

Name: _____ Index No. _____ / _____

1920/101
 INTRODUCTION TO ICT
 November 2015
 Time: 3 hours

Candidate's Signature: _____

Date: _____



THE KENYA NATIONAL EXAMINATIONS COUNCIL

CRAFT CERTIFICATE IN INFORMATION TECHNOLOGY

MODULE I

INTRODUCTION TO ICT
 3 hours

INSTRUCTIONS TO CANDIDATES

Write your **name** and **index number** in the spaces provided above.

Sign and write the **date of examination** in the spaces provided above.

This paper consists of **fifteen** questions in **TWO** sections: **A** and **B**.

Answer **ALL** the questions in **section A** in the spaces provided after each question.

Answer any **FOUR** questions in **section B** in the spaces provided after each question.

Candidates should answer the questions in English.

For Examiner's Use Only

Section	Question	Maximum	Candidate's score
A	1-10	40	
B	11	15	
	12	15	
	13	15	
	14	15	
	15	15	
Total score			

This paper consists of 12 printed pages.

Candidates should check the question paper to ascertain that all the pages are printed as indicated and that no questions are missing.

Turn over

SECTION A (40 marks)

Answer **ALL** questions in the spaces provided.

1. (a) Define the term *firmware* as used in computer systems. (2 marks)

- (b) Outline **two** reasons why computer users generate backup files. (2 marks)

2. (a) State **two** features of the first generation computers. (2 marks)

- (b) Joan discovered that her computer could not boot even though the power connectivity was right. Explain what could have been the cause of this. (2 marks)

3. Differentiate between *real-time* and *batch* data processing modes. (4 marks)

4. Outline **two** advantages of each of the following data transmission media:

(i) coaxial cables; (2 marks)

(ii) twisted pair cables. (2 marks)

5. (a) James intends to buy a flatbed scanner for office use. Outline **two** functions that the scanner could be used for. (2 marks)

(b) Explain the term *assembly language* as used in computer systems. (2 marks)

6. (a) Describe *direct file organization* method as used in computer data storage. (2 marks)

(b) Explain the term *data encryption* as used in computer security. (2 marks)

7. (a) Outline **two** advantages of *Magnetic Ink Character Reader (MICR)* as used in ICT. (2 mark

(b) State **two** ways of minimizing piracy of computer software. (2 marks)

8. Explain **two** methods that a computer operator would apply to improve ergonomics on a computer being used in an office environment. (4 marks)

9. Jerry prefers an LCD monitor to a CRT monitor. Explain **two** justifications for his preference. (4 marks)

10. Explain the function of each of the following computer keyboard keys:

(i) Print Screen;

(2 marks)

(ii) Esc.

(2 marks)

SECTION B (60 marks)

11. (a) Describe computer output to *microfilm (COM)* as used in computer systems. (3 marks)

(b) Explain **three** factors to be considered when purchasing computer hardware, other than cost. (6 marks)

(c) Dan intends to install utility software in his home computer for domestic use. Explain **three** utilities he could install. (6 marks)

12. (a) With the aid of an example in each case, outline **three** functions of spreadsheet computer software. (3 marks)

- (b) A computer consulting company intends to educate the public on various forms of computer crimes. Explain **three** forms of such crimes. (6 marks)

- (c) With the aid of a block diagram, explain the functional components of a computer system. (6 marks)

13. (a) With the aid of a diagram, describe *star network* topology. (5 marks)

- (b) A secondary school intends to buy computers for its management staff. Explain **two** uses that the computers could be put into. (4 marks)

- (c) Explain each of the following file management functions of an operating system:

- (i) file dumping; (2 marks)

- (ii) file loading; (2 marks)

- (iii) file deletion. (2 marks)

14. (a) Explain the difference between *desktop* and *palmtop* computers. (4 marks)

- (b) (i) Distinguish between *indexed sequential* and *sequential* file organization methods. (3 marks)

- (ii) A company has supplied the following software to a college for use.

novel, Ms PowerPoint, unix, Ms Access, Windows for Workgroup,

Classify the above software either as; the operating system, presentation software or database management system. (2 marks)

- (c) (i) Explain the relationship between each of the following data storage units:

I. byte and bit; (2 marks)

I. kilobyte and gigabyte; (2 marks)

- (ii) Outline **two** functions of the primary storage of a computer system. (2 marks)

15. (a) (i) The use of ICT technology for money transfer has changed the way in which Kenyans do business. Explain **two** benefits to business people for using this service. (4 marks)

- (ii) Explain **one** circumstance under which a wireless mouse would be of necessity as an input device. (1 mark)

- (b) A computer laboratory requires some standard measures to be followed to ensure safety and security. Outline **four** such measures. (4 marks)
