Course Code	Course Title		Т	Р	С		
PMDS506P	Database Management Systems Lab		0	2	1		
Pre-requisite	NIL	Syllabus version					
		1.0					

Course Objectives

- 1. To understand the concepts of SQL commands.
- 2. To comprehend the concepts of PL/SQL.
- 3. To explore the concepts of NoSQL using MongoDB.

Course Outcomes

At the end of the course the student should be able to:

- 1 Perform SQL and PL/ SQL queries.
- 2 Implement the MongoDB methods, insert, update, delete operations in a NoSQL database

Indicative Experiments

- 1 Basic SQL Commands (DDL, DML, DCL, TCL and Constraints)
- 2 | Operators, Views and Functions
- 3 Joins and Subqueries
- 4 PL/SQL Introduction and Control Structures
- 5 Exception handling
- 6 Functions and Procedures
- 7 Cursors and Triggers
- 8 | Basics of MongoDB, Methods and operators
- 9 Working with documents and collections
- 10 | Indexing in MongoDB

Total Laboratory hours | 30 hours

Text Book(s)

- 1 Manu sharma, MongoDB Complete Guide, 2021, BPB Publications.
- David Hows, Peter Membrey, Eelco Plugge, DUPTim Hawkins, The Definitive Guide to MongoDB: A complete guide to dealing with Big Data using MongoDB, 2015, Aress.

Reference Book(s)

- 1 Rick Copeland, MongoDB Applied Design Patterns: Practical Use Cases with the Leading NoSQL Database, 2013, O'Reilly.
- Amit Phaltankar, Juned Ahsan, Michael Harrison and Liviu Nedov, MongoDB Fundamentals, A hands-on guide to using MongoDB and Atlas in the real world, 2020, Packt Publishing

Mode of evaluation	Assignment and FAT			
Recommended by Board of Studies	15-02-2024			
Approved by Academic Council	No. 73	Date	14-03-2024	