



# THE MOMBASA POLYTECHNIC UNIVERSITY COLLEGE

(A Constituent College of JKUAT)

(A Centre of Excellence)

# Faculty of Engineering & Technology

DEPARTMENT OF BUILDING & CIVIL ENGINEERING

CERTIFACATE IN BUILDING CONSTRUCTION I

EBC 1132: ENGINEERING DRAWING II

END OF SEMESTER EXAMINATION SERIES: DECEMBER 2012 TIME: 3 HOURS

## **Instructions to Candidates:**

You should have the following for this examination

- Answer Booklet
- Drawing Paper size A2

This paper consists of **FIVE** questions.

Answer question **ONE** (**COMPULSORY**) and any other **TWO** questions Maximum marks for each part of a question are as shown This paper consists of **TWO** printed pages

## **Question One (Compulsory)**

- **a)** (i) Sub-divide a line 150mm long into proportions of 2:3:6
  - (ii) Indicate the dimension of the second proportion.

(4 marks)

**b)** Construct an octagon circumscribing a circle of 80mm.

(6 marks)

- c) Construct a plain scale in which 25mm 200mm = 1m, with a maximum reading of 2.5m. On the scale, indicate the following readings. (10 marks)
  - (i) 1.65m
  - (ii) 3.05m

#### **Question Two**

Show by sketches conventional indication of the following materials.

- (i) Concrete
- (ii) Stone
- (iii) Plaster
- (iv) Hardcore
- (v) Earth

#### **Question Three**

Use free hand sketches to show the following tools.

- (i) Wooden hawk
- (ii) Wooden float
- (iii) Steel float
- **(iv)** Bat and closer gauge

(20 marks)

(20 marks)

#### **Question Four**

Figure 1 shows an elevation of a framed braced and battened door. To scale of 1:10 draw front elevation, sections A-A and B-B. Dimension all the sizes. **(20 marks)** 

#### **Question Five**

Figure 2 shows a plan and sectional elevation of a bus stop shelter. To a scale of 1:10 draw the detail 'X'. Dimension and name all the parts. (20 marks)