Roll No. ....   Total Pages : 2

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ADVANCE COMPUTER NETWORK & APPLICATIONS

Paper–IT-456

Time Allowed : 3 Hours]   [Maximum Marks : 100

Note : Attempt five questions in all, selecting at least one question from each Unit. All questions carry equal marks.

UNIT–I

1. Specify the layers of TCP/IP protocol suite along with the protocols of each layer. Describe the purpose of each of the protocols.

2. Describe the media access control mechanism followed in Ethernet LANs. Can the MAC protocol of Ethernet LAN be adopted in wireless LANs? Justify.

UNIT–II

3. How is ADSL different from the normal dial up connection for accessing the Internet? Bring out a distinction between the ADSL and Cable Modem.

4. What features of IPv6 make it preferable over IPv4? Sketch the format of IPv6 and describe the purpose of each of its fields.

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UNIT–III

5. (a) How is Mobile IP different from traditional IP? What are the phases in Mobile IP process?

   (b) What is IP multicasting? Describe IP multicast addressing.

6. (a) Describe, how SSL ensures security at the transport layer of TCP/IP model.

   (b) Describe the security services provided by digital signatures along with the importance and properties of digital signatures.

UNIT–IV

7. Answer the following questions in brief :

   (a) Describe the components of Wireless Application Environment.

   (b) What is Wireless Application Protocol Gateway?

   (c) What is the significance of GPRS?

8. What are the objectives of network management? Give an overview of the concept and components of SNMP.

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