

**Question Paper Set of**

**F.Y.B.F.M. – Sem-II**

**Regular Exam**

**University of Mumbai**

**April, 2018**

Time: 2 ½ hours

Marks: 75

Note: 1) All Questions are compulsory.

2) Figure to the right indicates full marks.

1.A Choose the correct alternatives (any eight)

(8)

- (i) \_\_\_\_\_ means integrating the national economy with the world economy.  
(Globalisation, Privatisation, Socialisation)
- (ii) \_\_\_\_\_ farming is undertaken by large firms either by buying the land or taking land on lease basis.  
(Corporate, Contract, Mutual)
- (iii) Human Rights have \_\_\_\_\_ application.  
(Social, Political, Universal)
- (iv) The General Assembly adopted the UDHR on \_\_\_\_\_ 1948, at Paris.  
(10<sup>th</sup> December, 11<sup>th</sup> December, 12<sup>th</sup> December)
- (v) \_\_\_\_\_ degrades the soil and makes the cultivation of the crops impossible.  
(Deforestation, Desertification, soil erosion)
- (vi) \_\_\_\_\_ is the study of relationship between organisms and their environment.  
(Biology, Sociology, Ecology)
- (vii) \_\_\_\_\_ refer to moral and social norms that are essential for the well-being of an individual, group or society.  
(Values, Ethics, Prejudices)
- (viii) \_\_\_\_\_ are generalisations or assumptions about the characteristics of traits of people belonging to a group.  
(Stereotypes, Prototypes, Sociotypes)
- (ix) The \_\_\_\_\_ needs lie at the highest level of the hierarchy of Maslow's Need Hierarchy Theory.  
(Physiological, Social, Self-actualisation)
- (x) \_\_\_\_\_ don't believe in taking risk.  
(Concealers, Attackers, Addressors)

1. B State whether the statement is True or False

(7)

- (i) Brain Drain is a positive impact of globalisation.
- (ii) Immigration means moving into a new country.

- (iii) The UDHR consists of 28 articles.
- (iv) Writ can be issued only by Supreme Court.
- (v) Abiotic components are non-living compound and physical elements in the environment.
- (vi) Atmosphere regulates the global temperature.
- (vii) Environmental factors are only factor causing stress.
- (viii) Eustress are also known as negative stress.
- (ix) Maslow's theory is on Human Motivation.
- (x) Meditation is an effective method of relieving stress.

2. Discuss the concept of privatisation. Highlight the advantages and disadvantages of privatisation.

OR

What is migration? Discuss the causes and consequences of migration.

(15)

3. Discuss the civil, political and economic rights under UDHR.

OR

Explain the concept of human rights. What are the important landmarks in the development of modern human rights?

(15)

4. What is Sustainable Development? Discuss the basic components of Sustainable Development.

(15)

OR

What are the causes of aggression and violence? Discuss measures for resolving aggression and violence in society.

5. What is stress? Discuss various strategies to reduce stress.

(15)

OR

Write short notes on (any three):

- (a) Advantages of liberalisation
- (b) Right against exploitation
- (c) Air pollution
- (d) Family as agent of socialisation
- (e) Importance of values in society

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18/04/18

o/c RMS/BAF/221/271

Q.P. Code: 12169

Total Marks: 75

Duration: 2½ hours

N. B. 1) All questions are compulsory.

(08)

Q. I. A. Fill in the blanks with suitable options. (Any Eight):

- 1) A/An ..... provides written intimation about the date, time and venue of a business meeting.  
(Notice / Resolution / Agenda)
- 2) A Structured Interview is .....  
(pre – planned / unplanned / planned on the spot)
- 3) ..... are based on the findings of a Business Report.  
(Recommendations / Terms of Reference / Summary)
- 4) The primary objective of a/an ..... Interview is to select the best candidate for the job. (Selection / Exit / Appraisal)
- 5) Conferences provide a valuable base for .....  
(Seminars/Committees/Symposia)
- 6) Business meetings have a/an ..... agenda.  
(indefinite / dynamic / fixed)
- 7) A Group Interview is similar to a ..... (Group Discussion / Panel Interview / Structured Interview)
- 8) Suggestion Schemes are an example of ..... Communication.  
(Upward / Downward / Zigzag)
- 9) Catalogue, Price-list and Product Literature are sent by a seller in response to a Letter of ..... (Order / Complaint / Inquiry)
- 10) A conference should be ..... (need based / choice based / quality based)

(07)

Q. 1. B. Match the following (Any Seven).

- |                            |                             |
|----------------------------|-----------------------------|
| 1) Motion                  | a) Vote of Thanks           |
| 2) Conference              | b) Review of Performance    |
| 3) Promote Sales           | c) Open House               |
| 4) Last Item in the Agenda | d) Outgoing Employee        |
| 5) Exit Interview          | e) Give Latest Developments |
| 6) Bulletins               | f) Proposal                 |
| 7) Appraisal Interview     | g) Exchange of Views        |
| 8) Skype                   | h) Discounts                |
| 9) Group Communication     | i) Group Discussion         |
| 10) External PR            | j) Video Chat               |

- Q. 2 A. How should a candidate prepare himself for a Job Interview? (07)  
 B. List and explain the factors that must be considered to organize a successful conference. (08)

OR

- C. What is a Grievance Interview? Why should it be conducted? (07)  
 D. Define Public Relations. List and explain any five measures to promote the external Public Relations of an organization. (08)

- Q. 3 A. An educational institution requires one hundred and fifty desks for its classrooms. Draft a Letter of Inquiry addressed to Famous Furniture Mart asking for a price-list and catalogue. Use the Complete Block layout. (07)  
 B. Mr. Gupta bought two dozen fruit drink cans from Super Bazar. On checking the cans at home Mr. Gupta realized that the cans sold to him were 20 days past their expiry date. Draft a Letter of Complaint on his behalf. Use the Modified Block layout. (08)

OR

- C. Draft an Investigative Report with recommendations about the unhygienic conditions in the canteen of Wonder Works Pvt. Ltd, Chembur, Mumbai. (10)  
 D. Draft the Notice and Agenda for the Annual General Meeting of Phoenix Computers, Worli, Mumbai. (05)

- Q. 4 A. Draft a Sales Letter to promote a 'Vedic Maths and Abacus Center'. Use the Semi Block layout. (07)  
 B. Amrit Lal had paid his telephone bill in time, yet his telephone line was disconnected on charges of non-payment. This has happened for the third consecutive month. Draft a letter on his behalf addressed to the Consumer Redressal Forum seeking compensation for the harassment and immediate restoration of the connection. Use the Complete Block layout. (08)

OR

- C. Draft an RTI Letter seeking information regarding your application for a driving license that has not been processed in spite of having passed the Driving Test and having submitted the required documents three months ago. (07)

**D. Summarize the following passage:****(08)**

The educational philosophy of Swami Vivekananda is a harmonious synthesis between the ancient Indian ideals and modern Western beliefs.

He not only stressed upon the physical, mental, moral, spiritual and vocational development of the child, but also advocated women's education, as well as education of the masses. The essential characteristics of the educational philosophy of Swami Vivekananda are idealism, naturalism and pragmatism.

From a naturalist view point, he emphasized that real education is possible only through nature and natural propensities. From an idealist view point, he insisted that the aim of education was to develop the child with moral and spiritual qualities. From a pragmatist view point, he emphasized the need for Western education of technology, commerce, industry and science to achieve material prosperity. In short, first he emphasized spiritual development, then natural propensity, after that safety of life and then solving the problems of food and clothing of the masses.

Swami Vivekananda considered women to be the incarnation of power. He rightly pointed out that unless Indian women secure a respectable place in this country the nation can never move forward. The important features of his scheme for female education are, "Make women strong, fearless and conscious of their chastity and dignity". He insisted that men and women are equally competent not only in the academic matters, but also in other spheres of life. Swami Vivekananda being a keen observer could distinguish the difference in perception about the status of women in the West and in India. "The ideal woman in India is a mother, a mother first, and a mother last" he declared.

**Q. V. Write short notes: (Any Three)****(15)**

- 1) Advantages of Conferences
- 2) Role of a Chairperson in a Business Meeting
- 3) Appraisal Interview
- 4) Videoconferencing
- 5) Functions of the Public Relations Department of an Organization

**Q.P. Code : 32484**

**[Time: 2:30 Hours]**

**[ Marks: 75]**

Please check whether you have got the right question paper.

- N.B:
1. Solve all questions. Each question has internal options.
  2. Workings should form part of your answer.

**08**

**Q.1 A) TRUE OR FALSE ( ANY EIGHT)**

1. A partnership firm cannot issue shares.
2. Shareholders have unlimited liability.
3. Bonus issue is made out of free reserve.
4. Net Block is Gross block less accumulated depreciation.
5. Authorised capital is disclosed only for information.
6. Super profit is a difference between FMP and normal profit.
7. The partly paid share can be bought back.
8. Own debentures cannot be held as investment.
9. AS – 11 is applicable for accounting for investment.
10. Business entity concept is not applicable to sole trading organisation.

**B) MATCH THE COLUMNS (ANY SEVEN)**

**07**

Group A	Group B
1. Authorised Capital	A. Long term investment
2. Investment for over 12 months	B. Secured Loan
3. Creditors	C. An intangible assets
4. F.D. With Bank	D. Capital Reserve
5. Trade Mark	E. Memorandum of Association
6. Profit On cancellation	F. Current liabilities
7. Bonus Shares	G. Bank Balance
8. Debentures	H. Free Shares
9. Cost	I. Electronic Device
10. Computer	J. Expenses of the business

**Q.2** Paras plastic ltd. issued 20,000 shares of Rs.100 each at a premium of Rs.10 per share.

**15**

The share amount was payable as follows:

On Application: Rs.20. On allotment: Rs.40( Including Premium)

On first call: Rs.25. On final call: Rs.25.

Application were received for 15, 000 shares and all these application were allotted shares.

The directors made all the calls on shares. The first call money was not received on 1,000 shares

And the second call money on 500 shares. The directors forfeited the shares on which the first call was not paid. Of the forfeited shares 500 shares were re-issued as fully paid at Rs.70.

Give journal Entries.

- Q.2 OR  
Ajanta limited issued 8,000 6% debentures of Rs.100 each at a discount of 10% payable as Rs.10 On application, Rs.30 on allotment, Rs.40 on first call and balance on final call. All the amounts were duly received.

Pass necessary Journal Entries in the books of the company.

- Q.3 A) Mr. Kaushik furnishes the following details relating to his holding in 6% Government Bond :

Opening Balance Face value Rs. 1,00,000. Cost Rs.95,000.

2015

March 1 100 units purchased ex- interest at Rs.98.

July 1 Sold 200 ex- interest out of the original holding at Rs.100.

Oct 1 Purchased 50 units at Rs.98 ex- interest.

Interest dates are 30<sup>th</sup> September and 31<sup>st</sup> March. Mr. Kaushik closes his books every 31<sup>st</sup> December. Show the investment account for the year December 2015.

- B) Sun and Moon Ltd. Has Rs.11, 20,000 in equity share capital consisting of 80,000 Shares of Rs.10 each fully paid and 40,000 shares of Rs.10 each, of which Rs.8 paid per share.

It has Rs.40,000 in capital reserve, Rs.40,000 in securities premium account, Rs.1,40,000 in Capital Redemption Reserve Account and Rs.3,00,000 in general reserve.

By way of bonus dividend the partly paid up shares are converted into fully paid up shares and the holders of fully paid up shares are also allotted fully paid up bonus shares in the ratio of 4:1.

Pass journal entries showing separately the two types of bonus issues as mentioned above with the Minimum reduction in free reserve.

- Q.3  
Raviraj printers Ltd. Had an authorised capital of Rs.1, 00, 00,000 divided into 10, 00,000 equity shares of Rs.10 each. Trial balance of the company as on 31<sup>st</sup> March 2015 was as follow:

**Q.P. Code : 32484**

**Trial Balance as on 31.03.2015**

DEBIT	Rs.	CREDIT	Rs.
Premises	22,50,000	Equity share capital	47,50,000
Plant and Machinery	17,45,860	Profit and Loss A/C	1,01,200
Sundry Debtors	6,08,900	Gross Profit	10,58,000
Furniture	67,500	Reserve for Bad Debts	45,000
Bad Debts	14,250	General Reserve	3,25,000
Rent, Rates & Taxes	1,41,970	Sundry creditors	2,55,150
Advertising	97,540	Transfer fees	740
Cash in hand	47,200	Accrued wages	64,150
Cash at Bank	2,05,000	Staff Benevolent Fund	89,500
Stock ( 31.03.2015)	7,23,200		
Directors fees	18,000		
Sundry Expenses	39,980		
Salaries	1,59,140		
Motor Lorries	4,00,000		
Disc. On Issue of Shares	75,200		
Interim Dividend	95,000		
	66,88,740		66,88,740

Prepare statement of Profit & Loss for the year ending 31<sup>st</sup> March 2015 and Balance sheet in the prescribed form as on that date after considering the following:

1. Depreciation on Plant and Machinery at 10% and Furniture at 5%.
2. Create R.D.D at 10% on sundry Debtors.
3. Transfer Rs. 75, 000 to General Reserve.
4. Make provision for taxation to the extent of Rs.1, 00,000.
5. Interest accrued Rs.20, 000 on Bank Deposit.
6. Write off 20% Discount on issue of shares.
7. Rent & Taxes paid in advance amounted to Rs.16, 970.

**Q.4 A)** The following is the balance sheet of Udit Ltd as on 31/12/15

Liabilities	Rs.	Assets	Rs.
Share Capital:		Land and Building	42,000
7,500 shares of Rs.10 each	75,000	Plant & Machinery	48,000
General Reserve	15,000	Trade Marks	7,500
Taxation Reserve	22,500	Stock	18,000
Workmen's savings account	11,250	Debtors	33,000
Profit and loss Account	12,000	Cash at Bank	19,500
Sundry Creditors	36,750	Preliminary Expenses	4,500
	1,72,500		1,72,500

**Q.P. Code : 32484**

The plant and machinery is worth Rs.45,000 and land and Buildings have been valued at Rs.90,000.

Profits of the company have been as follow:

2013 Rs.30, 000

2014 Rs.33, 750

2015 Rs.33, 750

It is the company's practice to transfer 25% of the profit to General Reserve. Find out the value of the shares on the yield basis, Intrinsic value method and Fair value. Similar companies give a return of 10% on the market value of their shares.

OR

**Q.4 B)** Followings is the balance sheet of KJ Ltd. as on 31<sup>st</sup> March 2016.

Liabilities	Rs.	Assets	Rs.
Equity Shares of Rs. 10 Each	4,00,000	Net Block Fixed Assets	7,50,000
Preference Shares of Rs. 100 each	1,00,000	Trade Investment	50,000
Security Premium	1,27,500	Bank	10,00,000
General Reserve	1,00,000		
Profit & Loss Account	1,22,500		
Debentures	8,00,000		
Trade Payables	1,50,000		
	18,00,000		18,00,000

Keeping in view the legal requirements, ascertain the maximum number of Equity shares that KJ Ltd. can buy back @ Rs.25 per share.

Pass Journal entries and prepare Balance sheet after buy back.

**Q.5 A)** What is the need of Accounting Standards?

**B)** What are the advantages of computers?

OR

**Q.5** Short notes (Any three)

- 1) Own Debentures
- 2) Methods of Goodwill Valuation
- 3) Restriction of Buy back of shares
- 4) Right shares
- 5) Share Capital

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b. Discuss contemporary issues and challenges in managing business. (7)

OR

c. Explain the contribution of contingency approach to management (8)

d. Explain Managerial skills in detail. (7)

Q3. a. Explain the process of planning in detail (8)

b. What is MBO? Give suggestions for improving effectiveness of MBO. (7)

OR

Q.3 Explain group decision making techniques in detail. (15)

Q4. a. Explain the main principles of Organizing. (8)

b. "Leadership is situational." Explain. (7)

OR

c. "Co ordination is the essence of management " Explain (8)

d. Explain the types of leadership styles (7)

Q5a. Explain the process of Controlling. (8)

b. What are the modern techniques of Controlling ? Explain. (7)

OR

Q5 Write Short notes on (any 3) (15)

1. 6 M's of Management

2. Single use plan vs standing plan

3. Matrix Organization Design

4. Bases of departmentation

5. Reasons for employee resistance to control system

Please check whether you have got the right question paper.

- N.B:
1. All questions are compulsory
  2. Figures to right indicate full marks.
  3. Draw diagram where necessary.

08

A) Fill in the blanks with appropriate word: (any eight)

1. The ----- is the solid rocky crust covering the entire planet?
  - a) Lithosphere
  - b) Atmosphere
  - c) Hydrosphere
2. Agricultural decisions are greatly influenced by -----
  - a) Climate
  - b) Rainfall
  - c) Land
3. Fifth trophic level consists of the -----
  - a) Producer
  - b) Consumer
  - c) Decomposer
4. India has ----- biogeographical zones.
  - a) 30
  - b) 20
  - c) 10
5. ----- is both an engine of creation and destruction.
  - a) Machine
  - b) Technology
  - c) Science
6. The ----- sector of the economy extracts products from the earth.
  - a) Secondary
  - b) Primary
  - c) Tertiary
7. Activities associated with tertiary sector are transport and -----
  - a) Industry
  - b) Agriculture
  - c) Tourism

8. Zoo is an example of -----.

- a) Ex-situ
- b) In-situ
- c) Out-situ

9. ISO 16000 standard are meant for monitoring -----.

- a) E-waste
- b) Biomedical waste
- c) Indoor air quality

10. The sphere consist of living things are called as -----.

- a) Atmosphere
- b) Hydrosphere
- c) Biosphere

B) State whether the following statements are True or False: (any seven)

1. Large size countries like USA, Canada, Russia or India are likely to have wider range of resources.
2. Soil is a governing factor in raising particular crop.
3. Consumers are also called as autotrophs.
4. An endowment is any natural stuff that exists in nature, the use of which is not known to man at present.
5. The resources occurring only at the few places are known as localized resources.
6. When ores lie deep below the surface underground mining methods have to be used.
7. Deforestation refers to the loss of dessert cover.
8. Eco tourism means responsible tourism practices.
9. Ozone is mainly concentrated in the stratosphere between 10km and 50km above surface of the earth.
10. There are 18 mega diversity nations in the world.

- Q.2 a) What factors are responsible for loss of bio-diversity? 08  
 b) What methods can be adopted to conserve bio-diversity? 07  
OR  
 c) What is food chain, food web and biomass pyramid? 15
- Q.3 What is deforestation? Discuss the causes and effects of deforestation? 15  
OR  
 What is desertification? What are causes and effects of desertification? 15
- Q.4 Discuss the environmental problems associated with industries. 15  
OR  
 Explain the environmental impact of agriculture. 15
- Q.5 What is environment management? Discuss its need and importance of environment management? 15  
OR  
 Write short notes (any three) 15  
 i) Inexhaustible resources  
 ii) Effects of Greenhouse gases  
 iii) ISO 14000  
 iv) Remote sensing  
 v) Bio-Gas Energy

Max Marks: 75

Duration: 2½ hours

**NOTE: 1.** All questions are compulsory.

**2.** Figures to the right indicate full marks

**3.** Use of non-programmable electronic calculator is allowed

**4.** Graph paper will be provided on request.

Q1(A) Choose the correct alternative from the following (Attempt Any Eight) (8)

1. The information is to be collected from educated people in a large area, suitable method shall be \_\_\_\_\_  
 (a) Census (b) Questionnaire  
 (c) Direct Personal Investigation (d) Through Correspondents
2. Circular diagrams are always \_\_\_\_\_  
 (a) One dimensional diagrams (b) Two dimensional diagrams  
 (c) Three dimensional diagrams (d) Cartograms
3. Which of the following cannot be obtained by graphical method \_\_\_\_\_  
 (a) Arithmetic Mean (b) Median (c) Mode (d) Quartiles
4. Which average is affected most by extreme values \_\_\_\_\_  
 (a) Mode (b) Arithmetic Mean (c) Median (d) None of the above
5. Median means \_\_\_\_\_  
 (a) 50<sup>th</sup> Percentile (b) 40<sup>th</sup> Percentile (c) 6<sup>th</sup> Percentile (d) None of these
6. Quartile Deviation is \_\_\_\_\_  
 (a)  $Q_3 - Q_1$  (b)  $Q_3 + Q_1$  (c)  $\frac{Q_3 - Q_1}{2}$  (d)  $\frac{Q_1 - Q_3}{2}$
7. Correlation coefficient is always \_\_\_\_\_  
 (a) More than 1 (b) Less than -1 (c) Between -1 and +1 (d) More than 0
8. Regression coefficient ( $b_{yx}$ ) is \_\_\_\_\_  
 (a)  $r \cdot \frac{\sigma_y}{\sigma_x}$  (b)  $\frac{\sum xy}{N \sigma_x \sigma_y} \cdot \frac{\sigma_y}{\sigma_x}$  (c)  $\frac{\sum xy}{\sum x^2}$  (d) All of the above
9. The word 'Programming' means taking decision \_\_\_\_\_  
 (a) Systematically (b) Rapidly (c) Slowly (d) Instantly
10. The sampling units are chosen without replacement in the sense that the units once chosen are not placed back in the population are called \_\_\_\_\_  
 (a) SRSWR (b) SRSWOR (c) Both a & b (d) None of these

(B) State whether following statements are True or False (Attempt Any Seven) (7)

1. The sources of data are Primary and Secondary both.
2. The table giving the frequencies for different class intervals is known as frequency table.
3. In Frequency polygon, frequencies are plotted against the lower class limit.
4. With usual notation  $N\bar{x} = \sum x^2$ .
5. Dispersion measures the scatter of a set of observation.
6. If variable Y tends to decrease as variable X decreases, there is positive correlation.
7. If the value of correlation coefficient is zero, the regression lines are parallel to each other.
8. The student belonging to the University of Mumbai is an example of finite population.
9. Range can be calculated for open end classes.
10. Mode can be located by Pie diagram.

Q2 (A) Solve the following linear programming problem (LPP) graphically (8)

Minimize  $Z = 90x + 130y$  Subject to  $2x + 3y \leq 18$ ,  $2x + y \leq 12$ ;  $x \geq 0$ ;  $y \geq 0$

(B) Prepare a frequency distribution for the following data giving the heights of 30 children's. (7)

121 133 137 127 132 134 131 126 124 135 139 127  
137 130 133 144 131 132 127 140 126 134 128 143  
123 125 136 129 141 137  
Take the class intervals, as 120-125, 125-130..... etc.. Also write less than and more than cumulative frequencies.

OR

(P) SAGARMOTI REVOLUTION makes two types of videos I and II. To produce video I require 2 hours in studio A and 3 hours in studio B. To produce video II requires 3 hours in studio A and 1 hour in studio B. Studio A can operate for at most 15 hours a day and Studio B can operate for at most 12 hours a day. If Production House makes a profit of Rs. 4 on video I and Rs 12 on video II, how many of each should be produce in order to maximize a profit? Formulate LPP. (8)

(Q) Draw a subdivided Bar Diagram of the following data. (7)

Country	No. of tourists (in '000s) in year 2010	No. of tourists (in '000s) In year 2015
Africa	7.8	8.5
Australia	33.3	41.2
Canada	39.8	49.6
France	65.9	57.6
Germany (W)	61.4	66.0
Japan	36.4	34.9

Q3(A) Calculate Quartile ( $Q_2$ ) and Eighty Sixth Percentile ( $P_{86}$ ) for the following data. (8)

Marks	0 – 20	20 – 40	40 – 60	60 – 80	80 – 100
Frequency	5	12	32	40	11

(B) Calculate standard deviation for the following data. (7)

No. of Particles	Frequency ( $f$ )
0 – 4	54
4 – 8	120
8 – 12	66
12 – 16	30
16 – 20	2

OR

(P) Calculate Quartile Deviation and Coefficient of Quartile Deviation for the following data. (8)

Class Interval	2000-2500	2500 – 3000	3000 – 3500	3500 – 4000	4000 – 4500	4500 – 5000
Frequency	4	6	12	15	8	7

(Q) calculate mean and mode for the following data .

(7)

Daily wages in Rs.	200 – 400	400 – 600	600 – 800	800 – 1000	1000 – 1200	1200 – 1400
No. of Workers	8	15	22	15	13	7

Q4(A). Calculate Karl Pearson's coefficient of correlation for the following data.

(8)

Experience (x)	16	13	17	4	3	11	7	14
Rating (y)	88	87	89	72	70	82	78	84

(B) Given the following data, find the two regression equations.

(7)

Average age of car ( $\bar{x}$ ) = 8    Average annual maintenance ( $\bar{y}$ ) = 2000Standard deviation of age of cars ( $\sigma_x$ ) = 2    Standard Deviation of maintenance cost ( $\sigma_y$ ) = 80Coefficient of correlation between the two ( $r$ ) = 0.7Estimate  $y$  when  $x = 10$  and also estimate  $x$  when  $y = 69$ 

OR

P) Find the two regression equations for the following data.

(8)

Age in Years	10	10	11	11	12	13
Marks	5	6	6	7	8	7

Q) Find Karl Pearson's coefficient of correlation given for the following data.

(7)

$$\sum x = 65 \quad \sum y = 30 \quad \sum x^2 = 3261 \quad \sum y^2 = 1004 \quad \sum xy = 750 \quad n = 9$$

Q5 A) What is Correlation coefficient. Write a short note on scatter diagram.

(8)

B) What are the requisites of satisfactory average

(7)

OR

P) Write Short notes : ( Attempt Any Three)

(15)

1) Errors in Statistical Investigation

2) Advantages of Sampling

3) Merits &amp; Demerits of Arithmetic Means (A.M.)

4) Types of one dimensional bar diagrams

5) Distinguish between Primary &amp; Secondary data

[Time: 2.30 Hours]

[Total Marks: 75]

- Note: 1) All questions are compulsory.  
2) Figures to the right indicate full marks.  
3) Make use of diagrams wherever necessary.

1 A. Fill in the blanks (any 8)

[8 marks]

- i) URL stands for \_\_\_\_\_
- ii) \_\_\_\_\_ generation computers used vacuum tubes as an electronic component
- iii) \_\_\_\_\_ memory is temporary or volatile
- iv) MICR stands for \_\_\_\_\_
- v) Keyboards use \_\_\_\_\_ layouts
- vi) \_\_\_\_\_ printer is a circular wheel
- vii) \_\_\_\_\_ printers use electro-mechanical mechanism
- viii) TLD stands for \_\_\_\_\_
- ix) www has its own protocol known as \_\_\_\_\_
- x) Typing  $= (5+5) * 4 / 2$  in a cell of Excel will result in \_\_\_\_\_

1 B. State whether True or False (any 7)

[7 marks]

- i) www stands for word wide web
- ii) Internet is a computer network made up of thousands of networks sharing resources worldwide
- iii) eBay is an example of B2C model
- iv) Third generation computers used transistors as an electronic component
- v) Hardware are parts which you can see and touch
- vi) Processor is called as the brain of the computer
- vii) People are the computer operators or users
- viii) Language C and COBOL was used in second generation computers
- ix) OMR stands for Online Mark Reader
- x) Typing  $= (8+8) / 8 * 2$  will result in giving a value 1.

2.

- (a) What are computers? What are the characteristics of computers? [8 marks]
- (b) Explain the different parts of a computer in detail [7 marks]

OR

- (p) Explain the evolution of computers [8 marks]
- (q) Explain the types of computers [7 marks]

3.

- (a) Explain computer generations. [8 marks]
- (b) What are computer ports? Explain the various types of ports. [7 marks]

OR

- (p) What are the different types of non-impact printers? [8 marks]  
 (q) What is a computer bus? Explain the various types of computer buses? [7 marks]

4.

- (a) What is E-Commerce? Explain the various types of E-Commerce. [8 marks]  
 (b) Give solutions for the following problems. [7 marks]  
 (i) The computer won't print  
 (ii) The computer is frozen

OR

- (p) Explain intranet, internet and extranet. What are the various types of internet connections? [8 marks]  
 (q) What is software? Explain the various types of software. [7 marks]

5.

- (a) Explain mathematical operators in Excel and their order of operations. [8 marks]  
 (b) Give solutions for the following problems. [7 marks]  
 (i) All programs on the computer run slowly  
 (ii) The mouse / keyboard has stopped working

OR

Write short notes on (any 3)

[15 marks]

- (a) Different kinds of memories in computers  
 (b) Search engines  
 (c) Relative and Absolute cell referencing  
 (d) SUMIF and SUMIFS functions  
 (e) Boolean Search