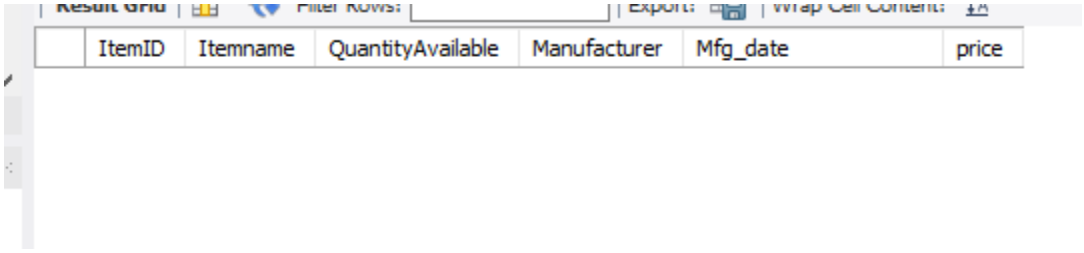
NAME: Jothilingam

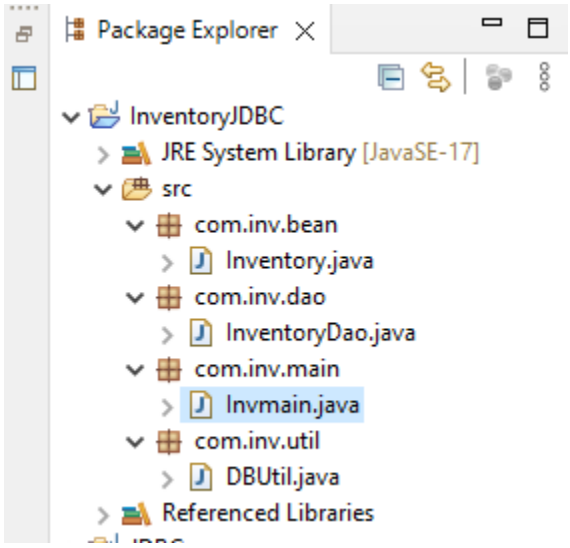
Task Name: Inventory Management System

Property	Type
itemID	int
Itemname	String
Quantity_Available	int
Manufacturer	String
Mfg_date	String
price	Float

Table Database:



Inventory JDBC:



source Code

1.Inventory.java:

```
package com.inv.bean;
public class Inventory {

	private int itemID;
	private String itemName;
	private int Quantity_Available;
	private String Manufacturer;
	private String Mfg_date;
	private Float Price;

	public Inventory() {
		// TODO Auto-generated constructor stub
	}

	public Inventory(int itemID, String itemName, int
quantity_Available, String manufacturer, String mfg_date,
			Float price) {
		super();
		this.itemID = itemID;
		this.itemName = itemName;
		Quantity_Available = quantity_Available;
		Manufacturer = manufacturer;
		Mfg_date = mfg_date;
		Price = price;
	}
	public int getItemID() {
		return itemID;
	}
	public void setItemID(int itemID) {
		this.itemID = itemID;
	}
	public String getItemName() {
		return itemName;
	}
	public void setItemName(String itemName) {
		this.itemName = itemName;
	}
```

```
	public int getQuantity_Available() {
		return Quantity_Available;
	}
	public void setQuantity_Available(int quantity_Available) {
		Quantity_Available = quantity_Available;
	}
	public String getManufacturer() {
		return Manufacturer;
	}
	public void setManufacturer(String manufacturer) {
		Manufacturer = manufacturer;
	}
	public String getMfg_date() {
		return Mfg_date;
	}
	public void setMfg_date(String mfg_date) {
		Mfg_date = mfg_date;
	}
	public Float getPrice() {
		return Price;
	}
	public void setPrice(Float price) {
		Price = price;
	}
}
```

2.InventoryDao.java:

```
package com.inv.dao;
import java.sql.Connection;
import java.sql.PreparedStatement;
import java.sql.ResultSet;
import com.inv.bean.Inventory;
import com.inv.util.DBUtil;
public class InventoryDao {
	public int insert(Inventory inv) {
		Connection con=DBUtil.getDBCOnnection();
		String sql="insert into  inventory_db.inventory
values(?,?,?,?,?,?)";
		int n=0;
```

```
                try {
                        PreparedStatement p=con.prepareStatement(sql);
                        p.setInt(1, inv.getItemID());
                        p.setString(2, inv.getItemName());
                        p.setInt(3, inv.getQuantity_Available());
                        p.setString(4, inv.getManufacturer());
                        p.setString(5, inv.getMfg_date());
                        p.setFloat(6, inv.getPrice());
                        n=p.executeUpdate();
                } catch (Exception e) {
                        System.out.println(e);
                }
                return n;
        }

        public int update(Inventory inv) {
                Connection con=DBUtil.getDBCOnnection();
                String sql="UPDATE `inventory_db`.`inventory` SET
`Itemname` =?, `QuantityAvailable` = ?, `Manufacturer` = ?,
`Mfg_date` = ?, `price` = ? WHERE (`ItemID` = ?);";
                int n=0;
                try {
                        PreparedStatement p=con.prepareStatement(sql);

                        p.setString(1, inv.getItemName());
                        p.setInt(2, inv.getQuantity_Available());
                        p.setString(3, inv.getManufacturer());
                        p.setString(4, inv.getMfg_date());
                        p.setFloat(5, inv.getPrice());
                        p.setInt(6, inv.getItemID());
                        n=p.executeUpdate();
                } catch (Exception e) {
                        System.out.println(e);
                }
                return n;
        }

        public int delete(int id) {
                int n=0;
      try {
```

```
        Connection con=DBUtil.getDBCOnnection();
        String sql="delete from inventory_db.inventory where
ItemID=?";
        PreparedStatement ps = con.prepareStatement(sql);
        ps.setInt(1, id);
        n=ps.executeUpdate();
      }
      catch (Exception e) {
                        System.out.println(e);
                }

                return n;
        }

        public int Find(int id1) {
                int n=0;
      try {
        Connection con=DBUtil.getDBCOnnection();
        String sql="Select * from inventory_db.inventory where
ItemID=?";
        PreparedStatement ps = con.prepareStatement(sql);
        ps.setInt(1, id1);
        ResultSet rs=ps.executeQuery();
                        while(rs.next()) {
                                System.out.print("Item ID:
"+rs.getInt(1)+"\nItem Name: "+rs.getString(2)+"\nAvailable Quantity:
"+rs.getInt(3)+"\nManufacturer: "+rs.getString(4)+"\nMfg_date:
"+rs.getString(5)+"\nPrice: "+rs.getFloat(6));

System.out.println("\n----------------------------------------------------------------
------------------------------");
                        }
      }
      catch (Exception e) {
                        System.out.println(e);
                }
                return n;
        }

         public int findAll() {
```

```
                int n=0;

                try {
                        Connection con=DBUtil.getDBCOnnection();
                        String sql="select * from
inventory_db.inventory";
                    PreparedStatement ps =
con.prepareStatement(sql);
                    ResultSet rs= ps.executeQuery();
                    while(rs.next()) {
                            System.out.print("Item ID:
"+rs.getInt(1)+"\nItem Name: "+rs.getString(2)+"\nAvailable Quantity:
"+rs.getInt(3)+"\nManufacturer: "+rs.getString(4)+"\nMfg_date:
"+rs.getString(5)+"\nPrice: "+rs.getFloat(6));

System.out.println("\n----------------------------------------------------------------
------------------------------");
                     }
                } catch (Exception e) {
                        System.out.println(e);
                }
                return n;
        }
}
```

3.invmain.jav:

```
package com.inv.dao;
import java.sql.Connection;
import java.sql.PreparedStatement;
import java.sql.ResultSet;
import com.inv.bean.Inventory;
import com.inv.util.DBUtil;
public class InventoryDao {
        public int insert(Inventory inv) {
                Connection con=DBUtil.getDBCOnnection();
                String sql="insert into  inventory_db.inventory
values(?,?,?,?,?,?)";
                int n=0;
                try {
```

```
                PreparedStatement p=con.prepareStatement(sql);
                p.setInt(1, inv.getItemID());
                p.setString(2, inv.getItemName());
                p.setInt(3, inv.getQuantity_Available());
                p.setString(4, inv.getManufacturer());
                p.setString(5, inv.getMfg_date());
                p.setFloat(6, inv.getPrice());
                n=p.executeUpdate();
            } catch (Exception e) {
                System.out.println(e);
            }
            return n;
        }

        public int update(Inventory inv) {
            Connection con=DBUtil.getDBCOnnection();
            String sql="UPDATE `inventory_db`.`inventory` SET
`Itemname` =?, `QuantityAvailable` = ?, `Manufacturer` = ?,
`Mfg_date` = ?, `price` = ? WHERE (`ItemID` = ?);";
            int n=0;
            try {
                PreparedStatement p=con.prepareStatement(sql);

                p.setString(1, inv.getItemName());
                p.setInt(2, inv.getQuantity_Available());
                p.setString(3, inv.getManufacturer());
                p.setString(4, inv.getMfg_date());
                p.setFloat(5, inv.getPrice());
                p.setInt(6, inv.getItemID());
                n=p.executeUpdate();
            } catch (Exception e) {
                System.out.println(e);
            }
            return n;
        }

        public int delete(int id) {
            int n=0;
      try {
        Connection con=DBUtil.getDBCOnnection();
```

```
        String sql="delete from inventory_db.inventory where
ItemID=?";
        PreparedStatement ps = con.prepareStatement(sql);
        ps.setInt(1, id);
        n=ps.executeUpdate();
      }
      catch (Exception e) {
                        System.out.println(e);
                }

                return n;
        }

        public int Find(int id1) {
                int n=0;
      try {
        Connection con=DBUtil.getDBCOnnection();
        String sql="Select * from inventory_db.inventory where
ItemID=?";
        PreparedStatement ps = con.prepareStatement(sql);
        ps.setInt(1, id1);
        ResultSet rs=ps.executeQuery();
                        while(rs.next()) {
                                System.out.print("Item ID:
"+rs.getInt(1)+"\nItem Name: "+rs.getString(2)+"\nAvailable Quantity:
"+rs.getInt(3)+"\nManufacturer: "+rs.getString(4)+"\nMfg_date:
"+rs.getString(5)+"\nPrice: "+rs.getFloat(6));

System.out.println("\n----------------------------------------------------------------
------------------------------");
                        }
      }
      catch (Exception e) {
                        System.out.println(e);
                }
                return n;
        }

         public int findAll() {
                 int n=0;
```

```
                try {
                        Connection con=DBUtil.getDBCOnnection();
                        String sql="select * from
inventory_db.inventory";
                    PreparedStatement ps =
con.prepareStatement(sql);
                    ResultSet rs= ps.executeQuery();
                    while(rs.next()) {
                            System.out.print("Item ID:
"+rs.getInt(1)+"\nItem Name: "+rs.getString(2)+"\nAvailable Quantity:
"+rs.getInt(3)+"\nManufacturer: "+rs.getString(4)+"\nMfg_date:
"+rs.getString(5)+"\nPrice: "+rs.getFloat(6));

System.out.println("\n----------------------------------------------------------------
------------------------------");
                     }
                } catch (Exception e) {
                        System.out.println(e);
                }
                return n;
        }
}
```

4.DBUtil.java:

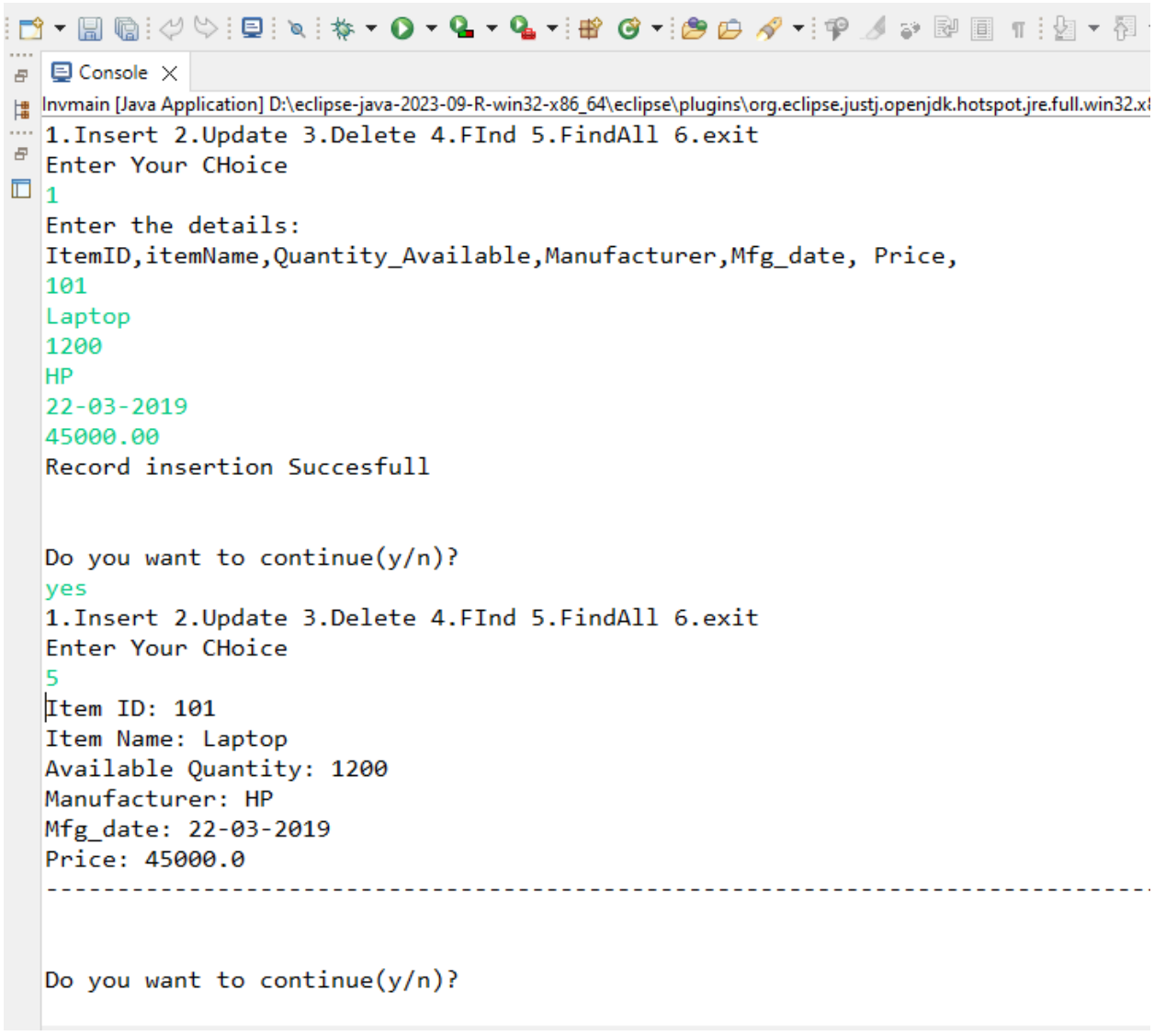
```
package com.inv.util;
import java.sql.Connection;
import java.sql.DriverManager;
public class DBUtil {
        public static Connection getDBCOnnection() {
                Connection con=null;
                final String URL
="jdbc:mysql://localhost:3306/inventory_db";
                final String User="root";
                final String Pass="root";
                try {

con=DriverManager.getConnection(URL,User,Pass);
                } catch (Exception e) {
```

```
                System.out.println(e);
            }
            return con;
        }
    }
```

Output Screen Shots:

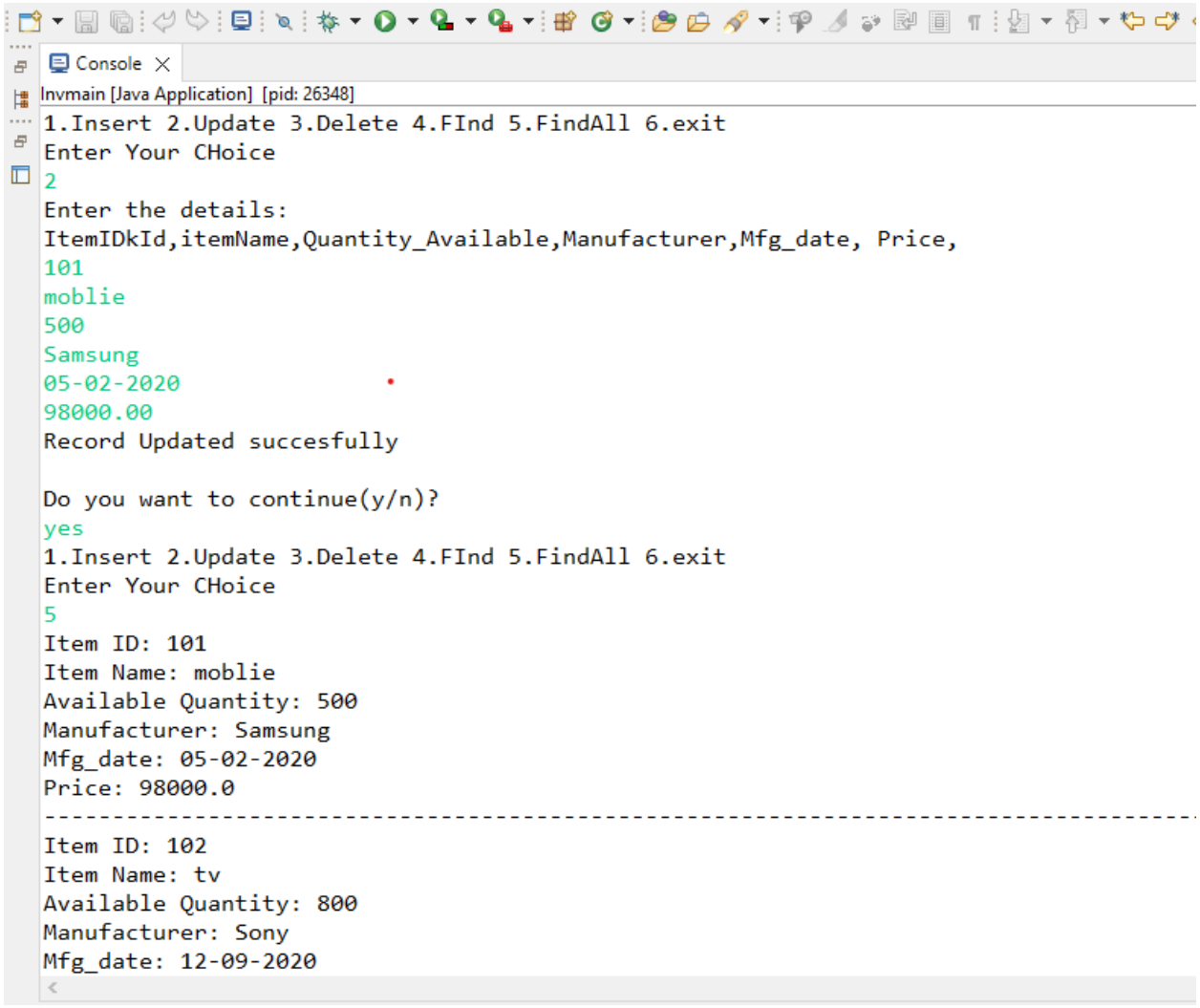
1.Insert Details:



	ItemID	Itemname	QuantityAvailable	Manufacturer	Mfg_date	price
▶	101	Laptop	1200	HP	22-03-2...	45000
	102	tv	800	Sony	12-09-2...	56000

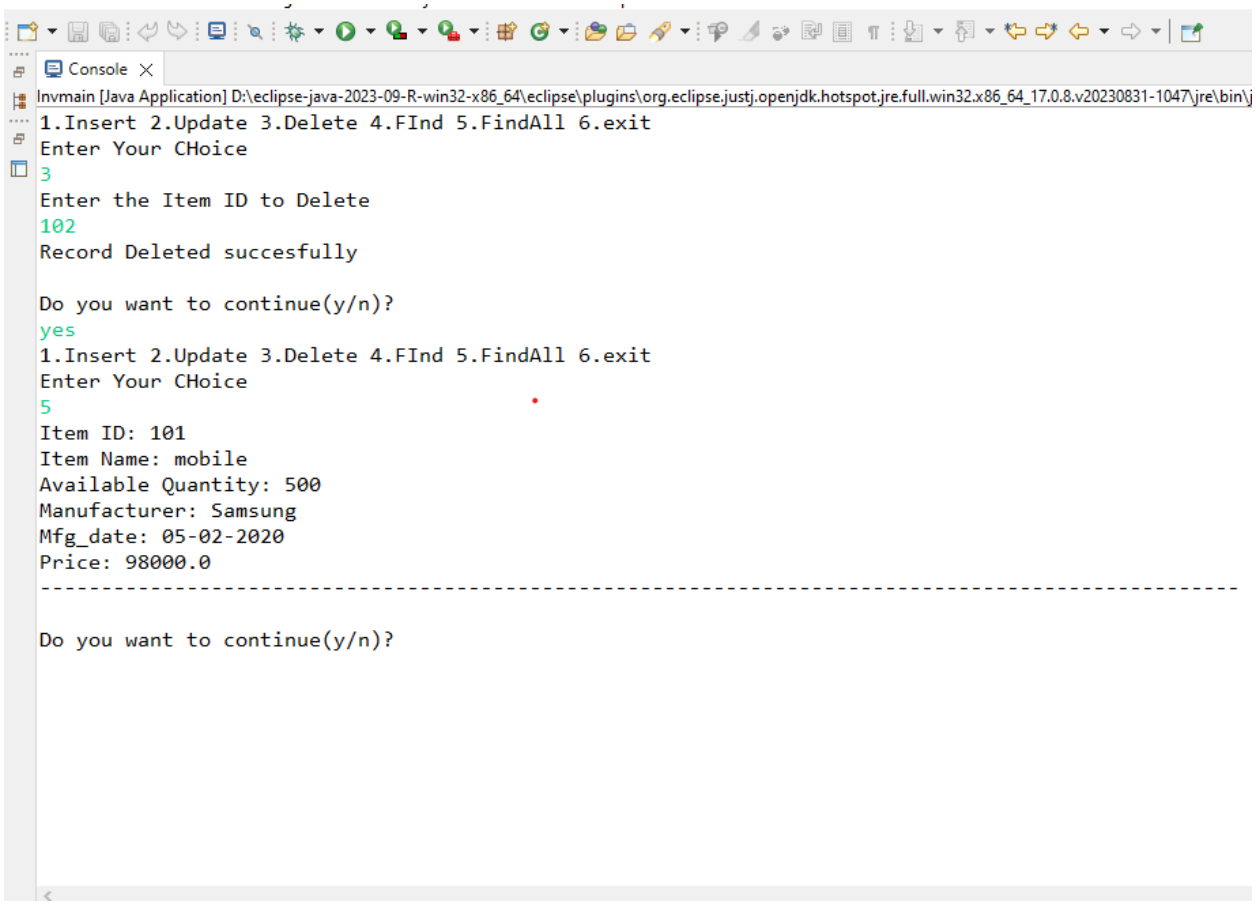
2.Update Details:

Update 101 ID details

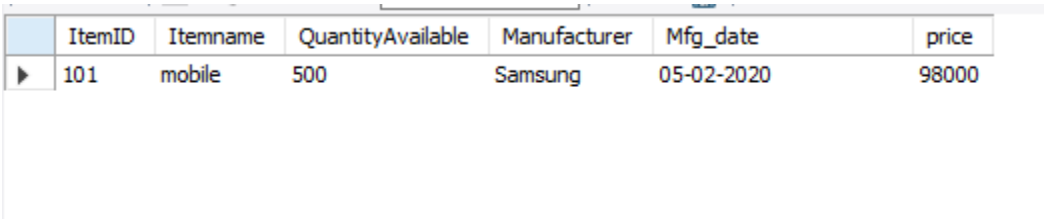


3.Delete Details:

Delete 102 ID details



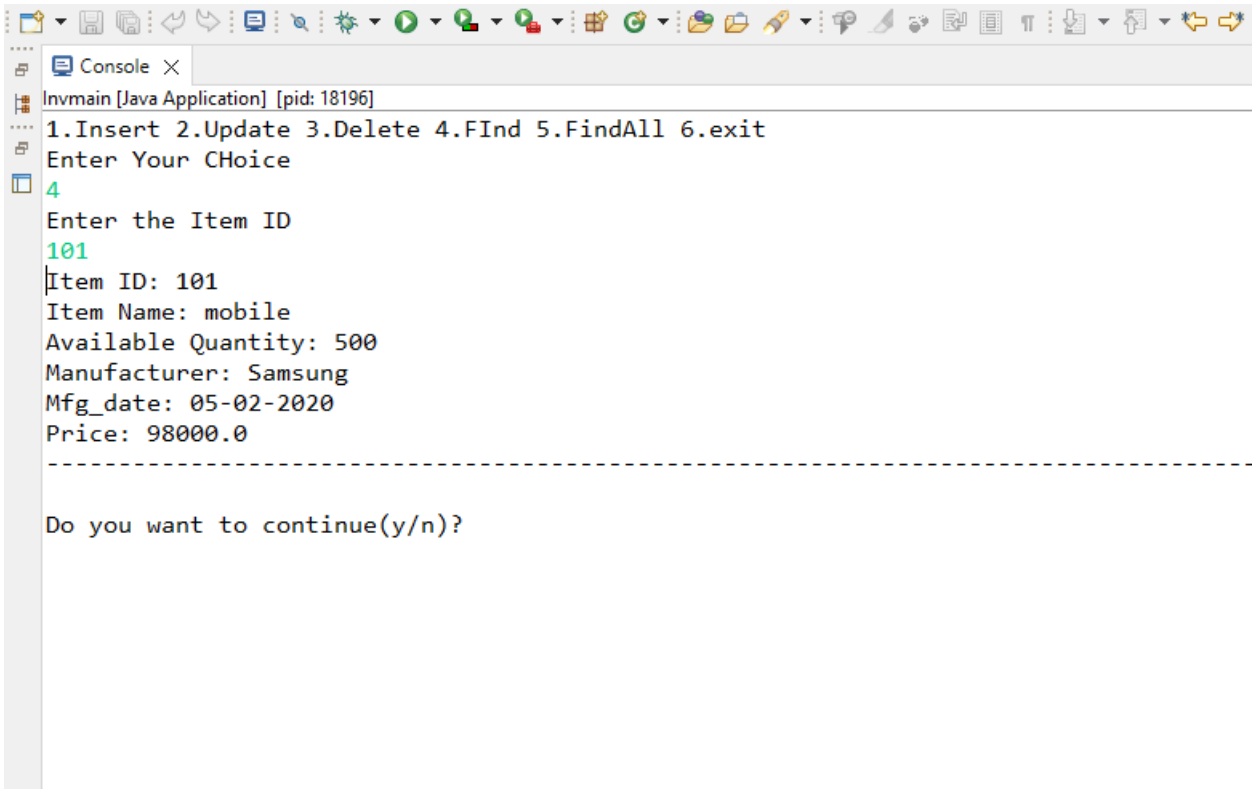
Deleted Form database:



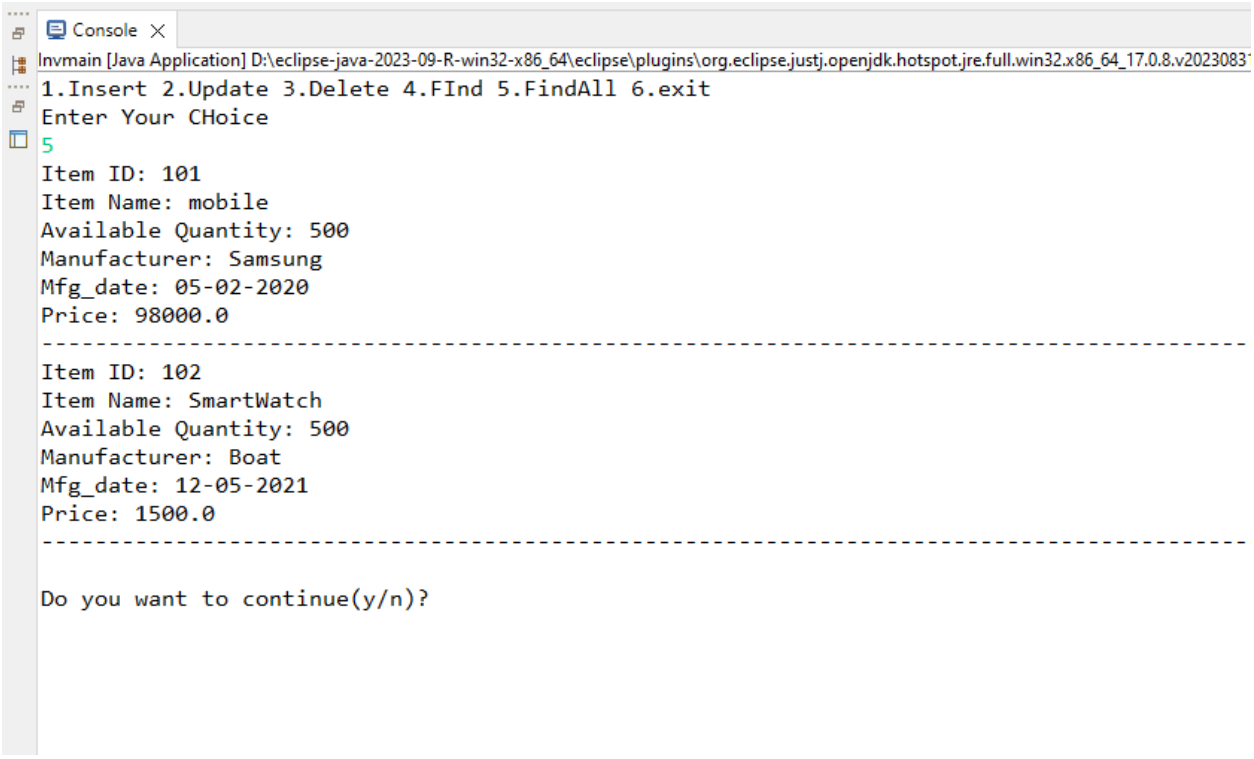
ItemID	Itemname	QuantityAvailable	Manufacturer	Mfg_date	price
101	mobile	500	Samsung	05-02-2020	98000

4.Find:

Find the 101 id details



5.FindAll:


Console
Invmain [Java Application] D:\eclipse-java-2023-09-R-win32-x86_64\eclipse\plugins\org.eclipse.justj.openjdk.hotspot.jre.full.win32.x86_64_17.0.8.v2023083
1.Insert 2.Update 3.Delete 4.FInd 5.FindAll 6.exit
Enter Your CHoice
5
Item ID: 101
Item Name: mobile
Available Quantity: 500
Manufacturer: Samsung
Mfg_date: 05-02-2020
Price: 98000.0
Item ID: 102
Item Name: SmartWatch
Available Quantity: 500
Manufacturer: Boat
Mfg_date: 12-05-2021
Price: 1500.0
Do you want to continue(y/n)?