Product details portal

Admin table:

```
CREATE TABLE 'tbladmin' (
'id' bigint(20) NOT NULL AUTO_INCREMENT,
'added_date' datetime NOT NULL,
'email' varchar(100) NOT NULL,
'password' varchar(100) NOT NULL,
'name' varchar(100) NOT NULL,
PRIMARY KEY ('id')
);
Cart table:
CREATE TABLE 'tblcart' (
'id' bigint(20) NOT NULL AUTO_INCREMENT,
'discount_price' varchar(200) DEFAULT NULL,
'quantity' int(11) NOT NULL,
'total_price' varchar(200) DEFAULT NULL,
`customer_id` bigint(20) NOT NULL,
'product_id' bigint(20) NOT NULL,
'mrp_price' varchar(200) DEFAULT NULL,
PRIMARY KEY ('id')
);
Customer table:
CREATE TABLE 'tblcustomer' (
'id' int(11) NOT NULL AUTO_INCREMENT,
'address' varchar(255) NOT NULL,
`added_date` timestamp NULL DEFAULT CURRENT_TIMESTAMP,
'email' varchar(100) NOT NULL,
'gender' varchar(6) NOT NULL,
'name' varchar(50) NOT NULL,
'password' varchar(60) NOT NULL,
'phone' varchar(200) NOT NULL,
'pin_code' varchar(255) NOT NULL,
PRIMARY KEY ('id')
);
```

Orders table:

);

```
CREATE TABLE 'tblorders' (
'id' int(11) NOT NULL AUTO_INCREMENT,
`order_no` int(11) DEFAULT NULL,
`customer_name` varchar(200) DEFAULT NULL,
'mobile_number' varchar(100) DEFAULT NULL,
'email_id' varchar(100) DEFAULT NULL,
'address' varchar(400) DEFAULT NULL,
'address_type' varchar(100) DEFAULT NULL,
'pincode' varchar(100) DEFAULT NULL,
'image' varchar(200) DEFAULT NULL,
'product_name' varchar(400) DEFAULT NULL,
'quantity' int(11) DEFAULT NULL,
'product_price' varchar(100) DEFAULT NULL,
'product_selling_price' varchar(100) DEFAULT NULL,
'product_total_price' varchar(100) DEFAULT NULL,
`order_status` varchar(100) DEFAULT NULL,
`order_date` timestamp NULL DEFAULT CURRENT_TIMESTAMP,
'payment_mode' varchar(100) DEFAULT NULL,
'payment_id' int(11) DEFAULT NULL,
PRIMARY KEY ('id')
);
Products table:
CREATE TABLE 'tblproduct' (
'id' bigint(20) NOT NULL AUTO_INCREMENT,
'active' varchar(100) DEFAULT NULL,
'code' varchar(5) DEFAULT NULL,
`create_date` timestamp NOT NULL DEFAULT CURRENT_TIMESTAMP,
'description' varchar(255) DEFAULT NULL,
'image' varchar(100) DEFAULT NULL,
'image_name' varchar(400) DEFAULT NULL,
'name' varchar(30) DEFAULT NULL,
'price' varchar(200) DEFAULT NULL,
'mrp_price' varchar(200) DEFAULT NULL,
'product_category' varchar(100) DEFAULT NULL,
PRIMARY KEY ('id')
```

Connection to database:

```
package com.connection;
import java.sql.Connection;
import java.sql.DriverManager;
import java.sql.ResultSet;
import java.sql.SQLException;
public class DatabaseConnection {
//Creating database Connection in java online shopping system
public static Connection connection;
//Creating universal method to open connect will mysql database
public static Connection getConnection() {
try {
//Registering with mysql Driver
Class.forName("com.mysql.jdbc.Driver");
connection = DriverManager.getConnection("jdbc:mysql://localhost:3306/shoppingsystem", "root",
"yourpassword");
} catch (Exception e) {
e.printStackTrace();
}
return (connection);
//Creating universal method to close connect will mysql database
public static void CloseConnection() {
if (connection != null) {
try {
connection.close();
connection = null;
} catch (SQLException ex) {
ex.printStackTrace();
}
}
}
//Creating universal method to query for retrieving information
public static ResultSet getResultFromSqlQuery(String SqlQueryString) {
//Creating Resultset object
ResultSet rs = null;
try {
//Checking whether the connection is null or null
if (connection == null) {
getConnection();
}
```

```
//Querying the query
rs = connection.createStatement().executeQuery(SqlQueryString);
} catch (Exception ex) {
ex.printStackTrace();
}
return rs;
}
//Creating universal method to query for inserting or updating information in mysql database
public static int insertUpdateFromSqlQuery(String SqlQueryString) {
int i = 2;
try {
//Checking whether the connection is null or null
if (connection == null) {
getConnection();
}
//Querying the query
i = connection.createStatement().executeUpdate(SqlQueryString);
} catch (Exception ex) {
ex.printStackTrace();
}
return i;
}
```

Defining new customer registering servlet

```
import java.io.IOException;
import javax.servlet.ServletException;
import javax.servlet.annotation.WebServlet;
import javax.servlet.http.HttpServletRequest;
import javax.servlet.http.HttpServletResponse;
import javax.servlet.http.HttpServletResponse;
import javax.servlet.http.HttpSersion;
import com.connection.DatabaseConnection;
@WebServlet("/AddCustomer")
public class AddCustomer extends HttpServlet {
  protected void doPost(HttpServletRequest request, HttpServletResponse response)
  throws ServletException, IOException {
    //Retrieving values from the frontend
```

```
String name = request.getParameter("name");
String email = request.getParameter("email");
String password = request.getParameter("password");
String mobile = request.getParameter("mobile");
String gender = request.getParameter("gender");
String address = request.getParameter("address");
String pincode = request.getParameter("pincode");
//Creating Session
HttpSession hs = request.getSession();
//Inserting all values inside the database
try {
//Connecting database connection and querying in the database
int addCustomer = DatabaseConnection.insertUpdateFromSqlQuery("insert into
tblcustomer(address,email,gender,name,password,phone,pin_code)values("" + address + "','" + email +
"','" + gender + "','" + name + "','" + password + "','"
+ mobile + "','" + pincode + "')");
//If customer registered successfully in java online shopping system
if (addCustomer > 0) {
String message = "Customer register successfully.";
//Passing message via session.
hs.setAttribute("success-message", message);
//Sending response back to the user/customer
response.sendRedirect("customer-register.jsp");
} else {
//If customer fails to register
String message = "Customer registration fail";
//Passing message via session.
hs.setAttribute("fail-message", message);
//Sending response back to the user/customer
response.sendRedirect("customer-register.jsp");
}
} catch (Exception ex) {
ex.printStackTrace();
}
}
```

Defining customer login servlet:

```
import java.io.IOException;
import java.sql.ResultSet;
```

```
import javax.servlet.ServletException;
import javax.servlet.annotation.WebServlet;
import javax.servlet.http.HttpServlet;
import javax.servlet.http.HttpServletRequest;
import javax.servlet.http.HttpServletResponse;
import javax.servlet.http.HttpSession;
import com.connection.DatabaseConnection;
@WebServlet("/CustomerLogin")
public class CustomerLogin extends HttpServlet {
protected void doPost(HttpServletRequest request, HttpServletResponse response)
throws ServletException, IOException {
//Getting all data from user/customer
String email = request.getParameter("email");
String password = request.getParameter("password");
//Creating Session
HttpSession hs = request.getSession();
try {
//Creating Resultset
ResultSet resultset = null;
//Query to check Login Details
resultset = DatabaseConnection.getResultFromSqlQuery("select * from tblcustomer where email='" +
email + "' and password='" + password + "'");
//Checking whether the details of user are null or not
if (email != null && password != null) {
if (resultset.next()) {
//Storing the login details in session
hs.setAttribute("id", resultset.getInt("id"));
hs.setAttribute("name", resultset.getString("name"));
//Redirecting response to the index.jsp
response.sendRedirect("index.jsp");
} else {
//If wrong credentials are entered in java online shopping system
String message = "You have enter wrong credentials";
hs.setAttribute("credential", message);
//Redirecting response to the customer-login.jsp
response.sendRedirect("customer-login.jsp");
}
} else {
//If username or password is empty or null
String message = "User name or Password is null";
hs.setAttribute("credential", message);
//Redirecting response to the customer-login.jsp
response.sendRedirect("customer-login.jsp");
```

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

Defining admin login servlet:

```
import java.io.IOException;
import java.sql.Connection;
import java.sql.ResultSet;
import java.sql.Statement;
import javax.servlet.ServletException;
import javax.servlet.annotation.WebServlet;
import javax.servlet.http.HttpServlet;
import javax.servlet.http.HttpServletRequest;
import javax.servlet.http.HttpServletResponse;
import javax.servlet.http.HttpSession;
import com.connection.DatabaseConnection;
@WebServlet("/AdminLogin")
public class AdminLogin extends HttpServlet {
protected void doPost(HttpServletRequest request, HttpServletResponse response)
throws ServletException, IOException {
//Getting all the parameters from the frontend (admin)
String email = request.getParameter("email");
String pass = request.getParameter("upass");
//Retriving our session
HttpSession hs = request.getSession();
//Calling Connection method
Connection con = DatabaseConnection.getConnection();
//Creating Statement
Statement st = con.createStatement();
//Querying inside the database
ResultSet resultset = st.executeQuery("select * from tbladmin where email='" + email + "' AND
password="" + pass + """);
//If all the details are correct
if (resultset.next()) {
hs.setAttribute("uname", resultset.getString("name"));
//Redirecting admin to dashboard page
response.sendRedirect("dashboard.jsp");
```

```
} else {
//If details are wrong
String message = "You have enter wrong credentials";
hs.setAttribute("credential", message);
//Redirecting admin to admin login page
response.sendRedirect("admin-login.jsp");
}
} catch (Exception e) {
System.out.println(e);
}
}
```

Defining servlet for adding product in the database:

```
import java.io.File;
import java.io.IOException;
import java.util.List;
import java.util.Random;
import javax.servlet.ServletException;
import javax.servlet.annotation.WebServlet;
import javax.servlet.http.HttpServlet;
import javax.servlet.http.HttpServletRequest;
import javax.servlet.http.HttpServletResponse;
import javax.servlet.http.HttpSession;
import org.apache.commons.fileupload.FileItem;
import org.apache.commons.fileupload.disk.DiskFileItemFactory;
import org.apache.commons.fileupload.servlet.ServletFileUpload;
import com.connection.DatabaseConnection;
@WebServlet("/AddProducts")
public class AddProducts extends HttpServlet {
//Path where all the images are stored
private final String UPLOAD_DIRECTORY = "ENTER_YOUR_DIRECTORY_PATH";
@Override
protected void doPost(HttpServletRequest request, HttpServletResponse response)
throws ServletException, IOException {
//Creating session in java online shopping project
HttpSession session = request.getSession();
if (ServletFileUpload.isMultipartContent(request)) {
try {
//Taking all image requests
List<FileItem> multiparts = new ServletFileUpload(new DiskFileItemFactory()).parseRequest(request);
```

```
String imageName = null;
String productName = null;
String productQuantity = null;
String productPrice = null;
String descrip = null;
String mrpPrice = null;
String status = null;
String category = null;
//SALTCHARS to generate unique code for product
String SALTCHARS = "ABCDEFGHIJKLMNOPQRSTUVWXYZ1234567890";
StringBuilder salt = new StringBuilder();
Random rnd = new Random();
while (salt.length() < 3) { // length of the random string.
int index = (int) (rnd.nextFloat() * SALTCHARS.length());
salt.append(SALTCHARS.charAt(index));
}
String code = salt.toString();
for (FileItem item : multiparts) {
if (!item.isFormField()) {
//Getting image name
imageName = new File(item.getName()).getName();
//Storing in the specified directory
item.write(new File(UPLOAD_DIRECTORY + File.separator + imageName));
//Retrieving all information from frontend of online shopping system
FileItem pName = (FileItem) multiparts.get(0);
productName = pName.getString();
FileItem price = (FileItem) multiparts.get(1);
productPrice = price.getString();
FileItem description = (FileItem) multiparts.get(2);
descrip = description.getString();
FileItem mprice = (FileItem) multiparts.get(3);
mrpPrice = mprice.getString();
FileItem fstatus = (FileItem) multiparts.get(4);
status = fstatus.getString();
FileItem pcategory = (FileItem) multiparts.get(5);
category = pcategory.getString();
}
}
try {
int id = 0;
String imagePath = UPLOAD_DIRECTORY + imageName;
//Querying to insert product in the table
```

```
int i = DatabaseConnection.insertUpdateFromSqlQuery("insert into
tblproduct(id,active,code,description,image,image_name,name,price,mrp_price,product_category)
values("" + id + "',"" + status + "',"" + code + "',"" + descrip + "',"" + imagePath + "',"" + imageName + "',"" +
productName + "','" + productPrice + "','" + mrpPrice + "','" + category + "')");
//If product inserted successfully in the database
if (i > 0) {
String success = "Product added successfully.";
//Adding method in session.
session.setAttribute("message", success);
//Response send to the admin-add-product.jsp
response.sendRedirect("admin-add-product.jsp");
}
} catch (Exception e) {
e.printStackTrace();
}
} catch (Exception ex) {
//If any error occurred while uploading product image
request.setAttribute("message", "File Upload Failed due to " + ex);
}
} else {
request.setAttribute("message", "Sorry this Servlet only handles file upload request");
}
}
}
```

Defining add to cart servlet:

```
import java.io.IOException;
import javax.servlet.ServletException;
import javax.servlet.annotation.WebServlet;
import javax.servlet.http.HttpServlet;
import javax.servlet.http.HttpServletRequest;
import javax.servlet.http.HttpServletResponse;
import javax.servlet.http.HttpSersion;
import com.connection.DatabaseConnection;
@WebServlet("/AddToCart")
public class AddToCart extends HttpServlet {
@Override
protected void doPost(HttpServletRequest request, HttpServletResponse response)
throws ServletException, IOException {
int id = 0;
//Getting all the parameters from the user
```

```
int productId = Integer.parseInt(request.getParameter("productId"));
String price = request.getParameter("price");
String mrp_price = request.getParameter("mrp_price");
HttpSession hs = request.getSession();
try {
//If user session is null user have to re-login
if ((String) hs.getAttribute("name") == null) {
response.sendRedirect("customer-login.jsp");
//Inserting cart details to the database
} else {
int customerId = (int) hs.getAttribute("id");
//Querying to the database.
int addToCart = DatabaseConnection.insertUpdateFromSqlQuery("insert into tblcart values("" + id + "',"" +
price + "',1,"" + price + "',"" + customerId + "',"" + productId + "',"" + mrp_price + "')");
if (addToCart > 0) {
response.sendRedirect("index.jsp");
}
} catch (Exception e) {
e.printStackTrace();
}
}
}
```

Defining servlet for admin to get current products status:

```
import com.connection.DatabaseConnection;
import java.io.IOException;
import java.sql.ResultSet;
import javax.servlet.ServletException;
import javax.servlet.annotation.WebServlet;
import javax.servlet.http.HttpServlet;
import javax.servlet.http.HttpServletRequest;
import javax.servlet.http.HttpServletResponse;
@WebServlet("/CustomerProductsOrderStatus")
public class CustomerProductsOrderStatus extends HttpServlet {
protected void doGet(HttpServletRequest request, HttpServletResponse response) throws
ServletException, IOException {
try {
int statusMode = 0;
//Taking input from admin order-id to get the order status from the database of online shopping system
in Java
```

```
ResultSet\ rs = DatabaseConnection.getResultFromSqlQuery("select\ order\_status\ from\ tblorders\ where
order_no='" + request.getParameter("orderId") + "'");
while (rs.next()) {
if (rs.getString(1).equals("Deliver")) {
status Mode = Database Connection. insert Update From Sql Query ("update tblorders set a status Mode") and the status Mode is a status Mode of the status Mode of t
order_status='Pending' where order_no='" + request.getParameter("orderId") + "'");
} else {
statusMode = DatabaseConnection.insertUpdateFromSqlQuery("update tblorders set
order_status='Deliver' where order_no="" + request.getParameter("orderId") + """);
}
}
if (statusMode > 0) {
//Sending response back to admin-all-orders.jsp page when sql query executed successfully
response.sendRedirect("admin-all-orders.jsp");
} else {
//Sending response back to admin-all-orders.jsp page
response.sendRedirect("admin-all-orders.jsp");
}
} catch (Exception e) {
e.printStackTrace();
}
}
}
```

Output:







