

Experiment No. 1.6

Student Name: Parvinder Singh

Branch: MCA - CCD

Semester: III

Subject Name: Business Analytical Lab

UID: 22MCC20043

Section/Group: 22MCD-1/ Grp B

Subject Code: 22CAH-703

1. **Aim/Overview of the practical:** To create, alter, and drop databases, tables, views, functions and indexes.
2. **Code for experiment/practical:**

To Create database:

Command: CREATE DATABASE 20043db;

```
mysql> create database 20043db;
Query OK, 1 row affected (0.00 sec)

mysql> show schemas;
+-----+
| Database |
+-----+
| 20043db |
| information_schema |
| mysql |
| performance_schema |
| sys |
+-----+
5 rows in set (0.01 sec)
```

To Alter database:

Command: ALTER DATABASE 20043db CHARACTER SET= ascii;

```
mysql> ALTER DATABASE 20043db CHARACTER SET= ascii;
Query OK, 1 row affected (0.02 sec)

mysql> SHOW CREATE DATABASE 20043db;
+-----+-----+
| Database | Create Database |
+-----+-----+
| 20043db | CREATE DATABASE '20043db' /*!40100 DEFAULT CHARACTER SET ascii */ /*!80016 DEFAULT ENCRYPTION='N' */ |
+-----+-----+
1 row in set (0.01 sec)
```

To Drop database:

Command: DROP DATABASE 20043db;

```
mysql> DROP DATABASE 20043db;
Query OK, 0 rows affected (0.03 sec)

mysql> show schemas;
+-----+
| Database |
+-----+
| information_schema |
| mysql |
| performance_schema |
| sys |
+-----+
4 rows in set (0.00 sec)
```

To Create Table:

Command: CREATE TABLE Persons(
 PersonID int,
 LastName varchar(255),
 FirstName varchar(255),
 Address varchar(255),
 City varchar(255)
);

```
mysql> USE testdb;
Database changed
mysql> CREATE TABLE Persons (
->     PersonID int,
->     LastName varchar(255),
->     FirstName varchar(255),
->     Address varchar(255),
->     City varchar(255)
-> );
Query OK, 0 rows affected (0.03 sec)

mysql> INSERT INTO Persons (PersonID, LastName, FirstName, Address, City)
-> VALUES ( 101, "Singh", "Parvinder", "Punjab", "Chandigarh");
Query OK, 1 row affected (0.01 sec)

mysql> SELECT * FROM Persons;
+-----+-----+-----+-----+-----+
| PersonID | LastName | FirstName | Address | City |
+-----+-----+-----+-----+-----+
| 101 | Singh | Parvinder | Punjab | Chandigarh |
+-----+-----+-----+-----+-----+
1 row in set (0.01 sec)
```

To Create Views:

Command: CREATE VIEW identity AS
 SELECT PersonID, FirstName
 FROM Persons
 WHERE City = "Chandigarh"

```
mysql> CREATE VIEW identity AS
-> SELECT PersonID, FirstName
-> FROM Persons
-> WHERE City = "Chandigarh";
Query OK, 0 rows affected (0.02 sec)

mysql> SELECT * FROM identity;
+-----+-----+
| PersonID | FirstName |
+-----+-----+
|      101 | Parvinder |
+-----+-----+
1 row in set (0.02 sec)
```

To Create Function:

Command: SELECT FirstName, ASCII(FirstName) AS NumCodeOfFirstChar
FROM Persons;

```
mysql> SELECT FirstName, ASCII(FirstName) AS NumCodeOfFirstChar
-> FROM Persons;
+-----+-----+
| FirstName | NumCodeOfFirstChar |
+-----+-----+
| Parvinder |          80         |
+-----+-----+
1 row in set (0.01 sec)
```

To Create Index:

Command: CREATE INDEX idx_pname
On Persons (LastName, FirstName);

```
mysql> CREATE INDEX idx_pname
-> On Persons ( LastName, FirstName);
Query OK, 0 rows affected (0.05 sec)
Records: 0  Duplicates: 0  Warnings: 0

mysql> SELECT * FROM Persons;
+-----+-----+-----+-----+-----+
| PersonID | LastName | FirstName | Address | City |
+-----+-----+-----+-----+-----+
|      101 | Singh   | Parvinder | Punjab  | Chandigarh |
+-----+-----+-----+-----+-----+
1 row in set (0.00 sec)
```

Learning outcomes (What I have learnt):

- To Create, Alter and Drop SQL database.
- To Create table, view and index in SQL.