

= ₹ 10,00,000

Credit Revenue from operations = Total Revenue from operations – Cash Revenue from operations

= ₹ 10,00,000 – (30% of ₹ 10,00,000)

= ₹ 7,00,000

Trade Receivables turnover Ratio = $\frac{\text{Credit revenue from operations}}{\text{Average trade receivables}}$

Average Trade Receivables = $\frac{₹\ 7,00,000}{7}$ = ₹ 100,000

Average Trade Receivables = $\frac{\text{Opening receivables + Closing receivables}}{2}$

Assume opening Trade receivables = x

Then, closing trade receivables will be = x + 40,000

₹ 1,00,000 = $\frac{(x) + (x + 40,000)}{2}$ = 2,00,000 – 40,000 = 2x

X = 1,60,000/2 = ₹ 80,000

Opening Trade receivables = ₹ 80,000

Closing Trade receivables = ₹ 80,000 + ₹ 40,000 = ₹ 120,000

(iv) Trade Payables Turnover Ratio : This ratio establishes the relationship between net credit purchase and average trade payables. This ratio reveals the number of times the trade payables turnover in relation to purchase.

Trade Payables Turnover Ratio = $\frac{\text{Net Credit Purchase}}{\text{Average Trade Payables}}$

Note:

(1) This ratio is calculated on the basis of total purchase, if information about credit purchase is not available.

(2) 'Provision for discount on creditors' would not be substracted from creditors, to calculate this ratio.

(3) Average Trade Payables = $\frac{\text{Opening (Creditors + B/P) + Closing (creditors + B/P)}}{2}$

Importance : The ratio reveals the speed of firm to payment to its trade payables. The higher the ratio, the better it will be. It shows that the firm is paying its payables promptly and this increases the goodwill of the firm.

(v) Average Payment Period : Average payment period means the credit period enjoyed by the firm in paying creditors. This ratio depends mainly upon trade payables turnover ratio. A high trade payables turnover ratio tends lower average payment period. On the contrary to this, lower the trade payables turnover ratio, average payment period would be higher.

$$\text{Average payment period} = \frac{\text{No. of days in a year}}{\text{Trade Payables Turnover Ratio}}$$

$$\text{(Or) Average payment period} = \frac{\text{No. of days in a year x Average trade payables}}{\text{Net credit purchase}}$$

Illustration 18 :

From the following information of Ramesh Ltd. Calculate 'Trade Payables Turnover Ratio' and 'Average Payment Period'. Total purchase during the year ₹ 15,00,000; Cash purchase ₹ 4,00,000; Purchase Returns (out of credit Purchase) ₹ 5000; Provision for discount on creditors ₹ 50,000; Opening creditors ₹ 35000; Opening B/P ₹ 15,000; Closing creditors₹ 50,000; & Closing B/P ₹ 20,000.

Solution :

(i) Trade Payables Turnover Ratio $= \dfrac{\text{Net Credit Purchases}}{\text{Average Trade Payables}}$

$= \dfrac{₹\ 10,95,000}{₹\ 60,000} = 18.25$ times

Net credit Purchases = Total Purchase – Cash Purchase – Purchase Returns

= ₹ 15,00,000 – ₹ 4,00,000 – ₹ 5,000

= ₹ 10,95,000

Average Trade Payables $= \dfrac{(₹\ 35000 + ₹\ 15000 + ₹\ 50,000 + ₹\ 20,000)}{2}$

$= \dfrac{₹\ 1,20,000}{2} = ₹\ 60,000$

(ii) Average Payment Period $= \dfrac{\text{No. of days in a year}}{\text{Trade Payables Turnover Ratio}}$

or $= \dfrac{\text{No. of days in a year X Average Trade Paybles}}{\text{Net Credit Purchase}}$

Average Collection Period $= \dfrac{365}{18.25} = 20$ days or

$= \dfrac{365 \times 60,000}{10,95,000} = 20$ days

(vi) Total Assets Turnover Ratio : This ratio indicates the relationship between revenue from operations or cost of revenue from operations and total assets of the firm. This ratio is also called Total investment turnover ratio.

$$\text{Total Assets Turnover Ratio} = \frac{\text{Revenue from operations or cost of Revenue from operations}}{\text{Total Assets}}$$

Total Assets = Noncurrent Assets (Tangible Assets + Intangible Assets + Non-current Investments + Long Term Loans and Advances) + Current Assets.

Importance : This ratio indicates the number of times the total assets turned into sales. The higher the ratio, the more effective is the management of the firm that they have utilized assets effectively. On contrary to it, if assets turnover ratio is low, it means the firm is not able to sale sufficiently in comparison to investment in assets and there is an over investment in assets.

Illustration 19 :

From the following information, Calculate 'Total Assets Turnover Ratio':-

Goodwill ₹ 8,000; Other Non-Current Assets ₹ 22,000; Current Assets ₹ 20,000; Cash Revenue from operations ₹ 1,30,000; Credit Revenue from operations ₹ 3,90,000; and Revenue from operations Return ₹ 20,000.

Solution :

$$\text{Total Assets Turnover Ratio} = \frac{\text{Net Revenue from operations}}{\text{Total Assets}}$$

$$= \frac{₹\ 5,00,000}{₹\ 50,000} = 10 \text{ times}$$

Net Revenue from operations = Cash Revenue from operations + Credit Revenue from operations – Revenue from operation Return

= ₹ 1,30,000 + ₹ 3,90,000 – ₹ 20,000 = ₹ 5,00,000.

Total Assets = Goodwill + Other non-current assets + Current assets

= ₹ 8000 + ₹ 22,000 + ₹ 20,000 = ₹ 50,000.

Profitability Ratios

(i) Gross Profit Ratio : This ratio reveals the relationship between gross profit and net revenue from operations. Generally this ratio is expressed in percentage. It is calculated with following formula :

$$\text{Gross Profit Ratio} = \frac{\text{Gross Profit} \times 100}{\text{Net Revenue from operations (Net Sales)}}$$

Gross Profit = Revenue from operations – Cost of Revenue from operations

Cost of revenue from operations = Cost of material consumed + Purchase of Stock-in-trade + Changes in inventories + Direct Expenses (Carriage, wages etc.)

Inventories = finished goods + Work-in-Progress (WIP) + Stock-in-Trade

Net Revenue from operations = Revenue from operations – Revenue from operations Return (i.e. sales Return)

Importance : This ratio is a good measure to determine the profit earning capacity of the firm. The higher the ratio the greater will be benefit for business. On the contrary the lower ratio is an indication of declining the profits in the firm, mainly reasons for this are – declining in selling price, increase in purchase price, carriage, wages and other direct expenses, under valuation of closing stock etc. There is not any ideal standard for this ratio but this ratio should be sufficient to cover all operating expenses, depreciation, Interest on debentures, dividend etc.

Illustration 20 :

From the following information calculate 'Gross Profit Ratio' :

Decrease in Inventory ₹ 160,000; Return out wards ₹ 50,000; Purchase: (Cash) ₹ 2,00,000; Purchase: (Credit) ₹ 6,00,000; Wages ₹ 80,000; Carriage in wards ₹ 15,000; salaries ₹ 1,00,000; Cash revenue from operations ₹ 2,50,000; Ratio of Cash Revenue from operations and credit revenue from operations = 1: 5

Solution :

$$\text{Gross Profit Ratio} = \frac{\text{Gross Profit}}{\text{Revenue from operations}} \times 100$$

$$= \frac{₹\ 15,00,000 - ₹\ 10,05,000}{₹\ 15,00,000} \times 100 \qquad = \frac{₹\ 4,95,000 \times 100}{₹\ 15,00,000} = 33\%$$

Revenue from operations = Cash Revenue from operations + Credit Revenue from operations

= ₹ 2,50,000 + (250,000 x 5) = ₹ 15,00,000.

Net Purchase = Cash Purchase + Credit purchase – Return outwards

= ₹ 2,00,000 + ₹ 6,00,000 – ₹ 50,000 = ₹ 7,50,000.

Cost of Revenue from operations = Net Purchase + Changes in Inventory (i.e. opening Stock – Closing Stock) + Direct expenses = ₹ 7,50,000 + ₹ 160,000 + ₹ 15,000 + ₹ 80,000.

= ₹ 10,05,000.

Gross Profit = Revenue from operations – Cost of Revenue from operations

= ₹ 15,00,000 – ₹ 10, 05,000 = ₹ 495,000.

Note : Decrease in Inventory means reduction in closing stock in comparison to opening stock.

(ii) Operations Ratio : Operating ratio expresses the relationship between total operating cost and net revenue from operations. To calculate total operating cost, all operating expenses relating to main business will be added to cost of revenue from operations and other operating income will be subtracted from it. Total of operating ratio and operating profit Ratio is 1.

$$\text{Operating Ratio} = \frac{\text{Operating Cost x 100}}{\text{Net Revenue from operations}}$$

Operating cost = Cost of Revenue from operations + other operating expenses – Other operating Incomes.

Other Operating Expenses : Employee benefit expenses, Depreciation, office and **a**dministrative expenses, selling and distribution expenses, discount, Bad debts, Interest on short term loans.

Other Operating Incomes : Commission received and discount received.

Importance : Operating ratio is a measure of operational efficiency and profit earning capacity of the business. The lower the ratio, the firm will be more efficient from the point of view of profit earning capacity.

Notable : At the time of calculating operating ratio non-operating expenses like. Loss on sale of fixed assets, abnormal loss, interest on long term loans, donation, income tax etc. and non-operating incomes like income from investments etc. are not considered.

(iii) Operating Profit Ratio : This ratio establishes the relationship between operating profit and net revenue from operations (net sales). Operating profit mean the profit which is derived by substracting cost of revenue from operations and all operating expenses from revenue from operations and adding other operating income to it.

$$\text{Operating Profit Ratio} = \frac{\text{Operating Profit}}{\text{Net Revenue from operations (Net sales)}} \text{x } 100$$

Operating Profit = Gross Profit – Other Operating Expenses + Other Operating Incomes

Note : If net profit is given, the operating profit will be calculated as follows:

Operating Profit = Net profit (before tax) + Non-operating expenses/Losses – None operating Incomes.

Other Operating Expenses : Employee benefit expenses, depreciation, office and administrative expenses, selling and distribution expenses, discount, Bad debts, Interest on short term loans etc.

Other Operating Incomes : Commission received and discount received.

Non-operating Expenses : Loss on sale of non-current (Fixed) assets, loss by fire, donation, income tax and interest on debentures/Long Term Loans.

Non-Operating Incomes : Profit on sale of non-current (fixed) assets & Income on Investments.

Importance : This ratio makes the operational efficiency of the firm clear. The higher this ratio, the firm would be better from the point of view of profit earning capacity. In some of the firms, profit from operations is low but non-operating profit is high, as a result net profit is enhanced. Thus, operating profit ratio is the basis for measuring the efficiency and profit earning capacity of the business.

Illustration 21 :

From the following information calculate operating Ratio and Operating Profit Ratio :

Revenue from operations ₹ 225,000; Revenue from operations Return ₹ 25,000; Cost of Revenue from operations ₹ 1,00,000; Administrative Expenses ₹ 17,000; Selling and Distribution Expenses ₹ 9,000; Depreciation ₹ 22,000.

Solution :

(i) Operating Ratio = $\dfrac{\text{Cost of Revenue from operations + Operating Expenses}}{\text{Net Revenue from operations}} \times 100$

$= \dfrac{₹\ 1,00,000 + (₹\ 17000 + ₹\ 9000 + ₹\ 22000)}{₹\ 2,00,000} \times 100$

$= \dfrac{₹\ 148000}{₹\ 2,00,000} \times 100 = 74\%$

(ii) Operating Profit Ratio = $\dfrac{\text{Operating Profit}}{\text{Net Revenue from operations}} \times 100$

$= \dfrac{₹\ 52000}{₹\ 2,00,000} \times 100 = 26\%$

Net Revenue from operations = Revenue from operations – Revenue from operations Return

= ₹ 225,000 – ₹ 25,000 = ₹ 2,00,000

Operating Profit = Net Revenue from operations – Cost of Revenue from operations – Other operating Expenses (Administrative expenses + Selling and distribution expenses + Depreciation)

= ₹ 2,00,000 – ₹ 1,00,000 – (₹ 17,000 + ₹ 9000 + ₹ 22000)

= ₹ 2,00,000 – ₹ 148,000

= ₹ 52,000.

Operating Profit Ratio = 100 – Operating Ratio = 100 – 74 = 26%.

(iv) Net Profit Ratio : This ratio expresses the relationship between net profit of the business and net revenue from operations (net sales). Net profit of a business firm is the total of profit from operating activities and non-operating activities.

Net Profit Ratio = $\dfrac{\text{Net Profit}}{\text{Net Revenue from operating (net sales)}} \times 100$

Net Profit = Gross Profit – Other operating expenses – other non-operating expenses + other operating incomes + other non-operating incomes.

Importance : This ratio is an indicator of overall profitability and efficiency of the business. If, this ratio reflects an increase compared to previous year then it means there is an improvement is profitability of the business. On the one hand this ratio reflects profitability on revenue from operations, while on the other hand it also provides information about appropriate reward for risk on owners Capital.

Illustration 22 :

From the following information of a company calculate Gross profit ratio, operating profit ratio and net profit ratio for the year ended 31st March, 2017.

Opening Inventory ₹ 1,20,000; Closing Inventory ₹ 2,00,000; Purchase ₹ 8,40,000; Wages ₹ 56,000; Carriage Inward ₹ 16,000; Administrative Expenses ₹ 96,000; Selling & Distribution expenses ₹ 1,12,000; Profit on sale of machine ₹ 112,000; Non-Operating expenses ₹ 30,000; Income Tax ₹ 50,000; Revenue from operations ₹ 16,40,000; Revenue from operations Return ₹ 40,000.

Solution :

(i) Gross Profit Ratio = $\dfrac{\text{Gross Profit}}{\text{Net Revenue from operations}} \times 100$

$= \dfrac{₹\ 768,000}{₹\ 16,00,000.} \times 100 = 48\%$

Gross Profit = Net Revenue from operations – Cost of Revenue from operations = Net Revenue

$$= \text{Net Revenue from operations} - (\text{Opening Inventory} + \text{Purchase} + \text{wages} + \text{Carriage inwards} - \text{Closing Inventory})$$

$$= (₹\,16,40,000 - ₹\,40,000) - (₹\,120,000 + ₹\,840,000 + ₹\,56,000 + ₹\,16,000 - ₹\,2,00,000)$$

$$= ₹\,16,00,000 - ₹\,832,000 = ₹\,7,68,000.$$

(ii) Operating Profit Ratio $= \dfrac{\text{Operating Profit}}{\text{Net Revenue from operations}} \times 100$

$$= \frac{₹\,5,60,000 \times 100}{₹\,16,00,000} = 35\%$$

Operating Profit = Gross Profit – Other operating Exp. (administrative exp. + selling exp.)

$$= ₹\,768,000 - (₹\,96000 + ₹\,112,000)$$

$$₹\,7,68,000 - ₹\,208,000 = ₹\,5,60,000.$$

(iii) Net Profit Ratio $= \dfrac{\text{Net Profit}}{\text{Net Revenue from operations}} \times 100$

$$= \frac{₹\,5,92,000 \times 100}{₹\,16,00,000} = 37\%$$

Net Profit = Operating Profit – Non Operating Exp. + Non-operating Incomes

$$= ₹\,5,60,000 - (₹\,30,000 + ₹\,50,000) + ₹\,112,000 = ₹\,5,60,000 - ₹\,80,000 + ₹\,112,000$$

$$= ₹\,5,92,000.$$

(v) Return on Investment or ROI : This ratio is also called 'Return on Capital Employed'. The main objective of investment in a concern is to earn a return on capital. The overall profitability of a business is measured by this ratio. This ratio expresses the relationship between Profit before interest and tax (PBIT) and capital employed.

Capital employed means long term funds invested in a firm. Since, long term loans are also included in long term funds, therefore, interest paid on long term loans is not substracted from profits, while calculating this ratio.

$$\text{Return on Investment} = \frac{\text{Net Profit before interest \& tax \& Dividends}}{\text{Capital Employed}} \times 100$$

Capital Employed can be calculated either of methods from the followings :

(i) Liabilities side approach: Capital employed = Shareholders funds + Non-current liabilities (Long term loans + Long term provisions) – Non trade Investments.

(ii) Assets side approach : Capital Employed = Non-Current Assets + Working Capital

Non-Current Assets = Fixed Assets (Tangible Assets + Intangible assets) + Non-Current Investments + LT loans & advances

Working Capital = Current Assets – Current Liabilities.

Note : If it is not clear about investment, it will be treated Trade Investment.

Importance : This ratio is the best basis to measure the overall profitability and efficiency of the business. This ratio indicates how efficiently the Capital employed in the firm is being used. The Performance of two companies may be compared with the help of this ratio.

Illustration 23 :

From the following information calculate rate of Return on Investment :

Share Capital ₹ 1,00,000; Fixed Assets – Tangible (net) ₹ 4,50,000; Current Assets ₹ 2,20,000; Current Liabilities ₹ 1,70,000; Reserves & Surplus ₹ 50,000; Non-current trade Investment ₹ 50,000; 10% Long term loans ₹ 4,00,000; Net profit before tax ₹ 180,000.

Solution :

$$\text{Return Investment or Return on Capital Employed} = \frac{\text{Net Profit before Interest \& Tax}}{\text{Capital Employed}} \times 100$$

$$= \frac{₹\,2,20,000}{₹\,5,50,000} \times 100 \qquad = 40\%$$

Net profit before Interest and tax = Net profit before tax + 10% Int. + on loan

= ₹ 1,80,000 + ₹ 40,000 = ₹ 2,20,000.

Capital Employed = Share Capital + Reserves & Surplus + 10% LT loans

= ₹ 1,00,000 + ₹ 50,000 + ₹ 4,00,000 = ₹ 5,50,000.

Investment Anaylysis Ratios

(i) Earning per Share - (EPS) : Earning per share is calculated by dividins the profit available to equity shareholders by the number of equity shares. This is a financial ratio that indicates how much income is earned on each equity share. As per As-20, while calculating profit available to equity shareholders, dividend on preference share will be substracted and outstanding numbers of equity shares mean weighted average of outstanding number of equity shares during the period.

$$\text{Earning Per Share – (EPS)} = \frac{\text{Net Profit After tax – Preference share dividend}}{\text{Number of Equity Shares}}$$

Importance : This ratio is important from the equity shareholder's point of view. This ratio affects market price of equity shares also. Higher **e**arning per share ratio is, the greater the market price of shares of the company. As a result, it is easy for the company to make arrangements for additional funds and will increase the company's goodwill.

Illustration 24 :

From the following information. Calculate Earning Per Share :

Equity Share Capital of ₹ 10 each fully paid ₹ 5,00,000; 10% Preference Share Capital of 10 each fully paid ₹ 1,00,000; General Reserve ₹ 1,50,000; Net Profit before tax ₹ 3,00,000; Tax Rate Assume 30%.

Solution :

$$\text{Earning Per share} = \frac{\text{Net Profit After tax – Preference share dividend}}{\text{Number of Equity Shares}}$$

$$= \frac{₹\,2,00,000}{₹\,50,000} = ₹\,4$$

Net Profit after tax and preference share dividend = Net Profit before tax – income tax – Preference share dividend

= ₹ 3,00,000 – (30% of ₹ 3,00,000) – (10% of ₹ 1,00,000)

= ₹ 3,00,000 – ₹ 90,000 – ₹ 10,000 = ₹ 2,00,000.

No. of Equity Shares = ₹ 5,00,000 ÷ ₹ 10 = 50,000 Shares.

(ii) Dividend Per Share – DPS : Dividend per share is a part of earning which is obtained by dividing the total amount distributed among equity shareholders by number of equity shares. Earning per share tell how much each equity shareholder is entitled to receive profit but he does not receive the entries amount. A portion of the profits of his share is retained by the company, remaining amount is received by him as dividend.

$$\text{Dividend Per Share} = \frac{\text{Dividend Paid to Equity Shareholders}}{\text{Number of Equity Shares}}$$

(iii) Dividend Payout Ratio : This ratio establishes the relationship between dividend per share and earning per share. This ratio tells what proportion of earnings related with equity shareholders has been distributed among them in the form of dividend.

$$\text{Dividend Payout Ratio} = \frac{\text{Dividend per Share}}{\text{Earning Per Share}} \times 100$$

If dividend pay out ratio is substracted from 100 the remaining will be the amount of profit retained by the firm, for example, Dividend pay out ratio of a company is 65%, then its retained earning ratio will be 100 – 65% = 35%.

Illustration 25 :

From the following information of Tanvi Ltd. Calculate (i) Earning per share (ii) Dividend per share and (iii) Dividend pay out ratio :

10% 2000 Preference Shares of ₹ 100 each ₹ 2,00,000

50,000 Equity Shares of ₹ 10 each ₹ 5,00,000

Profit After Tax ₹ 3,80,00; Equity Dividend Paid @ 40%

Solution :

(1) Earning Per Share $= \dfrac{\text{Net Profit after tax-Preference Share Dividend}}{\text{No. of Equity Shares}}$

$= \dfrac{₹\ 3,80,000 - (10\% \text{ of } ₹\ 2,00,000)}{₹\ 50,000} = \dfrac{3,60,000}{50,000} = ₹\ 7.20$ per share

(2) Dividend Per Share $= \dfrac{\text{Dividend Paid to equity Shareholders}}{\text{No. of Equity shares}}$

$= \dfrac{₹\ 2,00,000}{₹\ 50,000} = ₹\ 4$ per share

Dividend Paid to Equity shareholders = 40% of ₹ 5,00,000 = ₹ 2,00,000

(3) Dividend Payout Ratio $= \dfrac{\text{Dividend per Share}}{\text{Earning Per Share}} \times 100$

$= \dfrac{₹\ 4 \times 100}{₹\ 7.2} = 55.56\%$

Illustration 26 :

Following particulars are extracted from the books of Jony Ltd. :

Share Capital – 4,00,000, General Reserve – 2,04,000, Statement of Profit & Loss – 187,000, 11% Debentures – 2,00,000, Current Liabilities – 209,000, Non-current Assets – 560,000, Inventory – 198,000, Trade Receivables – 370,000, Cash and Cash Equivalents – 72,000.

Calculate following Ratios : (i) Current Ratio; (ii) Quick Ratio; (iii) Debt Equity Ratio; (iv) Proprietary Ratio; and (v) Solvency Ratio.

Solution :

(i) Current Ratio $= \dfrac{\text{Current Assets}}{\text{Current Liabilities}} = \dfrac{6,40,000}{2,09,000} = 3.06:1$

Current Assets = Inventory + Trade Receivables + Cash and Cash Equivalents

= 198,000 + 370,000 + 72000 = 6,40,000.

(ii) Quick Ratio $= \dfrac{\text{Quick Assets}}{\text{Current Liabilities}} = \dfrac{4,42,000}{2,09,000} = 2.11 : 1$

Liquid Assets = Current Assets – Inventory = 6,40,000 – 1,98,000 = ₹ 4,42,000

(iii) Debt – Equity Ratio $= \dfrac{\text{External Liabilities}}{\text{Internal Liabilities}} = \dfrac{4,09,000}{7,91,000} = 0.517 : 1$

External Liabilities = 11% Debentures + Current Liabilities = 2,00,000 + 2,09,000 = ₹ 4,09,000

Internal Liabilities = Share capital + General Reserve + Profit & Loss Balance

= 4,00,000 + 2,04,000 + 1,87,000 = ₹ 7,91,000

(iv) Proprietory Ratio $= \dfrac{\text{Shareholders Fund}}{\text{Total Assets}} = \dfrac{7,91,000}{12,00,000} = 0.659:1$

Shareholder's fund or Internal Equity or Internal Liabilities i.e. ₹ 7,91,000

Total assets = Non-current assets + Current Assets = 5,60,000 + (1,98,000 + 3,70,000 + 72,000) = ₹ 12,00,000.

(v) Solvency Ratio $= \dfrac{\text{Total Debt}}{\text{Total Assets}} = \dfrac{4,09,000}{12,00,000} = 0.341:1$

Total Debt = Non-current liabilities + current liabilities

= 2,00,000 + 2,09,000 = ₹ 4,09,000.

Illustration 27 :

Following information have been obtained from the books of Miraj Ltd. :

Particulars	2015-16 ₹	2016-17 ₹
Revenue from operations (at Gross Profit of 25%)	20,00,000	30,00,000
Trade Receivables on 1st April	3,00,000	
Trade Receivables on 31st March	3,50,000	5,00,000
Inventory on 1st April	3,20,000	
Inventory on 31st March	3,60,000	4,40,000

Calculate Trade Receivables Turnover Ratio and Inventory Turnover Ratio for both of the years and give necessary comments.

Solution :

Year 2015-16

Trade Receivable Turnover Ratio $= \dfrac{\text{Net Credit Revenue from operations}}{\text{Average Trade Receivables}} = \dfrac{20,00,000}{3,25,000} = 6.15$ times

Average Trade Receivables $= \dfrac{\text{Opening Trade Receivables + closing trade Receivables}}{2}$

$= \dfrac{300,000 + 350,000}{2} = 3,25,000$

Inventory Turnover Ratio $= \dfrac{\text{Cost of Revenue form operation}}{\text{Average Inventory}} = \dfrac{15,00,000}{3,40,000} = 4.41$ times

Cost of Revenue from operations = 20,00,00 – 25% of 20,00,000 = 20,00,000 – 5,00,000 = ₹ 15,00,000

Average Inventory $= \dfrac{\text{Opening Inventory + closing Inventory}}{2} = \dfrac{3,20,000 + 3,60,000}{2} = 3,40,000$

Year 2016-17

Trade receivables Turnover Ratio $= \dfrac{\text{Net Credit Revenue from Operations}}{\text{Average Trade Receivables}} = \dfrac{30,00,000}{4,25,000} = 7.06$ times.

Closing trade receivables of the year 2015-16 will be the opening trade receivables for the year 2016-17.

So Average Trade Receivables $= \dfrac{3,50,000 + 5,00,000}{2} =$ ₹ 4,25,000

Inventory Turnover Ratio $= \dfrac{\text{Cost Revenue from operations}}{\text{Average Inventory}} = \dfrac{22,50,000}{4,00,000} = 5,625$ times

Cost Revenue from operations = 30,00,000 – 25% of 30,00,000 = 30,00,000 – 7,50,000 = ₹ 22,50,000.

Average Inventory $= \dfrac{\text{Opening Inventory + Closing Inventory}}{}$

2

Closing Inventory of the year 2015-16 will be the opening Inventory for the year 2016-17.

$$\text{Average Inventory} = \frac{3,60,000 + 4,40,000}{2} = 4,00,000$$

Comments :

1. Trade Receivables Turnover Ratio has become 7.06 times in the year 2016-17 instead of 6.15 times in the year 2015-16. It means the firm is collecting money from debtors promptly.
2. Inventory Turnover Ratio has become 5.625 times in the year 2016-17 instead of 4.41 times. It also exhibits efficient inventory policy of the firm.

Note : There is no information about cash or credit sales. Hence, Trade Receivables turnover ratio is calculated on the given amount of revenue from operations.

Illustration 28 :

From the following figures available for the year ending 31st March 2017, calculate (i) Gross Profit Ratio (ii) Operating Ratio (iii) Operating Profit Ratio & (iv) Net Profit Ratio :

Cash Revenue from Operations ₹ 50,000, Credit Revenue from operations ₹ 1,00,000, Purchase (Cash ₹ 20,000, Credit ₹ 68,000), Return outwards ₹ 5,000, Opening Inventory ₹ 20,000, Closing Inventory ₹ 10,000, Carriage inwards ₹ 3,000, Salaries ₹ 3,500, Other Office expenses ₹ 5,000, Selling Expenses ₹ 6,500, Income from Investment ₹ 7,000, Interest on Loan ₹ 8,000, Loss by Fire ₹ 4,000, Wages ₹ 4,000.

Solution :

(i) $$\text{Gross Profit Ratio} = \frac{\text{Gross Profit}}{\text{Revenue from operations}} \times 100 = \frac{50,000}{1,50,000} \times 100 = 33\tfrac{1}{3}\%$$

Revenue from operations = Cash Revenue from Operations + Credit Revenue from operations

= 50,000 + 1,00,000 = ₹ 1,50,000

Net Purchases = Cash purchase + credit purchase – return outwards

= 20,000 + 68,000 – 5,000 = ₹ 83,000.

Cost Revenue from Operations = Net purchases + changes in inventory + Carriage inwards + Wages

= 83,000 + (20,000 – 10,000) + 3,000 + 4,000 = ₹ 1,00,000.

Gross Profit = Revenue from operations – cost of Revenue from operations

= 1,50,000 – 1,00,000 = ₹ 50,000.

(ii) $$\text{Operating Ratio} = \frac{\text{Operating Cost} \times 100}{\text{Revenue from operations}} = \frac{1,15,000 \times 100}{1,50,000} = 76.67\%$$

Operating Cost = Cost of Revenue from Operations + Salaries + Other Office Expenses + Selling Expenses

= 1,00,000 + 3,500, + 5,000 + 6,500 = ₹ 1,15,000.

(iii) $$\text{Operating Profit Ratio} = \frac{\text{Operating Profit}}{\text{Revenue from operations}} \times 100 = \frac{35,000}{1,50,000} \times 100 = 23.33\%$$

Operating Profit = Revenue from operations – operating cost = 1,50,000 – 1,15,000 = ₹ 35,000

(iv) $$\text{Net Profit Ratio} = \frac{\text{Net Profit}}{\text{Revenue from operations}} \times 100 = \frac{30,000}{1,50,000} \times 100 = 20\%$$

Net Profit = Gross Profit + other operating Income – Other Operating Expenses + Non-Operating Income – Non-operating Expenses or Net Profit = Operating Profit + Non-operating Income – Non Operating Expenses = 35000 + 7,000 – (4,000 + 8,000) = ₹ 30,000.

Illustration 29 :

Calculate the following ratios with the help of the information given below :

(i) Current Ratio (ii) Gross Profit Ratio (iii) Operating Ratio (iv) Net Profit Ratio on Return in Investment

Information : Plant & Machinery – 5,00,000, Non-current Investment (Trade) – 2,00,000; Current Assets 3,00,000, Current Liabilities 2,00,000, Revenue from Operations 10,00,000 Purchases 7,50,000, Opening Inventory 45,000, Closing Inventory 55,000, Wages 20,000, Office Expenses 40,000, Interest on Debentures 10,000, Income Tax 20,000.

Solution :

(i) Current Ratio = $\frac{\text{Current Assets}}{\text{Current Liabilities}} = \frac{3,00,000}{2,00,000} = 1.5:1$

(ii) Gross Profit Ratio = $\frac{\text{Revenue from operations - cost of revenue from operations}}{\text{Revenue from operations}} = \frac{2,40,000}{10,00,000} \times 100 = 24\%$

Cost of Revenue from operations = Purchases + changes in Inventory + wages

= 750,000 + (45,000 – 55,000) + 20,000 = ₹ 7,60,000.

Gross Profit = 10,00,000 – 7,60,000 = ₹ 2,40,000

(iii) Operating Ratio = $\frac{\text{Operating cost}}{\text{Revenue from operations}} \times 100$ $\frac{8,00,000}{10,00,000} \times 100 = 80\%$

Operating cost = Cost of Revenue from Operations + office expenses

= 7,60,000 + 40,000 = ₹ 8,00,000

(iv) Net Profit Ratio = $\frac{\text{Net Profit}}{\text{Revenue from operations}} \times 100 = \frac{₹\ 1,70,000}{10,00,000} \times 100 = 17\%$

Net Profit = Gross Profit – office exp. – Interest on debentures – Tax

= 2,40,000 – 40,000 – 10,000 – 20,000 = 1,70,0000

(v) Return on Investment = $\frac{\text{Net Profit before Interest \& Tax and Dividend}}{\text{Capital employed}} \times 100 = \frac{2,00,000}{8,00,000} \times 100 = 25\%$

Net Profit before interest & tax = Net Profit + Interest on Debentures + Tax

= 1,70,000 + 10,000 + 20,000 = ₹ 2,00,000.

Capital Employed = Non-current Assets + Working Capital

= (5,00,000 + 2,00,000) + (3,00,000 – 2,00,000) = 7,00,000 + 1,00,000 = ₹ 8,00,000

Particulars	Note No.	Amount ₹
I. **Equitiy and Liabilities**		
(i) Shareholder's Funds :		
(a) Share Capital		15,00,000
(b) Reserves and Surplus		10,00,000
(ii) Non-Current Liabilities		
Long Term Borrowings	1	15,00,000
(iii) Current Liabilities		
(a) Trade Payables		6,00,000
(b) Other Current Liabilities	2	1,00,000
(c) Short Term Provision	3	3,00,000
Total		**50,00,000**
II. **Assets**		
(i) Non Current Assets		30,00,000

(ii) Current Assets		
(a) Inventory		10,00,000
(b) Trade Receivables		6,00,000
(c) Cash and Cash Equivalents		4,00,000
Total		**50,00,000**

Illustration 30 :

The following is the balance sheet of Anuradha Ltd. as at 31st March 2017 :

Notes :

(i) Long Term Borrowings : 9% Loans – 10,00,000, 12% Debenture – 5,00,000, total = 15,00,000.

(ii) Other Current Liabilities : Outstanding Expenses- 1,00,000.

(iii) Short term Provision : Provision for tax- 3,00,000.

Other information are as follows : Net Revenue from operations- 75,00,000, Cost of Revenue from Operations- 60,00,000, Operating Expenses- 6,00,000

You are required to calculate following ratios:-

(i) Current Ratio (ii) Quick Ratio (iii) Debt- Equity Ratio (iv) Inventory Turnover Ratio (v) Proprietory Ratio (vi) Gross Profit Ratio (vii) Operating Ratio (viii) Operating Profit Ratio (ix) Net Profit Ratio

Solution :

(i) Current Ratio = $\frac{\text{Current Assets}}{\text{Current Liabilities}} \times 100 = \frac{20,00,000}{10,00,000} = 2:1$

Current Assets = Inventory + Trade Receivables + Cash & Cash Equivalents

= 10,00,000 + 6,00,000 + 4,00,000 = ₹ 20,00,000.

Current Liabilities = Trade Payables + Other Current liabilities + Short Term Provision

= 6,00,000 + 1,00,000 + 3,00,000 = ₹ 10,00,000.

(ii) Quick Ratio = $\frac{\text{Quick Assets}}{\text{Current Liabilities}} = \frac{10,00,000}{10,00,000} = 1:1$

Quick Assets = Current Assets - Inventory = 20,00,000 – 10,00,000 = ₹ 10,00,000.

(iii) Debt Equity Ratio = $\frac{\text{External Liabilities}}{\text{Internal Liabilities}} = \frac{25,00,000}{25,00,000} = 1:1$

External Liabilities = Non-current liabilities + Current Liabilities

= 15,00,000 + 10,00,000 = ₹ 25,00,000

Internal Liabilities = Share Capital + Reserves and Surplus = 15,00,000 + 10,00,000 = ₹ 25,00,000

(iv) Inventory Turnover Ratio = $\frac{\text{Cost of Revenue from operations}}{\text{Average Inventory}} = \frac{60,00,000}{10,00,000} = 6$ times

Since, there is no information about opening and closing stock. Hence, Inventory ratio has been calculated on the basis of given amount of inventory.

(v) Proprietory Ratio = $\frac{\text{Shareholder's Funds}}{\text{Total Assets}} = \frac{25,00,000}{50,00,000} = 0.5:1$

Shareholders funds or Internal Liabilities = ₹ 15,00,000 + ₹ 10,00,000 = ₹ 25,00,000

(vi) Gross Profit Ratio = $\frac{\text{Gross Profit}}{\text{Revenue from operations}} \times 100 = \frac{15,00,000}{75,00,000} \times 100 = 20\%$

Gross Profit = Revenue from operations – Cost of revenue from operations

= 75,00,000 – 60,00,000 = ₹ 15,00,000

(vii) Operating Ratio = $\frac{\text{Operating Cost}}{\ } \times 100 = \frac{66,00,000}{\ } \times 100 = 88\%$

Revenue from Operations 75,00,000

Operating Cost = Cost of Revenue from operations + Operating Expenses = 60,00,000 + 6,00,000 = ₹ 66,00,000

(viii) Operating Profit Ratio = $\dfrac{\text{Operating Profit}}{\text{Revenue from operations}} \times 100 = \dfrac{9,00,000}{75,00,000} \times 100 = 12\%$

Operating Profit = Revenue from operations – operating cost = 75,00,000 – 66,00,000 = ₹ 9,00,000

(ix) Net Profit Ratio = $\dfrac{\text{Net Profit}}{\text{Revenue from operations}} \times 100 = \dfrac{750,000}{75,00,000} \times 100 = 10\%$

Net Profit = Operating Profit – Non Operating Expenses

= 9,00,000 – (9% of 10,00,000 + 12% of 5,00,000) = 9,00,000 – (90,000 + 60,000)

= ₹ 7,50,000

Net Profit has been calculated by substracting interest on long term loans and interest on Debentures as non-operating expenses.

Summary

Ratio : The arithmetical expression of relationship between two numbers is called ratio. It expresses meaningful relationship.

Ratio Analysis : Ratio analysis is a method of presenting items or group of items of financial statements establishing relationship in simple manner.

Expression of Ratios : Ratios can be expressed in three ways :

(i) As proportion (ii) As rate

(iii) As percentage

Objectives of Ratio Analysis : Various objectives of ratio analysis are as follows :

(i) Helpful in financial analysis (ii) Simplifies figures

(iii) Knowledge of liquidity (iv) Knowledge of long term solvency

(v) Knowledge of activity (vi) Knowledge of profitability

(vii) Facilitates comparison (viii) Facilitates trend analysis

Limitations of Ratio analysis:

(i) Inherent limitations (ii) Affected by window dressing.

(iii) Unbelievable comparison based different accounting policies.

(iv) Effect of personal ability and bias of the analyst.

(v) Lack of qualitative analysis (vi) To comparison other ratios required

(vii) Unable to future projections (viii) Lack of knowledge about trend.

Precautions in using ratios :

(i) The user must be capable to understand accounting data.

(ii) It is essential to provide information timely to the users immediately after preparation of financial statements.

(iii) It is essential to consider not only benefits derived from ratios but also cost incurred.

(iv) Only essential ratios should be presented before the user.

(v) It is essential to revise the ratios while there is a change in scenario.

Formula of Accounting Ratios

A. Liquidity Ratios :

1. Current Ratio = $\dfrac{\text{Current Assets}}{\text{Current Liabilities}}$

2. Liquid Ratio = Liquid Assets

Current Liabilities

B. Solvency Ratios :

3. Debt-Equity Ratio = $\frac{\text{External Liabilities}}{\text{Internal Liabilities}}$ or $\frac{\text{Total Debt}}{\text{Shareholder's Fund}}$

4. Proprietory Ratio = $\frac{\text{Proprietory's Fund}}{\text{Total Assets}}$

5. Solvency Ratio = $\frac{\text{Total Debt}}{\text{Total Assets}}$

6. Interest Coverage Ratio = $\frac{\text{Profit before Interest and Tax}}{\text{Fixed Interest Charges}}$

C. Activity Ratios :

7. Stock/Inventory Turnover Ratio = $\frac{\text{Cost of Revenue from operations}}{\text{Average Inventory}}$

8. Trade Receivables Turnover Ratio= $\frac{\text{Net Credit Revenue from operations}}{\text{Average Trade Receivables}}$

9. Average Collection Period = $\frac{\text{No. of days in a year}}{\text{Trade Receivables Turnover Ratio}}$

10. Trade Payables Turnover Ratio = $\frac{\text{Net Credit Purchase}}{\text{Average Trade Payables}}$

11. Average Payment Period = $\frac{\text{No. of days in a year}}{\text{Trade Payables Turnover Ratio}}$

12. Total Assets Turnover Ratio = $\frac{\text{Revenue from operations or Cost of Revenue from operations}}{\text{Total Assets}}$

D. Profitability Ratios :

13. Gross Profit Ratio = $\frac{\text{Gross Profit}}{\text{Net Revenue from operations}} \times 100$

14. Operating Ratio = $\frac{\text{Cost of Revenue from operations + operating expenses}}{\text{Net Revenue from operations}} \times 100$

15. Operating Profit Ratio = $\frac{\text{Operating Profit}}{\text{Net Revenue from operations}} \times 100$

16. Net Profit Ratio = $\frac{\text{Net Profit}}{\text{Net Revenue from operations}} \times 100$

17. Return on Investment or ROI = $\frac{\text{Net Profit before Interest \& Tax \& Dividend}}{\text{Net Revenue from operations}} \times 100$

E. Investment Analysis Ratios :

18. Earning Per Share or EPS = $\frac{\text{Net Profit After Tax – Preference Share Dividend}}{\text{No. of Equity Shares}}$

19. Dividend per Share or DPS = $\frac{\text{Dividend Paid to Equity Shareholders}}{\text{No. of equity shares}}$

20. Dividend Pay-out Ratio = $\frac{\text{Dividend per Share}}{\text{Earning Per Share}} \times 100$

GLOSSARY

Financial Ratios : The ratios which are calculated between two items or groups of items, given in the balance sheet. These are also called balance sheet ratios.

Operating Ratio : The ratios which are calculated between two items or groups of items, given in the statement of Profit & Loss.

Combined Ratios: The ratios, calculated by taking one item from balance sheet and other from statement of profit and loss are called combined ratios.

Liquidity : Liquidity means, ability of a firm to meet out its current obligations or short term loans and liabilities.

Solvency : Solvency means, ability of a firm to meet out its long term loans and liabilities.

Activity Ratios: The ratios which indicate efficient use of Capital and assets by the firm.

Profitability: Profit earning capacity of a firm which is measured in relation to sales or investment.

Current Assets: Those assets which can be converted into cash in ordinary course of business, in normal operating cycle or within twelve months after the date of balance sheet.

Current Liabilities: Those liabilities which are to be paid in normal operating cycle or within twelve months from the date of balance sheet.

Liquid Assets: Those assets which can be converted into cash or cash equivalents promptly. Therefore, liquid assets include all current assets excluding stock and prepaid expenses.

External Equity: External equity will be the total of long term loans, long term provisions and current liabilities of the firm.

Internal Equity / Shareholders' funds: Shareholders fund include share capital and reserves and surplus but exclude accumulated losses and fictitious assets.

Fictitious assets: Those expenses which can not be written off. Example, Expenses on issue of shares and debentures, Discount/Loss on issue of debentures, and underwriting commission etc.

Total Assets: Total assets include all non-current assets and current assets of the firm. It can also be known by adding non-current liabilities and current liabilities to share holders fund.

Fixed interest Charge: Interest to be paid on long term loans of the firm.

Trade Receivables: The amount to be realised from its debtors and receivables by the firm is called trade receivables.

Trade Payables: Total of the creditors and bills payable of the firm.

Cost of Revenue from operations: Cost of revenue from operations is calculated by adding cost of material consumed, Purchase of stock in trade, changes in inventory and direct expense (Carriage, wages) etc.

Operating Expenses: Total of all other expenses relating to main business other than cost of revenue from operations is called operating expenses.

Other Operating Incomes: Income earned during course of operations other than revenue from operations like commission and discount received.

Gross Profit: Excess of net revenue from operations over cost of revenue from operations is called gross profit.

Operating Profit: Excess of net revenue from operations over operating cost is called profit from operations.

Net Profit: Net Profit is the total of profit from operating activities and profit from non-operating activities of the firm.

Rate of Return on Investment : Rate of return earned on long term funds by a firm is called rate of return on investment.

Earning Per Share – (EPS): Income earned on each equity share by the firm is called EPS.

Dividend Per Share- (DPS): Amount of profit distributed to each equity shareholder by the firm is called DPS.

Dividend Payout Ratio: The ratio between dividend distributed per share and earnings per share is called dividend payout ratio.

Questions for Exercise

Multiple Choice Questions :

1. Stock Turnover Ratio of a concern is 6 times. This expression of the ratio is:
   (a) Pure Ratio (b) Rate Ratio
   (c) In the form of the percentage (d) None of these
2. The objective of Ratio analysis is:
   (a) Knowledge of liquidity position (b) Knowledge of Profitability
   (c) Knowledge of solvency position (d) All of the above
3. At the time of calculating ratio, one item is taken from balance sheet and other item is taken from statement of Profit and Loss, then the ratio is called :
   (a) Balance Sheet Ratio (b) Statement of Profit and Loss Ratio
   (c) Combined Ratio (d) None of these
4. Another name of working capital ratio is :
   (a) Liquid Ratio (b) Current Ratio
   (c) Absolute Liquid Ratio (d) Working Capital Turnover Ratio
5. Ideal Current Ratio is assumed:
   (a) 3:1 (b) 1:1 (c)2:1 (d)1:2
6. Which of the following assets is not taken into consideration to calculate liquidity ratio?
   (a) Inventory (b) Debtors (c) Cash (d) Bills Receivables
7. Credit period to customer of a company is 30 days. Its credit collection would be poor if its average collection period is:
   (a) 36 Days (b) 28 Days
   (c) 20 Days (d) 15 Days
8. If 365 days are divided by the trade payable turnover ratio, it becomes a ratio of:
   (a) Average age of Inventory (b) Average Collection Period
   (c) Average Payment Period (d)Cheque Collection Period
9. If operating ratio of a company is 78%, then operating profit ratio will be:
   (a) 100% (b) 22% (c) 28% (d) 24%
10. The inventory turnover ratio of a company is 4 and its cost of revenue from operations is 2,40,000, then average inventory will be :
    (a) 9,60,000 (b) 1,80,000
    (c) 1,20,000 (d) 60,000
11. The relationship between shareholder's funds and total assets of a concern is expressed by :
    (a) Debt-Equity Ratio (b) Solvency Ratio
    (c)Properietary Ratio (d) Return on Proprietor's
12. If earnings per share of a company is 6 and dividend per share is 4, then dividend payout ratio would be:
    (a) 50% (b) 25% (c) 150% (d) 66.67%

Very short Answer type Questions :

1. What is meant by ratio?
2. What is ratio analysis?

3. Give two limitations of ratio analysis?
4. Give two objectives of ratio analysis?
5. What do you mean by liquid ratio?
6. What is meant by solvency ratio?
7. What is financial ratio?
8. What is meant by inventory turnover ratio?
9. What is average collection period?
10. What do activity ratios indicate?
11. What is meant by average trade receivables?
12. What is meant by operating ratio?
13. Name any two profitability ratios based on sales?
14. What is difference between current ratio and liquid ratio?
15. Write formula of earning per share.
16. What is ideal liquid ratio?
17. The Debt-Equity Ratio of a company is 0.75:1. If company obtains long term loan, what effect will be on this ratio?
18. What does Interest Coverage Ratio indicate?

Short Answer Type Questions:

1. Write difference between current ratio and liquid ratio.
2. Explain importance of Ratio Analysis.
3. Write names of ratios depicting capacity of payment of Long Term Loans.
4. Write four limitations of Ratio Analysis.
5. Which items are included in the Shareholder's funds?
6. Explain Gross Profit Ratio and Net Profit Ratio?
7. What are the implications of high and low Trade Receivables Turnover Ratio?
8. How the cost of goods sold is calculated?
9. Explain meaning of capital employed, and how it is calculated?
10. Write meaning and importance of Operating Profit Ratio?
11. Inventory Turnover Ratio of a trading concern is 15times and value of average is 20,000. Goods are sold at 25% profit on sales. State the amount of profit.

Ans. Profit ₹ 1,00,000.

12. Working capital of a company is ₹ 90,000. If its current ratio is 2.5:1, then calculate current Assets

Ans. ₹ 1,50,000

13. Opening inventory of a concern is ₹ 20,000, closing inventory is 1.6 times of opening inventory. Inventory turnover ratio is 3.5 times and sales is ₹ 1,40,000. Calculate the Gross Profit.

Ans. GP ₹ 49,000.

14. Total Assets, Non-Current Liabilities and Current Liabilities of a company are ₹ 8,00,000, ₹ 2,00,000 and ₹ 1,00,000 respectively, then calculate (i) Debt-Equity Ratio, and (ii) Proprietary Ratio.

Ans. (i) 0.6:1 (ii) 0.625 : 1

Essay Type Questions :

1. What is Ratio Analysis? Explain its importance.
2. Write down limitations of Ratio Analysis.

3. What is meant by Activity Ratios? Explain in details three activity ratios.
4. What is meant by Return on Investment? Give its importance and explain procedure to calculate with the help of an illustration.
5. Explain (i) EPS (ii) DPS and (iii) Dividend Payout Ratios, reflecting investment analysis.

Answer of Multiple Choice Questions

Question No.	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)
Answer	b	d	c	b	c	a	a	c	b	d	c	d

Numerical Questions :

1. Calculate Current Ratio and Liquid Ratio in following conditions :
   (a) Current Liabilities ₹ 48,000 ; Inventory ₹ 78,000; working capital ₹ 96,000
   (b) Working Capital ₹ 40,000 ; Liquid Assets ₹ 35,000; Stock ₹ 25,000; & Prepaid expenses ₹ 10,000
   (c) Current Assets ₹ 2,00,000 ; Creditors ₹ 10,000 ; Current Liabilities ₹ 80,000 & Inventory ₹ 60,000

Ans. (a) 3:1, 1.375 : 1 (b) 2.33:1, 1.17:1 (c) 2.5:1, 1.75:1

2. Solve the following:
   (a) Current Liabilities of a company are ₹ 4,00,000. Its current ratio is 2.5:1 and Liquid Ratio is 1.5:1. Calculate the value of current assets, liquid assets and inventories.
   (b) If the current ratio is 2.5, Liquidity ratio is 1.6 and working capital ₹ 90,000. Find the value of current assets, current liabilities and stock.

Ans. (a) ₹ 10,00,000, 6,00,000, 4,00,000 (b) ₹ 1,50,000, 60,000, 54,000

3. From the following information of Garg Ltd. Calculate (i) Debt-Equity Ratio (ii) Proprietory Ratio (iii) Solvency Ratio.
   Tangible Assets ₹ 3,00,000; Non-Current Investments ₹ 2,40,000; Trade Receivables ₹ 90,000; Other Current Assets ₹ 70,000; Long Term Borrowings ₹ 2,00,000; Long Term Provisions ₹ 1,00,000; Short Term Borrowings ₹ 20,000; Other Current Liabilities ₹ 60,000.

Ans. (i) 1.875:1 (ii) 0.457:1 (iii) 0.543:1

4. From the following details, calculate (i) Opening Inventory, (ii) Closing Inventory (iii) Trade Receivables Turnover Ratio.
   Cost of Revenue from operations ₹ 4,00,000; Gross Profit 20% on sales; Stock Turnover Ratio 5 times; Closing Inventory is ₹ 32,000 in excess of opening inventory; Opening Trade Receivables is ₹ 50,000; Closing Trade Receivables are 1.5 times of opening Trade Receivables.

Ans. (i) ₹ 64,000 (ii) ₹ 96,000 (iii) 8 times.

5. Calculate Trade Receivables Turnover Ratio and Average collection period from the following:-
   Total Revenue from operations for the year - ₹ 8,23,000; Cash Revenue from operations being 50% of Total Revenue; Opening Trade Receivables - ₹ 50,000; Cash received from Trade Receivables - ₹ 3,76,500; Discount Allowed to Debtors- ₹ 15,000; Revenue from operations return, out of credit revenue from operations- ₹ 10,000.

Ans. (i) 7.3 times (ii) 50 days, Hint : Prepare Receivables Account and find closing balance ₹ 60,000.

6. Calculate Gross Profit Ratio from the following informations :
   Cash Revenue from Operations 40% of Total Revenue; Total Purchases ₹ 13,50,000; Credit Revenue from Operations ₹ 9,00,000, Excess of closing stock over opening stock ₹ 75,000.

Ans. 15%

7. From the following informations of Tanvi Ltd., Calculate :
   (i) Working Capital Ratio, (ii) Quick Ratio; (iii) Inventory Turnover Ratio; (iv) Debt-Equity Ratio; (v) Solvency Ratio (vi)Gross Profit Ratio; (vii) Operating Ratio; (viii) Operating Profit Ratio (ix) Net Profit Ratio.

Informations : Revenue from operations ₹ 2,00,000; Purchases ₹ 1,20,000 ; Opening Inventory ₹ 12,000; Closing Inventory ₹ 18,000; Wages ₹ 8,000; Selling Expenses ₹ 2000; Tangible Fixed Assets ₹ 2,12,000; Other Current Assets ₹ 50,000; Current Liabilities ₹ 30,000 ; Equity Share Capital ₹ 1,00,000 ; 7% Preference Share Capital ₹ 80,000; Reserves ₹ 10,000 ; and 8% Debentures ₹ 60,000.

Ans. (i) 2.27:1 (ii) 1.67:1 (iii) 8.13 times (iv) 0.47:1 (v) 0.32:1 (vi) 39% (vii) 62% (viii) 38% (ix) 35.6%

8. From the following information of Rishabh Ltd. find out :

(i) Gross Profit Ratio, (ii) Operating Ratio, (iii) Operating Profit Ratio, (iv) Net Profit Ratio, (v) Return on Investment, (vi) Interest Coverage Ratio.

Informations : Revenue from operations ₹ 4,00,000, Cost of Revenue from operations ₹ 2,25,000, Interest on Short Term Loan ₹ 5,000, Office Expenses ₹ 25,000, Selling Expenses ₹ 50,000, Rent Received ₹ 4000, Loss by Fire ₹ 10,000, Interest on Long Term Loan ₹ 10,000, Commission Received ₹ 5,000, Capital Employed ₹ 6,00,000, Income Tax rate may assume 30%.

Ans. (i) 43.75% (ii) 75% (iii) 25% (iv) 14.7% (v) 15.67% (vi) 9.4 times

9. From the following information, calculate : (i) Earning Per Share-EPS, (ii) Dividend Per Share – DPS & (iii) Dividend Payout Ratio

Profit Before Interest & Tax-₹ 5,00,000, Interest on Long Term Loans-₹ 2,00,000, Provision for Tax-30%, Retained Earnings-₹ 60,000, Equity Share Capital-divided into shares of ₹10 each ₹ 3,00,000.

Ans. (i) 7 (ii) 5 (iii) 71.43%.

10. Following informations are given to you :

	₹	₹
Revenue from operations		6,00,000
Less : Purchases	3,00,000	
Changes in Inventories		
(Opening Inventory –Closing Inventory) (60,000 – 40,000)	20,000	
Direct Expenses	80,000	4,00,000
Gross Profit		2,00,000

	Particulars	Note No.	Amount ₹
I	**Equity and Liabilities :**		
	(1) Shareholder's Funds:		
	(a) Share Capital		4,00,000
	(b) Reserves and Surplus	1	2,00,000
	(2) Non Current Liabilities (10% Debentures)		1,00,000
	(3) Current Liabilities		
	(a) Trade Payables		2,00,000
	(b) Other Current Liabilities		1,00,000
	Total		**10,00,000**
II	**Assets :**		
	(1) Non Current Assets		5,00,000
	(2) Current Assets		
	(a) Inventory		40,000
	(b) Trade Receivables		2,60,000
	(c) Cash and Cash Equivalents		2,00,000
	Total		**10,00,000**

Note : 1	**Reserves and Surplus:**	₹
	General Reserve :	50,000
	Profit & Loss:	1,50,000
		2,00,000

On the basis of the informations given above, calculate :

(i) Current Ratio (ii) Liquid Ratio (iii) Proprietory Ratio (iv) Debt-Equity Ratio (v) Inventory Turnover Ratio (vi) Trade Receivables Turnover Ratio (vii) Trade Payables Turnover Ratio (viii) Gross Profit Ratio.

Ans. (i) 1.67 : 1 (ii) 1.53 : 1 (iii) 0.60 : 1 (iv) 0.67 : 1 (v) 8 times (vi) 2.3 times (vii) **1.5** times (viii) 33 1/3 %.

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12

Ethics in Accounting

Learning objectives :

After studying this chapter, you will be able to know about the following:

- Concept of ethics
- Definition of ethics
- Nature of ethics
- Sources of ethics
- Ethics and professional accountant
- Ethics in accounting transactions
- Window dressing

Introduction :

Ethics is not a new discovery. For centuries, philosophers have been trying to identify its various aspects in the process of understanding human behaviour. The English term 'ethics' is considered to have been derived from the Greek term 'ethos' which means 'way of living'. The subject of ethics or Neeti Shastra is a branch of philosophy, which is related to social behaviour of persons. This examines the logical justification of our behavioural decisions. This tells us what is ethically right or wrong, what is just or unjust, what is suitable or unsuitable.

Definitions :

Various definitions of ethics have been given, some of them are as follows:-

According to **R. Wayne Mondy–** "Ethics is subject, which is related with the good or bad, or right or wrong regarding ethical duties".

According to **Paul and Elder –** "Ethics is a group of concepts and principles, which tells us which behaviour will help or harm living beings.

According to **Cambridge Dictionary of Philosophy –** "The meaning of ethics is usually considered to be the ethical principles of some special tradition, group or persons."

According to **Websters New Words Dictionary –** "Ethics is subject of standards of behaviour or ethical decisions. This is a code or system for a special objective, religion, group or profession.

In conclusion, it can be said that ethics is set of such rules or principles in which mutual relations of all persons for interest of all of them are included in such a manner that respect for needs of everyone is maintained.

Nature :

The nature of ethics can be understood in the following manner:-

1. Ethics is related with human beings only. Both persons and society are included in it. This is because a person only can distinguish between good or bad and select better on ethical basis.
2. This is a branch of systematic knowledge, which is related with social science. This is a regulatory system of value

based decisions, and personal and social behaviour.

3. This is related with voluntary conduct and behaviour of human being. Conduct in ignorance or under pressure of circumstances are its exceptions. For example, killing of enemy by a soldier while safe-guarding frontiers of the nation cannot be considered as violation of policy of non-violence.
4. This includes universally acceptable rules of human conduct and behaviour. For example, telling truth, non-violence, piousness, humility, sympathy, non-hoarding, not being jealous etc.
5. The principles of ethics are not bound by the limits of time and place. These are valid always and at all places. No religion, nation or society will ever say that truth and non-violence are bad and redundant. Ethics are fundamental elements of human values therefore, these are also called Sanatan or perpetual religion.
6. For any decision to be ethical, it should contain the following features:-
   i. Best for all related ones
   ii. Honest
   iii. Suitable and acceptable
   iv. Justice must not only be resulting but should also appear to be resulting
   v. Ethically correct
   vi. Just and uniform

Sources of Ethics :

Two American experts in ethics George and John Stever have suggested the following sources of ethics:-

1. **Legal system :** Law in vogue in any country broadly represents the ethical standards of that country. Thus, the education of ethical side of life is obtained through law.
2. **Religion :** All religions contain teachings of ethical behaviour for persons. These teachings are important and effective sources of ethical behaviour.
3. **Hereditary Legacy :** Zoologists in their recent researches have found such evidences which indicate that the virtues of goodness related with ethical behaviour of a person may be his hereditary legacy.
4. **Philosophical Systems :** Scholars have evolved many philosophical systems regarding life and duties since ancient times. These systems outline various aspects of ethical behaviour.
5. **Code of conduct :** This may be divided in three primary groups:-
   i. Code of conduct of company:- This normally portrays brief, highly generalized and major expectations about normal behaviour.
   ii. Operational policies of company:- This includes complaint reddressal of customers, policies about appointments, offering gifts etc. Which protect against unethical transactions.
   iii. Professional codes of conduct:- Professional institutions such as Institute of Chartered Accountants of India have defined codes of conduct for their members, which accomplish important task of ensuring ethical behaviour of their members.
6. **Cultural experiences :** There are several such cultural rules, traditions and standards, which regulate the conduct and behaviour generation - after – generation. These social rules play a major role in giving proper shape to personal values.

Ethics and professional accountants :

Accounting provides financial information. Various stakeholders in business such as shareholders, loan providers, customers, employees, government etc. Come to know about the true financial position of business through accounting only. This helps all of them in decision making. Besides providing financial information, accounting plays an important role in providing safety of assets of the business. When assets are valued at correct price in accounts, their theft or other misuse is not possible.

For this reason, the pen of an accountant is said to be very powerful. This is necessary that accountants appreciate their capacity and responsibility and behave ethically while preparing accounts. In fact this is due to complete ethical adaptation in accounting that the profit of business is justifiably distributed among various stakeholders and economic security of business is ensured. Many such examples have appeared in India and abroad which showed that because of non adoption of ethics in accounting, large business organisations got demolished and various stakeholders had to face economic injustice.

The most precious asset of an accountant is his honest image. Professional accountant has an important role to play in the society. Investors, employees, loan providers, government and public at large depend on professional accountant in many ways. They provide financial report of high quality, effective financial management, and effective advice regarding matters related with business and taxation. The conduct and behaviour of professional accountants in providing such services affect economic well-being of the nation. Professional accountants world wide are expected to provide their best services to the society, which are absolutely in compliance with the ethical needs. Various institutions of professional accountants such as the American Institute of Certified Public Accountants, the Indian Institute of Chartered Accountants of India etc. have issued codes of conduct for their members, so that high ethical behaviour of the members may be ensured.

While doing accounting, it should be ensured that all entries are according to rules and these are based on vouchers. A procedure should be adopted so that the possibility of making entries in a fraudulent manner and manipulating the same is ruled out. This can be understood with respect to various transactions as follows:-

a. Regarding cash receipts :

i. All the vouchers related with cash receipts should bear serial number and these should be arranged in order.

ii. All vouchers bear the signature of authorities.

iii. All accounting entries must have reference of serial number of voucher.

iv. All cash receipts should be related to business.

v. Bank receipts should be recorded on the basis of counter foils of pay-in-slip or any other voucher.

b. Regarding cash payments :

i. Every payment should be recorded based on the printed receipt issued by the receiver. This should also be authenticated by the signatures of officer of the organisation.

ii. Payment should be related to business.

c. Regarding goods :

i. The accountant should ensure genuineness of invoice while entering purchase of goods. This should be seen that the invoice bears name of seller, date and amount and the same should have been issued in the name of the business.

ii. Regarding purchase return of goods, accountant should ensure appropriateness of debit note sent by the supplier. Such a note should bear the name of the supplier, date, particulars of the goods returned and amount in a clear manner and should also bear signature of authorizing person.

iii. Goods sold are recorded on the basis of sales invoice. Such invoices should bear name and address of customer, date, particulars of goods, rate of trade discount and amount in a clear manner and should bear the signatures of authorizing person.

iv. While entering sales returns into accounts, the credit note sent by the organisation to the customer returning goods is based upon. This credit note should bear name of customer, date, particulars of goods returned and amount in clear manner, signatures of authorised person. This has been found that the unethical accountants used to enter goods related transactions without any proper basis. Generally the objective of such treatment is to exaggerate the figure of sales.

d. Regarding other assets and liabilities :

i. While making accounting entries for other assets such as plant, machinery, buildings etc., the accountant should have vouchers in support, which are properly authenticated by signatures of authorized officer. These vouchers should show that

1. The ownership of asset is with the organisation, and
2. The asset actually exists.

ii. While entering various liabilities such as loans received from persons or organisations, the accountant should have sufficient proof in the form of voucher, which should show that

1. The liability is related with business, and
2. The same is authenticated properly.

Window dressing :

In order to show the financial position better than the actual one, the accountants often resort to window dressing of transactions. Normally, this practice is adopted at the end of the financial year. Some examples of the same are as follows:

❑ In order to motivate the debtors to make complete payment before the end of the accounting year, an offer of discount is made. This motivates debtors to make early payment and due to rise in cash balance, liquidity position of the business appears to become better than the actual one.

❑ Making alteration in the valuation method of stock for the purpose that its value gets inflated and profits consequently are also inflated.

❑ Altering the method of depreciation on asset so that depreciation is understated, income of the asset is increased and there by the profits are overstated.

The objective of such transactions is to alter the actual position of accounts. Therefore, this is not ethical. This hampers providing correct information to stakeholder through the accounts of the business.

Questions for Exercise

Very short answer type questions :

1. What is ethics?
2. How was the term ethics evolved?
3. With what is ethics related?
4. Who discovered ethics being hereditary?

Short answer type questions :

1. What characteristics should a decision contain in order to be ethically correct?
2. How many types of codes of conduct are normally there?
3. How is professional accountants are related with ethics?
4. What points should be considered while making accounting for goods in an ethical manner?
5. Write a note on window dressing?

Essay type questions :

1. Define ethics and explain its concepts.
2. Throw light on the nature of ethics?
3. Explain various sources of ethics?
4. How the accounting of cash receipts and cash payment can be done on ethical basis?

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13

Application of Electronic Spreadsheet in Accounting

Learning objectives :

After studying this Chapter, you will :

- Know about the utility of Spread Sheet
- Know the features of Microsoft Excel
- Understand Spreadsheet sources and use them in Accounting.
- Perform financial analysis through Spreadsheets.
- Understand the elements of Excel Spreadsheets.
- Know the difference between Spreadsheet and Workbook

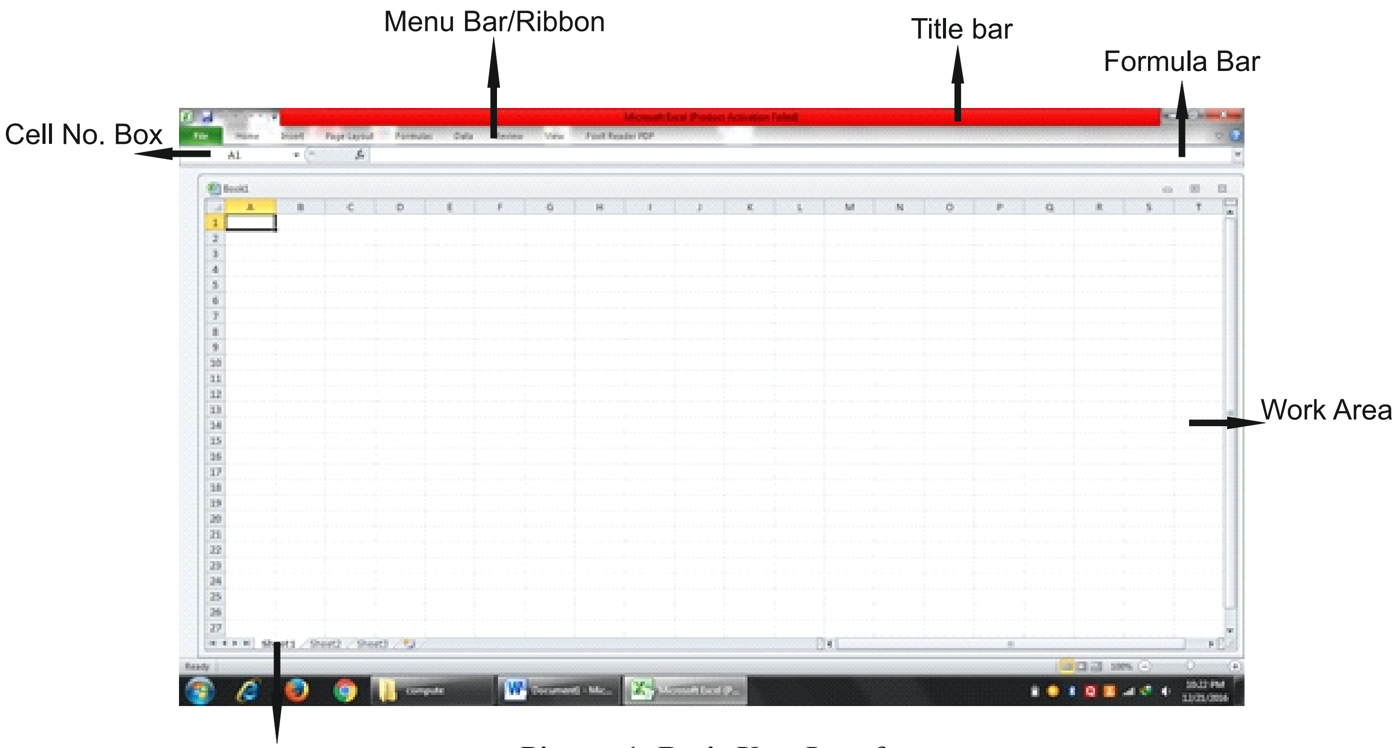
Introduction to Excel

Excel is a spreadsheet application developed by Microsoft. It is used to store, organize and analyze data. It facilitates the use of calculations, graphing tools, pivot tables, and macro programming languages (which are called visual basics) etc. Excel is part of Microsoft Office.

Excel is a spreadsheet program created in certian blocks, with the help of which one can keep and view various data in a tabular form. One of the special features of Excel is that, it also allows the user to perform different types of calculations automatically. It is Windows-based software that has a very large spreadsheet. Each block in this spreadsheet inputs data and can perform all the functions of DOS based software Lotus. It is easily operated through mouse and formatting can be done as per the need. Since Excel is part of Microsoft office, the data used in this software can be imported or exported with MS Access, MS power point and MS Word software, as per the requirement. A worksheet appears on the screen after loading the Excel Software.

Every file in Excel is known as a workbook. There can be many worksheets in a workbook. A worksheet is divided into rows and columns. Each column is displayed with in alphabet, whereas rows are in numbers. The intersection between a row and a column on a spreadsheet is termed as cell. The identification of a cell is done by the numbers and letters for rows and columns respectively. If the row is numbered as 5 and E represents column, the cell will be identified as E5. A cell starts with A1. Text, number or mathematical formula can be inserted in a cell.

A worksheet is located just above the status bar and can be entered by making a click on it. By default, three worksheets are already created in Excel. Select /Insert Worksheet can be followed to create a new worksheet. Inorder to change the name of the worksheet that is to rename a sheet, simply right-click on the name of the sheet that you wish to rename. Its major elements and actions have been explained further in the chapter. In MS excel, the user will see a screen displayed in Picture : **This screen is known as the basic user interface.**



Picture 1: Basic User Interface

1. Backstage view

Office Backstage View offers options for sharing, opening and printing the document. After clicking on the File tab, the backstage view of Microsoft Excel can be seen. In this, the file gives the options to save, open, print, etc., through the menu. Various types of instructions related to the file are explained below:

New- To create a new workbook, select File / New in the menu bar or press (CTRL+N) keys or click the New button in the toolbar.

Open - To open a workbook already created, select File / Open in the menu bar or press (CTRL+O) keys or click on Open button in the toolbar.

Save - To save a workbook, select File / Save in the menu bar or press (CTRL+S) keys or click the Save button in the toolbar.

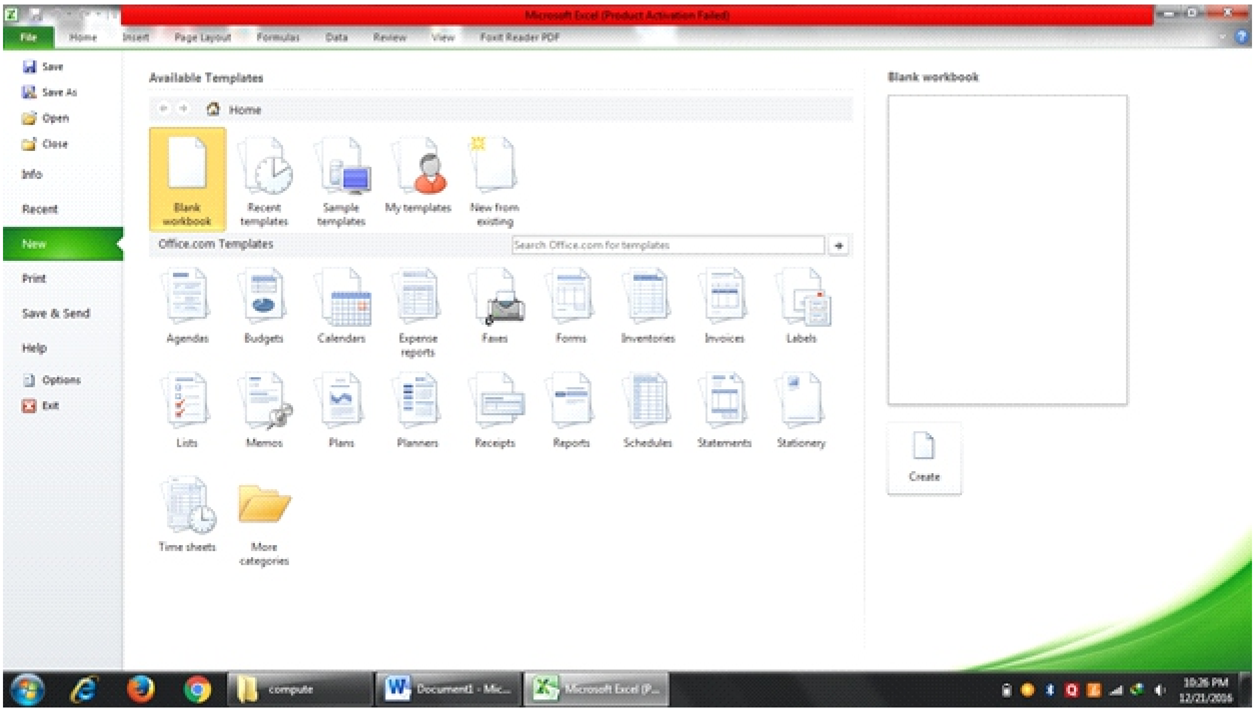
Print - To print a spreadsheet, select File / print in the menu bar or press (CTRL+P) keys or click the print button in the toolbar.

Print Preview - To see a workbook before printing, select File / Print Preview in the menu bar or click on the button before printing button.

Undo, Redo - Undo - Reverses the last command, use pull-down menu to undo several steps. Redo - Reverses the action of the Undo button, use the pull-down menu to redo several steps.

Inserting hyperlink - To insert a hyperlink, type the text in a field and click the hyperlink button and enter the address of the website to give hyperlink.

Zoom - Click the zoom button in the toolbar to zoom in to a workbook i.e. big or small.



Picture 2 : Excel Backstage View

2. Importance and use of Excel Spreadsheet

This is very simple and fast working software. It has many uses in business and profession. It can be made on a single sheet (spreadsheet). It can be used to make mathematical properties instantly of all kinds of digits and figures. By using several types of formulae various calculations can be done and saved as per requirement. After saving these threads, you can use and process the data several times.

Spread Sheet is known as a program. It can be used in a business for the following purposes :

(i) **Inventory Management:** It can be used for managing and controlling the stock of a business. The purchase, issue and valuation of the stock can be processed through spreadsheet.

(ii) **Calculation of working time:** Data can be stored in spread sheet. Time taken to complete a task can be calculated through spread sheet. Just like a ten minute time is taken by a laborer to manufacture a single unit, in this situation how much time will it take to produce five hundred units, it can be calculated faster by the spreadsheet. Similarly, the salary given to laborers and employees can be also calculated with the use of Excel.

(iii) **Accounting and Excel:** Accounting of a Income and expenditure can be maintained using Excel. Sales and income related expenses are inserted in cells. Thereafter with the application of formulae or commands net profit or loss can be calculated. Profit or loss in future can be also predicted. It can also be used to prepare budget. The budget can be made on the same spreadsheet for more than one units of production or sale.

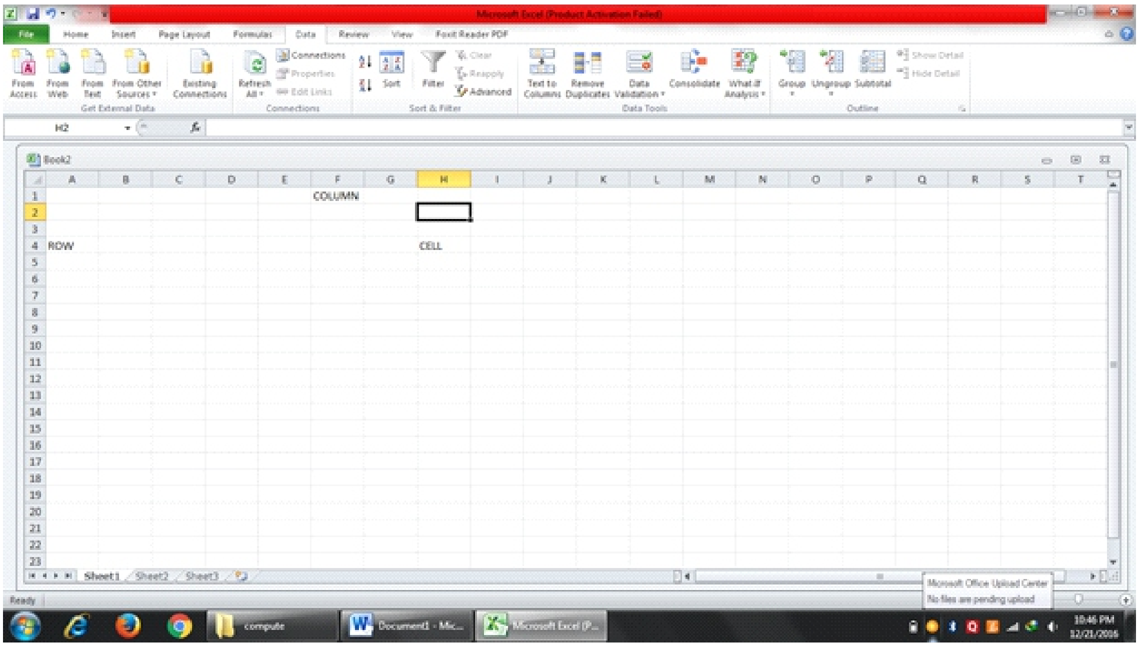
(iv) **Format of Bill:** The format of the bill or invoice can be produced using spreadsheet. In bill, the description, type, quantity per item of goods can be inserted through the columns and rows. The bill of purchase and sale can be sent by email.

(v) **Description of Clients:** The most important person in a business is customer. Details of customers can be kept in Excel. It can provide information about the business projects and proposals to the customers. Customers Names, Addresses, and Mobile numbers can be store. Similarly, the details of customers who purchased goods on credit can be also kept, so that total debtors can be calculated.

3. Structure of Workbook and Spreadsheet

An Excel document is composed of multiple worksheets and charts, which is also called workbook. A workbook is a file containing spreadsheets and charts. In a workbook we can keep many spreadsheets related to one type or one task. When you follow the steps outlined above to open Microsoft Excel, a workbook opens, which includes three worksheets by default. The main and largest part of the Excel screen is a spreadsheet that looks like a graph paper. Although the spreadsheet is very large in size and the entire spreadsheet does not appear on the screen at the same time, but its upper left part is shown on the screen from which we can start feeding our data. Each small block of a spreadsheet is called cell. This can be formatted according to the size and type of our data.

An Excel spreadsheet is a matrix of rows and columns .This is a type of sheet, which has vertical and horizontal parallel lines, which form a rectangular grid, termed as Cell in which the data is placed. We can also use the formula in this cell. More than three worksheets can be inserted as per the requirement. To add additional worksheets, the shortcut key combination (Shift+F1) can be utilized. A worksheet contains a total of 1,048,575 rows and 16,384 columns. For example, the address of the leftmost cell at the top shown in the picture is A1. Where A is column and 1 is row.



Picture 3 : Worksheet

The structure of a workbook can be understood by the following points.

(i) Sheet 1, sheet 2, and sheet 3 are displayed on the bottom of the workbook. These three sheets are different sheets on which work can be done simultaneously. To add a new worksheet, click on the tab after the sheet 3 . You can change the name of the worksheet by clicking on it and selecting Rename option as displayed in the picture.

(ii) For a particular cell selection ,click on the cell to select the cell, keep your cursor from the first cell A1.The address of the cell will be displayed in the name box and the content of the cell will be on formula bar. The address of the cell changes as it moves around in a sheet. You can easily move from one cell to another by pressing the tab or using the arrow keys.

(iii) Clicking on your mouse button allows more than one cell to be selected at a time and the selected cells are highlighted. In Microsoft Excel a cell can contain the following items:

- A number (such as decimal numbers, currency symbols punctuation marks)

· Textual content (in which letters, and other signs are included).

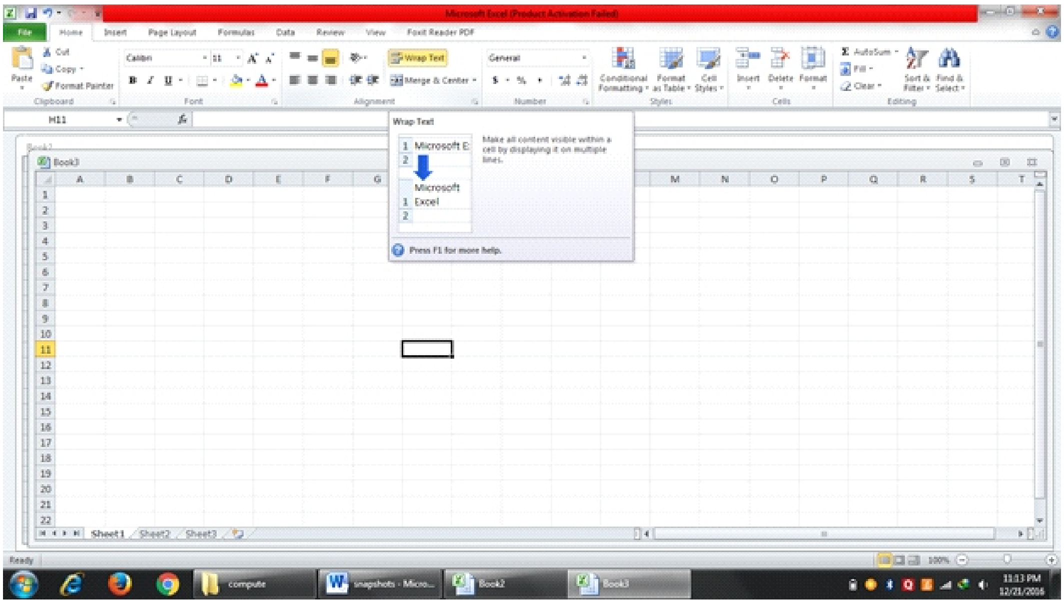
· A formula, which is a mathematical equation.

· A function which is representing complex operation as a shortcut.

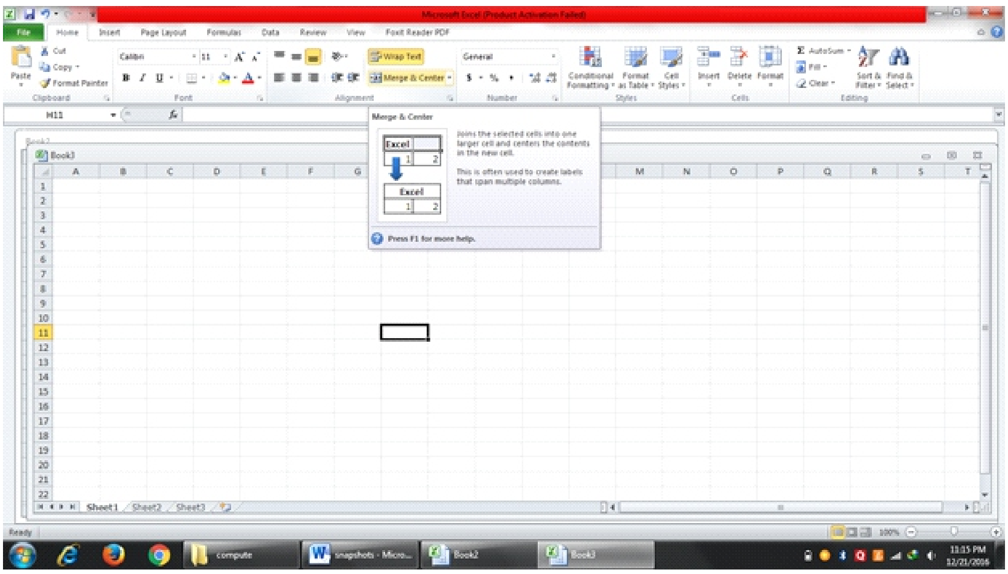
(iv) **Creating a New Workbook in Excel** : The following procedure is adopted to create a workbook : Click on Microsoft Office Excel 2010 and Click on New, thereafter Click on Blank Workbook; Context Menu (Excel opens an empty workbook by default.)

(v) **Save and Save as** :

By default Excel 2010 (*.xlsx)creates a new workbook in the 'unsaved format'. After making this workbook, this can be saved in the computer after using this. To save a newly created workbook, go to the File tab and select "Save As".



Picture 4 : Wrap Text



Picture 5 : Merge Cell

(vi) **Alignment group** : If you'd like to realign text in a cell to enhance the visual presentation of your data, select the cells that have the text you want to be aligned. On the Home tab choose one of the following alignment options : (horizontal movement): To horizontally align text, pick Align Text Left, Center, Align text Right. To vertically align text, pick Top Align Middle Align or Bottom Align.

Wrapping: When you have a long line of text, part of the text might not be visible. To fix this without changing the column width, click Wrap Text. To center text spanning several columns or rows, click Merge & Center. (Picture 4 & 5)

(vii) **Sort and Filters; Devices** - Data collection of your worksheet in a particular order is basically called sorting. For example, the list of students of a school can be done in alphabetical order, class-wise or any other order in the order such as of birth.

Sorting in alphabetical order : Select the column in the Excel, which you want to sort. On the Home tab, click on Sort and Filter Commands in the editing group. Select A to Z, Now the category (category) column will be organized in alphabetical order.

Sorting in small order : Select the cell in a column that you want to sort (column in which the number is entered). On the Home tab, click on Sort and Filter Commands in the editing group. Select from small to large; Now the information has been organized for a small number. You can also do reverse numerical order to make it smaller.

(viii) Create new worksheets and add rows and columns

Worksheet - To add a new worksheet, select Insert / Worksheet in the menu bar.

Row - To add a new row, select Insert / Row in the menu bar or highlight a row by clicking on the Row Level and right click in the mouse and select Insert.

Columns - To add a new column, select Insert / Column in the menu bar or by clicking on the column level, highlight a column and right click with the mouse and select Insert.

(ix) Resizing Rows and Column

There are two ways to reduce or increase the size of daily and column : A row can be resized by dragging on the bottom line of the cell level. Any column can be resized by dragging similar lines and keys or Select the format / row / height or format / column / width in the menu bar by entering the row or column level and enter the value of the row or column height or width.

(x) Moving and coping cells

To move the cell : To cut the cell from one place to another, select Edit / Cut in the menu bar or click the Cut button.

To copy the cell : To copy a cell, select Edit / Copy in the menu bar or click the Cut button.

Paste the cut or copied cell : To paste any cut or copied cell, select Edit / Paste in the menu bar or click the Paste button to paste the copied or copied cell.

Drag and Drop : If you have to take a cell just a little bit away then the drag and drop method is much simpler to move something from its place. Click on it and drag the left button of the mouse to the desired location.

(xi) Freeze Panes

If your worksheet is too large and it has lots of rows and columns, due to which you do not see the title of any text matter if you scroll the worksheet, then you can freeze its pans. This process will come as follows.

1. Click on the level of the row which is to be made visible
2. Now select the window / freeze pans in the menu bar.
3. To remove the freeze, select the window / unfreeze pans in the menu bar.

4. Features of MS Excel Spreadsheet

1. Managing and using many types of data on a large scale.
2. Data can be displayed through graph or chart.
3. Data can be exported or imported to the spreadsheet through the software.

4. Data can be calculated at a fast pace.

5. Once the formula is used, all calculations are processed. When the formula is changed it is automatically formatted in the new cell.

6. Spreadsheets can be used for different purposes, such as financial reporting, scientific research, tax calculation, budgeting, making business details etc.

7. Spreadsheets have built-in analytical abilities.

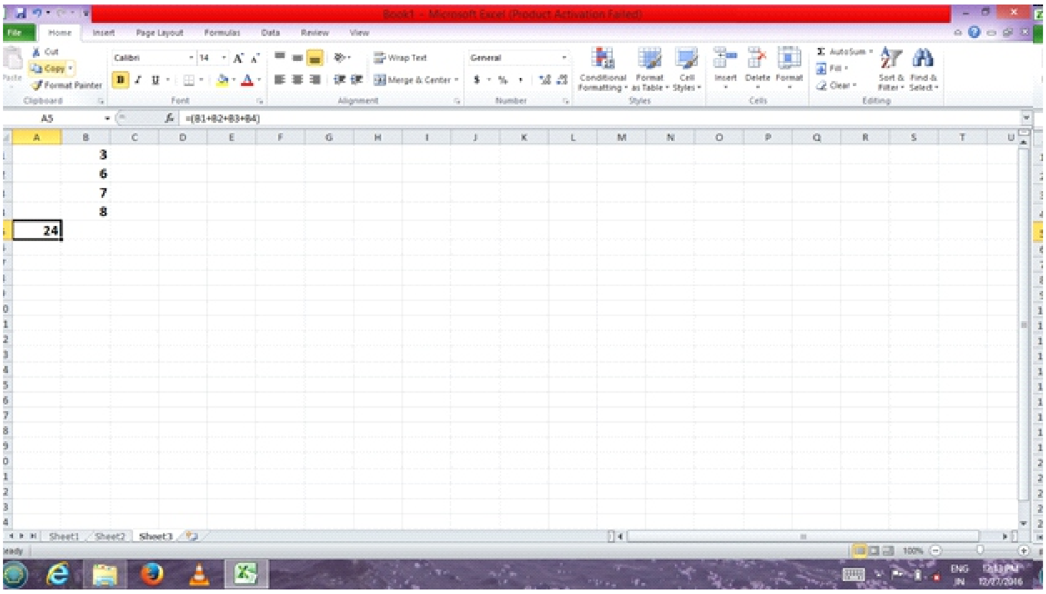
5. Formulae and Functions

Formulae are those equations that display calculations on values in your worksheet. In accounting these sources are used for different types of calculations. Microsoft Excel has the following basic formulas:

- Add (+)
- Deduct (-)
- Multiply (*)
- Division (/)

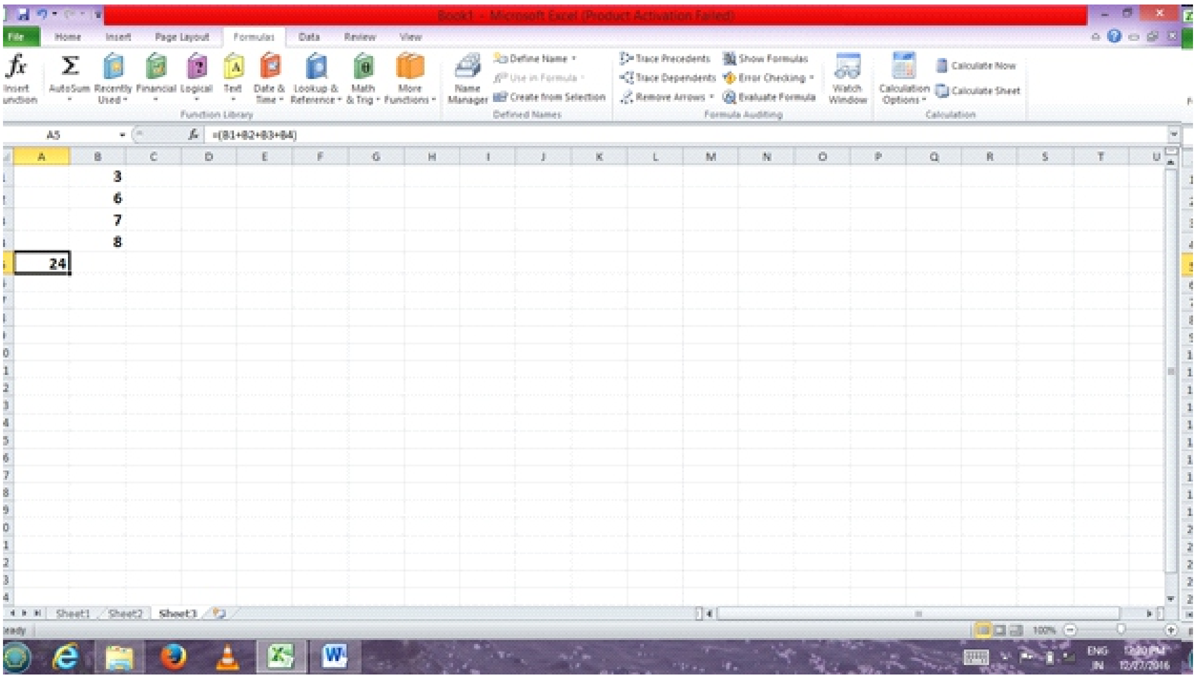
To make a simple calculation you have a formula. Next you will have to write the calculation after the symbol (=) . A Formula can be applied with reference to cell instead of the actual value or number. To apply formula with cell reference, you can write cell coordinates and associated operations after the equal symbol (=). Syntax is used for this. Syntax refers to the formula being installed by the relation of the cell. For example if you wish to add two numbers that are in cell A1(5) and cell A2(80),you need to give the formulae = (A1+A2).The result will be displayed in the cell where the cursor is placed. Similarly, many operations can be done in a form cell reference.

To edit a formula, click on a cell, the corresponding formula will be displayed in the Formula box (formula box) and change the formula and press enter. Excel has some predetermined formulas that are called functions. The advantage of the function is that you will not have to type the formula in it, which will save a lot of time. The syntax of the Addition Function is shown below in the Picture 6.



Picture 6 : Sum Formula

If we wish to add the values available in cell B1, B2, B3. We can add the figures of all these cells with the function =SUM (B1, B2, B3). It is called a function and within the brackets the content is called the arguments. Similarly, many functions can be used to calculate in excel sheets. You can find the functions available in the Function Library. Important functions are illustrated by the picture 7 below:



Picture 7 : Library Function

Application of Spreadsheet in Accounting

Spreadsheet can be used to calculate profit or loss of business. It is also used to prepare Balance Sheet. It is used to predict financial figures like profit, sales, cost, expenditure etc., in the coming years. This work can also be done through budget. It is a part of financial forecasting. The various applications of spreadsheet in accounting can be discussed as under :

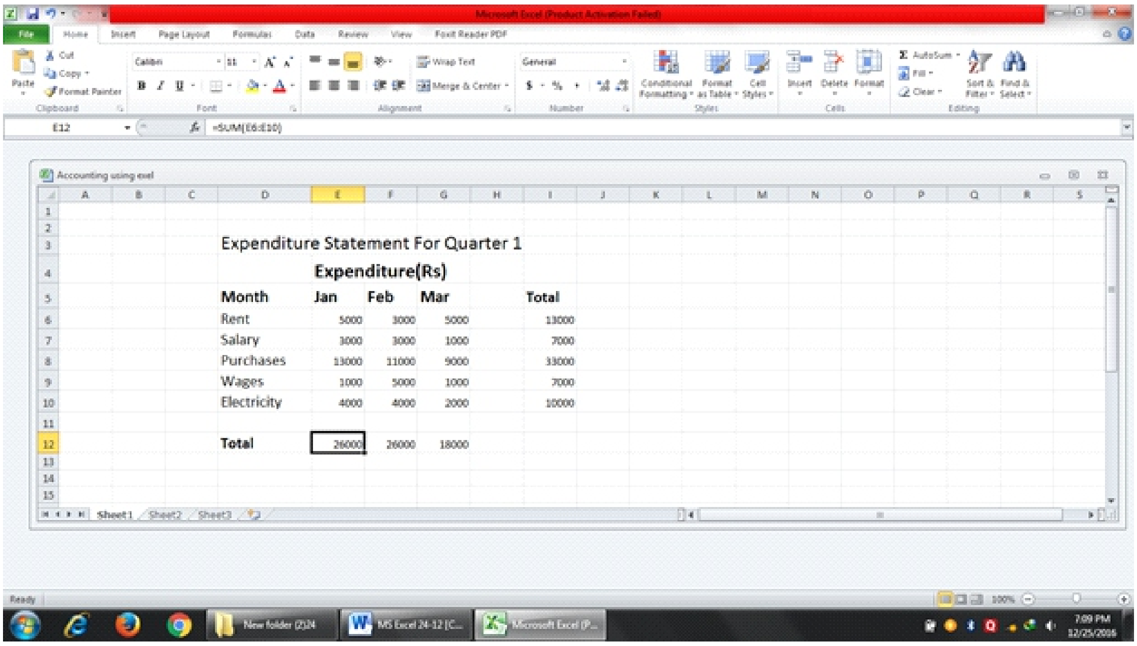
1. Text and Number in Accounting : Text and numbers can be entered in the spreadsheet with the same cell. Number of text in cell can be formatted for different purposes. It is widely used in accounting. To type the text, select the cell where the text is to be typed. Excel software makes clear difference between text and numbers easily. Therefore, the process of entering the number is similar to the text. This can be understood by example. Locate the Cell pointer at cell A1 through mouse or arrow key .Move and type by mouse or arrow. Type XYZ Ltd. in cell A1, Rsin cell A2, and type in 2005 to 2000 in cell A3. The financial year is to be registered in cell A4 to F4. It can also be done by typing 2005 in A4 and 2004 in B4 , pick up the pointer to the right by selecting B4 .Drag the mouse to the right side till F4. Subsequently the sales data from cell A 5 and F5 can be filled up. This worksheet can be displayed in picture 8.

	A	B	C	D	E	F
1	XYZ Ltd.					
2	(Rs.)					
3	2005 to 2000					
4	2005	2004	2003	2002	2001	2000
5	50000	60000	30000	15000	10000	5000

Picture 8 : Text & Number

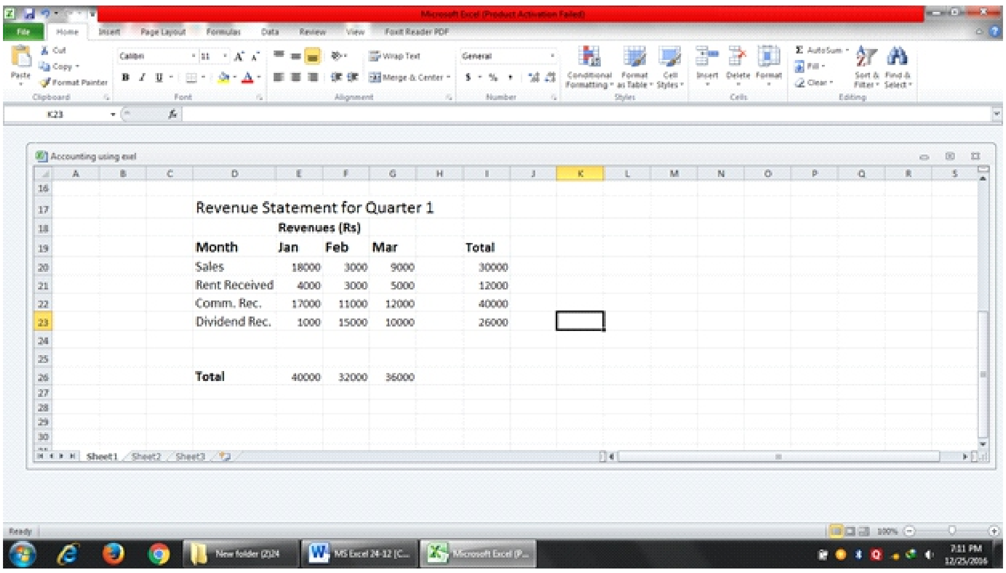
2. Calculation of Expenses : The total expenses for a particular period can also be calculated .Quarterly spending details are given for a business. The total expenditure of each month is shown in cell E12, F12 and G12. Similarly, the total of a particular month of the three months of any one expenditure has been shown in cell I6 to I10

.This is calculated by using SUM formula . For example the rent amount for three months will be=SUM(E6 : G6) which is executed in cell I6. Similarly, the total expenditure of the month of January has been calculated by the formula of SUM(E6 : E10). (Picture 9)



Picture 9 : Quarterly Expenses

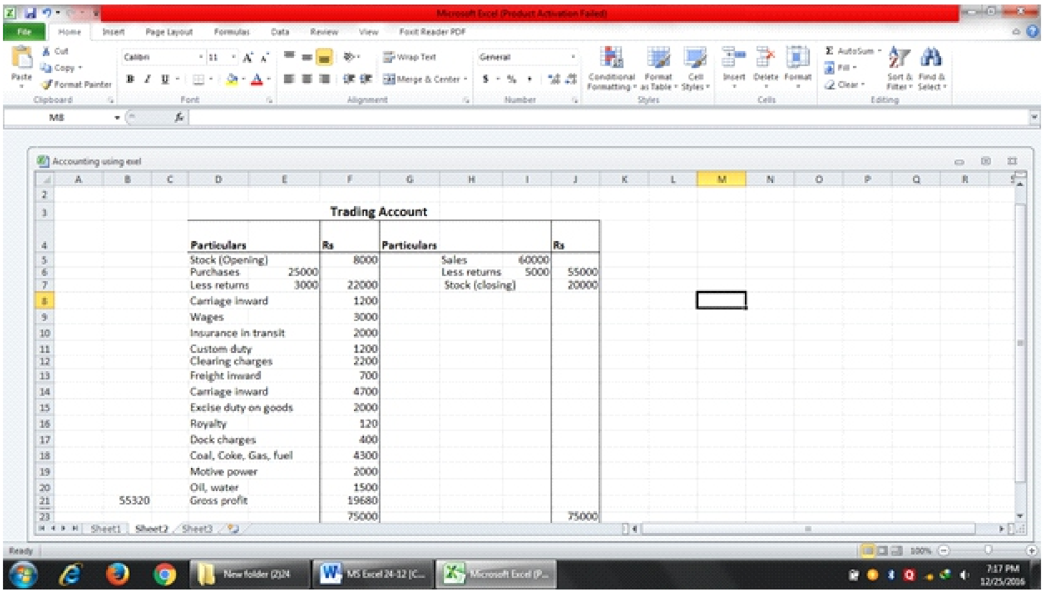
3. Calculation of income : The income in business can also be calculated by the spreadsheet. This calculation can be done to annual, half yearly, quarterly etc. This is done by deducting expenditure from total revenue of the business. For this purpose subtract function will be used. Data can be transferred from Excel Spreadsheets to create any type of budget related to income or expenditure. Similarly, higher or lower expenditure and revenue can be pointed out in any month. The calculation of quarterly income is shown in the table. (Picture 10)



Picture 10 : .Quarterly Income

4. Preparation of Trading Account : Trading account is prepared to calculate gross profit of the business.

Direct expenses are debited in the trading account. In this account purchases and sales, opening stock and closing stock are the main entries. If the total of its credit side is more than the total of the debit side then there is gross profit and if debit side is more than the total of credit side then gross loss is the result. It can be also made by spreadsheet. According to Figure 11, the cell J 6 and the J 7 show the sale and closing stock. The total of these cells is entered in cell J 23 by the formula SUM (J6 : J7). All the direct expenses have been calculated in the second phase in the same manner and are written in B21. Subsequently, cell B21 is deducted from J23 by using the formula = (J23 – B21), and that is placed at F21. (Picture 11)

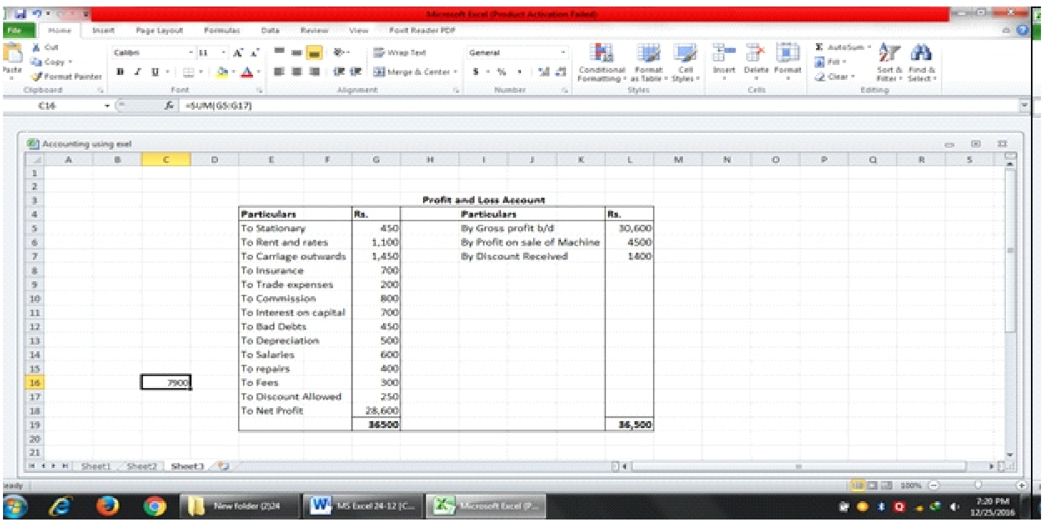


Trading Account

Particulars		Rs	Particulars		Rs
Stock (Opening)		8000	Sales	60000	
Purchases	25000		Less returns	5000	55000
Less returns	3000	22000	Stock (closing)		20000
Carriage inward		1200			
Wages		3000			
Insurance in transit		2000			
Custom duty		1200			
Clearing charges		2200			
Freight inward		700			
Carriage inward		4700			
Excise duty on goods		2000			
Royalty		120			
Dock charges		400			
Coal, Coke, Gas, fuel		4300			
Motive power		2000			
Oil, water		1500			
Gross profit		19680			
		75000			75000

Picture 11 : Trading account

5. Preparation of Profit Loss Account : All Indirect expenses and indirect incomes are transferred to profit-loss account. This final account is used to calculate net profit or net loss. If the credit side is more than the debit side then there is net profit situation and if the debit side is more than the credit side there is net loss situation. It can be explained through a spreadsheet. All the items from cell L 5 to L 7 belong to income. The total is shown in L 19 by using the formula = SUM (L5 : L7). Cell G5 to G17 are items of expenses whose total sum is written in C16, after which the net profit is calculated by deducting C16 from L19 and projected in cell G18. The profit and loss account is represented by the following figure (Picture 12) :

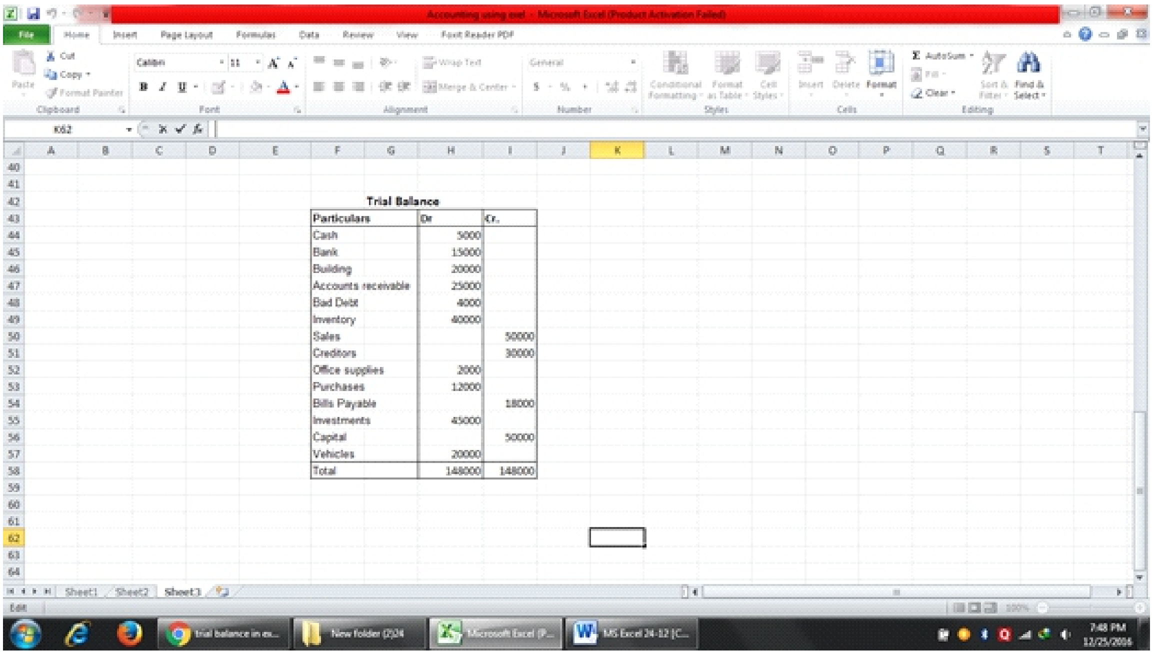


Profit and Loss Account

Particulars	Rs.	Particulars	Rs.
To Stationary	450	By Gross profit b/d	30,600
To Rent and rates	1,100	By Profit on sale of Machine	4500
To Carriage outwards	1,450	By Discount Received	1400
To Insurance	700		
To Trade expenses	200		
To Commission	800		
To Interest on capital	700		
To Bad Debts	450		
To Depreciation	500		
To Salaries	600		
To repairs	400		
To Fees	300		
To Discount Allowed	250		
To Net Profit	28,600		
	36500		36,500

Picture 12 : Profit and loss Account

6. Trial Balance : It is a statement that represents the balances of ledger accounts.The total of debit side and credit side of trial balance must be equal. It is presented in the following figure. (picture 13)

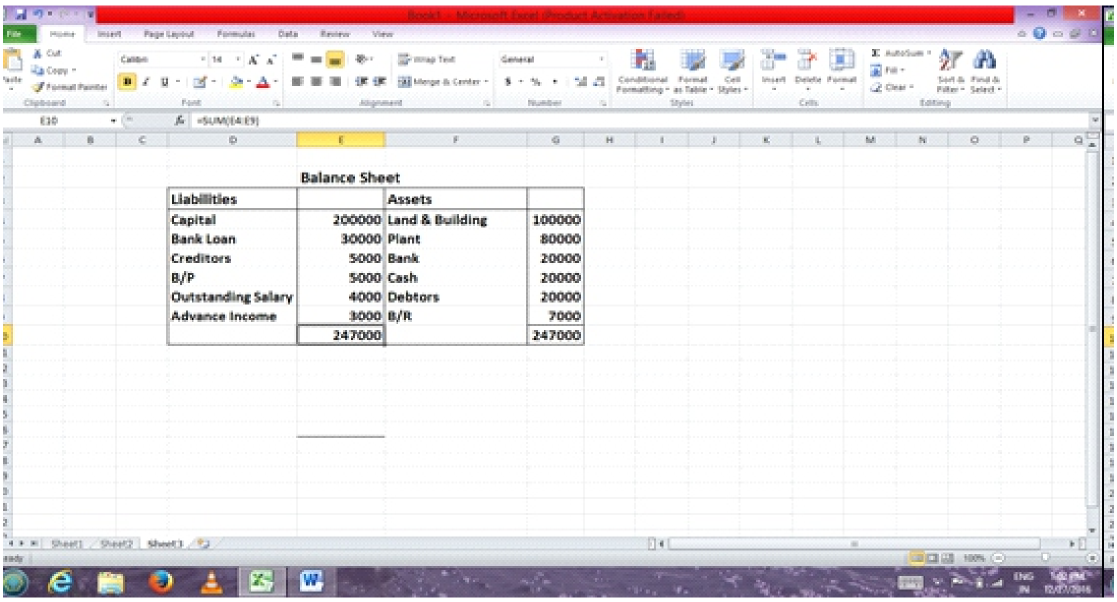


Trial Balance

Particulars	Dr	Cr.
Cash	5000	
Bank	15000	
Building	20000	
Accounts receivable	25000	
Bad Debt	4000	
Inventory	40000	
Sales		50000
Creditors		30000
Office supplies	2000	
Purchases	12000	
Bills Payable		18000
Investments	45000	
Capital		50000
Vehicles	20000	
Total	148000	148000

Picture 13 : Trial Balance

7. Balance Sheet : The sum of assets and liabilities in the Balance Sheet should be equal. If we make changes in any type of financial data that is inserted into the cell, then its effect falls on other points calculated. The sum of assets is stated from cell E4 to E9, which is shown in the cell E10. Its syntax is =SUM (E4:E9). (Picture 14)



Balance Sheet

Liabilities		Assets	
Capital	200000	Land & Building	100000
Bank Loan	30000	Plant	80000
Creditors	5000	Bank	20000
B/P	5000	Cash	20000
Outstanding Salary	4000	Debtors	20000
Advance Income	3000	B/R	7000
	247000		247000

Picture 14 : Balance Sheet

After making the above mentioned accounts statements by Excel Spreadsheet, its effect will be displayed on the ultimate balance such as profit, loss etc., with immediate effect. This facility can be used for analysis of financial statements. Such details can be made in a very short time through a spreadsheet. As a result, accounting experts have the ability to make investment decisions etc.

8. Other uses of Spreadsheets : The analysis of financial statements can be used by accountants and investors, spreadsheets can be used for many other accounting and finance related activities. Some important financial functions have been mentioned in the following examples :

(i) **Calculation of tax** : Spreadsheets can be used for predicting different types of taxes such as income tax, sales tax, custom duty, service tax etc., and their related sources. It has been explained by the following example. The sales figures are given in Column A, on which sales tax is charged at a rate of 10 percent. Which is calculated by the base formula: (percentage of tax *amount of sales). According to the Excel formula, applied in the table given below. It has a syntax : = (A1 * 0.5) the result is shown in Cell B1. (Picture 15)

	A	B	C
	Sales	Tax	
1	20	10	
2	30	15	
3	40	20	
4	50	25	
5	30	15	
6	40	20	
7	70	35	
8	80	40	
9	60	30	
10	100	50	

Picture 15 : Calculation of Tax

(ii) **Calculation of installment on loan** : Monthly installment of a loan on which compound interest is charged is calculated with PMT formula ,which is PMT (rate, nper, pv , [fv], [type]), Where

r = rate of interest

nper = Total Payments for Loan

pv = Principal amount

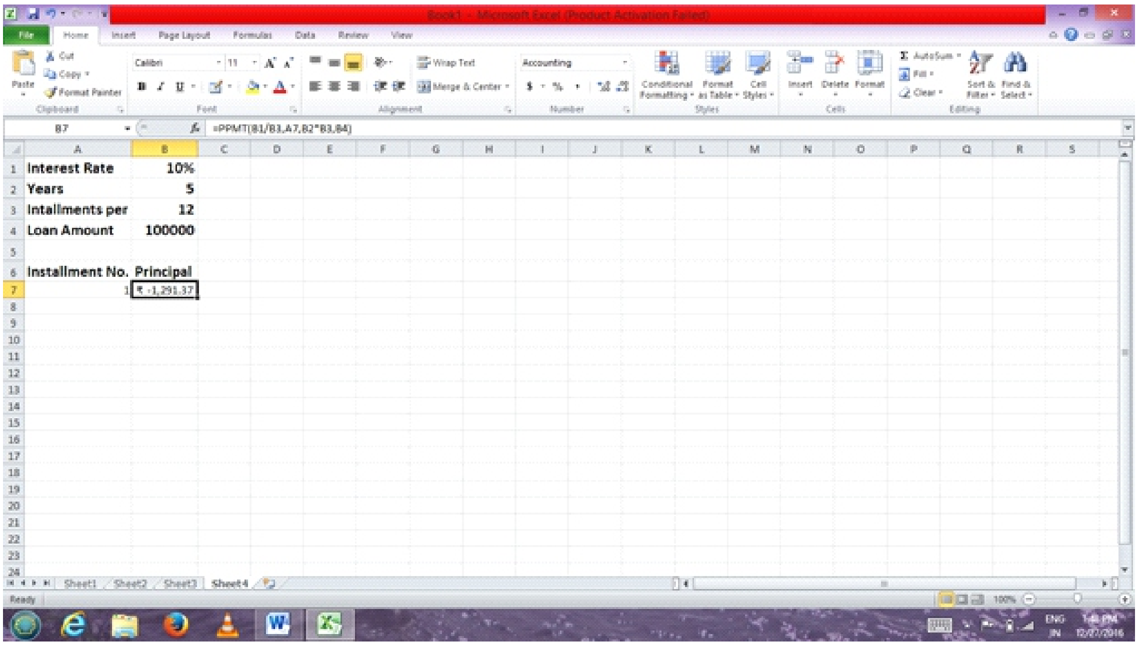
This calculation is available in the form of function also. This can be explained with the help of following example. A business took a loan of 200000 rupees at the rate of 6.75 percent for 30 years from the bank. The installment will be calculated with the following formula, = PMT(B4/B5, B3*B5,-B2). This is shown in the following table that represents the format of excel sheet. The amount payable per month is mentioned in cell B 6. (Picture 16)

	A	B
1	Loan Data	₹
2	Principal Amount	200000
3	Loan Term	30
4	Intrest Rate	6.75%
5	Payment per Year	12
6	Installment(₹)	1297.2

Picture 16 : Calculation of Installment loan

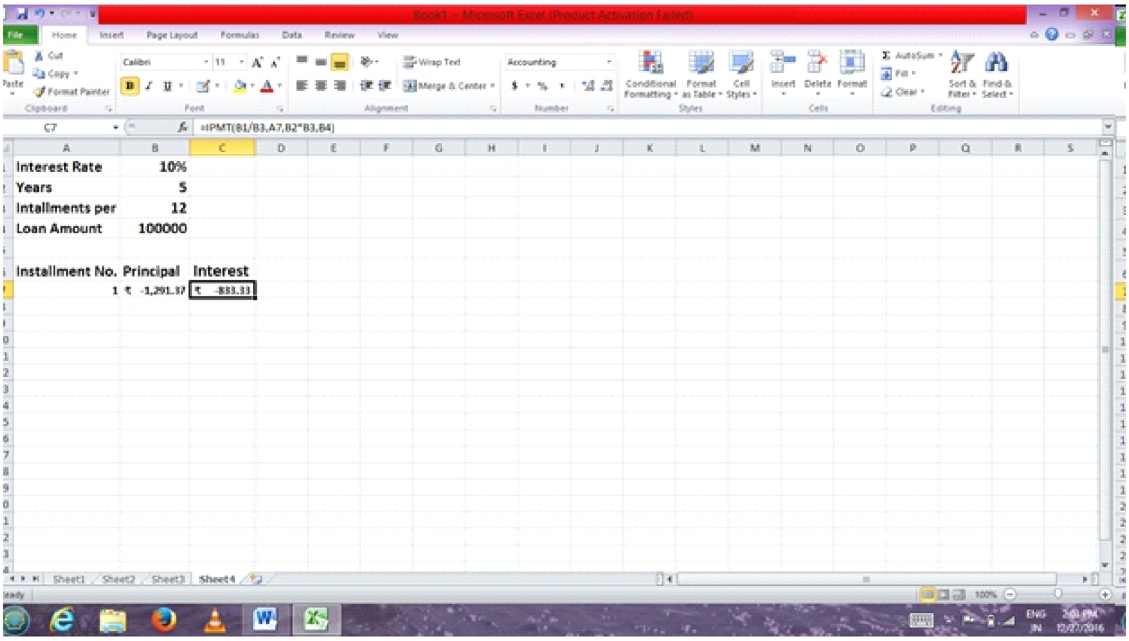
(iii) **Principal Amount :** If you want to calculate the principal amount from the monthly installment, it can be calculated by PPMT function. The formula is =PPMT (rate/payment in a year, 1, years *payment in a year, Amount).

Example : If the interest rate is 10 percent and the installment of loan is payable on per month, the total amount of loan is ₹100000 If the payment period is for 5 years, then the principal amount will be calculated from the formula, = PPMT(10/12, 1,5*12, 100000) in this case, ₹1291.37 will be the principal amount. This is shown in the following picture. The cell numbers are used instead of original figures as syntax. (Picture 17)



Picture 17 : Calculation of Monthly Installment

(iv) **Interest included in installment :** Similarly, in order to calculate the interest amount included in the installment, the use of IPMT function will be used. In the above example, it will be used by the following formula.
= IPMT(10/12,1,5*12,100000). In the picture below cell numbers are used in place of original figures using the syntax calculation will be : IPMT (B1|B3, A7, B2*B3, B4) (Picture 18).



Picture 18 : Calculation of Interest in Installment

(v) Ordinary interest on the capital or the loan : The interest rate on the respective capital or loan interest is calculated at a fixed rate on the principal amount. For this, the following formula is used :

Principal amount * Rate/100

For example, If the amount of ₹100000 has been taken for 5 years at 8 percent interest rate, interest will be payable. For calculating interest (₹100000 *8/100) which is ₹ 8000 per annum. To calculate interest of 5 years $(100000 * 8/100)^5$ will be done. According to the picture, the syntax for the calculation of interest of five years will be: = (B1/B2)*B3 or B1*.08(Picture 19)

	A	B	C	D
1	Principal Amount	100000		
2	Rate	.08 %		
3	Year	5		
4				

Picture 19 : Calculation of Interest

(vi) Total income on Investment : For calculating total income earned through interest on the basis of compounding, the compounded interest rate is multiplied by the principal amount. The amount calculated will be principal plus interest. For example, if ₹ 100 is invested at 8 percent, then after one year, the total amount will be ₹ 108. This is indicated by the following table. (Picutre 20)

A2 fx =A1*1.08

	A	B	C	D	E
1	100				
2	108				
3					
4					

Picture 20 : Calculation of Income

If investment is for more than one year, the cursor will be dragged accordingly with one cell forward. Example: If a person has invested ₹100 for 5 years at 8% annual interest rate, ₹100 will be entered in A1, then the value of the investment will be calculated in A2, thereafter the cursor will be dragged till A6. The total income will be indicated by the following table. (Picture 21)

A6 fx =A5*1.08

	A	B	C	D	E
1	100				
2	108				
3	116.64				
4	125.9712				
5	136.048896				
6	146.9328077				
7					
8					

Picture 21 : Calculation of total income on Investment

(vii) Monthly Compound interest : In calculation of compounding interest, interest is calculated on the principal amount as well as on the interest amount accumulated at the end of specific period. Its original formula will be. Principal amount* (1+ Interest/Compounding period in year) ^ (Compounding period *years)

For Example : If an investment of ₹10,000 is done on 5% compounded annual interest for 10 years and the interest is calculated on a monthly basis, then the amount receiveable at the end of 10^{th} year will be Rs 16470. It is presented in the following table:(Picture 22)

B7 fx =B2*(1+B3/B4)^(B4*B5)

	A	B	C
1			
2	Principal	10,000	
3	Annual Interest Rate	5%	
4	Compounding Periods Per Year	12	
5	Years	10	
6			
7	Amount Earned	16,470	
8			
9			

Picture 22 : Calculation of monthly compound interest

If the calculation is done on quarterly basis then compounding will be done four times in a year. It is presented in the following table (Picture 23)

B7 fx =B2*(1+B3/B4)^(B4*B5)

	A	B	C
1			
2	Principal	10,000	
3	Annual Interest Rate	4%	
4	Compounding Periods Per Year	4	
5	Years	15	
6			
7	Amount Earned	18,167	
8			
9			

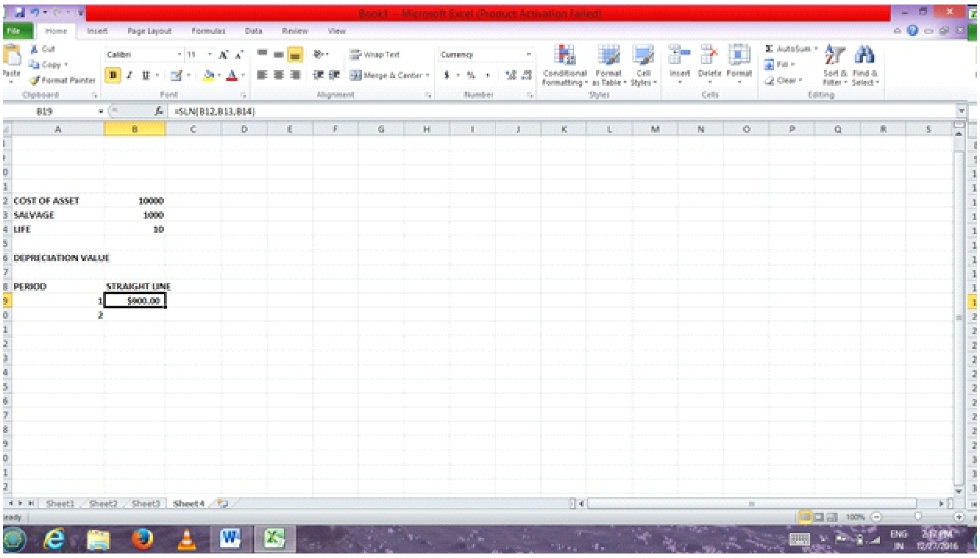
Picture 23 : Calculation of income on quarterly basis

(vii) Depreciation on Assets : Several methods are used to calculate depreciation of fixed assets of business. Calculation of depreciation through spreadsheet depends on the method used. It can be done through the construction of formula or with the help of excel function .The methods are discussed as under:

(a) Straight Line Method: According to this method the amount of depreciation remains fixed per year. This can be done by the function using syntax : = SLN (cost, Salvage, life)

For Example : If the cost of a Fixed asset is Rs. 10,000 , where Salvage value is Rs 1,000. The asset will be used for 10 years. It will be determind according to the syntax calculation formula of depreciation as :

= SLN (B2, B3, B4).The amount of depreciation will be ₹ 9000 as shown in the table below. (Picture 24)

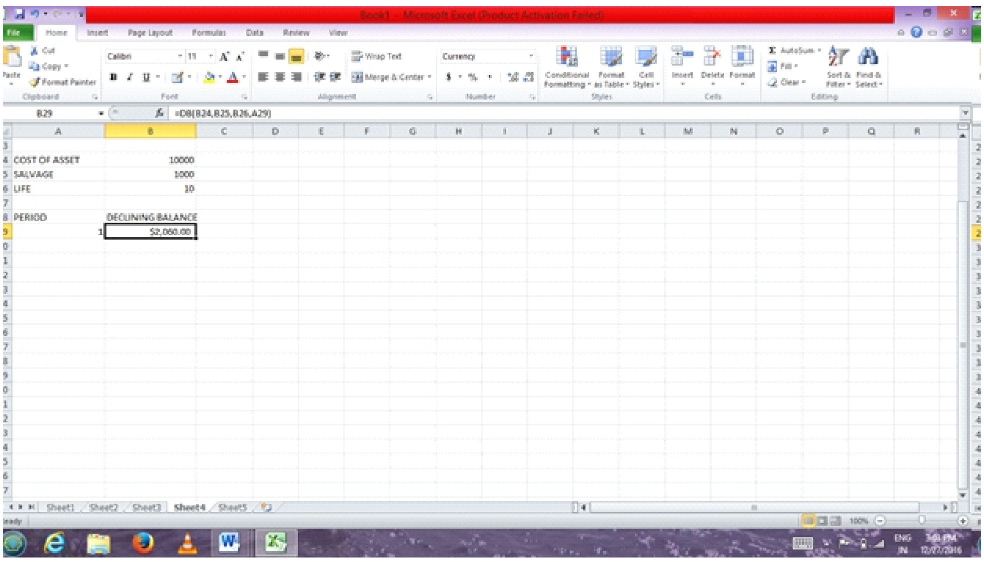


Picture 24 : Calculation of Depreciation based on the SLN formula

(b) Written down value method : According to this method the depreciation is calculated on the diminished value of the asset by using DB function, the syntax of which is:

= DB (cost of asset, salvage, life, 1)

The application of the above function in the previous example will be = DB (B4, B5, B6, A9). The amount of depreciation will be Rs.2,060. (Picture 25)



Picture 25: Calculation of Depreciation

Financial forecasting

Excel spreadsheet is also used for financial forecasts. This is part of budget and project planning. It is also termed as financial statement analysis. For this, two types of financial statements typically can ben made in the spreadsheet.

Projected Profit Loss Account

This financial statement can be used to calculate future profits or losses. Through Spreadsheet data related to expenditure and income are entered in the cells. Any incremental or decremental change in the financial figures in a cell will immediately affect the final result in the form of profit or losses. For example, if the expense of salary is increased by ₹ 500, then the net profit will also automatically reduce to ₹ 500 or the net loss will increase by ₹ 500. Forecasts can be also done through percentage. The impact on profit or loss due to the increase in sales by 10% can be calculated.

Projected Balance Sheet

The position of assets and liabilities can be ascertained through projected balance sheet. It helps in estimating the financial requirement of the business for which planning can be done in advance. For example, if profit increases as 10 percent the immediate impact on capital, liabilities or assets can be calculated. Similarly, the future position of cash, movable assets, working capital and immovable assets can be also predicted.

Financial projections are helpful for a business organization if they wish to apply for any loan and advance from banks and financial institutions. According to the proposed plan future financial planning is done. The bank provides loans according to the predicted financial statements.

The usefulness and importance of Excel spreadsheet is revealed from the above discussion. A business organization can take its financial decisions intensely and accurately with the use of Excel spreadsheet.

Summary

- Excel is developed by Microsoft. It is a spreadsheet program created in many blocks, with the help of which you can keep and view various data in a tabular form. One of the special features of Excel is that, it also allows the user to perform different type of calculations. It can be used for both commercial and non-commercial purposes.
- Every file in Excel is known as workbook. There can be many worksheets under a workbook. A worksheet is deemed to be the structure containing columns and rows.
- **Importance of Excel Spreadsheet:** Used in Inventory management, calculation of working hours, billing format, financial accounting and analysis, maintaining customer details.
- **Basic Functions and Formulae:** Addition (+), Subtraction (-), Multiplication (*),Division(/).These are used in various accounting applications.
- Spreadsheets are also used in financial forecasts, such as projected Profit and Loss account and Balance Sheet.
- Accounting and financial calculations can be done through spreadsheets using various functions and formulas.

Questions for Exercise

Multiple Choice Questions :

1 Which function will be used for calculating interest included in installment of a loan ?

(a) PPMT (b) IPMT (c) FAPM (d) None of above

2 What is the formula for adding the value of cell A1, A2 and A3 ?

(a) SUM= (A1+A2+A3) (b) SUM (A1,A2,A3)

(c) =SUM (A1:A3) (d) None of above

3 Components of Excel Workbook are :

(a) Workbook (b) Worksheet (c) Chart (d) Worksheet and Chart

4 Which command is used to make the title Rows and Column static in case we wish to scroll the spreadsheet ?

(a) Freeze and Pan command (b) Unfreez Pan command

(c) Hold title command (d) Merge command

5 Where the values and Formulae are typed in window in Excel ?

(a) Title Bar (b) Short Screen menu command (c) Formula Bar (d) Standard Bar

6 Data and Formulae are copied through :

(a) Cut, Copy ,Paste in edit menu (b) Sort, screen, menu command

(c) Standard tool bar (d) All of above

7 Which formula is incorrect?

(a) = (10+15) (b) = (B7*B1) (c) (B7 + 14) (d) 14+15

8 Which function is used to calculate depreciation?

(a) SLN (b) PRF (c) DVD (d) LTF

9 What is the syntax for calculating depreciation on written down value method ?

(a) =DB (Cost,Salvage,life,1) (b) = FB (Cost,25,1)

(c) =PFB (Cost,Salvage,life) (d) None of above

10 Function for calculating principal amount in installment will be :

(a) RPT (b) PMT (c) PPMT (d) IPMT

Very Short Answers Questions :

1. What is a Spreadsheet?
2. What is the syntax of the PPMT function ?
3. What is the procedure to save a file in a Spreadsheet?
4. What is a Cell and Row ?
5. The life of machine is 10 years, with cost of Rs. 500000. Describe the process of calculating depreciation (original cost basis) on the spreadsheet.
6. Explain the calculation of compound interest by example.

Short answer type questions :

1. Explain the basic elements of Microsoft Excel
2. Describe the key points of Spreadsheets.
3. Explain the importance of spreadsheets in Accounting.
4. Explain the difference between spreadsheet and workbook.
5. Explain the following FUNCTIONS with examples:
   (i) PMT
   (ii) SUM
   (iii) IPMT
6. Mahesh borrowed a loan of ₹500000 for buying a car at 5 percent interest rate. The loan is to be paid on quarterly basis in 10 years. Calculate the quarterly installment in the spreadsheet.

Answers of Multiple Choice Questions

Question No.	1	2	3	4	5	6	7	8	9	10
Answer	b	c	d	a	c	d	d	a	a	c

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Computerized Accounting System

Learning objectives :

After studying this chapter, you will :

- Know the meaning of Computized Accounting System, its components parts and capabilities.
- Understand the utility and benefits of computer in accounting
- Learn about the automation of the accounting process.
- Understand the composition of Computerized Accounting System.
- Understand the Management Information System and Accounting Information System.
- Learn about Computerized Accounting Software.
- Understand manual and Computerized Accounting Systems.

In a business organization, accounting of all financial transactions, valuation of stock and assets, warehousing, payroll of employees, etc. generally done is by the manual accounting system. Accountants or some accounts officer prepares final accounts in the form of profit-loss account, trial balance and balance sheet at the end of accounting period. The actual position of the business is known through these statements and books of accounts. These final accounts are used by businessmen for decision making. Reports are prepared through these books and accounts. All the above mentioned financial statements are prepared through manual system. That is all the books of accounts are prepared and maintained by the accountants, without the use of any technology. This type of accounting system is a time consuming process, as well as many types of errors are likely to occur. There are many other kinds of problems and complexities that come in the traditional manual accounting system. All these complications and problems can be solved by a superior technique. The development of information technology as well as the increased activities and transactions in business, generated a need for better system of accounting. Many machines were developed to facilitate accounting system- All these machines were partially successful in indirectly accelerating accounting work. For example, the billing machine that contained some limited information of the customer. This machine was able to do simple arithmetical functions like addition, subtraction, multiplication, etc. and could generate customer's information and billing amount. The receipt or the bill is prepared automatically by the operator of the machine. In a way, this machine could do the job of both the calculator and typewriter. However only limited work could be done by such machines. With the expansion of business and increase of financial transactions, technological advancement has also registered its place. Machines in the form of computers were introdused due to their ability of high speed, storage and processing capacity. They facilitated quick decision-making and reduced complexity in the transaction process.

Computer technology and its use have gained an important place over the past few decades. Historically, it has been effectively used to solve problems in science and technology. It has been used for economic policies and forecasts. With its very highly demand, the need for its use in business and commerce has also increased. The most important impact of computer is the processing and storage capacity of data and its effective presentation. In the present scenario in business, accounting and the operations of management information system would be nearly impossible without computers. On the other hand to resolve the complexity of intense competition and increasing business dealings, management of various types of data is a major challenge. It is now necessary that the accounts to be managed in such a way that they can be used at the right time when needed for prompt decision making. Such an accounting approach can be followed only by computerized accounting system.

Concept of Computerized Accounting System

Accounting of financial transactions was done through manual books of accounts prior to the origin of computer. According to the process of accounting, an accountant prepared cash book, Journal, Ledger etc. Handwritten final accounts were prepared from these books that included profit and loss account and balance sheet. Accounts are now maintained with computers. A Computerized accounting system is such a system by which all accounting activities are operated through a computer.

The following requirements are needed for the implementation of this method.

1. Computer; 2. Software; 3. Hardware; 4. User; 5. Networking procedures.

1. **Computer :** The computer word is derived from the English word "compute", which means "to calculate", so it is also called a calculator or computer. Computer is an electronic machine that has the ability to accept and process data and solve given problems. Its invention was done to calculate. In early stage computers were used only for simpler calculations, but nowadays these are used to create documentary, e-mail, audio, video, electronic games and to maintain database. It is extensively used in educational institutions, banks, offices, shops, railways etc. Computers are machines and therefore they work only as per the inserted instructions in the form of programs.

2. **Software :** Software is a set of instructed programs given to the computer that works through the hardware to achieve a definite result. All instructions are stored in the computer through the code. Operating system is the most prominent component of the software. This operating system establishes connection between the computer and the user, through which the resources of the computer get settled, and it becomes easy for the user to work on it. The software is divided into three types:

   (i) The utility programs are created to perform certain specific type of functions on the computer, though some supplementary operations can also be performed in addition to the main work. All these programs also fall under the category of software. Transfers of a file, deleting data, copying and storing etc., are categorized under the utility programs.

   (ii) A language processor is software that converts a source program into a machine language. Machine language is the language through which the computer converts the given instructions into its own language.

   (iii) Application software is a group of programs by which a specific procedure is performed for a predesigned task. The instructions given through programming is limited to the performance of a specific task. For example, financial accounting (Tally or Marg), payroll (salary calculation), inventory management etc. Similarly, the system software controls and operates the internal functions of the machine for conducting a specific task

3. **Hardware :** Computer hardware is the collection of physical parts of a computer system. This includes the computer case, monitor, keyboard, and mouse. It also includes all the parts inside the computer case, such as the hard disk drive, motherboard, video card, and many others. All these instruments are operated by electricity. These are of two types. The input device through which the information is entered in the computer, such as key board, mouse, pen drive. The output device through which the information is revealed. Monitor and Printer are examples of output device.

4. **User and Operators :** It is a group of people who contribute to the operations of the computer. These mainly include system analysts that prepare the format of the data processing system. Additionally programmers are

those people who implement the format of data processing by some programming language. In the end, the operator who works on the computer for some specific purpose.

5. **Data :** Computer data is information processed or stored by a computer. This information may be in the form of text documents, images, audio clips, software programs, or other types of data. Computer data may be processed by the computer's CPU and is stored in files and folders on the computer's hard disk or any other storage media. For instance data of a school include all types of information about the students. The computer coordinates it by systematically classifying data for the purpose of analysis. Data is used in making various kinds of decisions.

6. **Networking :** For the exchange of information, the computer is connected to many devices. The internet is the key in this. As a small network that connects various computers at a specific space is termed as local area network (LAN).A wider form of network is used in transformation of high frequency of information through internet. Such network is termed as wide area network.

Parts of Computer

Computer parts can be divided into three types -

1. Input unit
2. Output unit
3. Central Processing Unit (CPU)

1. **Input Devices :** These are hardware devices that allows us to input any data or command in the computer. Examples of input devices are mouse, keyboard, scanner, pen drive, card reader etc.

2. **Output Devices :** These are hardware devices that provide any data or any output from the computer. For example, monitor, speaker, printer, projector, headphone etc. The accounting transactions are entered in the computer, their processing leads to profit & loss account and other financial statements. This can be displayed through the monitor and the hardcopies of the statements can be taken from printer.

3. **Central Processing Unit :** The central processing unit is the main part of the computer. It can also be called computer's brain. Its function is to process the input and instructions given to the computer. It is also commonly known as processor. Computer needs both software and hardware to work properly. Both of these support each other. It performs the basic arithmetical, logical, and input/output operations of a computer system. The CPU is sometimes also referred to as the central processor unit, or processor for short. It is installed on the motherboard in the computer and through the motherboard only other components of the computer are connected to each other.

Components of CPU

(i) Arithmetic Logic Unit

(ii) Processor Register

(iii) Control Unit

The processing of computer operations is completed in the following manner:

Input ----- Processing ----- Output

The complete process of the computer can be understood in the following steps :

Input : For input we use input devices like keyboard, mouse, and also provide commands or instructions and data to the computer through software.

Processing : It is the second part of this process. The information entered in the computer is processed through it. This is done by processor or central processing unit.

Output : Third and final part is Output. In this process, the information is processed on the basis of the given command by the computer in the form of particular output.

Types of Computer

Based on the purpose of the work or use, the computer is divided into different types. Different areas are used according to capacity in each field. Some computers can be powerful, large, high speed, or long lasting. The details of various types of computer are discussed as under:

1. **Analog Computer :** Analog computers are computers that measure physical quantities, such as pressure, temperature, length, etc. and express their measurements in numbers. These computers do the measurement of any amount on the basis of comparison. Analog computers are mainly used in the field of science and engineering because quantitative analyses have more use in these areas. For example, the analog computer, located at a petrol pump, measures the amount of petrol released from the pump and shows it in liters .It calculates its value and shows it on the screen.
2. **Digital Computer :** Digital Computer is a computer that calculates the numbers. Using a computer the user can prepare a budget, write a letter, make a picture, listen to music, watch photos and videos, play games and so on. Digital computer is based on binary digits (0-1). This computer can calculate with hundred percent accuracy. Digital computer converts data and programs into 0 and 1 in an electronic form.
3. **Hybrid Computer :** Hybrid computers have the properties of both analog computer and digital computer. For instance the computer's analog device measures the symptoms of a patient i.e. temperature, blood pressure etc. These measurements are later converted into digits by digital computer for the purpose of processing and output. This output can be immediately used for the patient's treatment.

Types of computer : Based on purpose of Use

Depending on the purpose, computers can be divided into following types :

1. **General Purpose Computers:** Most computers in use today are general-purpose computers .These computers are used for a variety of processing jobs. A general purpose computer is able to perform a wide variety of operations because it can store and execute different programs in its internal storage. Personal computers, including desktops, notebooks, smartphones and tablets, are all examples of general-purpose computers. These computers have multipurpose use like, word processing, music composition, digital games, programming, watching movies etc.
2. **Special purpose computers :** These computers are designed for a particular task. The CPU's capabilities are according to the given function. The same category of computers, such as children's books, mini computers, super computers, etc. These computers are highly configured compared to common personal computers. They are mainly used in defense, economic analysis, sports, big data analysis, movie production etc.

Need and Importance of Computer Accounting System

Computer accounts are kept through software. The software are based on the database. Unlike manual accounting system, accounting data entries are made through a system supported software. In manual accounting system various books of accounts are maintained on day to day basis before the preparation of final accounts. Entries are done through customized or readymade software designed for the purpose of accounting. Usually the requirement of computer accounting system has arisen due to the following reasons :

1. Accounting can be done with greater speed and accuracy.
2. Accounting data can be stored.
3. Large business organizations can use ERP (enterprise resource planning) packages.
4. Softcopies of all types of financial statements can be kept.
5. Classification of accounts can be done from the beginning.
6. Accounting data can be entered through coding.
7. The security of financial data can be maintained.
8. Print outs of accounting reports can be taken.

Apart from accounting, many other details can be kept through software packages such as employees' payroll, storage of goods, salary register, creditors diary, debtor's diary, tax returns, registers etc.

Features of Computer Accounting System

Due to some of its specifications, a computer has more work efficiency than the manual system. This system is increasing in importance to reduce the complexity of intense competition and increasing business dealings. Mainly it has the following characteristics -

1. **Accuracy :** This refers to perfect level of calculations and operations performed by the computer. It can also be called exactness. The errors made by the user are identified in a short time through computer programming. In case of manual accounting system, there might be a chance that the desired results may vary from the actuals. This is because of human involvement in the process of accounting. The computer performs the task of identifying errors and inaccuracies followed by the process of rectification.
2. **Speed :** The time taken by the computer to perform a certain task is called speed. In the manual accounting process, a lot of time is involved in creating accounts books, subsidiary books, cash book, trial balance, profit-loss accounts and balance sheet.The duplicate records are kept through the process of recording and posting, which is also time consuming. The same work can be done in a very short time by computer accounting software. This is due to its processing speed. Generally, time is calculated in minutes or seconds. But the computer has the ability to calculate the time in seconds. This helps in prompt decision making.
3. **Reliability :** The efficiency of service provided by the computer to the user is called reliability. The computer is a machine, which remains active through its artificial intelligence. This machine is free from any type of human emotion, such as cheating, fraud, deceit etc. It can work without any interruption for several hours, so it has proved to be more reliable than humans. The results of processing are produced according to the instructions given under programming therefore no chance of discrepancy occurs in the outcome.
4. **Multi-Tasking :** Computer can be used for more than one purpose. A simple form of computer can be used in many areas such as science, business, technical communication, defense, industry governance etc. It can do many things because of its multi-tasking ability. For each particular specific programming is done for specific tasks. For example, we can do accounting on a computer and also payroll related work of employees on the same computer. The user can do many things on the internet, such as on line ticket, online purchases, sales, e-mail etc. Thus, the computer fully utilizes its capacity.
5. **Automation :** A computerized accounting system eliminates or reduces many cumbersome and time-consuming manual processes. In addition to calculating it can create all accounting reports at the end of the year at a click of button through accounting software. It can generate the accounting reports in seconds due to automatic processing. In addition to automated accounting process, it also has the ability to share reporting, accounting statements and information with different users. Accounting information can be freely entered into computers by authorized users. Additionally, financial information and documents can be e-mailed in a few moments.
6. **Compatibility :** A computerized accounting system has the ability to work according to different business activities. It optimizes the exchange of information between two business centers. If two companies use computerized system, then all their accounts can be adjusted with each other in case of integration of both companies. In other words the accounting process through computers are not rigid and can be adjusted as per the business requirement. In case a business organization is dealing with two different types such as trading or manufacturing, the accounts or inventory can be maintained with the same set of computers with the change in software configuration.
7. **Storage :** Computer can preserve many types of information and data through its storage media. It stores data through files. These files can be from media, audio, video, text, software etc. These data and files can be used by the users as per the requirement. Many types of data in the company, such as inventories, salaries,

purchases, sales, taxes etc. can be stored through computers. Storage of data depends on the storage capacity of the computer. The storage capacity of data is measured by TB (Terabytes), GB (Giga byte), KB (Kilobytes). The storage is done by storage media such as the hard disk on the computer. Similarly data can also be stored in Pen drive, CD Rom. All these types of files and solders can be transferred through the Internet.

Basic structure of Computerized Accounting System

Computerized accounting system is primarily an organized system through which accounting decisions are taken. The first task of this system is to collect accounting related data. The structure of a robust computerized accounting system can be understood by the following points:

1. **Accounting framework :** It creates an environment to implement computerized accounting system. It prepares the basic structure of accounting. In this, a mixture of accounting principles, procedures, database, classification of data and accounts etc., are predesigned. Process of data input, data processing, results according to user, format of representations etc. are decided. This framework depends on the the accounting needs of the business .
2. **Operating Procedures :** A well-operated operating process accompanied by well-structured system of accounting is vital for establishing an effective computerized accounting system. A computerized accounting procedure is one of the database-oriented applications of computerized accounting system. Data related to transactions are collected. The user can access and collect accounting related statements and reports from the database using the necessary interface. Therefore, the basic principles of computerized accounting system include the requirements of database-oriented application. It's a comprehensive layout of the flow in which computer based accounting will be directed.
3. **Accounting Query :** Query is used to obtain any kind of information in the computerized accounting system. The query is a question that can be inserted into the database through software to obtain any information required by the user. For example, an accountant or user has to identify all the debtors or consumers who have not paid within the credit time limit. This type of information can be obtained through a structured query language. This type of facility is not available in the human accounting method.
4. **Data and Information :** Initially the computer accounting system was entirely dependent on transactions done in the business. This now is a system of decision-making through information in a business. It facilitates the user to make accounting related decisions and prepare articles through a well-organized process. First of all the data related to accounting are collected. Thereafter, the data are edited by classifying them. This process converts data into relevant information. Data is related to purchasing, sales, income, expenditure, creditor, debtor, property etc. This data is collected by different departments and a master file is prepared. Data is taken into use through software. Software packages are created according to the needs of the business organization. The software operates through the transaction process system. In this system all data collected is edited and authorized to convert it into required information. This system is based on input, processing and output. To make accurate decisions in the form of correct information, it is necessary to determine the exact type of data as an input.
5. **Computerized Accounting Process :** As mentioned earlier computerized accounting process operates through the transaction process system. This system works to record, process, validate and collect day to day transactions in the business .These transactions are related to business processes like purchase, billing, production, payroll etc. Th**e** transaction can be internal or external. When the production department requests the purchase department for the purchase of raw materials, or the transfer of goods to a sales center from one sales center, it will be taken into the definition of internal transactions. When the sales department sells goods to a customer, it is an external transaction. Generally the account of the financial accounting department are related to outside transactions. This can be divided into the following steps :

(i) Collection of Data : The collection of accounting data is compilation of all types of data in files at one place. Before designing any accounting package the classification of various heads is to be done under which data will be collected. It can be related to sale, purchase, cost etc. Accounting details are prepared only through all these collected data.

(ii) Data Editing : It is a process through which data collected is processed, and the inappropriate data is removed from the collected data, thereby causing no interference during the analysis process.

(iii) Data Validation: Data validation is an automated process by computer, which helps in reducing input errors in the data. This corrects data by correcting typing errors and other language related errors. It increases the ability to check and verify the accuracy of the data. This process helps in finding the right type of conclusions.

(iv) Data Manipulation: Under this process, some changes are made according to the requirement in the data collected, so that they can be easily used, to understand and analyze them for the users .It can be done through Data Manipulation Language.

(v) Data storage: The accumulation of accounting data can be done by various storage devices in the computer, such as pen drive, hard disk or CD. These data can be used by the user by retrieving the same from the storage device as per requirement.

(vi) Coding of Data: Data coding is providing a brief identification to the collected data. It is the process of identifying information collected on a large scale. The code can be a short word or a number. The analysis process of accounting becomes simpler through codes. The collected data can be speedily retrieved through codes. For example, code for cash sales can be CS and for credit sales can be CRS. In the same way, January can be given code JS.

(vii) Classification of data: Data are divided into groups based on a certain class .Each and every class holds some common factors so that they can be effectively used. In accounting process, data and transactions are divided into various pre-defined classes. Like a group of creditors or debtors of fifty thousand and above, a group of assets used for more than ten years, or a group of assets charged depreciation at fixed rate.

6. Management Information System :

Management of a business is based on decisions taken by it. These decisions are based on the timely information received by its user. The stronger the information system of a business will be, the more accuracy and transparency will be there in the decisions. All this is possible by an efficient management information system. The management information system is the system that forms the basis of remaining systems of an organization. Information in the accounting information system is timely, accurate and systematic. It is a computer-based system that provides managers with tools to organize, evaluate and manage the flow of information among various departments. In other words, management information system is a system that meets the information needed to make decisions, in order to manage a business smoothly. In a business transaction cycle there are various transactions relating to procurement of goods, advance of vendor / supplier, amount to be paid to creditors, salaries etc. All these information are distributed to the other departments of the management information system of an organization. This information is provided through a computer based system. It is collectively an electronic mechanism through which a perfect flow of information is insured in the organization horizontally and vertically. This system supports the long term policy goals and objectives of the organization. The management information system can be defined primarily in the following points :

- It is an integrated user machine system.
- It provides information.
- It manages and operates the information
- It is used in Business

7. Accounting Information System :

The use of information and technology in accounting is called accounting information system. It is an computer aided information system used in various areas of accounting, such as taxation, financial accounting, budgeting etc. The information of all these areas is used for managerial decisions. The accounting information system exchanges information for other active information systems. During the course of business ,there are various integral activities of the business that make a business, its invoicing on the sale of a merchandise, receiving a sales order and performing its operations, employees' wages etc. Under the Accounting Information System, all information related to accounting and finance can be exchanged among high, middle and lower management. Through this system, financial information about a person or an object is created for identification, collection and processed for a variety of its users. Data related to financial information are organized in such a way that right decisions can be made through its utilization. In addition, the accounting information system is a mixture of all the resources, so that the financial and other data are designed to be converted into information. This information is provided to the end users and decision-makers at their convenience. The use of this system provides the certainty of being able to control various types of financial transactions and deal in an effective manner. This system is also used in generating financial reports for its beneficiaries. To use information to make management decisions, that information should be managed in the right way, therefore information management includes :

- Determining the necessary information
- Collecting and analyzing information
- Storage of information and retrieve it when needed
- Use and distribute the information

Functions of Management Information System

(i) Determining the information required for management: Many information is generated during planning, execution and inspection of a business. Some information is necessary to make immediate decisions and some are needed for later management decisions. Therefore a good management information system helps the managers with the relevante information at a particular point of time.

(ii) Obtaining information for Information management and Analysis: Information can be obtained from technical reports, rural books, forms, group meetings or conferences, meetings, observations etc. The MIS receives data from company units and functions. Some of the data are collected automatically from computers

(iii) Storage of information : It is necessary that the information obtained should be collected at one place so that it can be used later. Information can be stored in various books and documentation can be done as per the need and usage of the information. The basic principle of securing or storing information is to get this information easily recovered.

(iv) Use of information: There are many uses of information for the management. It is used to solve collective problems, to set the resources (quantities and types) for upcoming projects in the business

(v) Flow of information: It is the approach where the collected information or data is to be moved for management in decision process. In order to get the benefit of information collected, it is necessary that it should be shared with all stakeholders, consumers and other beneficiaries of the business. These users can also assists the persons engaged in collection of such information with regard to its collection and use.

8. Accounting Reports :

Different types of financial reports can be processed by accounting information system. In the beginning, the data passes through various stages and it is converted into information. These reports are presented in brief according to the requirement of the users. The subject and format of the report varies for each level. The usefulness of a report depends on the fact that it helps the user to make decisions. There is timeliness in the computerized accounting information system. We can transfer, erase and produce the necessary report through a single click. Accounting reports are prepared only through accounting information. Its process is as follows :

(i) Determination of the objectives of the reports.

(ii) Define users of reports

(iii) Designing the framework of reports

(iv) Preparation of query related to data base.

(v) Finalizing the reports.

The formulation of a good accounting system must include the following elements, which make the reports important in decision making. It includes :

- Accuracy
- Relevance
- Timeliness
- Summarized
- Understandable
- Perfection

The report prepared by the software is for different types of users. If the sales department wants information about the sale of the last one month, it can be produced from the sales report. If the personnel department requires data of salary for last six months, then it can retrieved from payroll report. The report related to the creditors or debtors according to the name of the party or the amount can be obtained from debtors and creditors book. The report can be summarized and can also be elobarative. Time based reports may be derived, such as quarterly sales, monthly salary, annual profit etc. Similarly, reports can be drawn as per demand, such as bad debt report etc. The reports as per the management information system, can be of the following types:

(i) Summary Report : The activities of accounting are presented briefly in summary report. This report primarily represents the overall financial data of an accounting period of a business unit, branch or a product. Multiple information are presented jointly in it. For example profit and loss account, stock of material, sales summary, summary of creditors and debtors etc. Such report doesn't contain details of every data content.

(ii) Trend Report : Tendency reports are made for the purpose of comparing two or more units, products, branches. This report can predict future data according to previous figures. For instance, taking the base of sales of last five years, it can be ascertained in which direction the future sales would probably move. If the business unit or product unit is showing a negative trend, then managerial decisions can be taken to adopt an effective marketing policy to increase its sales.

(iii) Exception Report : In this type of report, the extra ordinary information is shown separately from general information. Exception reports present information about abnormal circumstances. In the case of exception, this report is very helpful for making immediate decisions in any kind of managerial decisions. The manager does not need to look at any other report. This saves time and other resources. For example, in case of unusual sale on any ordinary day, a report of such days falls under the category of exception report. On the basis of such a report the purchase analysis for those days can be done.

(iv) Demand Report : This report is prepared only at the request of higher level management. There is no certainty of its duration. The format of these reports depends on the information required by the user. Its format can be as summarized report, trend report, or exception report. For instance if the company wished to provide cash discount to its debtors, then they can take the information of the dues of the total debtors, which will help them in making decisions. The demand report will be the data of total debtors. Such reports are not generated on regular basis.

(v) Personal Report : This report is related to a particular person, group or organization. Accounting reports such as debtors, creditors, banks, customers, and suppliers of raw materials can be submitted through a personal report. For example, Ramesh & Company's six monthly Sales Report is example of a personal report.

9. Management Information System and Data Interface :

The main function of the management information system is to provide information to different users of an organization through a computer network. This information helps in making managerial decisions. This type of system has to be coordinated with many departments and active areas of operations. The reason for this is that no single department can make its decision or plan its activities in isolation. The information from the various departments is needed to be provided to the managers. In this there is separate information system of each department for their level of activities performed, which is called sub-component. In order to make collective decisions in any two or more sub-components, the sharing of information is called data interfaces. It can be understood through the information of the following departments:

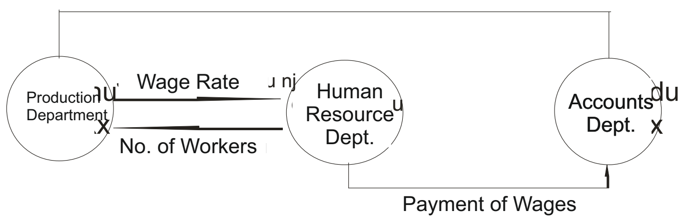
(i) Accounting Information System, Operations and Production Information System and Human Resources Information System : The Department of Production requires the details of the workers from the Human Resources Department. The details of units produced by labours are given to accounts department for calculation and payments of wages. There after the details of the remuneration paid by the accounting department are given to the Department of Production and Human Resources so that management of employees can be done for their effective performance. Accounting Information Systems and Marketing Information Systems.

Similarly in the case of recruitment of new employees the accounts department, the information can be shared with human resource department, since the recruitment is processed by the later department.

(ii) Accounting Information System and Marketing information System : Marketing and selling plays an important role in the progress of the business. It mainly includes -

- Inquiries
- Contact establishment
- The order of entry of goods
- Shipping goods
- Consumer receipt

In the accounting system the transactions are to be supported by sales details, transport details, insurance etc. Apart from this, the consumer accounts are also needed to be reviewed for the purpose of collection .The inter-relationship between these departments can be presented through following figure (Picture 1).



Picture 1: Relationship between AIS, OPIS, HRIS

(iii) Accounting Information System and Production Information System : Production Department is responsible for production of goods and deals with the planning, development and maintenance of production facilities as per the established production goals. It also provides the flow of information with the acquisition, storage and availability of production material. The production department performs the following functions in business:

- Preparation of plans
- Quotation of raw material
- List of items to be produced

- Order for the release of raw material purchased
- Handling the suppliers invoice
- Payments of suppliers

The accounts department processes the purchase orders, makes payment to creditors or suppliers in coordination with production department and the information flows through their respective information systems. The information regarding production is provided by production department to accounts department through information system.

Accounting software

Accounting process through computerized accounting system is performed with the help of accounting software. It is software that processes accounting transactions with functional modules such as journal, ledger, trial balance etc. In its absence, the accounting process cannot be easily completed by the computer. In computer based accounting system, accounting software is required in following two situations:

- When current computerized system is replaced by new requirements.
- When manual system of accounting is converted into computerized accounting system.

There are many accounting software available in the market, which are of different importance to different types of businesses. Before using the accounting software, the following general conditions should be taken into consideration:

1. **Flexibility :** It is the ability of the software to make data and hardware enable as per the need of the user. It refers to the adaptability of the accounting system as per the change in the accounting process. The flexibility of the software should be kept in mind at the time of installation or upgradation of computerized accounting system.
2. **Installation and maintenance costs :** The software should be selected based on the objectives of the organization. Economical software should be used inorder to maintain its cost. Therefore a cost benefit analysis should be applied before the installation, before adopting any software.
3. **Easy adaptability and minimum training requirement :** Accounting software should be selected on the basis of ease of handling by the user. This means that the software should be user friendly .The user should find himself in a comfortable position while making the accounting proceedings through it. The user should be able to perform its activities with minimum effort and support. Some software are user-friendly and complete with easy training. But some complex software packages may require extensive training.
4. **Level of confidentiality :** The software should contain high level of security for the purpose of safeguarding and protecting the accounting data. If privacy is not kept in mind then important information related to the organization can be leaked and misused, that can be fatal to any organization. The higher the level of privacy, the more information related to the organization will be kept safe.
5. **Size of Organization :** The larger the size of the organization, the accounting software will be more complex and cost-sensitive. Small organizations, where the number of accounting deals is not high, such organizations can take software with simple and single user, while large organizations require special software to meet the user's needs.
6. **Utility :** If the level of management information system is high, that is the number of department is large then software should also be of high standard. In the organization the management information system and its utility rate, decide the need for software.
7. **Vendor information :** The organization should be well informed about the supplier of the software. The software should be purchased and installed from a vendor who has expertise in this area and provides his services for upgradation etc. on the demand of the buyer, related to vendors should always keep the buyer.
8. **Import-Export of data :** Sometimes the data base of accounting software needs to be changed from one system or software to another system or software. For example Information about the institution's liability in

ERP packages has to be changed directly into spreadsheet software. Accounting software should be such that it can transfer data originally. Ready to use accounting software have the facility of import export of the data but they are restricted to the MS DOS only and are not supported by any other operating system. Tailored software is designed in such a manner that it can interact with all the different subgroups of Management Information System and should be compatible with other software and operating systems for data transfer.

Types of Accounting Software

In the computerized accounting system, the accounting work and its reporting are prepared according to the needs of the institution. Accounting software, also called accounting packages, are of the following types:

1. **Ready to use Software :** Such accounting software are not developed for any particular user. It is useful software for small traders who have very limited dealings in business. They lack privacy, but they are simple to understand and are less expensive. Its training is simple and does not involve much cost in training, as the vendor provides training without any cost. These are usually not related to any other information system. The possibility of deception in this software is high because privacy is of low level.
2. **Customized Software :** It is useful for medium and large business entities. The cost of installing and maintaining these is high, because the software needs to be altered according to the requirement of the user. The privacy increases in this and the authorized persons alone can use it. Due to the availability of all these benefits, the costs of the user's training and after-sale service is high.
3. **Tailored Software :** Such type of software is fully prepared according to the instructions of the customer. It is demanded by large business establishments, which are geographically distant at different places. The development cost is high in comparison to customized or ready to use software. Highly trained users are using this software and therefore they can have an optimum utilization of the software

Advantages of Computerized Accounting System

Compared to human accounting, there are many benefits of computerized accounting. These are summarized below.

1. **Less Error :** Errors become extinct in the computerized accounting system because initial accounting data is entered at one time and then used to prepare accounting details. Mistakes are likely in the manual accounting system, because big data on repetitive basis is often used for identical entries to prepare various accounting documents. Computer accounting works with complete accuracy. It keeps the chances of error at a lower level.
2. **Automated Information:** Accounting records are updated automatically in the computerized accounting system. Therefore, the details of the accounts are prepared and extracted for the latest accounting information. For example, the effect of any purchase on cash account, purchase account, and the final account (Trading, Profit and Loss account) is instantly displayed by entering cash payment on the purchase of goods in accounting data. The effect on final accounts is observed immediately after the primary entry. There is no requirement of making duplicate entries in the accounts .The up-to-date detail of accounting documents are available at all times.
3. **Exchange of data :** The accounting data processed through computers can be shared from, one computer to another through local area network. This allows different users to have multiple information at the same instant. The accounting reports can be also shared among different branches located at distinct geographical locations.
4. **Preparation of documents :** Most computerized accounting systems have preset parameters and formats, which automatically prepare accounting reports according to the user's need. For instance the accounting reports such as cash book, details of summarized account, trial balance etc. can be retrieved on one click.
5. **Clarity :** When data comes to the monitor of the computer, it is provide clarity by its visibility because of

standard fonts for typing is taken. Similarly the hard copy of accounting documents also possesses the same clearity and redability. This eliminates error and ambiguity in understanding caused due to handwriting in manual accounting system.

6. **Reports :** Computerized-accounting system provides information for management with immediate effect that is necessary for managing and controlling business. Various summarized reports related to debtors, creditors, accounts payable, accounts receivable, inventory, cash balance can be prepared. Analysis can be made on the basis of these reports. For example, if a company restricts credit sale to a certain limit of sale, then this information will be immediately available on the computer .This will restrict the credit sale,upto the pre decided limit. On the other hand it takes time in the manual accounting system to track this type of restrictions.

7. **Storage and access of data**: Computerized accounting system stores data for a longer duration through its storage media like hard disk, external SD card, compact disk, pen drive etc. The electronic storage takes very little space compared to the manual storage. Additionally, you can get the data and information very quickly through computer storage media, by giving the command to the computer.

8. **Motivation and benefits for employees:** Employees are required to take special training in computer systems so that they consider themselves to be more valuable. This encouragement keeps the interest in his job. Their efficiency and effectiveness in their job reaches higher level, which is helpful in their professional growth and development.

Manual and Computerized Accounting System

The difference between manual and computerized accounting system can be understood through the following points:

1. **Elements of Manual Accounting System :**
   (i) Financial transactions are done manually (handwritten).
   (ii) Transactions are recorded by original entries in books of accounts and can be retrieved from these books.
   (iii) The original entry of the transaction is done in the journal, after which it is posted in the ledger books. Thus financial transactions are recorded twice.
   (iv) After preparing the Journal and Ledger, Trial Balance is prepared to summarize the accounts.
   (v) The final accounts are prepared with the help of Trial Balance, in which profit-loss account and Balance Sheet is finalized.
   (vi) In case there is any error in entries in primary or secondary books, adjustments are made to remove it. Errors are corrected by passing rectification entries.
   (vii) At the end of the year, accounting ledgers (Assets and Liabilities) are closed and their balances are transferred to next year.

2. **Computerized Accounting System :**
   (i) Financial transactions are recorded in computer through program based software applications.
   (ii) Financial transactions are recorded through the database.
   (iii) The accounting transaction once recorded in the computer, immediately get processed in all other books of account.
   (iv) Ledger accounts are not required to prepare trial balance. The accounts balance can be known through summary accounts. After each entry the accounts book balances automatically.
   (v) Profit & loss account and balance sheet are created while passing the entries in primary books. The reason for this is that every entry is directly processed and final accounts are not dependent on trial balance.

(vi) There is no necessity for making any type of manual entry for error correction. It can be done automatically through primary entry.

(v) Preliminary and final accounts are stored in the data base.

3. **The main difference between Manual Accounting and Computerized Accounting System for the purpose of implementation can be explained as follows:**

(i) Speed : The main difference in human accounting and computerized accounting system is speed. Accounting transactions are processed through software aided database that prepares financial statements much faster than in the manual system. Calculations and other mathematical work is automatically performed with the help of software. In manual accounting, right from primary entry to the final accounts, hand-written accounts are prepared by the accountants, in which the possibility of errors might occur. For these reasons, it takes time to complete the accounting process. Computerized systems are less likely to have errors, and if done, then it takes less time in comparison to the manual accounting system. In the computerized system, only data is entered once and the account details are prepared on the click of a single button.

(ii) Cost: The second difference between human and computerized systems is cost. Software-based computerized systems are more expensive compared to paper and pencil based manual system. Cost of maintenance of computerized system is also high. It requires skilled staff to run and their training costs are too high. In addition to computers, other hardware like pen drives, UPS, server, printer, hard disk, etc. are required. The maintenance cost of all such equipment also costs a lot. Thus, this accounting system is more expensive than the manual accounting system.

(iii) Back Up of Data: The third difference in human and computerized systems is back-up of financial statements. In this system, many types of details can be stored at some other place. Those details can be kept safe. In case if any damage occurs the backed up data can be used.

(iv) Security: Accounting details and reports in computerized system can be kept safe through password protection. It is not possible to steal these computerized details or to misuse it in some other way. The possibility of stealing from the books of account prepared under the manual system or using them by any unauthorized person remains persistent.

(v) Classification: In manual accounting system, the transaction is classified on repetitive basis after recording in the initial books of accounts. As a result, the copy of transaction of accounting data is prepared. While in the computerized accounting system, classification is done initially, thereafter automatic classification is done at the time of making the entry. To prepare the books, the data of the secured deals is classified as a document. A similar transaction data is displayed by various documents.

(vi) Summarization: Transactions in the manual accounting system are briefly shown in the books, after which their account balance is transferred to the trial balance. Whereas in the computerized accounting system, initially accounting database is prepared and thereafter entries are made in designed formats, that are eventually shown in the trial balance document. The summarized records of the accounts can be extracted instantly as and when required. Preparation of books for the trial balance is not necessary under the computerized accounting system.

(vii) Adjustment Entry: In the manual accounting system, accounting entries are recorded on the principle of double entry book keeping system. In other words, it can be said that the insertion of these entries is done in the form of a match between debit and credit entries. Apart from this, some other adjustedment and rectification entries are also done for improvement. While computerized accounting voucher entries are made on the basis of expenditure and receipts, due to which chances of error are less.

Types of Computerized Accounting System

The computerized accounting system is a multilateral accounting system in which data is entered through accounting software and automatically books of accounts, trial balance, profit & loss account and balance sheet is prepared. This system operates various co-functions of accounting. These functions are discussed as under:

1. **Management Accounting :** The purpose of management accounting is to run business smoothly by analyzing the financial information provided by the management. This is done by providing right and required information to management accountants. This is done through transfer of data through networking with the mechanism of accounting information system. It is the branch of accounting, which manages to make business decisions and exchange information between the administrators. It records the actual cost, and tries to reduce costs by various cost control techniques, such as standard cost, budgetary control, marginal cost accounting etc. This system compares the standard costs and actual costs employed by the firm and with the use of computer the variations between the costs are estimated and controls are made. A sub part of this method is estimated accounting, in which the software estimates the cost of any item produced or any project undertaken. It also examines how much profit is obtained by using the estimated cost. Management accounting lays emphasis upon fuller utilization of financial resources.
2. **Inventory Accounting :** Inventory accounting system is used for determining the value of stock and determine its level. Valuation of stock is the process of calculating the value of finished goods, work in progress in terms of rupees on a particular given date, when the goods are purchased. A database is created for each and every item of goods. The process of codification and classification is followed for inventory management. At the time of every purchase and sale, the goods are entered in the format preset by the software with the calculations required for its valuation. After every entry the units of goods along with its value are immediately acertained. Such entries are known as inward entry and outward entry. The computers are connected to various departments through the data interface. In this way, the amount of material available for use in it is always available with the store manager, purchase manager, accounts officer. In case the business unit is engaged only in trading then bar coding is done in the context of the products. This is helpful in displaying the content details and price of the product.
3. **Industry Specific Accounting :** The accounting system includes industry special applications as accounting requirements for a retailer are different from other category of business. Similarly, for a grocery trader or general store the requirement would be different from merchandise specific trader. This is because the sale of grocery merchandise will be high in cash and its stock evaluation will be a complex process, because the stock contains many types of materials. The software requirement for a courier company will be different. It requires tracing so that it can be ensured that the goods sent have reached the right person. In the same way, special accounting software is prepared keeping in view the prevailing general practical conditions of particular industry, which can comply with its operations.

Limitations of Computerized Accounting System

The main limitations of the computerized accounting system are given below:

1. **Cost of training:** Computerized accounting packages usually require trained staff for operating the computer accounting system in a most effective and efficient manner. Training is required to obtain knowledge of the technology and software used in accounting. The cost of training on regular basis may not be suitable for small concerns.
2. **Resistance of Employees**: Whenever accounting is computerized, it is opposed by the accounting staff. These employees are preoccupied with the notion that they will have less importance in the organization and their numbers will also have an impact.
3. **Disintegration:** When an organization moves to computerized accounting system, it has to go through wastage of time of ts establishment. This is due to the change in the environment of work and for this, such accounting staff is required to adopt the system and method of operation. The entire accounting mechanism may be divided into separate segments, that may lead to shuffling of employees.
4. **Failure of the system:** The serious limitation of the computerized accounting system comes when a terrible

situation arises due to the failure of hardware or software resulting in the loss of work. However, this situation can be solved by the back-up arrangement. The software's failure can be caused due to virus. Such a situation is actually due to the extensive online use of internet in accounting systems operation.

5. **Unable to check fault:** Since the computer lacks the ability to decide on its own, as it doesn't possess any ability to detect the faults or errors on its own. This is because computers are enabled to detect only those errors that are permitted by the application software.

6. **Breach in security:** Detection of computer-related crimes is a difficult task. The computerized data can be stolen without notice or any clue that the data is stolen. This is because the primary data exists in the file so it is very difficult to identify that which data or file is copied or extracted by an unauthorized person. In the manual Accounting System, the theft of data can be identified. Fraud and embezzlement in computerized accounting system can be done by altering data or programs. Accounting records can be obtained by altering the user's password or data can be even misused by the authorized person having excess to password. It is obtained by re-opening, telecommunication tapping, line taping etc.

7. **Impact on health:** A wide variety of health problems arise due to continuous use of computer. Waist pain, eye problem, muscle pain and other illness may occur to the user. It has adverse effect on the work efficiency of accounting staff and on the other side the medical expenses of the employees may increase.

8. **Lack of general consciousness**: Computer programming is done in such a manner that it makes a decision according to the instruction given in the programme. Any small mistake of any kind in instruction can have great negative impact on the results. The machine does not have this capability to automatically correct the small error and give the right results in a better format. Therefore, due to the lack of general consciousness, the possibilities of wrong consequences remain in this system.

9. **Inability to make decisions:** The computer cannot take any decision on its own, because it acts according to the instructions given by the user. User has to give instructions through program to deal with every type of situation. Computers do not have the ability to make decisions like humans. Even for small decisions, instructions have to be given to the computer.

10. **Expensive System:** As stated earlier, large expenditure is required to install computer system in business. The expenses incurred in manual system are limited. From time to time, software have to be upgraded, due to that the expenditure is likely to increase. It is not possible for a small trader to afford this. In addition, training of staff has to be done.

11. **Lack of security :** The data stored in the computer contain all the secret information of a business. Any unauthorized person can take out that data and use it. However there are various measures to protect it but sometimes the system may fail due to the expertise of unauthorized persons or hackers.

Summary

- **The meaning of computerized accounting system :** Computerized accounting system is a technique by which all accounting activities are operated through a computer".

  The following items are needed for the implementation of this method.

  1. Computer; 2. Software; 3. Hardware; 4. User; 5. Networking process

- **Components of computer :** Computer parts can be divided into three types

  1. Input unit
  2. Output unit
  3. Central Processing Unit

- **Need and Utility of Computer Accounting System :** Computerized accounts are kept through software. This software is set up on database. Usually the requirement of computer accounting system has arisen due to the following reasons:

  1. Accounting can be done with speed and accuracy.

2. Accounting data can be stored.
3. Softcopy of all types of financial statements can be kept.
4. Classification of accounts can be done from the beginning.
5. Data can be entered in the system through coding.
6. The security of financial information can be maintained.
7. Print out of accounting reports can be taken.

- **Features of Computer Accounting System :** A computerised system has more work efficiency than the manual system due to its specifications. This system has gained in importance due to increased complexities, intense competition, increasing business dealings. Credibility, speed, reliability, multi-functional, automation, compatibility and storage are its main features.

Questions for Exercise

Multiple Choice Questions :

1. Which among the following is an input Device :
   (a) Key Board (b) Monitor (c) Hard Disk (d) Printer
2. The main function of the memory in computer:
   (a) Run the program (b) Controlling the hardware
   (c) Storage (d) All of the above
3. For CPU the full form is:
   (a) Control Process Unit (b) Central Production Unit
   (c) Central Processing Unit (d) Control Program Unit
4. A group of computer programs that effectively organize data is called :
   (a) Program (b) Information System (c) Database (d) All of above
5. The benefits of computerized accounting system is :
   (a) Speed (b) Reliability (c) Readability (d) All of the above
6. A report of Trading account, Profit and Loss Account etc. of an organization is :
   (a) Exception Report (b) Reporting Framework
   (c) Liability Report (d) Summary Report
7. The following are functions in the managerial process:
   (a) Planning (b) Directing (c) Control (d) All of the above
8. Software is:
   (a) Language (b) Program (c) Physical part of computer (d) None of the above
9. Which of the following languages is directly understood by the Computer ?
   (a) Machine language (b) Assembly language (c) English language (d) High level language
10. The process of computerized accounting is integration of:
   (a) Sale (b) Purchase (c) Ledger (d) All above
11. A feature of the Computerized Accounting System is
   (a) Purchase and sale reporting (b) Online entry of accounting data
   (c) Both of the above (d) none of above

Very Short answer type questions :

1. Describe any two characteristics of computer accounting system.
2. What is the Computerized Accounting System?

3. What is the Management Information System?
4. What is the Customized Accounting Software?
5. Name various Components of the Computer.
6. What is Central Processing Unit?
7. What is the Accounting Information System?

Short answer type questions :

1. Explain the difference between hardware and software.
2. Describe the limitations of the computer accounting system.
3. Describe the characteristics of the computer accounting system.
4. Describe different parts of the computer system.
5. What is the computer accounting system? What are its utilities?
6. Explain differences between manual accounting system and computerized accounting system.
7. What is an accounting report? Explain with example.
8. Explain the contribution of computers in accounting.
9. Explain various information systems related to the computer.
10. Explain the types of accounting software packages.

Answers of Multiple Choice Questions

Question No.	1	2	3	4	5	6	7	8	9	10	11
Answer	a	c	c	a	d	d	d	b	a	c	c

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Database Management System

Learning objectives :

After studying this chapter, you will :

- Know the concept of data and database
- Know the key features of the Database Management System
- Understanding the components of Microsoft Access
- Understanding Structured Query Language
- Preparing a table for the database.

Various types of transactions are done on day to day basis in a business organization. All these transactions are of financial nature. These transactions are recorded in the form of various financial statements and accounts books. At the end of the year, the profit or loss is determind by finalizing these accounts. In this process of accounting, it takes time to make decisions since different categories of data are used. The reason behind is that the entre accounting data is not available in a single book or place. The data contained in these books are related to each other, that is, they influence each other. For example, sales affect cash balance or debtors balance. Sometimes the firm needs to take business decisions on the basis of data related to last ten or fifteen years. It may be that data for such a long duration is not available. There are several types of obstacles to store these data for a long time. Like, on the basis of profit or loss of the last ten years, it is difficult to instantly estimate the profit and loss for the coming years. This makes it difficult to reach a better business decision. A computerized information management system has been built to overcome all these types of challenges.

Concept of Database Management System

This information system provides information for management decisions through various types of data. All these data are organized and converted into information as per the requirement, through database management system. This system is a group of programs created to use co-related data. Its purpose is to collect data through the software and do data management as per the requirement of the business. It also converts the collected data into certain information. It is used in different areas, such as railway reservations, bus reservations, examination control, stock, payroll preparation warehousing, employees related salaries, attendance etc. A database management system (DBMS) can be defined as a collection of programs that enables you to store, modify, and extract information from a database. The database management system principally controls three activities and principally operates through the following :

(i) Data base engine: It provides data and modifies it accordingly. The task of fully controlling the data depends on the database engine.

(ii) Data : These are the sources of information.

(iii) Database scheme: It is the structure that represents the entire database.

Thus, it is a centralized information system, in which many types of data are used by the user in different types of decisions through computer.

Functions of database management system

1. The main function of the database management system is to collect and retrieve different types of data through appropriate media. For example information of students studying at a school can be stored in the following format, the name of the student, father's name, roll number, address, class, date of birth etc.
2. The system manages all large scale information of an organization so that such information can be utilized in a planned manner.
3 This system provides the ability to create, modify, and improve data for its users.
4 It is a system that provides the multiuser facility for the same database. That is a single database can be used by more than one users.
5 It allows the use of data only to its authorized users and safeguards the data from any unauthorized use. According to this facility, the user can work on the data of his own department, which keeps the security of the information of other departments. The data access in not extended to any other department without permission.
6. It coordinates data and reduces unnecessary data, which briefs the data. This brief data make it easy to make decisions.
7. DBMS provides varied views to its users. For instance the sales department has a different view of the screen in comparison to the user of the accounting department. The data used by the respective users in accessed from common database.

Advantages of DBMS

1. Establishes coordination between various sets of data and reduces unnecessary figures that distrub clarity in decision making.
2. DBMS collects data by using advanced computer based techniques. This data is accessed by its user. It also simplifies and broadens the complex data.
3. Provides a variety of users access to data as per their individual need.
4. DBMS provides the facility to recover data, retrieve data for various purposes.
5. Data can be imported or exported through DBMS to maintain the authenticity and stability of the data. Thereby increasing the reliability of the data.
6. It analyzes the data in the shortest possible time, which helps in speedy decision making process.
7. DBMS can be used by more than one user. This helps in establishing a productive coordination among various departments. In the single database, the purchase and sales departments of an organization can use the data at a given point of time. The data of the production department depends on how much sales will be done in the financial year.
8. Electronic security is provided to the entire data used in the process. It is secured by a password given to the user. Users can not use the information of any other department, unless it is permitted. It also provides protection of data at different levels by departments.

Components of Database Management System

The key elements of the database management system can be understood as follows :

1. Database : A group of collected data that are related to each other, through which certain information is created. For example, marks secured by all the students of a school in the examination are a database. On the basis of this database , we can calculate the total number of students who passed in first class and second class, third class. Similarly, students who failed in any class or subject can be also counted. The above mentioned data can be used to calculate attendance of the students in class. The processing system does the following tasks with the help of database:

- Data Collection
- Data Editing
- Data Manipulation
- Data Storage
- Data Analysis
- Output

2. Administrator : The responsibility of operating the DBMS is of administrator. They build profiles that are used by different users. For example, data of the students in a school can be used by students, teacher and school administration. DBMS administrator can create three different types of profiles. Student Profile, Teacher Profile, School Administration Profile .From the point of view of the data security, it is ensured that the respective data will be used only by authorized persons. A student can see the total attendance in his class, and he can also see the presence of another student, but he cannot see the marks of any other student.

3. Data : Data can be any type of information, the quantities, characters, or symbols on which tasks are performed by a computer, which may be stored and transmitted in the form of electrical signals and recorded on any recording media like the hard disk, pen drive etc. These types of data are related to each other. Such as name, roll number, address, city district etc. are certain examples of data. In a business entity, there are various types of data, such as purchases, sales, profit, loss, expenditure, bank accounts, labours working in the factory etc.

4. Software : Any kind of information is handled through software. Software is a collection of instructions that enable the user to interact with a computer, its hardware, or perform tasks related to database management system. Software stores, processes, creates data, and so on. For example MS Access, MS Excel.

5. User Interface : The means by which the user and a computer system interact, in particular the use of input devices and software. It includes the preparation of screens, which relate to user-friendly relationship with user. The screen, which will be visible to user, by which the user will set up the relationship and would input some of the data in computer or would like to see some output. For example, to make any software for the library, the screen that will be used by librarian, students, etc. will be user interface, through which the users will be operating.

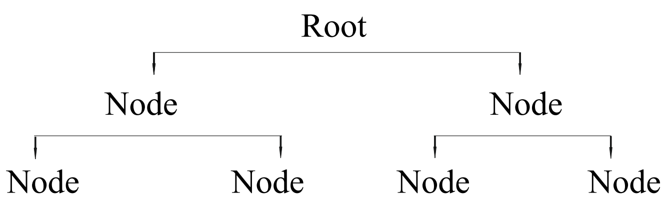
6. Data processing : The user wants output based on information provided to the computer through interfaces, computer interfaces, based on programmed instructions of database management system. This complete process is called data processing.

7. File Handling Programs : These programs help in storage of data, searching files, creating files, editing the files, existing files and managing files. All the files related to our application are in the storage, so that the data may be taken as necessary.

Types of Database Management System

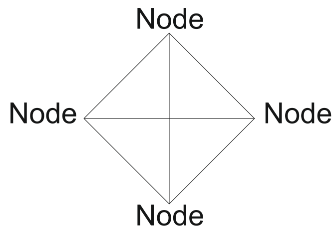
(1) Hierarchical (2) Network (3) Relational

1. Hierarchical Design : The earlier designed databases were hierarchical, in which one main route and remaining branches were considered. Its branches (one-to-many) are floated in the form of a tree, hence it is not a transitional structure, no one can interact with the media and the data will be in the same direction. Due to these shortcomings, the design of the database has been changed so that the data can be used in full and appropriate manner and at the right time. It has been shown by the following picture. (Picture 1)



Picture 1 : Hierarchical Design

2. Network : In network system, each and every databases are inter connected. The data in the network model are represented by collection of records and relationships among data, are represented by links, which can be viewed as pointers. In other words each node is connected to the other. The data are made available wherever it is required. The flow of data is not restricted to a particular direction. The flow of data is from many to many. Representation of relationship between entities is implemented using pointers, which allow the representation of arbitrary relationship (Picture 2)



Picture 2 : Network Design

3. Relational : In relational database, all the shortcomings of the hierarchical and network database management are removed. It is a database in which all the data are stored in relations of one to one as well as one to many. The data is stored in database objects, which are called tables. Relational database model is the basis of structured query language.

Database Structure

The main elements used to prepare the database structure are as follows:

1. Reality : Generally a structure of data is prepared according to the organization's activities in which all the data related to the work should be ensured. For example, accounting is a work, so data related to accounting will be considered.

2. Data : Data is a collection of facts, such as numbers, words, measurements, observations or even just description of things. It includes basic facts and statistics on which decisions can be taken only after further processing.

3. Database : Database is a combination of various data files. It contains various units. The smallest unit is a letter (i.e., 1, 2, 3, 4, a, b, c, d) to be stored in the computer, and data items are created from a group of letters, such as name, address etc. A group of data items is known as record. Such as record of a student contains his roll number, name, subject etc. The sum of the records is called a data file and all the data files are called database.

4. Information : If any decision can be made on the basis of results obtained on processing the data, it is called information. In other word the processed data available for decision making is known as information. If any decision can't be taken on such information then the data will be reprocessed. Information is the final residual of database system

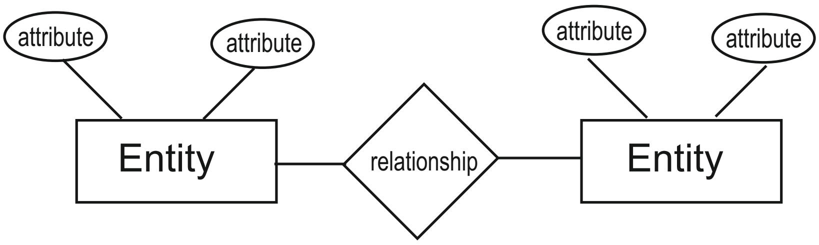
5. Data Base Management System : It is software that operates the entire database in providing information to the required persons. It also assists in finding out some specific information through query from the database. The data base management system is helpful in storing data in the database, preparing their structure, removing unnecessary data, processing for desired results, and arranging data in accordance with the requirement, etc.

6. Data Model : Data is a collection of facts. The data provides information to users according to their use. Data Model defines the dynamic structure of DBMS. Database within a system, defines how the data are interconnected.

7. Entity Relationship Model : Entity relationship model is based on attributes of the model. Entity is an object based on a particular person or a thing. For example patient is an entity in a hospital's database and its attributes are his name, date of birth, father's name, date of hospitalization in this hospital, name of disease, etc. The ER model is based on:

Entity and its attributes

The interrelation between entities : can be explained as under (Figure 3) :



Picture 3 : Entity Relationship Model

(i) Entity : The structure of the actual conditions based on the particular object is termed as Entity of ER model. An entity is a single person, place, or thing about which data can be stored. In DBMS, an entity is some unit of data that can be classified and have stated relationships to other entities. Its characteristics are known as attributes. Entity can be an object with physical existence, such as, house or a non-existent entity. For examples accounting entity may be accounts, employees, types of accounts and supporting documents. Accounting data is prepared by entity. Example of an entity can be understood with the help of college database where student is an entity and its attributes are name, father's name, birth date, gender, class etc.

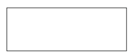
(ii) Relation : The relationship between object or entity is the connection or association between them that affects each other. Relationships can be depicted in multiple forms with entities. Such relations should be logical or rational in nature. This relationship can be between two entities. In addition, the relationship between two or more entities demonstrates that there is a mutual relationship between the respective entities. Existence of relationship between two entities is possible in many ways. As shown in the diagram: (Figure 4)

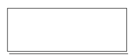
One to one 1 : 1	Entity	1	Relationship	1	Entity
One to Many 1 : N	Entity	1	Relationship	*	Entity
Many to one N: 1	Entity	*	Relationship	1	Entity
Many to Many 1 : 1	Entity	*	Relationship	*	Entity

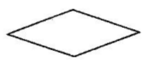
Picture 4 : Types of Relationship Between Two Entities

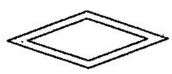
Note : In the above table 1 means one and * means many

(iii) Entity Relationship : Entity model concept is used in most database applications. The structure of entity relationship model is used of the major components of model entity, feature identifier, and ties to reality. The format of the database can be understood by the model's signals. An entity relationship diagram (ERD) shows the relationships of entity sets stored in a database. An entity in this context is a component of data. In other words, ER diagrams illustrate the logical structure of databases .The following signals are used to express various types of entity symptoms, identities and relationships used for construction of ER diagram :

An entity is represented by a rectangle which contains the entity's name. 

Weak entity is doubled line rectangle 

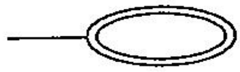
Relationship 

Identification of relationship 

Attribute

Key attribute

Multivalued attribute: An attribute that can have many values.



Derived attribute: An attribute whose value is calculated (derived) from other attributes.

(iv) Identifier: The database object name is referred to as its identifier. All entity types have the same kind of properties but have a different value, so that the identity of the entity is mentioned. For example, the roll number is a student entity type, which has a code number by which a particular student is identified.

(v) Weak entity : An entity that cannot be uniquely identified by its attributes alone. The existence of a weak entity is dependent upon another entity called the owner entity. The weak entity's identifier is a combination of the identifier of the owner entity and the partial key of the weak entity. Some entities may have more than one property. This type of entity that does not have any major property.

(vi) Attribute : A quality of any object that explains about that entity is known as attribute. For example in case of a person it may be the height, weight and birth date, all the qualities applied to the person. In case of accounting, the accounting code and name of the account etc. Every entity has an attribute that represents that entity, which is stored in the database in the form of data.

Types of Attributes

(a) **Simple attribute :** Simple attribute cannot be divided. For example the units produced by a machine in one year, have a general quality.

(b) **Mixed attribute:** This attribute is divided into some smaller subdivisions. Their quality reveals its original meaning. For example fixed assets are a mixed quality. There can be several types of permanent assets.

(c) **Single value attribute :** The attribute that has value in a single unit is called a single attribute. Just like a company's net profit of one year is a single value attribute.

(d) **Multi value attribute :** Such qualities which have more than one value for one unit are called multi-value attributes. For example, the qualifications of an employee employed in a company are valuable properties.

(e) **Compound attribute :** In this, two or more properties are related to each other in such a way that one attribute is dependent over the main attribute.

Database in Accounting

Various types of data are used in accounting process. The amount of accounting data depends on what is the format of business and the manner in which transaction are recorded. If there is a sole proprietary concern, then the number of data required will be limited due to which the accounting transaction will be less in comparison to partnership firm and company.

Structure of Accounting Database :

Computerized accounting information system is dependent on data storage of accounting records. For this purpose an entire structure of accounting data structure is designed with well assigned entity and attributes with clear establishment of relationship between them. As explained earlier, the database is used for the storage of accounting data. The process of drafting (for accounting) starts with the process of reality (the reality of accounting), which is expressed as the concept of data format elements.

(i) Reality : It refers to the real world situation for certain aspects in which database management system will be operated. In the context of accounting through database management , this is the first step of accounting, which is expressed with full description.

- The accounting transaction of a business is documented through a Voucher.
- Each voucher has a serial number that starts with '01', as well as it indicates that it is the first voucher of the accounting period. Only simple voucher is used to document the transaction.
- On every voucher, the date of the transaction, account number, both the income-expenditure entries with the code are used.
- Each accounting voucher shows the amount of accounting transaction.
- Supported documents such as bills, receipts, contracts etc., are also attached to the accounting voucher.
- Each account is prepared by a certain employee and is authorized by another employee.
- Each accounting is classified into an account type - expenses, income, assets and liabilities.

(ii) Entity Relationship Scheme: It is formally presented with the blue print of illustrated presentation, in which the entity relationship is established. It is a design used to present the description of reality.

(iii) Relational Data Model: This model explains the relationship between the databases in a group. It is based on the entity relationship design. In other words it represents the database in the form of collections of relations in the form of data tables. Row of the tables depict the collection of related data. Each row of a table is called a record. The values in columns are called data type.

(iv) Normalization: It is used to remove the process of refining duplicate, unused and unclean data in the database. It reduces the possibility of duplicate and terminated data.

Data Processing Cycle

The computerized accounting process involves identifying, storing and retrieving data of an accounting transaction. This requires a process that stores data related to accounting in such a way that they can be retrieved as necessary. It can be obtained by preparing appropriate data base for accounting. The data processing steps include data seizing, data input, manipulating and generating the information for the user of information. The data are internally attached in the data inventories in such a way that it insures consistency and integrity of the data . Before understanding the data base format dynamic, the data processing cycle should be explained in terms of accounting. Accounting data is the data that is extracted from, and with which the accounts are prepared. This data is used through a certain process. The order of this process is called the data (Accounting) process cycle. It involves collection, classification, relation and calculation of the data in way, which makes it easy for accounting decisions in the best possible manner. Information in financial statements is converted from different levels and presented in the final order. These levels are as follows -

(i) Sources : The first step in data processing cycle is the preparation of voucher. It is a document that is prepared for accounting so that the accounting process can be done in a sequential manner. All the information related to accounting is available in these vouchers.

(ii) Inserting the data : The accounting data collected is entered in computer. Accounting statistics is available to the providers through the computer's storage device. The data entry form is formatted in such a way that it is similar to the physical voucher. The data entry is made through software in a prescribed format.

(iii) Storage Data : A data structure is needed to store the data in which the composition of the account's nature, the name of the account and the codification of the category of the account have to be written. Storage data is the only part of data accumulation. The format of data storage is as follows: (Figure 5)

Code	Name	Type of Account

Picture 5 : Data Storage (Entity type)

The above mentioned data record is used to store the items related to the account code, account name and account class items. As explained below : (Picture 6)

Code	Name	Type
120001	Capital Account	4
150001	Purchase Account	1
160001	Sales Account	3
170001	Assets Account	2
180001	Libility Account	5

Picture 6 : Type of Accounts

In the above table, type-4 liabilities, 1 expense 3 sales, 2 asset and 5 liabilities. The data storage structure (also called data table) for accounting is generated as part of the data base structure.

(iv) **Data manipulation :** The final report is prepared by making necessary changes to the compiled data. These types of data can be compiled separately and can be used in the preparation of final reports. Alternatively, manipulated data can be presented in the form of final report.

(v) **Data Output :** Using the manipulated data, accounting reports can be obtained according to the preformed format. The data output in the form of accounting reports may be in the form of trial balance, profit and loss account etc.

Entity and attributes of accounting

1. **Types of Accounts :** This is a conceptual entity that is meant to express types of account of the accounting system. Class (ID) is an account type of entity, through which the classified accounts are identified.
2. **Account :** Account is an entity that expresses various types of accounts. Name of the account is the category of account. (Picture 7)

S.No.	Entity Type	Attributes
1.	Accounts Type	Category-ID
2.	Accounts	Code, Name, Type
3.	Emloyees	Employees ID, First Name, Middle Name, Last Name, Category IA
4.	Voucher	Date, Number, Income, Expenses, Debit, Credit, Authorised by, Prepared by
5.	Support Document	S.No., Name, Date

Picture 7 : Attributes of Accounting Entity

3. **Employee :** The employee is a physical entity by which various types of employees are concerned with the accounting system. Any employee can be identified by the employee identification (ID).The ID expresses the

employee's first name, middle name, last name. Super ID Expresses the identity of the superior of the employee.

4. **Vouchers:** This is an entity which provides the structure of transaction data.
5. **Support Document:** These are the facts that express the various types of supporting documents that are attached to the authenticity of the transaction of an account.
6. **Date:** The serial number expresses the sequence number in the supporting document attached to the attributes. The document expresses the date and the name expresses the name of the account which is attached to the voucher.
7. **Entity type and entity group:** Entity type is the collection of entities that hold some common features with reference to their attributes. Each entity type is given a name for its identification. Attributes of entity types are described in the data base. The value of the attribute of an entity, which is in the form of entity type, is called an entity instance. Example (11001 Capital Account 4) is an entity reference, whose code is 11001, Name - Capital Account and Type is 4)
8. **Entity group:** It is a collection of all entity instances of each entity type. An entity type is described in the set of attributes called schema. The set of entity related to particular entity type share the same set of attributes. The collection of entities of a particular entity is grouped into entity set, called the extension of entity type. (Picture 8 and 9)

Code	Name	Type

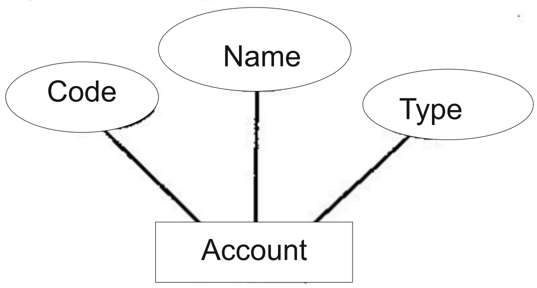
Picture 8: Structure of type of Entity

11001	Capital Accounts	4
221019	Jain Com.	4
221020	Jairam Brothers	4

Picture 9: Entity Type & Entity Group

Identifier : Nearly all the entity type is one kind of attribute, which has a unique value. Thereby identifies the entity instance. For example, roll number of a student is an attribute of entity type (student) with a unique value through which a student is identified. In the same way code is an important attribute of an entity type (Accounts) since it represents a unique data value that separates it from other data values.

Accounting database : In accounting, accounts of transactions are divided into just four categories. Expenditure, Earnings, Property and Liability. According to the rules and procedures of accounting, the first entry of a transaction is made first. After that, posting is done in his accounts. The balance of the accounts is transferred to the plumbing. Benefit-loss account and blog are created from Talpath. For example, if the loan of five thousand rupees is sold to Sunil, then the journal entry will be written through voucher. Its entry in the General will be as follows. (Picture 10)



Picture 10: Account code of Account and Attributes

There are some instances where two or more attributes, together constitute some different values. For example, a school requires a composite key (sub class and roll no.) for its entity type (student) . The object does not allow any two entities of same value in any form at the same time for its attribute. Some entities can have more than one main attribute. The type of entity that has no main attribute is called weak entity. (Picture 11 & 12)

Sunil A/c Dr To Sales A/c (goods sold to sunil)	5000	 5000

Picture 11: Entry in Journal

Voucher Entry

M/s Dinesh and Company

Transaction Voucher

Vourchers No. 05 : Date : 10 April, 2015

Account Name 69001 : Sunil Account

Credit Account 69002 : Sales Account

Amount Rs. : 500000

Authorised by - Vivek Prepared by - Ravi

Picture 12 : Voucher entry one debit one credit

The same transaction can be also processed through a credit voucher in multiple credits against a single debit. It can be illustrated as under: (Picutre 13)

Credit Voucher

Voucher No. 05 Date: 01 April, 2016

Account Name : 69001 Bank Accounts : M/s Ideal Computers

Credit Account

Serial No.	Code	Name of Account	Amount	Naration
1.	69002	Purchase Account	5,00,001	Goods Sold
		Total	5,00,001	

Autorized by - Vivek Prepared by - Ravi

Picture 13 : Voucher for multiple credits and one debit

Now look at the following transactions: M/s S.K. and Sons purchased a machine worth Rs 10000 on April 5, 2016 , from, M/s P.K. and Sons and paid Rs 500 as freight to M/s Sharma Transport. This transaction involves multiple debit accounts and a single credit account. The debit voucher used for this transaction will be prepared as follows (Picutre 14):

Debit Voucher

Voucher No. : 10 Date : 05 April, 2016

Credit Account : 642001 Bank A/c. S.K. and sons.

Expenses Account

S. No.	Code	Name	Amount	Naration
1.	711004	Purchase A/c	10000	Purchase form P.K. & Sons
2.	711034	Carriage	500	Carriage charge paid to M/s Sharma Transport
		Total	10501	

Authorized by : Vivek Prepared by : Ravi

Picture 14: Voucher for multiple debits against one credit

The accounting database can be explained by an example. In an accounting process, there are data related to the relevant voucher's supporting documents, ledger accounts and database related to employees, debtors, transactions, bank to record the transaction. From this database, the transaction has to be recorded in accounts and related reports. For instance in case goods sold to Rakesh, then Rakesh, will be debtor and his name will be stored in the list of debtors, through the database before passing the entry. Similarly, the data of which is the source of revenue through sales will be prepared. The effect of the sale will be on the stock, so the data of the stock will also be stored in the database structure. It can be understood by the following transactions.

Date	**Transaction**
1 June,2016	Started business with cash 10,000
1 June,2016	Rs. 25,000 deposited in Bank
5 June,2016	Goods purchased Rs. 10000
10June,2016	Purchase goods for Rs. 8000 amount paid by Cheque No. 89654
15June,2016	Salary paid Rs. 10000
30June,2016	Purchased goods from Dinesh for Rs. 10000
30June,2016	Rs. 5000 paid as carriage

The structure of database will be as under : (Picutre 15, 16, 17, 18 and 19)

Name	Fathers' Name	I.D.	Dept. I.D.
Sunil	Dinesh	S002	MK08
Kranti	Rohit	K002	
Ramesh	Vimal Sharma	R001	FN08
Vikas	Suresh Doshi	V001	
Yogesh	Gopal Singh	Y003	

Picture 15: Database of employees

Voucher No.	Debit	Rs.	Date	Credit	Transation
005	65001	100000	1 June, 2016	63002	Started Business
006	64001	25000	1 June, 2016	65001	Deposit at Bank
007	66001	10000	5 June, 2016	66001	Purchased goods
008	66001	8000	10June, 2016	64002	Purchased goods
009	67001	10000	15 June,2016	64002	Paid Salary
010	66001	10000	30June,2016	67002	Purchased from dinesh
011	69001	5000	30June,2016	64001	Paid carriage invered

Picture 16 : Vouchers

Voucher No.	S. No.	Supporting Documents
006	1	Bank Receipt
007	1	Invoice
008	1	Invoice
009	1	Signature on Register
010	1	Invoice

Picture 17: Supporting documents and accounts

Code	Name	Type ID
65001	Cash Account	3
63002	Capital Account	4
64001	Bank Account	3
66001	Purchase account	1
67001	Salary Account	1
67002	Dinesh account	2
69001	Carriage Account	1

Picture 18 : Accounts

Type ID	Classification
1	Expenditure
2	Libilities
3	Assets
4	Capital
5	Income

Picture 19: Type of accounts

All the above mentioned transactions have been coded. These have been classified according to the type of accounts classified.

Disadvantages of DBMS

1. **High Cost:** D.B.M.S. is based on computer programming. Costs arise in creating this program. This cost is in addition to the normal cost that is incurred in the business. If an organization wants to implement this system, then it has to pay for its installation and maintenance. It is difficult for every business entity to afford this cost.

2. **Skilled Employees:** Operating DBMS requires highly trained professionals and skilled personnel. The employees working in the current system need training and regular upgradation after the installation of DBMS. Ongoing training is essential for the employees.

3. **Complexity :** The main pillar of DBMS database, which stores and operates data. Sometimes data are collected which are not required. Different types of users may have trouble using data because there might be certain ambiguity in data usage

Microsoft Access

This software controls and regulates data base management system. The process of collecting, controlling, transferring, etc. of data is effectively implemented from this software system. Access elements are used by various types of business organizations, for the convenience of their business. These elements have been created keeping in mind the user's objectives. The elements of access are defined as follows. Every element which is created using access is an object and all other objects constitute a class. Access is available with the following object classes:

Elements of MS Access

(i) **Table:** This object class convert database format into data table. It includes their respective fieldname, data type and properties.

(ii) **Queries:** It is meant to create the Structured Query Language well-matched query statement with or without the use of graphic user interface to define tables, store data and retrieve data and information.

(iii) **Forms:** This is done by creating user interface. This helps the user to use the back end database.

(iv) **Reports:** This object class is used to prepare various types of report. Their information is based on source tables, queries, or both. Such reports are made in access as per the end user's requirement.

(v) **Page:** This object class creates data access pages that can be sent to any organization's website with the use of internet, or by e-mail to users' networks.

(vi) **Macros:** In macro programming, macro based actions(individual instructions) are manipulated.A macro is a list of macro oriented actions that run a unit.

(vii) **Modules :** These are the main sizes for any application, and formats can help them prepare a group of programming instructions called functions. Similar modifiers are made through access.

The object class is contained in the named database file of Access with MBD extension. Whenever this file is opened then a database window is displayed. Among these, all the above mentioned objectives are open with the left side. Whenever special objects are created, then they get listed on the right side on this window against each of the object class.

Efficiencies of MS Access

Access has special utilities, which can be implemented in any type of organization. Its main functions are as follows:

- Systematic storage
- Representing complex relationships between data.
- The database prohibits unauthorized users from accessing.
- Allows Structured Query to retrieve the data with or without its speed.
- Creates intermediate interfaces of multiple users
- Shares data.
- Promotes multimedia data and information.

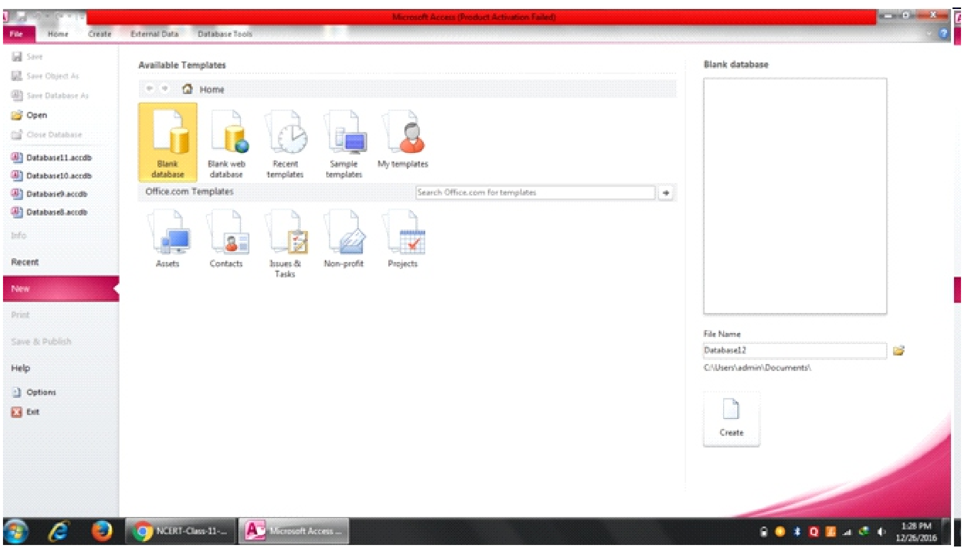
Database in Access

When a new database is created from inception, there is full control over the objects of the database, their properties and the relationships. In order to create a new database (this process is an automatic process) it is necessary to follow the following steps:

(i) To select an empty access database, open the access window and select OK. Click the button.

(ii) The Access file database will display the dialog box, in which the designer must type the name of the file and the name of the database, after which the Create button must be clicked.

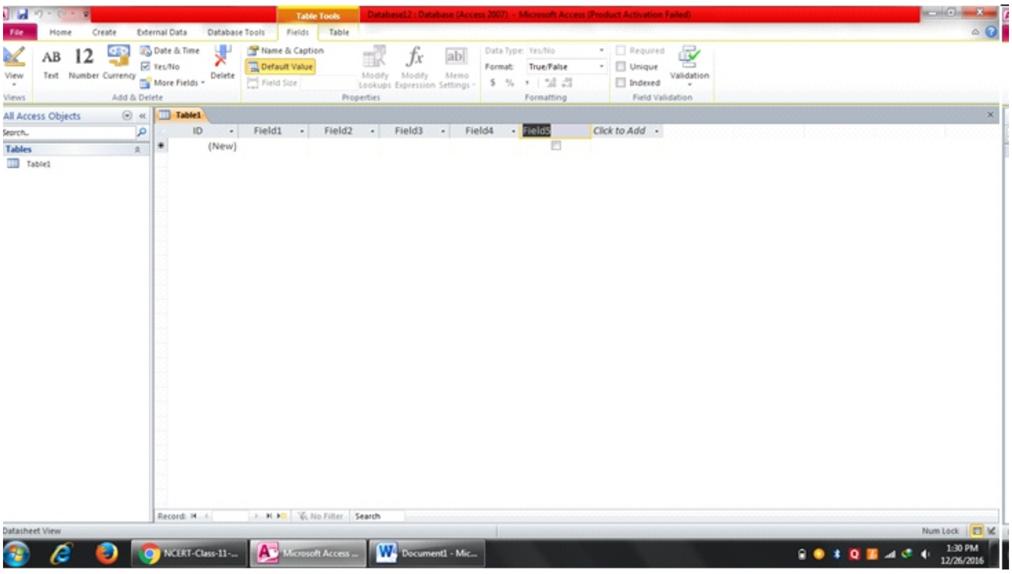
If the task pane does not open, then go to the file from the menu list and click on 'New' to create a new database. The file that opens the access file is displayed in picture 20.



Picture 20: Creating a new file in a window

Creating tables in access :

To create tables in access, it is necessary to understand the following components of the table object. Click on the tables object in Access, Make a double click at “create table by design view”, which will provide a table window, which consists of three column areas: Field Name, Data type and Description. They define the plans (schemas) of the tables that are being created. Each of its rows corresponds to the column of the table to be made. The column of a table has field name and data type as its major parts. The file window is displayed as under: (Picutre 21)



Picture 21: File creation window

Field Name: This is the column name of the table. The name of the column should be a string of contiguous characters. The field name defines the name of the column to be created, followed by data type of such column. The designer can also opt to provide description of the column. After defining the data type, the designer can further define the properties of each column in the lower part of the table window.

Data type: Access supports different data types, which are described below:

Text: It is used for string of characters, letters, words or numbers that are not be used in any arithmetical calculations.

Memo: It is used to store comments and adjust the character. But the data type cannot be agreeable for sorting or filtering of data records.

Number: It is used to store the numbers, that may be integers (-32768 to 32767) long integers (-2, 147, 483, 648 to 2, 147, 883, 647), bytes (0-255) , Single (storage of values with a decimal point up to a certain extent), double (values in decimal point in greater magnitude).

Date / Time: It is used to store date and time or combination of both.

Currency: It is used to store numbers in terms of, rupees, pound, dollar and other currencies of various countries.

Auto Number: This is numerical data which is inserted automatically by Access. It has special significance in situation where, none of the fields individually or a set of fields as a combination in a table is unique.

Hyperlink : It is meant to store a Universal Resource Locator (URL) and email addresses.

Structured Query Language

In database management system a standard computer language is used for data manipulation. Such language is required by the user to get the information by placing a request to the database. It is called the Structured Query Language. When some data is to be deleted, added and changed, then it is processed through query.SQL is used to query, insert, update and modify the data. Answer can be found for any type of special questions related to the database by using the query. Query is an inquiry into the database through certain specific statement. By looking at the database table, it is not possible to remove the data directly from it. Data can be filtered by query and can be calculated and summarized. The functions of data management can be automated through the query. Before any changes in data, data can be reviewed before making any specific changes. The user can write the statement in the form of a data base application that can access data stored in two or more relational database management systems. It is also capable of defining user oriented views of database and also specify security and authorisation.

The original version of structured query language was SEQUEL(Structured English Query Language) that was designed by IBM research center.

Functions of SQL

- It performs data manipulation.
- It displays the query.
- It can Inserts the records.
- It can delete the records.
- It can update the records.

Table

The database is prepared through the data table. A database can contain more than one table. (Picutre 22)

Customer ID	Name	Address	City	Pincode

Picture 22: Format of Table

Basic Queries in SQL : Data Query Language (DQL) as a sub set of SQL is generally used to answer most of the basic queries. The basic form of query is the usage of SELECT-FROM-WHERE**. This** structure is used as described under:

SELECT : This clause is used to locate or specify the data or information that is desired to answer the query

FROM : It is used to specify the source of data for answering the query.

WHERE : It is used to specify the condition that are used to specify or narrow down the choice of data to extract the information chosen in select clause.

SQL Statement : Select statement is used to select the specific data from a given database.For example, if a data is to be selected from a database table the following syntax command will be used: (Picutre 23)

SELECT column-NAME from Table NAME

Employee			
Employee ID	First Name	Last Name	Address
001	Anil	Sharma	25, Adarsh Nagar
002	Sunil	Khandelwal	8, Amal Park
003	Rajat	Sharma	10, Apex Avenue
004	Sunder	Agarwal	7, Smart Nagar

Picture 23 : Table of Employees

From the above table if we want to retrieve the record of the person with an ID of 002 then SQL command will be:

SELECT

FROM Employee(Employee is name of table)

WHERE Employee ID=002

This language is specifically designed to work as per the instructions of user for various data related work.

Summary

Database management system provides information for management decisions through various types of data.

All the data are arranged by converting them into the information required according to the database management system. This system is a group of programs created to use co-related data. Its purpose is to collect data through the software and to do its management as per the requirement of the user.

The main function of the database management system is to provide a way to recover data from different types of data through appropriate media. As the information of students studying in a school can be stored in the form of name, roll no. section, marks etc. Structured Query Language is used to remove, modify and retrieve data from database. It has major importance in accounting.

Questions for Exercise

Multiple Choice Questions :

1. Data is ?
   (a) Notice (b) Collection of facts (c) a and b both (d) None of the above
2. Information is ?
   (a) Meaning of Data (b) The origin of Data (c) Data (d) None of the above
3. The result of processed information is ?
   (a) Input (b) Output (c) Both of the above (d) None of the above
4. The method of preparation of query in the following is ?
   (a) SQL (b) JHL (C) RST (d) DBM
5 The full name of DBMS is ?
   (a) Database Markup System (b) Database Management System
   (c) Database Management Section (d) None of the above
6. The demerit of the database is ?
   (a) Repetition of data (b) Data discrepancy
   (c) Difficulty in retrieving data (d) None of the above

Very Short Answer type question :

1. What is data?
2. What is data processing?
3. Define Structured Query.
4. What is ER Model?
5. What do you understand from the relation in DBMS?
6. What is information?
7. Define Query.

Short Answer type questions :

1. Explain the data processing cycle with the view of accounting.
2. What is accounting data?
3. Explain the database management system in detail.
4. Explain the following words with examples-
   a) Entity b) Attribute c) Relational
5. Explain the ER model in detail.
6. What do you understand from the database? Compare it to the traditional file handling system.

Answers of Multiple Choice Questions

Question No.	1	2	3	4	5	6
Answer	b	a	b	a	b	d