

**B. Tech. 7th Semester (IT) F. Scheme Examination,**

**December-2017**

**ADVANCED DATABASE MANAGEMENT SYSTEM**

**Paper-CSE-435-F**

*Time allowed : 3 hours*                      *[Maximum marks : 100]*

**Note :** *Question No. 1 is compulsory and attempt four more questions selecting one question from each unit. All questions carry equal marks.*

1. Write the short note on the following :

- (a) Heuristics in query execution
- (b) Schedules and recoverability
- (c) Deductive database system
- (d) Indexing techniques
- (e) Multimedia database

**Unit-I**

2. Explain object oriented data model in detail with suitable example also focus on its different standards.
3. Discuss the following :
- (a) Nested relational model
  - (b) Semantic query optimization

**Unit-II**

4. Explain concurrency control in detail. Also discuss different locking techniques.

5. Discuss client server architecture and internet in detail. Also focus on different technology components of client server system.

**Unit-III**

6. What do you mean by heterogeneous and federated database system ? Also focus on parallel database.
7. Explain deductive database system and deductive object oriented database system in detail with suitable examples.

**Unit-IV**

8. Discuss the following :
  - (a) Digital libraries and their comparison with traditional libraries.
  - (b) Spatial database and their needs.
9. Discuss the components and structure of multimedia database and their different applications. Also focus on mobile database.