

Name..... Index No.....
 School..... Candidate's sign.....
 Date.....

451/1
COMPUTER STUDIES
Paper 1
(Theory)
July/August 2010
2 ½ Hours

NYAMIRA NORTH DISTRICT JOINT EVALUATION TEST
Kenya Certificate of Secondary Education (K.C.S.E)

COMPUTER STUDIES
Paper 1
(Theory)
July/August 2010
2 ½ 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 two sections A and B
- Answer all questions in section A
- Answer question 16 and any other three questions from section B
- All answers should be written in the spaces provided in the question paper.
- Electronic calculators may be used.

FOR EXAMINERS USE ONLY

Section	Question	Score
A	1 -15	
B	16	
	17	
	18	
	19	
	20	
TOTAL		

This paper consists of 12 printed pages. Candidates should check the question paper to ensure that all the pages are printed as indicated and no questions are missing.

SECTION A (40MARKS)

Answer all questions

1. What is disk formatting? (1mk)

.....
.....

2. Describe the computer booting process. (2mks)

.....
.....
.....

3. Explain why the following, controls should be implemented for computer based systems

(i) Back ups (1mk)

.....
.....

(ii) Passwords (1mk)

.....
.....

4. What is meant by the term dry running as used in program development? (2mks)

.....
.....
.....

5. How is point of sale terminal used in a business organization. (2mks)

.....
.....
.....

6. (a) Define authenticity as used in software selection. (1mk)

.....
.....

(b) Explain two ways of acquiring software in an organization. (2mks)

.....
.....

-
.....
7. (a) Differentiate between truncation and transposition error. (2mks)
.....
.....
.....
.....
- (b) State four ways in which data may lose integrity. (2mks)
.....
.....
.....
.....
8. Explain data series and legend as used in spreadsheet charts. (2mks)
- (i) Data series
.....
.....
- (ii) Legend
.....
.....
9. (a) State the function of each of the following
- (i) Network Interface Card (1mk)
.....
.....
- (ii) Network protocol (1mk)
.....
.....
- (b) Differentiate between a hub and a switch. (2mks)
.....
.....
.....
.....
10. Distinguish between job replacement and displacement. (2mks)
.....
.....
.....
.....

.....
.....

11. Using two's complements, subtract 4 from 7 in 8-bit and express your answer in decimal form. (3mks)

12. State three ways in which complements are used in hospitals (3mks)
.....
.....
.....

13. Name two responsibilities that are carried out by a web designer. (2mks)
.....
.....
.....

14. (a) Suggest on how computers may be made more user friendly for persons that are (2mks)
(i) Blind
.....
.....

(ii) Without hands
.....
.....

(b) Explain three types of computer motherboard buses (3mks)
.....
.....
.....

.....
.....
.....
.....

15. Name two circumstances in which it is better to use a questionnaire than an interview for gathering information. (3mks)

.....
.....
.....
.....
.....
.....

SECTION B (60 MARKS)

Answer question 16 and any other three questions from this section.

16. Kenya women finance trust KWFT pays 10% interest in shares exceeding 150,000 shillings and 4% on shares that do not meet this target. However no interest is paid on deposits in the members (KWFT) bank account.

(a) Design a pseudo code for a program that would

(i) Prompt the user for shares and deposits of a particular member.

(ii) Calculate the interest and total savings

(iii) Display the interest and total savings

(iv) Display the interest and total savings in the screen for a particular member of the trust fund. (7mks)

(b) Draw a flowchart for the above pseudo code.

(8mks)

7. (a) Distinguish between logical and physical computer files.

(2mks)

.....
.....
.....

(b) Define the term computer crime.

(1mk)

Get kcse results with KCSE MOCK PAST PAPERS @ www.kcse-online.info

.....
.....
(c) Explain three examples of computer crimes. (3mks)

.....
.....
.....
.....
.....
.....
.....

(d) (i) An individual has a right to demand a guarantee to privacy of personal information stored in a computer. Give two such types of information. (1mk)

.....
.....

(ii) Explain two precautions that have to be taken to prevent illegal access to a computer based system. (2mks)

.....
.....
.....
.....

(e) Explain what is a search engine and give an example. (2mks)

.....
.....
.....
.....
.....
.....

(f) The Internet can be used as a source of information about emerging issues that may not be available in printed media form. Give two advantages and two disadvantages of information obtained from the internet. (4mks)

.....
.....
.....
.....
.....
.....

.....
.....

18. (a) Despite the introduction of the ATM cards, human resource is still necessary in banks. Give two reasons why human beings are still needed. (2mks)

.....
.....
.....

(b) State three advantages of the using the ATM card. (3mks)

.....
.....
.....
.....
.....

(c) What is virtual reality. (2mks)

.....
.....
.....

(d) List three areas where virtual reality is used. (3mks)

.....
.....
.....
.....
.....

(e) What is GPS in air traffic control? (2mks)

.....
.....
.....

(f) Outline three ways computers can be used to enhance marketing. (3mks)

.....
.....

.....
.....
.....
.....

19. (a) Explain the meaning of the following terms. (3mks)

(i) File

.....
.....

(ii) Folder

.....
.....

(iii) Storage media

.....
.....

(b) Outline any three factors you would consider when buying an operating system. (3mks)

.....
.....

(c) Explain the meaning of the following terms as used in disk management. (2mks)

(i) Defragmentation

.....
.....

(ii) Partittioning

.....
.....

(d) State two methods used to detect input errors (2mks)

.....
.....
.....

(e) Explain the following concepts as used in telecommunication systems. (3mks)

(i) Attennatian

.....
.....

(ii) Bandwidth capacity

.....
.....

(iii) Repeater

.....
.....

(f) Give two advantages of using GUI over command line interface. (2mks)

.....
.....

20. (a) Explain any two areas where DTP software can be used. (4mks)

.....
.....
.....
.....
.....
.....

(i) Name four data types used in MS – access (2mks)

.....
.....
.....

(b) A school wants to analyse its support staff personal details using Microsoft excel. The school has seven employees. Tom, Wycliff, Oscar, Mary, Lilian, Robina and Anne. Their ages are 29, 32, 28, 33, 30, 27 and 30 years respectively.

Tom is a cook, Wycliff is the school bursar and Oscar is the school watchman. While Mary, Lilian, Rubina and Anne are Librarian, secretary, typist and matron respectively. Tom, Mary and Robina are married while the rest are single. Using appropriate headings construct a worksheet showing the above information. (6mks)

(i) Write the formula you would use to find the worker who is the oldest of all. (2mks)

.....
.....
.....
.....

(c) What is a chart wizard as used in spread sheets. (1mk)

.....
.....
.....
.....