TECHNICAL UNIVERSITY OF MOMBASA

# SCHOOL OF HUMANITIES AND SOCIAL SCIENCES <br> DEPARTMENT OF COMMUNICATION STUDIES <br> UNIVERSITY EXAMINATION FOR: <br> DEGREE 

# BMC4307: STATISTICS FOR MASS COMMUNICATION <br> END OF SEMESTER EXAMINATION <br> SERIES:DECEMBER2016 <br> TIME:2HOURS 

DATE:Pick DateSelect Month2016

## Instructions to Candidates

You should have the following for this examination
-Answer Booklet, examination pass and student ID
This paper consists of Choose No questions. Attemptquestion ONE (Compulsory) and any other TWO questions.
Do not write on the question paper.

## Question ONE Compulsory

## Write short notes on the following

i. Primary data (2 marks)
ii. Secondary data (2 marks)
iii. Systematic sampling (2 marks)
iv. Qualitative data (2 marks)
v. Quantitative data (2 marks)
b) Briefly explain the application of statistics in the field of communication (6 marks)
c) The table below presents respondents who participated in a survey on the use of contraceptives at the technical university of Mombasa.

|  | Frequency | Percent | Cumulative Percent |
| :--- | ---: | :---: | ---: |
| Engineering | 4 | 3.1 | 3.1 |
| Business | 4 | 3.1 | 6.3 |
| Media | 84 | 65.6 | 71.9 |
| Applied science | 36 | 28.1 | 100.0 |
| Total | 128 | 100.0 |  |

## Required

a) Draw a histogram of the data shown above ( 2 marks)
b) Calculate the mean for the data provided ( 4 marks)
c) Interpret the data to a journalist who may wish to write a story on the same (4 marks)
iii) Identify any four short comings of statistics (4 marks)

## Question Two

Advice a corporate communication officer on how to present research findings to a group of journalists (10 marks)
ii) Given a set of raw data below, construct a frequency table for it.
$2,3,2,1,4,4,1,1,3,2,5,3,5,1,5,1,4,2,3,0$,
$4,1,0,3,5,2,5,0,4,1,4,0,5,2,3,0,4,4,1,2$ ( 6 marks)
iv) Interpret the data to a layman (4 marks)

## Question THREE

a) The roles or functions of statistics are many in the society identify any five. (10 marks)
b) Outline any five limitations of statistics (10 marks)

## Question FOUR

Critically examine the use of electronic data analysis software in the analysis and presentation of data (20 marks)

## Question FIVE

The following are the income and expenditure records at Pwani TV from the year 2012-2016

| Year | Expenditure in 000 | Sale of air time in 000 |
| :--- | :--- | :--- |
| 2012 | 10 | 16 |
| 2013 | 12 | 20 |
| 2014 | 24 | 24 |
| 2015 | 18 | 16 |
| 2016 | 4 | 2 |

Required:
a) Compute co-efficient of correlation. (10 marks)
b) Calculate regression equation of sales on expenditure and hence find sales when expenditure is sh. 10,000 . (10 marks)

