



**LOYOLA COLLEGE (AUTONOMOUS), CHENNAI – 600 034**

**M.C.A.DEGREE EXAMINATION – COMPUTER APPLICATIONS**

**FOURTH SEMESTER – NOVEMBER 2018**

**16PCA4MC02– MOBILE COMPUTING**

Date: 29-10-2018  
Time: 01:00-04:00

Dept. No.

Max. : 100 Marks

**SECTION-A**

**ANSWER ALL THE QUESTIONS:**

**(10 X 2 = 20)**

1. What is Pervasive Computing?
2. What are communication gateways?
3. Define Handover.
4. What is DECT?
5. What is BRAN?
6. State any two advantages of Radio transmission.
7. What is the role of Home Agent?
8. What is TTL?
9. What are ACID rules?
10. State any two features of Symbian OS.

**SECTION-B**

**ANSWER ALL THE QUESTIONS:**

**(5 X 8 =40)**

11. a) List out some of the applications and services in mobile computing.

**(OR)**

b) What are the design considerations for mobile computing?

12. a) Explain the architecture of GSM.

**(OR)**

b) Discuss the security features of GSM.

13. a) Describe about the Infrastructure and Adhoc Networks.

**(OR)**

b) Explain the architecture of Bluetooth.

14. a) Discuss in brief about the Registration procedure in Mobile IP.

**(OR)**

b) Explain about the selective retransmission in TCP.

15. a) Explain the architecture of Query Processing.

**(OR)**

b) Describe about the ADO.Net transactional model.

### **SECTION-C**

**ANSWER ANY TWO QUESTIONS:**

**(2 X 20 = 40)**

16. (a) Describe about the three tier architecture of mobile computing.

**(10)**

(b) Elaborate about the network operations of GPRS.

**(10)**

17. (a) Explain the protocol architecture of IEEE 802.11.

**(10)**

(b) Explain the functioning of Transaction Oriented TCP.

**(10)**

18. (a) Describe the steps involved in data recovery process.

**(10)**

(b) Explain the features of Power Aware Mobile Computing.

**(10)**

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