



THE MOMBASA POLYTECHNIC UNIVERSITY COLLEGE

(A Constituent College of Jkuat)

Faculty of Engineering and Technology

DEPARTMENT OF BUILDING AND CIVIL ENGINEERING

DIPLOMA IN CIVIL ENGINEERING (DCE 10A)

DIPLOMA IN ARCHITECTURE (DA 10A)

DIPLOMA IN BUILDING (DBC 10A)

EBC 2218 : MEASUREMENT OF BUILDING WORKS I

END OF SEMESTER EXAMINATION

SERIES: AUGUST/SEPTEMBER 2011

TIME: 3 HOURS

Instructions to Candidates:

You should have the following for this examination

- *Answer booklet*
- *Pocket Calculator*
- *Dimension papers*
- *A copy of the standard method of measurement for building works*

This paper consists of **FIVE** questions in **TWO** sections A & B

Answer questions **ONE (COMPULSORY)** and any other **TWO** questions

Maximum marks for each part of a question are shown

This paper consists of **THREE** printed pages

SECTION A (COMPULSORY – 40 MARKS)

Question 1

Take off all quantities for the water tank shown in drawing No. 01 (40 marks)

SECTION B (Attempt any TWO questions. Each question from this section carry 30 Marks)

Question 2

Take off all quantities for the door shown in drawing No. 02 (30 marks)

Question 3

Take off all quantities for the substructure works shown in drawing No. 03 (30 marks)

Question 4

a) Briefly explain the following items as applied in measurements giving an example in each case

- (i) Spot items
- (ii) Provisional items (8 marks)

b) Define the following terms

- (i) Tender sum
- (ii) Contract sum (4 marks)

c) State any **SIX** duties of the quantity surveyor in a construction project (6 marks)

d) Briefly describe the following types of contracts

- (i) Cost plus fixed fee contract
- (ii) Cost plus percentage fee contract
- (iii) Cost plus fluctuating fee contract
- (iv) Negotiated contract (12 marks)

Question 5

a) Describe the following contract documents

- (i) Bills of quantities
- (ii) Drawings
- (iii) Specifications
- (iv) Form of tender (12 marks)

b) Briefly describe the following

- (i) Preliminaries
- (ii) Preambles (6 marks)

c) Briefly outline the following types of bills

- (i) Elemental Bills
- (ii) Operational Bills
- (iii) Trade by Trade Bills

(12 marks)