

EASTERN UNIVERSITY, SRI LANKA

EXTERNAL DEGREE

FIRST EXAMINATION IN SCIENCE 1998/1999

TERM SYSTEM, 2004/2005

JUNE, 2008

EXTCC 103 - COMPUTER LITERACY

(RE- REPEAT)



Answer four questions only

Time : 2 Hrs.

- (1) a) Who is known as the first Computer Programmer or Software Engineer in the world ? (10)
- b) Briefly explain about fifth Generation Computers. (20)
- c) Briefly compare the capabilities of a Computer with Human. (30)
- d) Briefly explain the use of Artificial Intelligence and Expert systems in dealing with Mathematical and Scientific problems. (40)
- (2) a) Define the following terms. (20)
- | | |
|------------|-------------------|
| (i) Bit | (ii) ASCII |
| (iii) WORD | (iv) Information. |
- b) Convert the following numbers into binary equivalent. (20)
- | | |
|----------------|------------------|
| (i) 127_{10} | (ii) $7F_{16}$ |
| (iii) 76_8 | (iv) AB_{16} . |
- c) Compare and Contrast the following. (30)
- | |
|---|
| (i) Hardware and Software |
| (ii) RAM and ROM |
| (iii) Highlevel and Lowlevel languages. |

d) Write short notes on the following :

- (I) Internal memory
- (ii) Translators
- (iii) Multimedia PC.

(30)

a) Define the term "Source data automation".

(10)

b) Explain the use of following input devices.

- (i) OMR
- (ii) Scanner
- (iii) Mouse
- (iv) Bar code reader.

(40)

c) What are the factors to be considered when selecting an output device (Printer) ?

(20)

d) Explain the use of following storage devices.

- (i) Winchester disk
- (ii) Compact disk (CD - ROM)
- (iii) WORM .

(30)

a) What is meant by System files ?

(20)

b) How can system files be copied from Hard disk to floppy disk ?

(20)

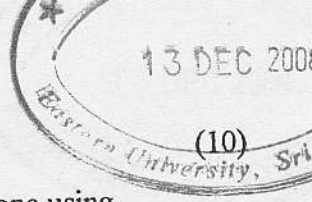
c) Briefly write down about the following in relation to MS-DOS.

- (i) Internal and External commands
- (ii) Files and Directories
- (iii) Format and Path commands.

(10 * 3 = 30)

d) State the advantages of Windows-95 over MS-DOS.

(30)



- (5) a) What is an Electronic Spreadsheet? (10)
- b) What kind of applications or problems can be done using Spreadsheet ? (20)
- c) Name two Electronic Spreadsheet packages available today. (10)
- d) Define the term "Word Processing". (10)
- e) What are the facilities available in word processing packages ? (20)
- f) Give name of two word processing packages. (10)
- g) State the advantages and disadvantages of a computerized record keeping system (Database) over a manual filing system. (20)
- (6) a) State the use of flow charts when writing Computer programs. (20)
- b) Draw a flow chart to the following problem.
Find out the roots of a quadratic equation $ax^2 + bx + c = 0$. The roots can be obtained using the following equation.
- $$x = \frac{-b \pm (b^2 - 4ac)^{1/2}}{2a}$$
- If the value of $(b^2 - 4ac)$ is greater than or equal to zero, the roots should be displayed. If the value of $(b^2 - 4ac)$ is less than zero, it should print that the "Roots are imaginary". (40)
- c) Convert the flow chart into a QBASIC program. (40)