#### HEMCHANDRACHARYA NORTH GUJARAT UNIVERSITY, PATAN

### MCA SEMESTER – II MCA-23: Advanced Database Management system

Teaching Scheme (Per Week)		Examination Scheme					
		Internal		External		Total	
Th.	Pr.	Th.	Pr.	Th.	Pr.	Th.	Pr.
(HOURS)	(HOURS)	(MARKS)	(MARKS)	(MARKS)	(MARKS)	(MARKS)	(MARKS)
4	3	30	20	70	30	100	50

# UNIT I (25)%

# **Transition Management:**

Recovery, concurrency Security Introduction, Discretionary access control, Mandatory access control, Statistical databases, Data encryption, Distributed Databases Introduction, Some Preliminaries, The twelve objectives, Problems of distributed systems

# UNIT II (25)%

# **Structured Query Language (SQL):**

Introduction to SQL, Constraints, DDL, DML, DCL, Create, Alter, Drop, Rename, Grant, Revoke, Select Clause, Functions, Different Types of Joins, set operators

# **UNIT III (25)%**

## PL/SQL:

Index, View, Sequence, Trigger, Procedure, Cursor, Exception Handling

# **UNIT IV (25)%**

### **Decision Support:**

Introduction, Aspects of decision support, Database design for decision support, Data Warehouses and Data marts, Online analytical processing, Data mining

#### **Books:**

- 1. Introduction to Database System C. J. Date (7th edition) Low Price Edition
- 2. SQL, PL/SQL Evan Bayross (2nd edition) BPB
- 3. Database system concepts Henry F. Korth (3rd edition) TMH

# **Question Paper Scheme: Section – I Section – II**

- Q.1 Objective Type Unit I & II (11) Marks Q.4 Objective Type Unit III & IV (11) Marks
- Q.2 Unit-I OR Q.2 Unit-I (12) Marks Q.5 Unit-III OR Q.5 Unit-III (12) Marks
- Q.3 Unit-II OR Q.3 Unit-II (12) Marks Q.6 Unit-IV OR Q.6 Unit-IV (12) Marks