

**C. ABDUL HAKEEM COLLEGE (AUTONOMOUS),
MELVISHARAM - 632 509.
SEMESTER EXAMINATIONS, NOVEMBER - 2018**

**B.Com., CORPORATE SECRETARYSHIP SEMESTER III
U15AKS301 / U14AKS301 – STATISTICS - I (ALLIED)**

Time: Three Hours

Maximum: 75 Marks

SECTION - A (10 X 2 = 20 Marks)

Answer **ALL** Questions.

1. Explain the term statistics.
2. What is a primary data?
3. What is a bar diagram?
4. What is a histogram?
5. What is Median?
6. Find Mode from the following data.
110, 120, 130, 120, 110, 140, 130, 120, 140, 120.
7. Write the formula for Standard deviation.
8. The following are the prices of shares of A B Co. Ltd. From Monday to Saturday.

Days	Monday	Tuesday	Wednesday	Thursday	Friday	Saturday
Price (Rs.)	200	210	208	160	220	250

Calculate Coefficient of Range.

9. State the formula for Karl Pearson's coefficient of skewness.
10. What is Bowley's measure of skewness?

SECTION - B (5 X 5 = 25 Marks)

Answer **ALL** Questions.

11. a) What is secondary data? State some of its sources.
(Or)

b) What do you mean by a questionnaire? Discuss the points to be observed in designing a good questionnaire.

12. a) Draw histogram for the following data:

Variable	100-110	110-120	120-130	130-140
Frequency	11	28	36	49
Variable	140-150	150-160	160-170	
Frequency	33	20	8	

(Or)

- b) Represent the following data by a deviation bar diagram:

Years	Income (Rs. Crore)	Expenditure (Rs. Crore)
1997	15	18
1998	16	17
1999	17	16
2000	18	20
2001	19	17
2002	20	18

13. a) Calculate harmonic mean for the following data:

Value	0-10	10-20	20-30	30-40	40-50
Frequency	8	12	20	6	4

(Or)

b) Find the arithmetic mean from the following data obtain by 60 students.

Marks	20	30	40	50	60	70
No. of students	8	12	20	10	6	4

Ascertain the student's average mark using direct method.

14. a) Calculate Standard Deviation from the following data.

Size of item	6	7	8	9	10	11	12
Frequency	3	6	9	13	8	5	4

(Or)

b) Find the coefficient of variation for the following data:

Size (in Cms)	10-20	20-30	30-40	40-50	50-60	60-70
No. of items	10	16	30	40	26	18

15. a) The following statistical constants were calculated from the distribution of sales of two types of products on various days.

	Types I (Rs.)	Types II (Rs.)
Mean Sales	210.1	230.0
S.D.	2.4	3.0
Mode	215.5	228.0

Calculate Karl Pearson's coefficient of skewness.

(Or)

b) Find Bowley's coefficient of Skewness from the data given below:

X	0	1	2	3	4	5	6
F	10	16	25	18	11	10	8

SECTION - C (3 X10 = 30 Marks)

Answer **ANY THREE** Questions.

16. Explain the functions of Statistics.

17. Represent the following data by a divided bar diagram:

No. of Students						
College	Arts	Science	Commerce	Vocational	Total	
A	1,200	800	600	400	3,000	
B	750	500	300	450	2,000	

18. Find the Mean, Median and Mode to the following frequency distribution:

Marks	0-20	20-40	40-60	60-80	80-100
Frequency	3	17	27	20	9

19. Find the median and mean deviation:

X	0-10	10-20	20-30	30-40	40-50	50-60
F	5	10	13	18	14	8

20. From the following data compute quartiles and hence find out coefficient of skewness.

Daily income (Rs.)	0-200	200-400	400-600	600-800	800-1,000	1,000 - 2,000
No. of persons	25	40	85	75	20	16
