

**PSG COLLEGE OF ARTS & SCIENCE  
(AUTONOMOUS)**

**BCom DEGREE EXAMINATION MAY 2019  
(First Semester)**

Branch - **COMMERCE (BUSINESS ANALYTICS)**

**STATISTICS FOR BUSINESS ANALYTICS**

Time: Three Hours

Maximum: 75 Marks

**SECTION-A OP Marks!**

Answer **ALL** questions

**ALL** questions carry **EQUAL** marks

(10 x 1 = 10)

- 1 Statistics results are
 

(i) cent percent correct	(ii) not absolutely correct
(iii) always incorrect	(iv) misleading
- 2 Mailed questionnaire method of enquiry can be adopted if respondents
 

(i) live in cities	(ii) have high income
(iii) are educated	(iv) are known
- 3 When the population consists of units arranged in a sequence or deck, one would prefer
 

(i) stratified random sampling	(ii) systematic sampling
(iii) cluster sampling	(iv) none of these
- 4 Whether classification is done first (or) tabulation?
 

(i) Classification follows tabulation	(ii) Classification precedes tabulation
(iii) Both are one simultaneously	(iv) no criterion
- 5 Frequency of a variable is always
 

(i) in percentage	(ii) in fraction
(iii) an integer	(iv) none of these
- 6 With the help of o-give curve, one can determine
 

(i) median	(ii) standard deviation
(iii) quartile deviation	(iv) mean deviation
- 7 The median of 11, 7, 6, 9, 12, 15, 19, is
 

(i) 9	(ii) 12
(iii) 15	(iv) 11
- 8 If variance = 4, then the standard deviation is
 

(i) 2	(ii) 4
(iii) 8	(iv) 16
- 9 For a positive skewed distribution
 

(i) Median > Mode	(ii) Mode > Mean
(iii) Mean > Median	(iv) Mean > Mode
- 10 Two variables deviate in same direction then it refers to
 

(i) positive correlation	(ii) negative correlation
(iii) no correlation	(iv) none of these

**Cont...**

**SECTION - B (25 Marks)**

Answer **ALL** questions  
**ALL** questions carry **EQUAL** Marks ( 5 x 5 = 25)

- 11 a Define Statistics. State its functions.  
OR  
b Give briefly the characteristic of a good questionnaire.
- 12 a What is sample? State its merits and demerits.  
OR  
b Explain the objectives of classification.
- 13 a What is diagram? State its advantages.  
OR  
b Explain briefly pie diagram.
- 14 a State the merits of arithmetic mean.  
OR  
b Compute the quartile deviation and its coefficient :  
Height (in cm) : 28 32      18   16 42      12 39
- 15 a Write a note on (i) Skewness (ii) Kurtosis.  
OR  
b Define regression. State its properties.

**SECTION -C (40 Marks)**

Answer **ALL** questions  
**ALL** questions carry **EQUAL** Marks ( 5 x 8 = 40)

- 16 a Discuss the scope of Statistics.  
OR  
b What is secondary data? What are the precautions necessary before using secondary data?
- 17 a Write a note on (i) Simple Random Sampling (ii) Stratified Random Sampling  
(iii) Systematic Sampling.  
OR  
b Explain the four types of classification.
- 18 a Define frequency distribution. Explain the construction of frequency table.  
OR  
b Draw both o-gives :

CI :	141-150	151-160	161-170	171-180	181-190
f :	5	16	56	19	4

19 a Compute mean , median and mode :

Height (cms) :	120	122	124	126	128	130
No. of students :	5	1	9	6	4	4

OR

- b From the following price of gold in a week, find the city in which the price was more stable?

Day :	Mon	Tue	Web	Thu	Fri	Sat
City A :	498	500	505	504	502	509
City B :	500	505	502	498	496	505

- 20 a Compute Karl Pearson's coefficient of correlation :

Rainfall (cms)	32	35	31	38	27	42	57	21
Production (Tons) :	52	67	53	47	41	55	63	72

OR

- b Find two regression equations :

X :	10	12	13	12	16	15
Y :	40	38	43	45	37	43