EASTERN UNIVERSITY, SRI LANKA

DEPARTMENT OF MATHEMATICS

EXTERNAL DEGREE EXAMINATION IN SCIENCE –2008/2009

FIRST YEAR FIRST SEMESTER (Dec/Jan, 2012/2013)

EXTCC 101 – FUNDAMENTALS OF COMPUTER SYSTEMS

(REPEAT)

**Answer all questions**                                    **Time allowed: 01 hour**

**01.**

   a. Name the main components of a Central Processing Unit (CPU) and briefly describe their functions.

   b. Briefly describe the computer generation.

   c. Briefly describe any five characteristics of a computer.

   d. Define the term **Software**. The computer software is classified into two broad categories, explain it with suitable examples.

   e. What is an Operating system?

   f. List the functions of an operating system.

**02.**

   a. What you mean by "**input devices**"? Explain.

   b. What you mean by "**number system**" in computing? Explain.

   c. Convert the following into Binary:

     a) $(998)_{10}$;         b) $(043.56)_{10}$;         c) $(245)_{10}$.

   d. Convert the following into Octal:

     a) $(1100111)_{2}$;        b) $(865.356)_{10}$;        c) $(A2D)_{16}$.

   e. Convert the following into Hex:

     a) $(698)_{10}$;          b) $(475)_{8}$;          c) $(0.852)_{10}$.

   f. What is a network?

   g. Briefly explain types of network.