

00274 MASTER OF BUSINESS ADMINISTRATION
RETAIL SERVICES (MBARS)

Term-End Examination

December, 2015

MRS-011 : QUANTITATIVE TECHNIQUES

Time : 3 hours

Maximum Marks : 100

Note : Attempt any five questions. All questions carry equal marks.

1. (a) The main objective of Business Statistics is to make inferences (e.g. prediction, making decisions) about certain characteristics of a population based on information contained in a random sample from the entire population. Explain the above statement with the help of a suitable example. 20
- (b) What do you mean by the term "Probability"? Throw a Light on Properties and Applications of Probability Distribution.
2. Below are measurements of characteristics for two samples of interest, for each characteristic obtain the following : 20
 - (a) Mean
 - (b) Variance
 - (c) Standard deviation
 - (d) Frequency plot

DATA			
Male Heights (inches)		Length of Index finger (inches)	
66	71	3.0	3.2
68	71	3.5	2.8
69	72	3.4	2.9
68	69	3.5	3.1
71	71	3.7	3.1
73	70	3.2	3.3
67	72	3.5	3.2
68	69	3.4	3.5
65	70	3.1	2.9
72	70	3.5	3.1

3. How are Arithmetic Mean, Geometric Mean and Harmonic Mean related to each other ? Why is Arithmetic Mean greater than the Geometric Mean and Geometric Mean is greater than the Harmonic Mean ? Explain with the help of a suitable example. 20
4. (a) What do you mean by hypothesis testing ? 20
 (b) What is the relation between correlation coefficients and regression coefficients ?
5. Distinguish between **any two** of the following : 20
- (a) Exclusive and Inclusive Series
 (b) Absolute Measure and Relative Measure
 (c) Continuous and Discrete Series

6. (a) What is "Statistical Sampling" ? Describe the various methods of statistical sampling.
(b) Write a note on the Editing of Primary Data and Secondary Data for the purpose of Analysis and Interpretation. **10x2=20**
7. Briefly comment on **any two** of the following : **20**
(a) A population is the set of all items or individuals of interest.
(b) An index number is an economic data figure reflecting price or quantity compared with a standard or base value.
(c) Dependence refers to any statistical relationship between two random variables or two sets of data.
8. Write short notes on **any two** of the following : **20**
(a) Semi - Inter - Quartile Range
(b) Co - efficient of Standard Deviation
(c) Individual Series
-