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M.Phil 1st Semester Examination, 2019

ENVIRONMENTAL STUDIES

(Statistics and Computer Application for Environmental Studies)

PAPER -EVS-114

Full Marks: 40

Time: 2 hours

Answer four questions

The figures in the right-hand margin indicate marks

Candidates are required to give their answers in their own words as far as practicable

Illustrate the answers wherever necessary

- 1. (a) What is spread sheet? Give some examples.
 - (b) What is the extension of an excel and powerpoint file?

(c) List some advantages of use of Google search engine in research. (2+2)+2+4

2. Consider the following data:

10

Name	Result%		
Adams	47		
Brooks	36 94 82 62 46 85 67		
Cowell			
Dillon			
Edwards			
George			
Haynes			
Jackson			
King	48		
Lewis	85		
Morris	73		
Peters	96		
White	66		

Score below	No. in range
10	2 000 000
20	8.
30	0
40	
50	
60	ĺ
70	
80	
90	
100	
Table 2	2

Table 1

Find the histogram of data supplied in Table 1 as per the bin range given in Table 2. Also draw a bar chart against Table 2.

- 3. (a) Write some features of powerpoint presentation tool.
 - (b) What are the differences between animation and transition effect in powerpoint? Give some examples (name) of animation and transitions.
 - (c) What is a master slide? Can we change the design of a slide after presentation is ready?
 4+4+2
- 4. (a) What do you mean by correlation? Give the formulae to compute.
 - (b) Use the below data to compute correlation coefficient.

X	1.0	2.3	3.1	4.8	5.6	6.3
Y	2.6	2.8	3.1	4.7	5.1	5.3

- (c) How to activate Data Analysis tool, if it is not present under the Data section of MS-Excel? 4+4+2
- 5. (a) What do you mean by moving Average? What is its advantages?
 - (b) Define web browser, internet and www.
 - (c) Write down the steps to compute standard deviation in a spreadsheet. Sample data may be constituted by your self. (1+1)+6+2
- **6.** (a) Distinguish among variance, co-variance and co-efficient of variation.
 - (b) Find the quartile deviation from the following:
 - Values: 10-15 15-20 20-25 25-30 30-40

 Frequency: 4 12 16 22 10

 4+6
- 7. The frequency distribution of carbon content

(per cent) in 100 determinations of a mixed powder is given below:

Carbon (%):

4.0-4.1 4.2-4.3 4.3-4.5 4.6-4.7 4.8-4.9 5.0-5.1

Frequency:

10

20

25

30

10

5

Compute the arithmetic mean, median and standard deviation.

- **8.** (a) State the advantages and disadvantages of Mean, Median and Mode.
 - (b) A car travelled 120 miles at 40 m.p.h and again 100 miles at 5 m.p.h. What was the average speed of the car?

 6+4
- 9. Assignment writing (to be submitted by the candidates before examination).