IRC_SKCT_Java2_COD_JDBC_Challenge

Test Summary
- No. of Sections: 1
- No. of Questions: 12
- Total Duration: 120 min

Section 1 - Coding

Section Summary
- No. of Questions: 12
- Duration: 120 min

Additional Instructions:
None

Q1. Write a Java (JDBC) program to connect with MySQL database and check whether the given user name and password are valid. Display **Login Successful** or **Invalid username/password** based on the user input.

Use below Database Credentials
Driver Class   :   com.mysql.jdbc.Driver
Default DB URL :   jdbc:mysql://localhost/ri_db
Username   :   test
Password   :   test123

Note : Table is already created and set of user name and passwords are inserted.
Table Name : userdetails

Sample User Name and Password

Input Format

User name in first line as string
Password in second line as string

Output Format

Login Successful or **Invalid username/password**

Sample Input	Sample Output
USER01 ivRdxMb2jtoEGswo	Login Successful

Sample Input	Sample Output
USER02 ZIudKRarq47GMBqL	Invalid username/password

Time Limit: - ms Memory Limit: - kb Code Size: - kb

Q2. Create a class Stall with the following private attributes

id as int
name as String and
deposit as Double

Generate appropriate constructors, getters and setters.
Create a class StallBO with the following methods
public Hall getStall(int id) - Finds all details of Stall based on stall id and return them.
Use below Database Credentials
Driver Class : com.mysql.jdbc.Driver
Default DB URL : jdbc:mysql://localhost/ri_db
Username   : test
Password   : test123
Note : Table is already created and 15 entries are included. The table structure is given below.

Table Name : stall
id - int
name - varchar(30)
deposit - double

Create a driver class Main to display the Item details.
Note: Use System.out.format("%-10s %-10s %-10s %s\n","ID","Name","Deposit") to display Hall details.

Input Format

The input consists of the Stall id that has to be searched.

Output Format

Stall details as shown in the sample output. (Refer the format in the question).

Sample Input	Sample Output
2	ID Name Deposit 2 Platinum 20000.0

Sample Input	Sample Output
4	ID Name Deposit 4 Silver 40000.0

Time Limit: - ms Memory Limit: - kb Code Size: - kb

Q3. Write a Java program to get below input from user and insert in in table and search the record based on department.
1. int sid;
2. String sname;
3. String dname;

4. String address;
5. int gpa;

Create a class to handle all the database related functions.

Get the console input from user
Insert those values in table using proper insert query
Select the values from table using select query with suitable WHERE Clause and display values

Driver Class: com.mysql.jdbc.Driver
Default DB URL: jdbc:mysql://localhost/ri_db
Default USER: test
Default Password: test123

Note : Table is already created. Table Structure is
Table Name : BILL

Input Format

Number of students
For each student, input consists of Student ID, Name , Department, Address and GPA in each line
Department to search

Output Format

Students details as shown in sample output

Sample Input	Sample Output
2 100 Ram ECE	100 Ram ECE Chennai 3.3

Sample Input	Sample Output
2 100 Ram ECE	No students in MECH department

Time Limit: - ms Memory Limit: - kb Code Size: - kb

Q4.   As a principal of college, I need to find the faculty details based on their gender and department. So, write a Java (JDBC) program to connect with MySQL database and display the faculty details based on the input.

Display Employee ID and Name as shown in sample output

Use below Database Credentials
Driver Class   :   com.mysql.jdbc.Driver
Default DB URL :   jdbc:mysql://localhost/ri_db
Username   :   test
Password   :   test123

Note : Table is already created and values are inserted already.
Table Name : employee

Input Format

Gender code in first line (M/F)
Department code in second line(ECE,EEE,MECH,CSE,IT,CIVIL)

Output Format

Employee ID and Name as shown in sample output

Sample Input	Sample Output
F IT	Employee ID : 106 Name : Mona Kumari Employee ID : 107 Name : Sona Singh

Sample Input	Sample Output
M MECH	Employee ID : 105 Name : Samy Shankar Employee ID : 109 Name : Vikram Vishal

Time Limit: - ms Memory Limit: - kb Code Size: - kb

Q5.   As a teacher, I need to remove few students from the database and check other students details. So, write a Java (JDBC) program to connect with MySQL database and display the student details after deleting the given student list.

Display student details as shown in sample output.

Use below Database Credentials
Driver Class   :   com.mysql.jdbc.Driver
Default DB URL :   jdbc:mysql://localhost/ri_db
Username   :   test
Password   :   test123

Note : Table is created and values are inserted already.
Table Name : student

Input Format

Department code in first line
CGPA value in second line

Note : Delete the student details of given department and CGPA above the given value

Output Format

Students data in table after deleting

Refer Sample output for exact format

Sample Input	Sample Output
ECE 5	102 Namjkxk Xzcvhch 1985-01-24 IT Tfsvccq@gmail.com 9415530762 5 M 103 Jcpfbjt Jjggfpg 1977-07-26 IT Ubokksx@gmail.com 9415388380 6 M 105 Lydyvei Jmhclvq 1970-06-16 EEE Nzemrlk@gmail.com 9517054399 7 F

Q6.   Write a Java (JDBC) program to connect with MySQL database and insert the given data in the table and display the table contents using ResultSet.
Use below Database Credentials
Driver Class : com.mysql.jdbc.Driver
Default DB URL : jdbc:mysql://localhost/ri_db
Username : test
Password : test123
Note : Table is already created
Table Name : STUDENT
id as int, name as varchar(30), average_marks as int.
Make id as primary key.

Input Format

The first line of the input consists of the number of students.
The next input consists of the student id, name and average_marks.

Output Format

Display the table contents as shown in the sample output.

Sample Input	Sample Output
2 01 Alice 85	1 Alice 85 2 Ron 90

Time Limit: - ms Memory Limit: - kb Code Size: - kb

Q7.   Write a Java (JDBC) program to connect with MySQL database and display the values in student table.

<u>Use below Database Credentials</u>
Driver Class   :   com.mysql.jdbc.Driver
Default DB URL :   jdbc:mysql://localhost/ri_db
Username   :   test
Password   :   test123

Note : Table is already created. Table Structure is
Table Name : student

Input Format

No Console input.

Note : Query to insert values in table is already implemented.

Output Format

Display the student details as shown in sample output

Sample Input	Sample Output
	100 Anbu 85 70 55 101 Babu 75 98 95 102 Ram 82 70 56 103 Mona 45 91 57

Time Limit: - ms Memory Limit: - kb Code Size: - kb

Q8.   Write a Java (JDBC) program to connect with MySQL database and display the student details based on the user input.
Display student ID and Name as shown in sample output
Use below Database Credentials
Driver Class   :   com.mysql.jdbc.Driver
Default DB URL :   jdbc:mysql://localhost/ri_db
Username   :   test
Password   :   test123
Note : Table is already created and values are inserted already.
Table Name : student

Input Format

The input consists of the department code(ECE,EEE,MECH,CSE,IT,CIVIL).

Output Format

The output prints the student id and name. Refer sample input and output.

Sample Input	Sample Output
CSE	4 Banu 14 Karthik 15 Indhu

Time Limit: - ms Memory Limit: - kb Code Size: - kb

Q9.   Write a Java (JDBC) program to insert students details in a table and display number of rows affected.

<u>Use below Database Credentials</u>
Driver Class   :   com.mysql.jdbc.Driver
Default DB URL :   jdbc:mysql://localhost/ri_db
Username   :   test
Password   :   test123

Note : Table is already created. Table Structure is
Table Name : student

Input Format

Number of students in first line
Roll number, Name and Marks of 3 subjects in next lines

Note : Refer sample input

Output Format

Display the number of rows inserted.

Sample Input	Sample Output

```
2
1000
Babu
```

```
2
```

Time Limit: - ms Memory Limit: - kb Code Size: - kb

Q10.   Write a Java (JDBC) program to connect with the MySQL database, insert the given data in the table, and print the details of the designation (elon,sapiens,jarvis)

Use the below Database Credentials
Driver Class   :   com.mysql.jdbc.Driver
Default DB URL :   jdbc:mysql://localhost/ri_db
Username   :   test
Password   :   test123

Note: Table is already created
Table Name: OFFICE
|Column|datatype
|EID|INT
|ENAME|Char(100)
|DESIGNATION|Char(100)

Input Format

Number of Employees in the first line
Employee ID, Employee Name, Employee designation in next lines

Output Format

The output displays the details from the office table. Refer to the sample input and output for the formatting specifications.

Sample Input   **Sample Output**

```
4
101
Arun
sapiens
```

```
101 Arun sapiens
102 Aiju elon
103 Zara sapiens
104 Zyana jarvis
```

Time Limit: - ms Memory Limit: - kb Code Size: - kb

Q11.   Write a Java (JDBC) program to connect with the MySQL database, insert the given data in the table, and display the employee details with the salary range from 10000 to 50000.

Use the below Database Credentials
Driver Class   :   com.mysql.jdbc.Driver
Default DB URL :   jdbc:mysql://localhost/ri_db
Username   :   test
Password   :   test123

Table :OFFICE

Input Format

Number of Employees in the first line
Employee ID, Employee Name, Employee Salary in next lines

Refer sample input

Output Format

Display the employee details with the salary range from 10000 to 50000

Sample Input   **Sample Output**

```
3
101
ashwin
5000
```

```
102 arshath 10000
103 sangeetha 50000
```

Time Limit: - ms Memory Limit: - kb Code Size: - kb

Q12.   Write a Java (JDBC) program to connect with the MySQL database, insert the given data in the table, and display the employee details after deleting the one employee ID.

Use the below Database Credentials
Driver Class   :   com.mysql.jdbc.Driver
Default DB URL :   jdbc:mysql://localhost/ri_db
Username: test
Password: test123

Note: Table is already created
Table Name: OFFICE
|Column|datatype|
|EID |int|
|ENAME| varchar|
|ESALARY|INT|

EID|ENAME|ESALARY
101| Zara|30000
102 |zyana|40000
103|Soban|60000
104|Kumar|70000)
105|Lavanya|80000

Note: Table and values are Prepopulated.

Input Format

Input consists of the employee ID which has to be deleted.

Output Format

The output prints the employee details after deleting the particular employee . Refer to the sample input and output for reference.

Sample Input   **Sample Output**

```
101
```

```
102 zyana 40000
103 Soban 60000
104 Kumar 70000
105 Lavanya 80000
```

Time Limit: - ms Memory Limit: - kb Code Size: - kb

Section 1 - Coding

〉1

Test Case

Input	Output
USER04 j0fIFkeAlZaXEJ4E	Login Successful

Weightage - 25

Input	Output
USER12 jamt91cmUBJ8ZooI	Login Successful

Weightage - 25

Input	Output
USER09 LyTiT9zF3e33gSQf	Invalid username/password

Weightage - 25

Input	Output
USER05 USER05	Invalid username/password

Weightage - 25

Sample Input	Sample Output
USER01 ivRdxMb2jtoEGswo	Login Successful

Sample Input	Sample Output
USER02 ZIudKRarq47GMBqL	Invalid username/password

Solution

```java
import java.sql.*;
import java.util.Scanner;
 class LoginValidation {
    public static void main(String args[]) throws Exception {
        String url="jdbc:mysql://localhost/ri_db";
        String username ="test";
        String password ="test123";
        String query = "select *from userdetails where user_name=?";
        Scanner sc = new Scanner(System.in);

        String user_name = sc.nextLine();
        String pass_word =sc.nextLine();
        Class.forName("com.mysql.jdbc.Driver");
        Connection con = DriverManager.getConnection(url,username,password);
        PreparedStatement st = con.prepareStatement(query);
        st.setString(1, user_name);
        ResultSet rs = st.executeQuery();
        rs.next();
        //System.out.println(rs.getString(2));
        if(rs.getString(2).equals(pass_word)) {
            System.out.println("Login Successful");
        }
        else
            System.out.println("Invalid username/password");
        }
    }
```

〉2

Test Case

Input	Output		
6	ID 6	Name Pro	Deposit 60000.0

Weightage - 15

Input	Output
8	ID Name Deposit 8 Novice 80000.0

Weightage - 15

Input	Output
12	ID Name Deposit 12 Clothing 120000.0

Weightage - 20

Input	Output
15	ID Name Deposit 15 Project 150000.0

Weightage - 20

Input	Output
3	ID Name Deposit 3 Gold 30000.0

Weightage - 10

Input	Output
7	ID Name Deposit 7 Premium 70000.0

Weightage - 10

Input	Output
11	ID Name Deposit 11 Book 110000.0

Weightage - 10

Sample Input	Sample Output
2	ID Name Deposit 2 Platinum 20000.0

Sample Input	Sample Output
4	ID Name Deposit 4 Silver 40000.0

Solution

```java
import java.sql.*;
import java.util.Scanner;

class Stall{
    int id;
    String name;
    Double deposit;

    public Stall() {
        super();
    }

    public Stall(int id, String name,Double deposit) {
        super();
        this.id = id;
        this.name = name;
        this.deposit = deposit;
    }

}

class StallBO {
```

```java
    public Stall getStall(int id) throws Exception {
        String url="jdbc:mysql://localhost/ri_db";
        String username ="test";
        String password ="test123";
        Class.forName("com.mysql.jdbc.Driver");
        String query = "select *from Stall where id="+id;

        Connection con = DriverManager.getConnection(url,username,password);
        Statement st = con.createStatement();
        ResultSet rs =st.executeQuery(query);

        rs.next();
        String name = rs.getString(2);
        Double deposit =rs.getDouble(3);
        Stall s = new Stall();
        s.id=id;
        s.name=name;
        s.deposit=deposit;
        return s;
    }
}

class Main {
    public static void main(String args[]) throws Exception {
        StallBO sbo = new StallBO();
        Scanner sc = new Scanner(System.in);
        int id = Integer.parseInt(sc.nextLine());

        Stall S1 = sbo.getStall(id);
        System.out.format("%-10s %-10s %-10s\n","ID","Name","Deposit");
        System.out.format("%-10s %-10s %-10s\n",S1.id,S1.name,S1.deposit);

    }

}
```

}3

Test Case

Input	Output
2 100 Ram ECE	101 Radha EEE Chennai 3.8

Weightage - 25

Input	Output
1 101 Karthick ECE	No students in MECH department

Weightage - 25

Input	Output
5 100 Ram ECE	800 Joo CSE Erode 4.8

Weightage - 25

Input	Output
5 100 Ram ECE	300 Kumar CIVIL Erode 4.8 800 Joo CIVIL Goa 4.8

Weightage - 25

Sample Input	Sample Output
2 100 Ram ECE	100 Ram ECE Chennai 3.3

Sample Input	Sample Output
2 100 Ram ECE	No students in MECH department

Solution

```java
import java.sql.*;
import java.util.Scanner;
class JDBCExample {
    static final String JDBC_DRIVER = "com.mysql.jdbc.Driver";
    static final String DB_URL = "jdbc:mysql://localhost/ri_db";
```

```java
    static final String USER = "test";
    static final String PASS = "test123";

    public static void main(String[] args) {
    Connection conn = null;
    Connection myConn = null;
    Statement stmt = null;
    PreparedStatement st = null;
    try{
        Class.forName("com.mysql.jdbc.Driver");
        conn = DriverManager.getConnection(DB_URL, USER, PASS);
        stmt = conn.createStatement();
        String sql;
        Scanner sc =new Scanner(System.in);
        int n=Integer.parseInt(sc.nextLine());
        for(int i=0;i<n;i++) {
          int sid =Integer.parseInt(sc.nextLine());
          String sname =sc.nextLine();
          String dname =sc.nextLine();
          String address =sc.nextLine();
          double gpa =Double.parseDouble(sc.nextLine());
          sql = "insert into BILL (sid,sname,dname,address,gpa) values(?,?,?,?,?)";
          st = conn.prepareStatement(sql);

          st.setInt(1, sid);
          st.setString(2, sname);
          st.setString(3, dname);
          st.setString(4, address);
          st.setDouble(5, gpa);

          st.execute();
        }

     String search = sc.nextLine();
      sql= "SELECT * FROM BILL Where DNAME='"+search+"'";
      ResultSet rs = stmt.executeQuery(sql);
      int count=0;
      while (rs.next())
       {
         count++;
        int sid = rs.getInt("SID");
        String sName = rs.getString("SNAME");
        String dName = rs.getString("DNAME");
        String address =    rs.getString("ADDRESS");
        double gpa =rs.getDouble("GPA");
        System.out.format("%s %s %s %s %s\n", sid, sName, dName, address,gpa);
       }
       if(count==0)
        System.out.println("No students in "+search+" department");

    }catch(SQLException se){

        se.printStackTrace();
    }catch(Exception e){

        e.printStackTrace();
    }finally{

        try{
           if(stmt!=null)
              conn.close();
        }catch(SQLException se){
        }
        try{
           if(conn!=null)
              conn.close();
        }catch(SQLException se){
           se.printStackTrace();
        }
    }

  }
}
```

Test Case

Input	Output
M IT	Employee ID : 104 Name : Babu Samy

Weightage - 20

Input	Output
M ECE	Employee ID : 100 Name : Ram Kumar Employee ID : 110 Name : Vishal Vishnu

Weightage - 20

Input	Output
F ECE	Employee ID : 108 Name : Joshna Joshna

Weightage - 20

Input	Output
F EEE	Employee ID : 101 Name : Ramya Kumar

Weightage - 20

Input	Output
F IT	Employee ID : 106 Name : Mona Kumari Employee ID : 107 Name : Sona Singh

Weightage - 20

Sample Input	Sample Output
F IT	Employee ID : 106 Name : Mona Kumari Employee ID : 107 Name : Sona Singh

Sample Input	Sample Output
M MECH	Employee ID : 105 Name : Samy Shankar Employee ID : 109 Name : Vikram Vishal

Solution

```java
import java.sql.*;
import java.util.Scanner;
class Employee {
    public static void main(String args[]) throws Exception {
        String url="jdbc:mysql://localhost/ri_db";
        String username ="test";
        String password ="test123";
        String query = "select *from employee where gender=? AND dept=?";
        Scanner sc = new Scanner(System.in);

        String gender = sc.nextLine();
        String dept=sc.nextLine();
        Class.forName("com.mysql.jdbc.Driver");
        Connection con = DriverManager.getConnection(url,username,password);
        PreparedStatement st = con.prepareStatement(query);
        st.setString(1,gender);
        st.setString(2,dept);
        ResultSet rs = st.executeQuery();

        while(rs.next()) {
            System.out.println("Employee ID : "+rs.getInt(1)+" Name : "+rs.getString(3)+" "+rs.getString(4));
        }
    }
}
```

Test Case

Input	Output
EEE 4	101 Dcmigaj Vsfcezp 1965-11-09 ECE Rttdxtl@gmail.com 9228644223 9 F 102 Namjkxk Xzcvhch 1985-01-24 IT Tfsvccq@gmail.com 9415530762 5 M 103 Jcpfbjt Jjggfpg 1977-07-26 IT Ubokksx@gmail.com 9415388380 6 M 104 Zcphizv Nvicucm 1977-01-02 ECE Hxupxzi@gmail.com 9511654501 9 M

Weightage - 25

Input	Output
IT 6	101 Dcmigaj Vsfcezp 1965-11-09 ECE Rttdxtl@gmail.com 9228644223 9 F 102 Namjkxk Xzcvhch 1985-01-24 IT Tfsvccq@gmail.com 9415530762 5 M 103 Jcpfbjt Jjggfpg 1977-07-26 IT Ubokksx@gmail.com 9415388380 6 M 104 Zcphizv Nvicucm 1977-01-02 ECE Hxupxzi@gmail.com 9511654501 9 M

Weightage - 25

Input	Output
MECH 8	101 Dcmigaj Vsfcezp 1965-11-09 ECE Rttdxtl@gmail.com 9228644223 9 F 102 Namjkxk Xzcvhch 1985-01-24 IT Tfsvccq@gmail.com 9415530762 5 M 103 Jcpfbjt Jjggfpg 1977-07-26 IT Ubokksx@gmail.com 9415388380 6 M 104 Zcphizv Nvicucm 1977-01-02 ECE Hxupxzi@gmail.com 9511654501 9 M

Weightage - 25

Input	Output
CSE 6	101 Dcmigaj Vsfcezp 1965-11-09 ECE Rttdxtl@gmail.com 9228644223 9 F 102 Namjkxk Xzcvhch 1985-01-24 IT Tfsvccq@gmail.com 9415530762 5 M 103 Jcpfbjt Jjggfpg 1977-07-26 IT Ubokksx@gmail.com 9415388380 6 M 104 Zgnbizy Nxjougm 1977-01-02 ECE Hxupyzi@gmail.com 9511654591 9 M

Weightage - 25

Sample Input	Sample Output
ECE 5	102 Namjkxk Xzcvhch 1985-01-24 IT Tfsvccq@gmail.com 9415530762 5 M 103 Jcpfbjt Jjggfpg 1977-07-26 IT Ubokksx@gmail.com 9415388380 6 M 105 Lydyvei Jmhclvq 1970-06-16 EEE Nzemrlk@gmail.com 9517054399 7 F 107 Veokutm Mokgiky 1962-01-09 CIVIL Dgaotlz@gmail.com 9991755203 5 M

Solution

```java
import java.sql.Connection;
import java.sql.DriverManager;
import java.sql.PreparedStatement;
import java.sql.ResultSet;
import java.util.Scanner;

class RowDelete{
    public static void main(String args[]) throws Exception{
        String url="jdbc:mysql://localhost/ri_db";
        String username ="test";
        String password ="test123";
        String query = "delete from student where dept =? AND cgpa > ?;";

        Scanner sc =new Scanner(System.in);

        Class.forName("com.mysql.jdbc.Driver");
        Connection con = DriverManager.getConnection(url,username,password);
        PreparedStatement st = con.prepareStatement(query);


        String dept =sc.nextLine();
        double  cgpa= Double.parseDouble(sc.nextLine());
        st.setString(1,dept);
        st.setDouble(2,cgpa);
        st.execute();


        ResultSet rs =  st.executeQuery("select *from student");
        while(rs.next()) {
            System.out.println(rs.getInt(1)+" "+rs.getString(2)+" "+rs.getString(3)+" "+rs.getString(4)+" "+rs.getString(5)+" "+rs.getString(6)+" "+rs.getString(7)+" "+rs.getStri
        }
        st.close();
        con.close();
    }
}
```

Test Case

Input	Output
3 01 Alice 85	1 Alice 85 2 Ron 90 3 Harry 98

Weightage - 20

Input	Output
4 01 Alice 85	1 Alice 85 2 Ron 90 3 Harry 98 4 Hermoine 100

Weightage - 20

Input	Output
5 01 Alice 85	1 Alice 85 2 Ron 90 3 Harry 98 4 Hermoine 100

Weightage - 20

Input	Output
6 01 Alice 85	1 Alice 85 2 Ron 90 3 Harry 98 4 Hermoine 100

Weightage - 20

Input	Output
7 01 Alice 85	1 Alice 85 2 Ron 90 3 Harry 98 4 Hermoine 100

Weightage - 20

Sample Input	Sample Output
2 01 Alice 85	1 Alice 85 2 Ron 90

Solution

```java
import java.sql.Connection;
import java.sql.DriverManager;
import java.sql.PreparedStatement;
import java.sql.ResultSet;
import java.util.Scanner;

class RowInsertExample{
    public static void main(String args[]) throws Exception{
        String url="jdbc:mysql://localhost/ri_db";
        String username ="test";
        String password ="test123";
        String query = "INSERT INTO STUDENT (id,name,average_marks) VALUES (?,?,?);";

        Scanner sc =new Scanner(System.in);

        Class.forName("com.mysql.jdbc.Driver");
        Connection con = DriverManager.getConnection(url,username,password);
        PreparedStatement st = con.prepareStatement(query);

        int n =Integer.parseInt(sc.nextLine());

        for(int i=0;i<n;i++) {
            int id=Integer.parseInt(sc.nextLine());
            String name =sc.nextLine();
            int average_marks = Integer.parseInt(sc.nextLine());
            st.setInt(1,id);
            st.setString(2,name);
            st.setInt(3,average_marks);
            st.executeUpdate();
        }

        ResultSet rs =  st.executeQuery("select *from STUDENT");
        while(rs.next()) {
            System.out.println(rs.getInt(1)+" "+rs.getString(2)+" "+rs.getInt(3));
        }
        st.close();
        con.close();
    }
}
```

Test Case

Input	Output
	100 Anbu 85 70 55 101 Babu 75 98 95 102 Ram 82 70 56 103 Mona 45 91 57

Weightage - 100

Sample Input	Sample Output
	100 Anbu 85 70 55 101 Babu 75 98 95 102 Ram 82 70 56 103 Mona 45 91 57

Solution

```java
import java.sql.*;
class StudentDetails {
    public static void main(String args[]) throws Exception{
        String url ="jdbc:mysql://localhost/ri_db";
        String uname ="test";
        String pass ="test123";
```

```
        Class.forName("com.mysql.jdbc.Driver");
        Connection con =DriverManager.getConnection(url, uname, pass);

        Statement st = con.createStatement();
        ResultSet rs=st.executeQuery("select *from student");
        while(rs.next()) {
            System.out.println(rs.getInt(1)+" "+rs.getString(2)+" "+rs.getInt(3)+" "+rs.getInt(4)+" "+rs.getInt(5));

        }
        st.close();
        con.close();
    }

}
```

Test Case

Input	Output
MECH	3 Geetha 6 Samy 10 Vikram

Weightage - 20

Input	Output
CIVIL	16 Naveena 17 Rahul 18 Naren

Weightage - 20

Input	Output
ECE	1 Ram 9 Joshna 11 Vishal

Weightage - 20

Input	Output
EEE	2 Ramya 12 Raksha 13 Ravi

Weightage - 20

Input	Output
IT	5 Babu 7 Mona 8 Sona

Weightage - 20

Sample Input	Sample Output
CSE	4 Banu 14 Karthik 15 Indhu

Solution

```
        Class.forName("com.mysql.jdbc.Driver");
        Connection con =DriverManager.getConnection(url, uname, pass);

        Statement st = con.createStatement();
        ResultSet rs=st.executeQuery("select *from student");
        while(rs.next()) {
            System.out.println(rs.getInt(1)+" "+rs.getString(2)+" "+rs.getInt(3)+" "+rs.getInt(4)+" "+rs.getInt(5));
```

```java
import java.sql.*;
import java.util.Scanner;
 class Employee  {
    public static void main(String args[]) throws Exception {
        String url="jdbc:mysql://localhost/ri_db";
        String username ="test";
        String password ="test123";
        String query = "select *from student where dept=?";
        Scanner sc = new Scanner(System.in);

        String dept=sc.nextLine();
        Class.forName("com.mysql.jdbc.Driver");
        Connection con = DriverManager.getConnection(url,username,password);
        PreparedStatement st = con.prepareStatement(query);
        st.setString(1,dept);
        ResultSet rs = st.executeQuery();

        while(rs.next()) {
            System.out.println(rs.getInt(1)+" "+rs.getString(2));
        }
    }
}
```

Test Case

Input	Output
3 1000 Babu 37	3

Weightage - 25

Input	Output
4 100 ABCD 50	4

Weightage - 25

Input	Output
1 100 ABCD 50	1

Weightage - 25

Input	Output
5 100 ABCD 50	5

Weightage - 25

Sample Input	Sample Output
2 1000 Babu 37	2

Solution

```java
import java.sql.*;
import java.util.Scanner;
class StudentDetails {
    public static void main(String args[]) throws Exception{
        Scanner sc = new Scanner(System.in);
        int n = Integer.parseInt(sc.nextLine());
        int count=0;

        String url ="jdbc:mysql://localhost/ri_db";
        String uname ="test";
        String pass ="test123";

        String query ="insert into student values(?,?,?,?,?);";
        Class.forName("com.mysql.jdbc.Driver");
        Connection con =DriverManager.getConnection(url, uname, pass);
        for(int i=0;i<n;i++) {
            int rollno =Integer.parseInt(sc.nextLine());
            String sname =sc.nextLine();
            int mark1 =Integer.parseInt(sc.nextLine());
            int mark2 =Integer.parseInt(sc.nextLine());
            int mark3 =Integer.parseInt(sc.nextLine());
```

```
            PreparedStatement st = con.prepareStatement(query);
            st.setInt(1,rollno);
            st.setString(2, sname);
            st.setInt(3, mark1);
            st.setInt(4, mark2);
            st.setInt(5, mark3);
            count=count+st.executeUpdate();
        }
        System.out.println(count);
        con.close();
    }
}
```

Test Case

Input	Output
4 101 Arun sapiens	101 Arun sapiens 102 Aiju elon 103 Zara sapiens

Weightage - 100

Sample Input	Sample Output
4 101 Arun sapiens	101 Arun sapiens 102 Aiju elon 103 Zara sapiens 104 Zyana jarvis

Solution

```java
import java.sql.Connection;
import java.sql.DriverManager;
import java.sql.PreparedStatement;
import java.sql.ResultSet;
import java.util.Scanner;

class RowInsertExample{
    public static void main(String args[]) throws Exception{
        String url="jdbc:mysql://localhost/ri_db";
        String username ="test";
        String password ="test123";
        String query = "INSERT INTO OFFICE (EID,ENAME,DESIGNATION) VALUES (?,?,?);";

        Scanner sc =new Scanner(System.in);

        Class.forName("com.mysql.jdbc.Driver");
        Connection con = DriverManager.getConnection(url,username,password);
        PreparedStatement st = con.prepareStatement(query);

        int n =Integer.parseInt(sc.nextLine());

        for(int i=0;i<n;i++) {
            int eid=Integer.parseInt(sc.nextLine());
            String ename =sc.nextLine();
            String designation = sc.nextLine();
            st.setInt(1,eid);
            st.setString(2,ename);
            st.setString(3,designation);
            st.executeUpdate();
        }


        ResultSet rs =  st.executeQuery("select * from OFFICE where designation in('elon','sapiens','jarvis')");
        while(rs.next()) {
            System.out.println(rs.getInt(1)+" "+rs.getString(2)+" "+rs.getString(3));
        }
        st.close();
        con.close();
    }
}
```

Test Case

Input	Output
2 101 ashwin 40000	101 ashwin 40000 102 arshath 30000

Weightage - 25

Input	Output
4 101 ashwin 5000	102 arshath 10000 103 sangeetha 50000 104 Soban 42000

Weightage - 25

Input	Output
4 10122 ashwin 43000	10121 sangeetha 50000 10122 ashwin 43000 10131 arshath 34000 10161 Suji 23000

Weightage - 25

Input	Output
2 10291 Soban 45000	10281 Kumar 32000 10291 Soban 45000

Weightage - 25

Sample Input	Sample Output
3 101 ashwin 5000	102 arshath 10000 103 sangeetha 50000

Solution

```java
import java.sql.Connection;
import java.sql.DriverManager;
import java.sql.PreparedStatement;
import java.sql.ResultSet;
import java.util.Scanner;

class Main
{
    public static void main(String args[]) throws Exception
    {
        String url="jdbc:mysql://localhost/ri_db";
        String username ="test";
        String password ="test123";
        String query = "INSERT INTO OFFICE (EID,ENAME, ESALARY) VALUES (?,?,?);";

        Scanner sc =new Scanner(System.in);

        Class.forName("com.mysql.jdbc.Driver");
        Connection con = DriverManager.getConnection(url,username,password);
        PreparedStatement st = con.prepareStatement(query);

        int n =Integer.parseInt(sc.nextLine());

        for(int i=0;i<n;i++) {
            int eid=Integer.parseInt(sc.nextLine());
            String ename =sc.nextLine();
            int esalary = Integer.parseInt(sc.nextLine());
            st.setInt(1,eid);
            st.setString(2,ename);
            st.setInt(3,esalary);
            st.executeUpdate();
        }

        ResultSet rs =  st.executeQuery("select * from OFFICE where esalary between 10000 and 50000");
        while(rs.next()) {
            System.out.println(rs.getInt(1)+" "+rs.getString(2)+" "+rs.getInt(3));
        }
        st.close();
        con.close();
    }
}
```

Test Case

Input	Output
104	101 Zara 30000 102 zyana 40000 103 Soban 60000 105 Lavanya 80000

Weightage - 100

Sample Input	Sample Output
101	102 zyana 40000 103 Soban 60000 104 Kumar 70000 105 Lavanya 80000

Solution

```java
import java.sql.Connection;
import java.sql.DriverManager;
import java.sql.PreparedStatement;
import java.sql.ResultSet;
import java.util.Scanner;

class Main
{
    public static void main(String args[]) throws Exception
    {
        String url="jdbc:mysql://localhost/ri_db";
        String username ="test";
        String password ="test123";
        String query = "delete from office where eid =?;";

        Scanner sc =new Scanner(System.in);

        Class.forName("com.mysql.jdbc.Driver");
        Connection con = DriverManager.getConnection(url,username,password);
        PreparedStatement st = con.prepareStatement(query);

        int eid =Integer.parseInt(sc.nextLine());
            st.setInt(1,eid);
            st.executeUpdate();

        ResultSet rs =  st.executeQuery("select *from office");
        while(rs.next())
        {
            System.out.println(rs.getInt(1)+" "+rs.getString(2)+" "+rs.getString(3));
        }
        st.close();
        con.close();
    }
}
```