



THE TECHNICAL UNIVERSITY OF MOMBASA
**Faculty of Engineering &
Technology**

DEPARTMENT OF COMPUTER SCIENCE & INFORMATION
TECHNOLOGY

CERTIFICATE IN BUILDING & CIVIL ENGINEERING
(CBCE/SEP12/S-EV)

ECT 1101: INTRODUCTION TO COMPUTER SCIENCE

SPECIAL/SUPPLEMENTARY EXAMINATION
SERIES: FEBRUARY 2013
TIME: 2 HOURS

Instructions to Candidates:

You should have the following for this examination

- *Answer Booklet*

This paper consist 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) Define a computer. **(2 marks)**
- b) What is the difference between single bus structure and two bus structure? **(4 marks)**
- c) Explain the data input methods you have encountered. **(5 marks)**
- d) Distinguish between system software and application programs. **(4 marks)**
- e) Why is saving a file important? **(2 marks)**
- f) Describe the user, interface and give an example. **(3 marks)**
- g) Distinguish between data and information. **(4 marks)**
- h) Explain the functions of peripherals of a computer system. **(6 marks)**

Question Two

- a) Describe data collection methods. **(5 marks)**
- b) Explain with the common types of system software/programs. **(8 marks)**
- c) Define batch data processing. **(2 marks)**

Question Three

- a) What is a computer operating system? **(2 marks)**
- b) Discuss with examples the various types of operating systems. **(10 marks)**
- c) What is a file and with an example explain how you can modify its contents. **(3 marks)**

Question Four

- a) Describe the functions of these peripheral and indicate areas where they are used. **(10 marks)**
 - (i) Optical Character Reader (OCR)
 - (ii) Printer
 - (iii) Digitizer tablet
 - (iv) Plotters
 - (v) Scanner
- b) What are the advantages of a word processor application over a type writer? **(5 marks)**

Question Five

- a) Explain the functions of the computer operating system. **(5 marks)**
- b) Discuss the common types of application software. **(6 marks)**
- c) Describe a spreadsheet and areas where they are commonly used. **(4 marks)**