

<b>Annexure No.</b>	<b>20 H</b>
<b>SCAA Dated</b>	<b>29.02.2008</b>

**BHARATHIAR UNIVERSITY, COIMBATORE**

**SCHOOL OF DISTANCE EDUCATION.**

(For the candidates admitted from **2008-2009** onwards)

**First year Group B: Allied A**

**For B.Sc Geography**

**Subject Title: STATISTICS FOR GEOGRAPHY**

**Goal** : To enable the students to learn the techniques of Statistics and their applications in Geography

**Objective** : On successful completion of this course the students shall enrich the techniques of Statistics and enable them to draw various diagrams, to solve numerical problems

**Unit I:**

Meaning and Scope of Statistics - Collection of data — Primary and Secondary – Methods of Primary data collection – Sources of Secondary data - Classification and Tabulation

**UNIT II :**

Formation of Frequency distribution – Presentation of data by Diagrams and Graphs - Bar diagram, Pie diagram, Pictogram and Cartogram – Histogram, Frequency polygon, Frequency curve and Ogives.

**UNIT III:**

Measures of Central tendency – Mean, Median, Mode, Geometric Mean and Harmonic Mean – their computation – merits and demerits

**UNIT IV:**

Measures of Dispersion – Range, Quartile Deviation, Mean Deviation, Standard Deviation and Co-efficient of Variation.

Skewness – Meaning – Measures of Skewness – Karl Pearson's and Bowley's co-efficient of Skewness

**Unit V:**

Curve fitting – Principles of Least squares – Fitting of Straight line – Fitting of Parabola - Fitting of power curves

**Books for study:**

1. Statistical Methods by S.P. Gupta
2. Business Mathematics and Statistics by P. Navaneetham
3. Statistics by R.S.N. Pillai and V. Bagavathi
4. Statistics-Theory, Methods & Application by D.C. Sancheti and V.K. Kapoor
5. Applied General Statistics by Frederick E.Croxtton and Dudley J. Cowden

**SCHOOL OF DISTANCE EDUCATION.**(For the candidates admitted from **2008-2009** onwards)**B.Sc degree examination****Allied- Statistics for Geography****Model question paper**

Time: 3 hrs

Maximum: 100 marks

Answer any **five** questions.

All questions carry equal marks.

1. Discuss the meaning and scope of statistics. Also discuss its importance in the field of Geography.

2. What are the different types of diagrams used in the presentation of data? Draw a pie diagram

to the following data:

Expenditure item:

Value (Rs in lakhs):

Agriculture	2122
Co-operation	330
Irrigation & power	4083
Industry & mines	880
Transport	618
Social welfare	3575

3. What is an average? State any three averages and discuss their merits and demerits.

4. Explain the various measures of dispersion.

5. Explain the principle of least squares and describe its application in fitting a curve of the form

$$y = a + bx.$$

6. form a frequency table with class intervals 21-30,31-40,41-50....and calculate mean ,median

and mode of the frequency distribution.

21, 96, 68, 60, 82, 69, 52, 41, 105, 70, 77,  
66, 92, 83, 60, 61, 35, 76, 80, 39, 61, 120,  
102, 65, 118, 120, 73, 101, 95, 81, 117, 60, 86  
60, 76, 97, 74, 44, 74, 85, 63, 93, 103, 60, 47

7. From the following data, find out which share is more stable in its value:

X: 55 54 52 53 56 58 50 51 49 50

Y: 108 107 105 105 106 107 104 103 104 101

8. Fit a straight line to the following data:

x: 1 2 3 4 5 6 7 8

y: 55 46 40 38 33 30 29 30