MURANG'A UNIVERSITY OF TECHNOLOGY

SCHOOL OF EDUCATION

DEPARTMENT OF EDUCATION

UNIVERSITY ORDINARY EXAMINATION

2018/2019 ACADEMIC YEAR

FIRST YEAR **FIRST** SEMESTER EXAMINATION FOR, BACHELOR OF EDUCATION SCIENCE

TDP 202 – EDUCATIONAL MEASUREMENT AND EVALUATION

DURATION: 2 HOURS

DATE:

TIME:

Instructions to candidates:

1. The examination paper consists of section A and B

2. Section A (30 marks) – attempt all the questions

3. Section B (40 marks) – attempt any two questions

4. You are not allowed to write on this examination question paper.

SECTION A: ANSWER ALL QUESTIONS

QUESTION ONE (30 MARKS)
a. Define the following terms or phrases
   i.   Mission statement   (1 mark)
   ii.   Goal   (1 mark)
   iii.   Objective   (1 mark)
   iv.   Measurement   (1 mark)
   v.   Evaluation   (1 mark)
   vi.   Test   (1 mark)
   vii.   Assessment   (1 mark)
   viii. Vision statement   (1 mark)
b. Outline **Four** measurement scales   (4 marks)
c. Mention the **Two** categories of test   (2 marks)
d. State any **Four** purposes of using Bloom's taxonomy of instructional objectives in education   (4 marks)
e. The age of the 17 young people on the school bus are ;
           12, 15, 13, 19, 10, 14, 16, 15, 16, 12, 15, 12, 13, 14, 16, 15, 11
   i.   Find the mode   (1 marks)
   ii.   Find the median   (1 marks)
   iii.   Calculate the mean   (2 marks)
f. Given the following set of data
           8, 3, 12, 10, 7, 8, 5, 2, 5
   i.   Find the range   (1 marks)
   ii.   Calculate the inter-quartile range   (3marks)
g. Outline any **Four** threats of reliability   (4 marks)

SECTION B – ANSWER ANY TWO QUESTIONS IN THIS SECTION

QUESTION TWO (20 MARKS)
a. Fred and Vicki did a test in English and Statistics. Both tests had a maximum mark of 100. Their results are given in the table below

	John	Faith	Mean marks	Standard deviation
English	46	55	50	12
Statistics	45	42	42	8

   1. Work out Vicki and Fred's standardized scores in English and Statistics   (6 marks)
   2. Comment on their examination performance   (2 marks)
   3. Who do you think performed better overall   (1 marks)
b. The table below gives the history and geography results for Sean, Theresa and Victoria along with the mean and standard deviation of those results for the whole year group.

	Andrew	Richard	Jane	YEAR GROUP MEAN	STANDARD DEVIATION
HISTORY	72	58	78	61	6
GEOGRAPHY	34	43	51	44	5

1. Calculate the six standard scores (8 marks)
2. Comment on the performance of Sean, Theresa and Victoria (3 marks)

QUESTION THREE (20 MARKS)
A testing laboratory wishes to test two experimental brands of outdoor paints to see how long each will last before fading. The testing laboratory makes six gallons of each paint to test. Different chemical agents are added in each group and only six cans are involved, therefore these two groups constitute two small populations. The results (in months) are shown in the table bellow

Brand A	brand B
10	35
60	45
50	30
30	45
40	40
20	25

i.   Calculate the mean, variance and standard deviation for brand A and B

ii.   Make comments about brand A and B paints based your mean, variance and standard deviation results.

QUESTION FOUR (20 MARKS)
Using relevant examples discuss the importance of continuous assessment test to both the learner and teacher (20 marks)