BICS-027

DIPLOMA – VIEP – COMPUTER SCIENCE AND ENGINEERING (DCSVI) / ADVANCED LEVEL CERTIFICATE COURSE IN COMPUTER SCIENCE AND ENGINEERING (ACCSVI)

Term-End Examination

June, 2016

BICS-027 : COMPUTER ORGANIZATION

Time : 2 hours *Maximum Marks : 70*

Note : *Question no. 1 is **compulsory**. Attempt any **four** questions from the remaining. All questions carry equal marks.*

1. (a) Mnemonics are used in high level languages.

    (i)   True

    (ii) False

    (b) Fortran is an assembly language.

    (i)   True

    (ii) False

(c) There are 4 layers in TCP/IP.

   (i)   True

   (ii) False

(d) BCD code is also known as 8-4-2-1 code.

   (i)   True

   (ii) False

(e) The number of bits in an ASCII code is

   (i)   4   (ii)   6

   (iii) 7   (iv)   8

(f) FTP stands for

   (i)   File Travel Protocol

   (ii) Fixed Transfer Protocol

   (iii) Float Transfer Protocol

   (iv) File Transfer Protocol

(g) In star topology, various computers are attached to different points.

   (i)   True

   (ii) False   *7×2=14*

2. (a) What is an operating system ? Explain its types and applications.   7

   (b) Differentiate between time sharing and real time operating systems.   7

3. (a) Why is VDU considered as one of the most important output devices ? Explain the working of VDU in brief. 7

(b) What is Hamming Code ? Explain with an example. 7

4. (a) What is ISO-OSI reference model ? Explain all the layers of OSI reference model. 7

(b) Describe the features of various generations of computers. 7

5. (a) Explain the Telnet service in brief. What are the major advantages of this service ? 7

(b) Explain machine code, assembly language and higher level languages. 7

6. Explain any *four* of the following : $4 \times 3\frac{1}{2} = 14$

(a) Inventory Control

(b) Network Topology

(c) Input-Output Device

(d) Remote Sensing

(e) TCP/IP

(f) Fourth Generation Languages

7. What is a Computer Network ? Write down the applications of computers and computer networks in business, railways and hospital management systems. *14*