Statistics-2

Model Exam Question paper - 2

11th Standard

Business Maths

Reg.No. : | | | | | | |

I.Answer all the questions

Time : 00:45:00 Hrs

Total Marks : 35

Part-A

7 x 1 = 7

1) $P(A/B)$ is

(a) $\frac{P(A\cap B)}{P(A)}$ (b) $\frac{P(A\cap B)}{P(B)}, P(B)=0$ (c) $\frac{P(A\cap B)}{P(B)}, P(B)\neq 0$ (d) None of these

2) Which is based on all the observations?

(a) Range (b) Median (c) Mean (d) Mode

3) Which is not unduly affected by extreme item?

(a) Median (b) Mean (c) Mode (d) None of these

4) The empirical relation between mean, median and mode is

(a) Mean - mode = 3 median (b) Mean - mode = 3 (mean - median) (c) Mean - mode = 2 mean (d) mean = 3 median - mode

5) Square of S.D. is called

(a) mean deviation (b) quartile deviation (c) variance (d) range

6) If A and B are independent event, then $P(A\cap B)$ is

(a) $P(A)P(B)$ (b) $P(A)+P(B)$ (c) $P(A/B)$ (d) $P(B)-P(A)$

7) Which of the following is correct?

(a) $H.M. \leq G.M. \leq A.M.$ (b) $H.M. \geq G.M. \geq A.M.$ (c) $A.M < G.M. < H.M.$ (d) None of these

Part-B

6 x 2 = 12

8) A perfect die tossed twice. Find the probability of getting a total of 9.

9) A bag contains 4 white and 6 black balls. Two balls are drawn at random. What is the probability that (i) both are white (ii) both are black.

10) A number is choose out of the numbers {1, 2, 3,..... 100} What is the probability that it is (i) a perfect square (ii) a multiple of 3 or 7.

11) A bag contains 4 white, 5 black, and 6 red balls. A ball is drawn in random. What is the probability that is red or white?

12) If two dice are thrown simultaneously, what is the probability that the sum of the points on two dice is greater than 10^9.

13) A person is known to hit the target 3 out 4 shots where as another person is known to hit 2 out of 3 shots. Find the probability of the target being hit when they both shoot.

Part-C

2 x 3 = 6

14) Find the S.D. of the following set of observations by using Deviation Method.

45, 36, 40, 36, 42, 45, 35, 40, 39.

15) Find the S.D. from the following set of observation by using

(i) Mean

25, 32, 43, 53, 62, 59, 48, 31, 24, 33

Part-D

2 x 5 = 10

16) Calculate the Arithmetic mean for the following

Wages in Rs.	100-119	120-139	140-159	160-179	180-199
No. of Workers	18	21	13	5	3

17) Calculate the Median weight of persons in an office from the following data.

Weight (in kgs.)	60-62	63-65	66-68	69-71	72-74
No. of Persons	20	113	138	130	19

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