

CURD:

# Python implementation to create a Database in MySQL

```
import mysql.connector
```

```
# connecting to the mysql server
```

```
db = mysql.connector.connect(  
    host="localhost",  
    user="root",  
    passwd="password"  
)
```

```
# cursor object c
```

```
c = db.cursor()
```

```
# executing the create database statement
```

```
c.execute("CREATE DATABASE employee_db")
```

```
# fetching all the databases
```

```
c.execute("SHOW DATABASES")
```

```
# printing all the databases
```

```
for i in c:
```

```
    print(i)
```

```
c = db.cursor()
```

```
# finally closing the database connection
```

```
db.close()
```

```
Create table:
```

```
# Python implementation to create a table in MySQL
```

```
import mysql.connector
```

```
# connecting to the mysql server
```

```
db = mysql.connector.connect(  
    host="localhost",  
    user="root",  
    passwd="password",  
    database="employee_db"  
)
```

```
# cursor object c
```

```
c = db.cursor()
```

```
# create statement for tblemployee
```

```
employeeetbl_create = """CREATE TABLE `employee_db`.`tblemployee` (  
    `empid` INT NOT NULL AUTO_INCREMENT,  
    `empname` VARCHAR(45) NULL,  
    `department` VARCHAR(45) NULL,  
    `salary` INT NULL,
```

```
PRIMARY KEY (`empid`))"""
```

```
c.execute(employeetbl_create)
```

```
c = db.cursor()
```

```
# fetch table employee details in the database
```

```
c.execute("desc table employee")
```

```
# print the table details
```

```
for i in c:
```

```
    print(i)
```

```
# finally closing the database connection
```

```
db.close()
```

```
insert table:
```

```
# Python implementation to insert data into a table in MySQL
```

```
import mysql.connector
```

```
# connecting to the mysql server
```

```
db = mysql.connector.connect(
```

```
    host="localhost",
```

```
user="root",  
passwd="password",  
database="employee_db"  
)
```

```
# cursor object c
```

```
c = db.cursor()
```

```
# insert statement for tblemployee
```

```
# this statement will enable us to insert multiple rows at once.
```

```
employeeetbl_insert = """INSERT INTO tblemployee (  
empname,  
department,  
salary)  
VALUES (%s, %s, %s)"""
```

```
# we save all the row data to be inserted in a data variable
```

```
data = [("Vani", "HR", "100000"),  
        ("Krish", "Accounts", "60000"),  
        ("Aishwarya", "Sales", "25000"),  
        ("Govind", "Marketing", "40000")]
```

```
# execute the insert commands for all rows and commit to the database
```

```
c.executemany(employeeetbl_insert, data)
```

```
db.commit()
```

```
# finally closing the database connection
```

```
db.close()
```

```
Read Table:
```

```
# Python implementation to fetch data from a table in MySQL
```

```
import mysql.connector
```

```
# connecting to the mysql server
```

```
db = mysql.connector.connect(  
    host="localhost",  
    user="root",  
    passwd="password",  
    database="employee_db"  
)
```

```
# cursor object c
```

```
c = db.cursor()
```

```
# select statement for tblemployee which returns all columns
```

```
employeeetbl_select = """SELECT * FROM tblemployee"""
```

```
# execute the select query to fetch all rows
```

```
c.execute(employeeetbl_select)
```

```
# fetch all the data returned by the database  
employee_data = c.fetchall()
```

```
# print all the data returned by the database  
for e in employee_data:  
    print(e)
```

```
# finally closing the database connection  
db.close()
```

Update:

```
# Python implementation to update data of a table in MySQL
```

```
import mysql.connector
```

```
# connecting to the mysql server
```

```
db = mysql.connector.connect(  
    host="localhost",  
    user="root",  
    passwd="password",  
    database="employee_db"  
)
```

```
# cursor object c
```

```
c = db.cursor()
```

```
# update statement for tblemployee
# which modifies the salary of Vani
employeeetbl_update = "UPDATE tblemployee\
SET salary = 115000 WHERE empid = 1"
```

```
# execute the update query to modify
# the salary of employee with
# employee id = 1 and commit to the database
c.execute(employeeetbl_update)
db.commit()
```

```
# finally closing the database connection
db.close()
```

deleting:

```
import mysql.connector
```

```
# connecting to the mysql server
```

```
db = mysql.connector.connect(
    host="localhost",
    user="root",
    passwd="password",
    database="employee_db"
```

)

# cursor object c

c = db.cursor()

# delete statement for tblemployee

# which deletes employee Aishwarya having empid 3

employeeetbl\_delete = "DELETE FROM tblemployee WHERE empid=3"

# execute the delete statement and commit to the database

c.execute(employeeetbl\_delete)

db.commit()

# finally closing the database connection

db.close()