



KENYATTA UNIVERSITY

UNIVERSITY EXAMINATIONS 2014/2015

DIGITAL SCHOOL OF VIRTUAL AND OPEN LEARNING

**FIRST SEMESTER EXAMINATION FOR THE DEGREE OF MASTER OF SCIENCE
(HOSPITALITY AND TOURISM MANAGEMENT)**

HTM 802: STATISTICAL METHODS IN HOSPITALITY AND TOURISM

DATE: SATURDAY 20TH DECEMBER 2014

TIME: 9.00 A.M. – 12.00 P.M.

INSTRUCTIONS:

1. Differentiate between the following terms: (4 marks)
 - a) Descriptive and inferential statistics
 - b) Parametric and non-parametric method in statistics
2. Discuss four importance of statistics. (4 marks)
3. A research was conducted to assess the duration that various tourists stayed in Kenya. The results are as shown; 51, 52, 7, 55, 59, 8, 13, 15, 26, 31, 16, 18, 41, 44, 10, 11, 19, 4, 5, 47, 50, 2, 4, 53, 38, 40, 61, 20, 23, 25, 5, 35, 37, 56, 58, 32, 34
Using 6 classes draw a frequency distribution table and calculate; mean, mode, medium and standard deviation. (16 marks)
4. The following are ages of a group: 53, 63, 35, 59, 20, 68, 21, 65, 37, 64, 34. Determine if the smallest value and the largest value are outliers at 95% confidence level. (12 marks)

5. The mean revenue from tourism industry in Kenya is 80 million. A research was done in 6 tourist sectors in Nairobi. The results show a mean of 113 million KES with a standard deviation of 12.6. Determine if there was a significant difference between the population mean and the sample mean at 95% confidence level. (10 marks)
6. A research conducted to assess the relationship between the numbers of hours worked per day and the amount of money paid day among causal workers in a hotel showed the following results.

	Number of hours worked (y)	Amount of pay per day (x)
1	7	300
2	10	450
3	5	450
4	8	550
5	4	300
6	9	400
7	3	200
8	6	400

- a) Calculate the product moment correlation coefficient (r) and describe the direction and magnitude of the relationship. (12 marks)
- b) Calculate the contribution of number of hours worked to the amount of pay per day. (2 marks)
