



KENYATTA UNIVERSITY

UNIVERSITY EXAMINATIONS 2011/2012

INSTITUTION BASED PROGRAMME

DECEMBER SESSION EXAMINATION FOR THE DEGREE OF MASTER OF EDUCATION

ECT 505: RESEARCH METHODS AND STATISTICS

DATE: Wednesday 2nd May, 2012

TIME: 9.00 a.m. – 12.00 p.m.

INSTRUCTIONS: Answer ANY THREE Questions

1. Your District Education Officer wants empirical evidence as to whether extra coaching of students in preparation for Kenya Certificate of Secondary Education Examination makes a difference in KCSE performance or not.
As an educationist, explain how you would carry out a study to provide the empirical evidence to the DEO. (24 marks)

2. a) Discuss the following pairs of concepts as used in a research proposal:
 - i) Theoretical and conceptual framework. (6 marks)
 - ii) Research objectives and research questions. (6 marks)
b) Discuss the importance of literature review in a research enterprise. (12 marks)

3. A class teacher wanted to find out if there is any relationship in student achievement in two different subjects A and B.
 - a) State TWO research objectives relevant to the investigation. (4 marks)

 - b) State and justify the sampling technique you would use. (6 marks).

- c) Given a sample size of 15 and the following raw scores, how would you determine the extent of relationship between the two subjects? (14 marks)

Subject A	Subject B
46	74
45	60
83	68
62	75
59	61
76	80
67	59
91	84
50	60
77	73
61	64
70	77
63	59
52	70
70	62

4. a). What is the importance of hypothesis testing in research? (9 marks)
- b) Discuss the procedure a researcher would follow in testing a hypothesis.(15 marks)

5. The scores of students in a subject were as follows:

Student:	Score
1	65
2	80
3	50
4	50
5	55
6	60
7	60
8	30
9	40
10	43

11	64
12	41
13	53
14	44
15	53

a) Calculate the i) mean; ii) median, and iii) mode (10 marks)

b) Calculate the i) variance and ii) standard deviation (14 marks)
