



THE MOMBASA POLYTECHNIC UNIVERSITY COLLEGE

Faculty of Engineering & Technology

DEPARTMENT OF CIVIL AND BUILDING ENGINEERING

CERTIFICATE IN CONSTRUCTION TECHNICIAN I

SEMESTER II EXAMINATIONS

APRIL/MAY 2010 SERIES

BUILDING DRAWING

TIME: 2 HOURS

Instructions to Candidates

You should have the following for this examination:-

- Answer booklet
- Calculator
- Drawing instruments

This paper consist of **FIVE** Questions in **ONE** Section, **A** and **FOUR** in Section **B**.

Answer any **THREE** Questions choosing **ONE** from Section **A** (Compulsory) and any **TWO** from Section **B**.

Questions in Section **A** carry **30 Marks** and Section **B** carry **20 Marks** each.

Maximum marks for each part of a question are as shown.

SECTION A – COMPULSORY (30 Marks)

Question ONE

- (a). Describe the process of submission and approval of building plans. **(6 Marks)**
- (b). State the importance of using the building code and statutory documents in the design of buildings. **(6 Marks)**
- (c). Briefly describe the duties of the Architect in the following Stages of Design of buildings:
- (i). Preliminary stage
 - (ii). Design stage
 - (iii). Construction stage
 - (iv). Completion stage
 - (v). Defect liability period **(12 Marks)**
- (d). Briefly describe the duties of the statutory team during the design stage of the building process. **(6 Marks)**

SECTION B - ANSWER ANY TWO QUESTIONS (20 Marks each)

Question TWO

- (a). Using sketches describe the **TWO** techniques of drawing in the design of buildings. **(12 Marks)**
- (b). State the main differences between the **TWO** methods of drawing technique described in (2)(a) above. **(4 Marks)**
- (c). State the importance of details in the design of buildings. **(4 Marks)**

Question THREE

- (a). Describe the **FIVE** components of the building plan layout. **(10 Marks)**
- (b). State the role of the Client in the design process of buildings. **(5 Marks)**
- (c). State the importance of specification in the design of buildings. **(6 Marks)**

Question FOUR

- (a). State the importance of using standard signs and symbols in the design of buildings. **(4 Marks)**
- (b). With the aid of a sketch the following conventional sign and symbols:
- (i). Grass
 - (ii). Concrete
 - (iii). Brick
 - (iv). Earth
 - (v). Timber
- (10 Marks)**
- (c). State the importance of model work in the design of Buildings. **(5 Marks)**

Question FIVE

- (a). Briefly describe the **TWO** types of drainage systems to residential buildings. **(6 Marks)**
- (b). With the aid of a sketch describe typical drainage connection to a simple Residential house. **(10 Marks)**
- (c). State the **TWO** Advantages and Disadvantages of the systems described in 5 (a) above. **(4 Marks)**