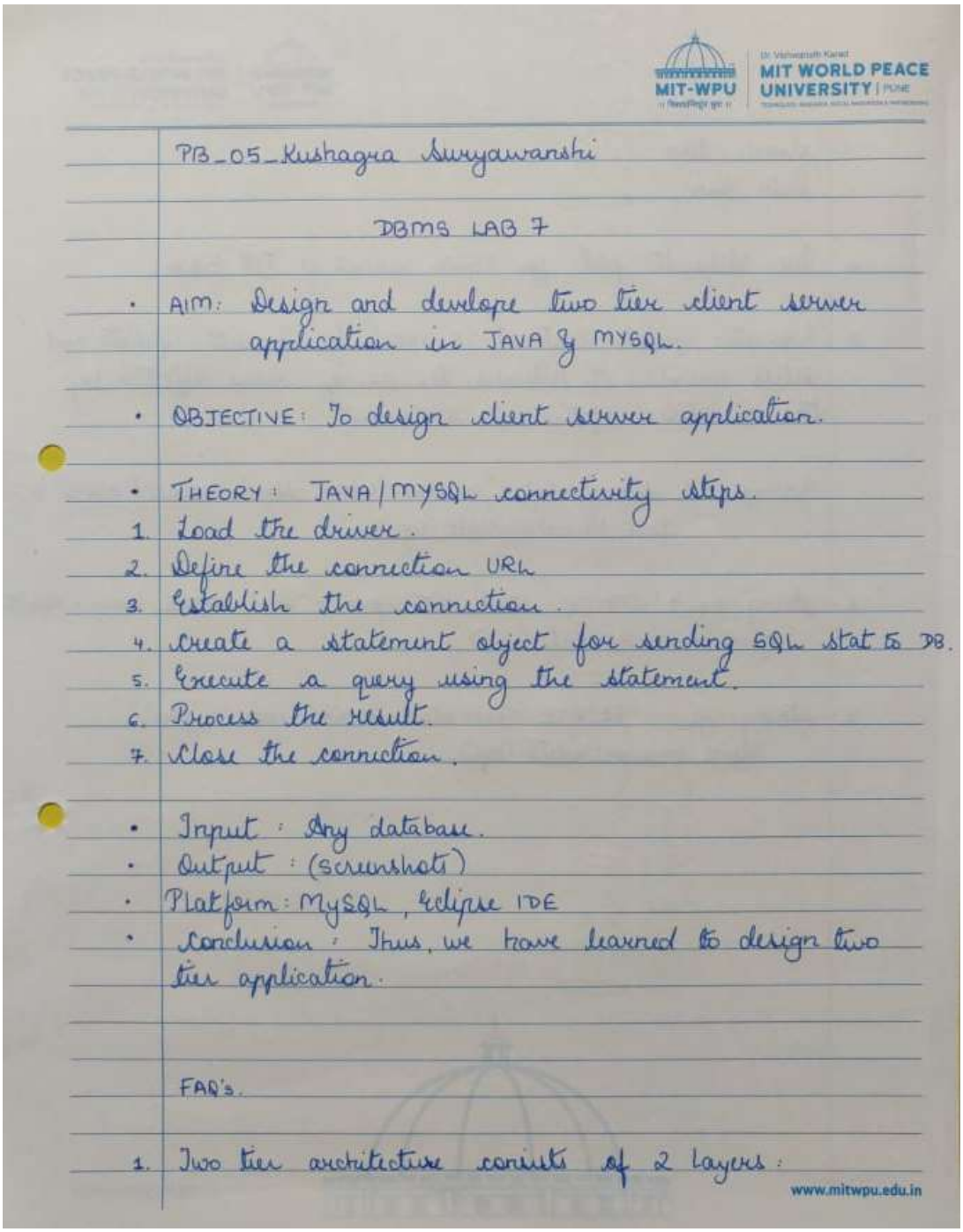
PB_05_Kushagra Suryawanshi

DBMS LAB 7



PB_05_Kushagra Suryawanshi

DBMS LAB 7

- AIM: Design and develope two tier client server application in JAVA & MYSQL.
- OBJECTIVE: To design client server application.
- THEORY: JAVA/MYSQL connectivity steps.

1. Load the driver.
2. Define the connection URL
3. Establish the connection.
4. Create a statement object for sending SQL stat to DB.
5. Execute a query using the statement.
6. Process the result.
7. Close the connection.

- Input: Any database.
- Output: (screenshots)
- Platform: MySQL, Eclipse IDE
- Conclusion: Thus, we have learned to design two tier application.

FAQ's.

1. Two tier architecture consists of 2 layers:

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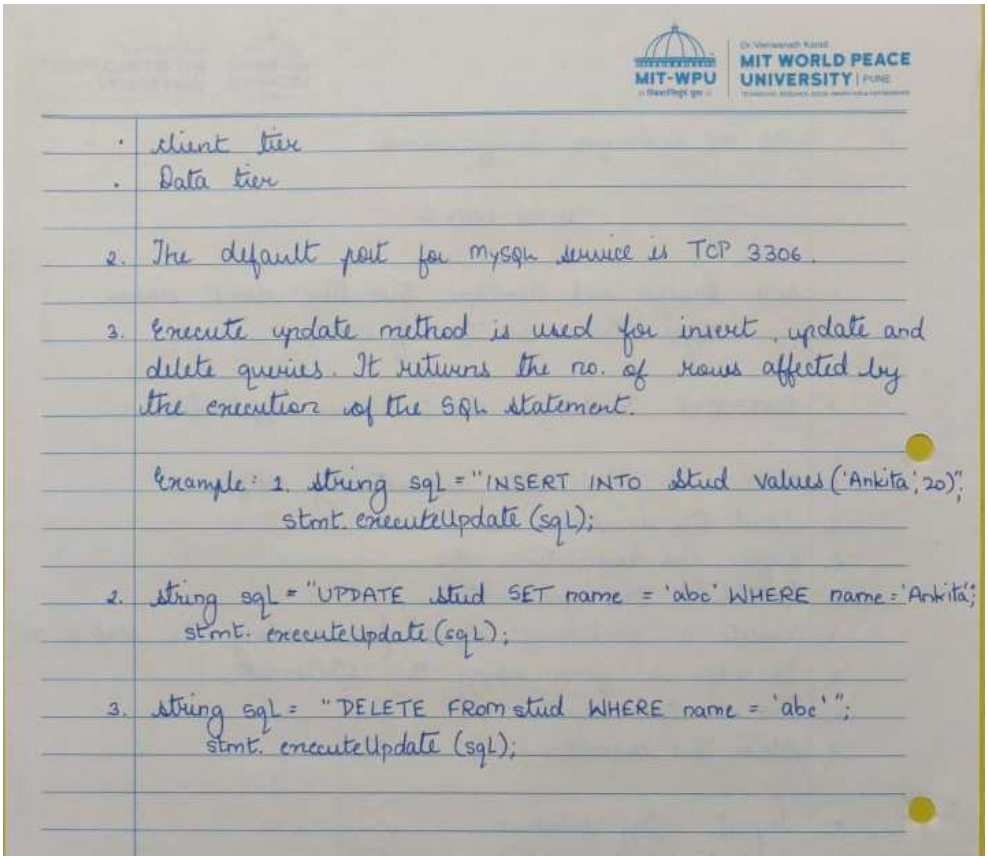


Code:

```
import java.sql.*;
import java.util.Scanner;
public class LAB7 {
	public static void main(String[] args) {
		try
		{
			Class.forName("com.mysql.cj.jdbc.Driver");
			Connection con =
DriverManager.getConnection("jdbc:mysql://localhost:3306/hotel_mgmt","root","Kushagra
5838!");
			System.out.println("Connected to the database");
			Statement sm = con.createStatement();
			int ch;
			Scanner s = new Scanner(System.in);
```

```
                    do
                    {

        System.out.println("\nMENU:\n1.INSERT\n2.SELECT\n3.UPDATE\n4.DELETE\n5.EXIT
\nEnter your choice: ");
                                ch=s.nextInt();
                                switch(ch) {
                                case 1:
                                        System.out.println("Enter the Guest No: ");
                                        int i=s.nextInt();
                                        System.out.println("Enter the Guest Name: ");
                                        String n=s.next();
                                        System.out.println("Enter the Guest Ph.no: ");
                                        int a=s.nextInt();
                                        String sql = "Insert into guest
values('"+i+"','"+n+"','"+a+"');";
                                sm.executeUpdate(sql);
                                System.out.println("\nRecord is Inserted!");
                                break;

                                case 2: String sql1 = "SELECT * FROM guest";
                                ResultSet rs = sm.executeQuery(sql1);
                                while(rs.next())
                                {
                                        int gno = rs.getInt("guest_no");
                                        String gname1 =rs.getString("guest_name");
                                        int gphno = rs.getInt("guest_phn");
                                        System.out.print("\nGuest No.: " +gno);
                                        System.out.print("\nGuest Name: " +gname1);
                                        System.out.print("\nGuest Phone No.: " +gphno);
                                        System.out.print("\n");
                                }
```

```
                                break;

                                case 3:
                                        System.out.println("\nEnter the Guest No. for which
you want to update name: ");
                                        int i1=s.nextInt();
                                        System.out.println("\nEnter the Guest Name to be
updated: ");
                                        String n1=s.next();
                                        String sql2 = "update guest set guest_name='"+n1+"'
where guest_no='"+i1+"';";
                                sm.executeUpdate(sql2);
                                System.out.println("Record is updated");
                                break;

                                case 4:

                                        System.out.println("\nEnter the Guest No.: ");
                                        int i2=s.nextInt();
                                        String sql3 = "delete from guest where
guest_no='"+i2+"';";
                                sm.executeUpdate(sql3);
                                System.out.println("\nRecord is deleted");
                                break;
                                }
                                }while(ch<5);
                                con.close();
                        }
                catch(Exception e)
                {
                        e.printStackTrace();
                }
```

```
                }
}
```

OUTPUT:

Connected to the database

MENU:

1.INSERT

2.SELECT

3.UPDATE

4.DELETE

5.EXIT

Enter your choice:

2

Guest No.: 1

Guest Name: Kush

Guest Phone No.: 7028

Guest No.: 2

Guest Name: Kshati

Guest Phone No.: 7057

Guest No.: 3

Guest Name: DBMS

Guest Phone No.: 1234

MENU:

1.INSERT

2.SELECT

3.UPDATE

4.DELETE

5.EXIT

Enter your choice:

1

Enter the Guest No:

4

Enter the Guest Name:

Tony

Enter the Guest Ph.no:

2024

Record is Inserted!

MENU:

1.INSERT

2.SELECT

3.UPDATE

4.DELETE

5.EXIT

Enter your choice:

3

Enter the Guest No. for which you want to update name:

4

Enter the Guest Name to be updated:

Tony

Record is updated

MENU:

1.INSERT

2.SELECT

3.UPDATE

4.DELETE

5.EXIT

Enter your choice:

3

Enter the Guest No. for which you want to update name:

4

Enter the Guest Name to be updated:

Steve

Record is updated

MENU:

1.INSERT

2.SELECT

3.UPDATE

4.DELETE

5.EXIT

Enter your choice:

4

Enter the Guest No.:

4

Record is deleted

MENU:

1.INSERT

2.SELECT

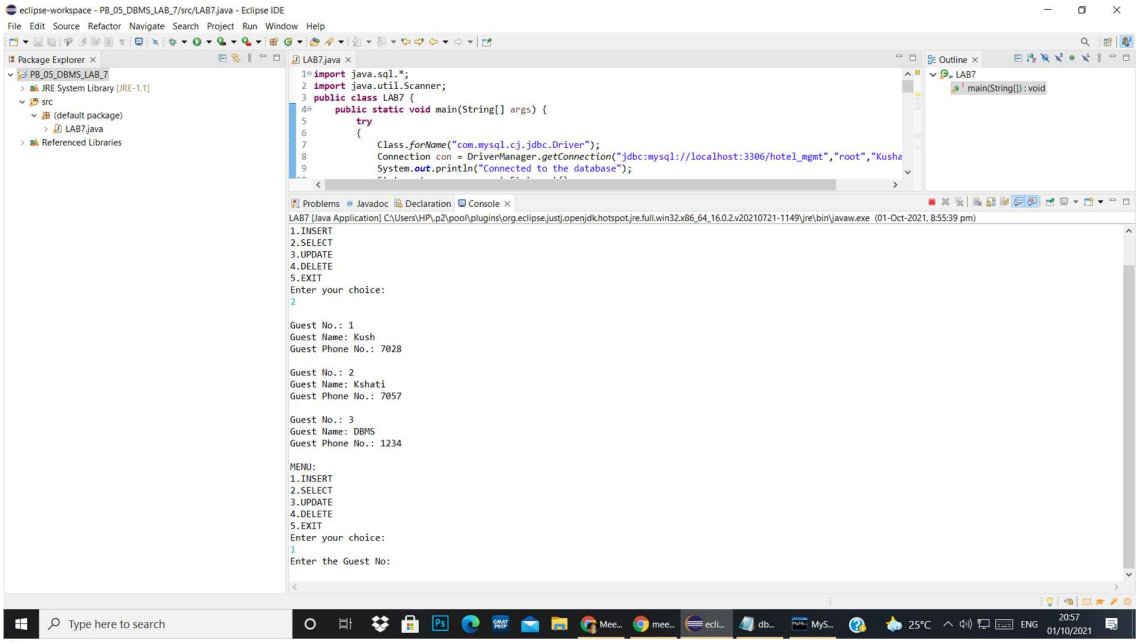
3.UPDATE

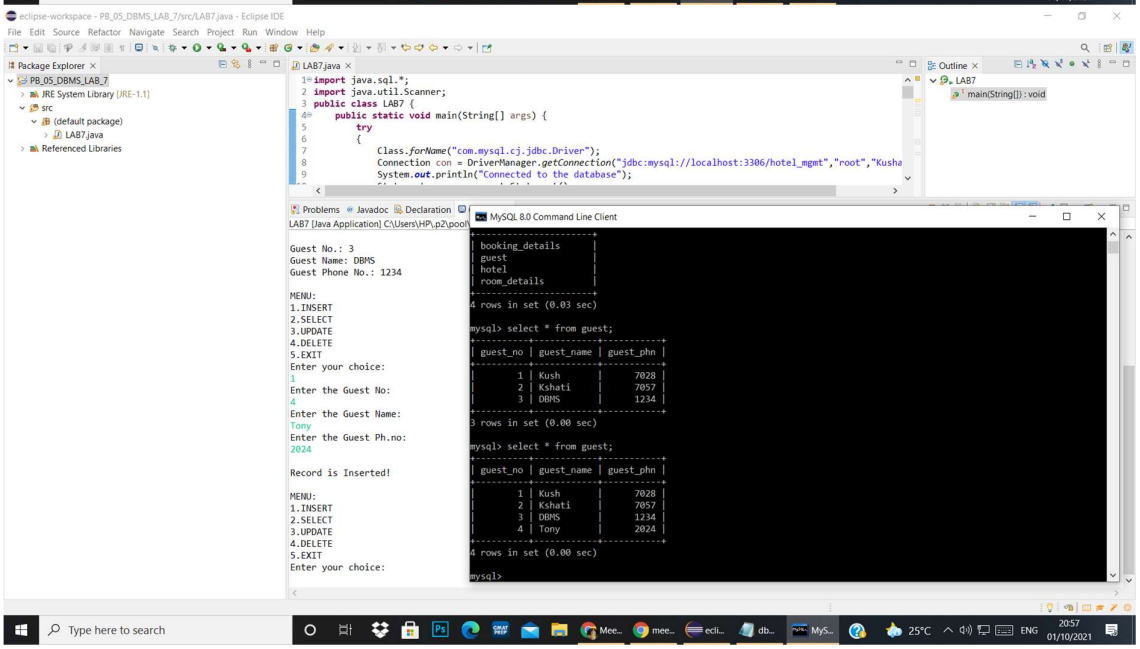
4.DELETE

5.EXIT

Enter your choice:

5


eclipse-workspace - PB_05_DBMS_LAB_7/src/LAB7.java - Eclipse IDE
File Edit Source Refactor Navigate Search Project Run Window Help
Package Explorer
PB_05_DBMS_LAB_7
JRE System Library [JRE-1.1]
src
(default package)
LAB7.java
Referenced Libraries
LAB7.java
1 import java.sql.*;
2 import java.util.Scanner;
3 public class LAB7 {
4 public static void main(String[] args) {
5 try
6 {
7 Class.forName("com.mysql.cj.jdbc.Driver");
8 Connection con = DriverManager.getConnection("jdbc:mysql://localhost:3306/hotel_mgmt","root","Kusha
9 System.out.println("Connected to the database");
Outline
LAB7
main(String[]) : void
Problems Javadoc Declaration Console
LAB7 [Java Application] C:\Users\HP\.p2\pool\plugins\org.eclipse.justj.openjdk.hotspot.jre.full.win32.x86_64_16.0.2.v20210721-1149\jre\bin\javaw.exe (01-Oct-2021, 8:55:39 pm)
1.INSERT
2.SELECT
3.UPDATE
4.DELETE
5.EXIT
Enter your choice:
2
Guest No.: 1
Guest Name: Kush
Guest Phone No.: 7028
Guest No.: 2
Guest Name: Kshati
Guest Phone No.: 7057
Guest No.: 3
Guest Name: DBMS
Guest Phone No.: 1234
MENU:
1.INSERT
2.SELECT
3.UPDATE
4.DELETE
5.EXIT
Enter your choice:
1
Enter the Guest No:
Type here to search
25°C
ENG
20:57
01/10/2021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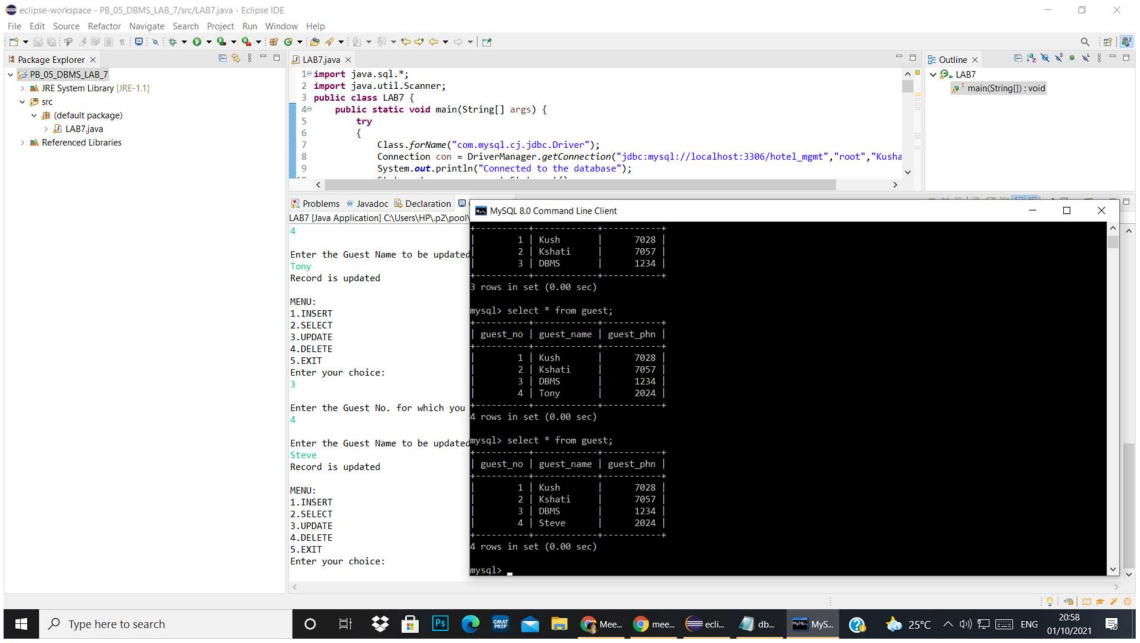
9 System.out.println("Connected to the database");
Outline
LAB7
main(String[]) : void
Problems Javadoc Declaration
LAB7 [Java Application] C:\Users\HP\.p2\pool
Guest No.: 3
Guest Name: DBMS
Guest Phone No.: 1234
MENU:
1.INSERT
2.SELECT
3.UPDATE
4.DELETE
5.EXIT
Enter your choice:
1
Enter the Guest No:
4
Enter the Guest Name:
Tony
Enter the Guest Ph.no:
2024
Record is Inserted!
MENU:
1.INSERT
2.SELECT
3.UPDATE
4.DELETE
5.EXIT
Enter your choice:
MySQL 8.0 Command Line Client
| booking_details |
| guest |
| hotel |
| room_details |
4 rows in set (0.03 sec)
mysql> select * from guest;
guest_no	guest_name	guest_phn
1	Kush	7028
2	Kshati	7057
3	DBMS	1234
3 rows in set (0.00 sec)
mysql> select * from guest;
guest_no	guest_name	guest_phn
1	Kush	7028
2	Kshati	7057
3	DBMS	1234
4	Tony	2024
4 rows in set (0.00 sec)
mysql>
Type here to search
25°C
ENG
20:57
01/10/2021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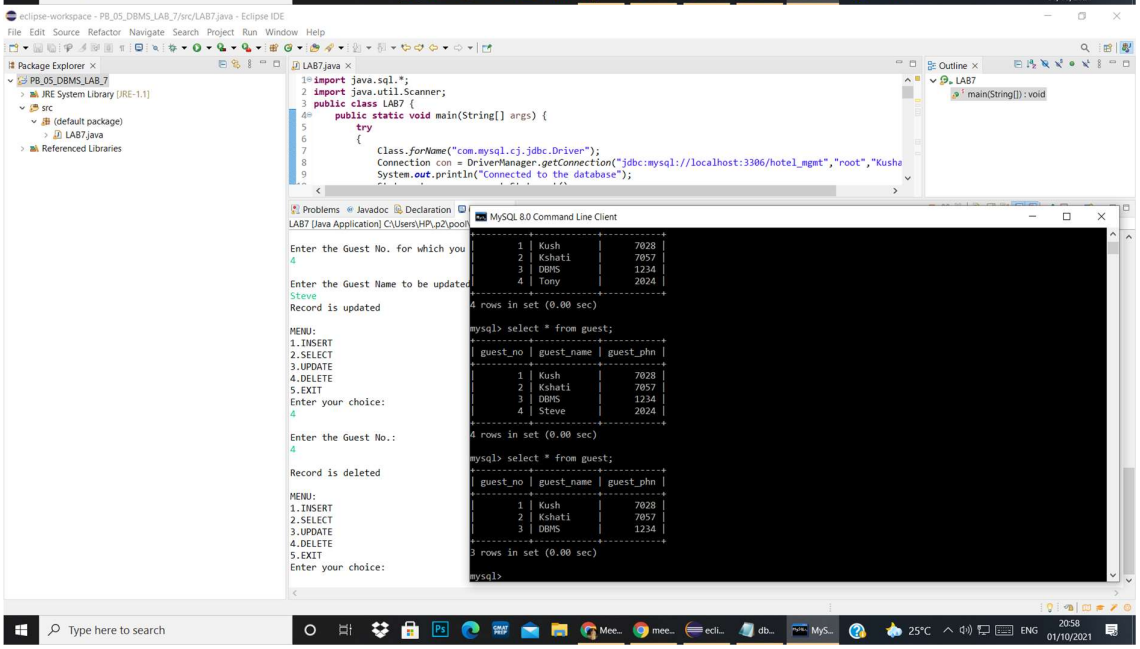
Outline
LAB7
main(String[]) : void
Problems Javadoc Declaration
LAB7 [Java Application] C:\Users\HP\.p2\pool\
4
Enter the Guest Name to be updated
Tony
Record is updated
MENU:
1.INSERT
2.SELECT
3.UPDATE
4.DELETE
5.EXIT
Enter your choice:
3
Enter the Guest No. for which you
4
Enter the Guest Name to be updated
Steve
Record is updated
MENU:
1.INSERT
2.SELECT
3.UPDATE
4.DELETE
5.EXIT
Enter your choice:
MySQL 8.0 Command Line Client
1	Kush	7028
2	Kshati	7057
3	DBMS	1234
3 rows in set (0.00 sec)
mysql> select * from guest;
guest_no	guest_name	guest_phn
1	Kush	7028
2	Kshati	7057
3	DBMS	1234
4	Tony	2024
4 rows in set (0.00 sec)
mysql> select * from guest;
guest_no	guest_name	guest_phn
1	Kush	7028
2	Kshati	7057
3	DBMS	1234
4	Steve	2024
4 rows in set (0.00 sec)
mysql>
Type here to search
25°C
ENG
20:58
01/10/2021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Problems Javadoc Declaration
LAB7 [Java Application] C:\Users\HP\.p2\pool\
Enter the Guest No. for which you
4
Enter the Guest Name to be updated
Steve
Record is updated
MENU:
1.INSERT
2.SELECT
3.UPDATE
4.DELETE
5.EXIT
Enter your choice:
4
Enter the Guest No.:
4
Record is deleted
MENU:
1.INSERT
2.SELECT
3.UPDATE
4.DELETE
5.EXIT
Enter your choice:
MySQL 8.0 Command Line Client
1	Kush	7028
2	Kshati	7057
3	DBMS	1234
4	Tony	2024
4 rows in set (0.00 sec)
mysql> select * from guest;
guest_no	guest_name	guest_phn
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2	Kshati	7057
3	DBMS	1234
4	Steve	2024
4 rows in set (0.00 sec)
mysql> select * from guest;
guest_no	guest_name	guest_phn
1	Kush	7028
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3 rows in set (0.00 sec)
mysql>
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