**Phase 2: Become a Back End Expert - Project FlyAway**

**Developer Details:**

Name: Dhawal Yerekar

Email: dhawalyerekar10[@gmail.com](mailto:manishmachha@hotmail.com)

Date created: 01-09-2022

Program Name: FlyAway

**Program Background :**

FlyAway is a ticket-booking portal that lets people book flights on their website.

**Program Features:**

● A search form in the homepage to allow entry of travel details, like the date of travel, source, destination, and the number of persons.

● Based on the travel details entered, it will show the available flights with their ticket prices.

● Once a person selects a flight to book, they will be taken to a register page where they must fill in their personal details. In the next page, they are shown the flight details of the flight that they are booking, and the payment is done via a dummy payment gateway. On completion of the payment, they are shown a confirmation page with the details of the booking.

For the above features to work, there will be an admin backend with the following features:

● An admin login page where the admin can change the password after login, if he wishes

● A master list of places for source and destination

● A master list of airlines

● A list of flights where each flight has a source, destination, airline, and ticket price

**Tools used for development:**

1. Eclipse IDE
2. MySQL Relation Database Management System
3. Apache Tom-Cat 10 server
4. Java Servlets
5. Java Server Pages (JSP)
6. HTML
7. Apache Maven
8. JDBC Java Database Connectivity

**DATABASES:**

1.Airlines



2.Flights



3.Places



4.Login

User Name: Dhawalyerekar

Password: Dhawal@123

**Source Code:**

**1.Homepage**

<%@pagelanguage=*"java"*contentType=*"text/html; charset=ISO-8859-1"*

pageEncoding=*"ISO-8859-1"*%>

<!DOCTYPEhtml>

<html>

<head>

<metacharset=*"ISO-8859-1"*>

<title>FlyAway</title>

</head>

<body>

<h1>FlyAway</h1>

<formaction=*"search.jsp"*method=*"post"*>

Travel Date <inputtype=*"date"*id=*"traveldate"*name=*"traveldate"*

placeholder=*"dd/mm/yyyy"*></br></br><labelfor=*"source"*>Source</label>

<inputlist=*"source"*id=*"date"*name=*"source"*/>

<datalistid=*"source"*>

<optionvalue=*"Hyderabad"*>

<optionvalue=*"Delhi"*>

<optionvalue=*"Kolkata"*>

<optionvalue=*"Mumbai"*>

<optionvalue=*"Bangalore"*>

</datalist>

</br></br><labelfor=*"destination"*>Destination </label><input

list=*"destination"*id=*"date"*name=*"destination"*/>

<datalistid=*"destination"*>

<optionvalue=*"Hyderabad"*>

<optionvalue=*"Delhi"*>

<optionvalue=*"Kolkata"*>

<optionvalue=*"Mumbai"*>

<optionvalue=*"Bangalore"*>

</datalist>

</br></br> No of Persons <inputtype=*"number"*name=*"no of persons"*></br>

</br><inputtype=*"submit"*value=*"show available flights"*></br>

</br>

</form>

<formaction=*"login.jsp"*method=*"post"*>

<inputtype=*"submit"*value=*"Admin Login"*>

</form>

</body>

</html>

**2.Login page**

<%@pagelanguage=*"java"*contentType=*"text/html; charset=ISO-8859-1"*

pageEncoding=*"ISO-8859-1"*%>

<!DOCTYPEhtml>

<html>

<head>

<metacharset=*"ISO-8859-1"*>

<title>LOGIN</title>

</head>

<body>

<formaction=*"validate.jsp"*method=*"post"*>

<h1>Admin Login</h1>

USERNAME <inputtype=*"text"*name=*"username"*></br>

</br> PASSWORD <inputtype=*"password"*name=*"password"*></br>

</br><inputtype=*"submit"*value=*"login"*>

</form>

</body>

</html>

**3.LoginValidation**

<%@pagelanguage=*"java"*contentType=*"text/html; charset=ISO-8859-1"*

pageEncoding=*"ISO-8859-1"*%>

<%@pageimport=*"java.sql.\*"*%>

<%

**try** {

String username = request.getParameter("username");

String password = request.getParameter("password");

Class.forName("com.mysql.jdbc.Driver");

String url = "jdbc:mysql://localhost:3306/flyaway";

String user = "root";

String pass = "root";

Connection con = DriverManager.getConnection(url,user,pass);

PreparedStatementst = con

.prepareStatement("select username,password from login where username=? and password=?");

st.setString(1, username);

st.setString(2, password);

ResultSetrs = st.executeQuery();

**if** (rs.next()) {

response.sendRedirect("adminhome.jsp");

} **else** {

out.println("<h1><p style=color:red>Invalid credentials!</P></h1>");

}

} **catch** (Exception e) {

out.println(e);

}

%>

**4.Admin Homepage**

<%@pagelanguage=*"java"*contentType=*"text/html; charset=ISO-8859-1"*

pageEncoding=*"ISO-8859-1"*%>

<!DOCTYPEhtml>

<html>

<head>

<metacharset=*"ISO-8859-1"*>

<title>Insert title here</title>

</head>

<body>

<formaction=*"placeslist.jsp"*method=*"post"*>

<h2>

<inputtype=*"submit"*value=*"Places List"*>

</h2>

</form>

<formaction=*"airlineslist.jsp"*method=*"post"*>

<h2>

<inputtype=*"submit"*value=*"Airlines List"*>

</h2>

</form>

<formaction=*"flightslist.jsp"*method=*"post"*>

<h2>

<inputtype=*"submit"*value=*"Flights List"*>

</h2>

</form>

<formaction=*"passdata.jsp"*method=*"post"*>

<h2>

<inputtype=*"submit"*value=*"Change Password"*>

</h2>

</form>

</body>

</html>

**5.Admin get all Airlines list**

<%@pagelanguage=*"java"*contentType=*"text/html; charset=ISO-8859-1"*

pageEncoding=*"ISO-8859-1"*%>

<%@pageimport=*"java.sql.\*"*%>

<%

Class.forName("com.mysql.jdbc.Driver");

String url = "jdbc:mysql://localhost:3306/flyaway";

String user = "root";

String pass = "root";

String sql = "select \* from airlines order by name";

Connection con = DriverManager.getConnection(url, user, pass);

Statement st = con.createStatement();

ResultSetrs = st.executeQuery(sql);

%>

<tableborder=*"1"*>

<tr>

<th>code</th>

<th>name</th>

</tr>

<%

**while** (rs.next()) {

%>

<tr>

<td>

<%=

rs.getString(1)

%>

</td>

<td>

<%=

rs.getString(2)

%>

</td>

</tr>

<%

}

%>

</table>

**6.Admin get all Places list**

<%@pagelanguage=*"java"*contentType=*"text/html; charset=ISO-8859-1"*

pageEncoding=*"ISO-8859-1"*%>

<%@pageimport=*"java.sql.\*"*%>

<%

Class.forName("com.mysql.jdbc.Driver");

String url = "jdbc:mysql://localhost:3306/flyaway";

String user = "root";

String pass = "root";

String sql = "select \* from places order by name";

Connection con = DriverManager.getConnection(url, user, pass);

Statement st = con.createStatement();

ResultSetrs = st.executeQuery(sql);

%>

<tableborder=*"1"*>

<tr>

<th>code</th>

<th>name</th>

</tr>

<%

**while** (rs.next()) {

%>

<tr>

<td>

<%=

rs.getString(1)

%>

</td>

<td>

<%=

rs.getString(2)

%>

</td>

</tr>

<%

}

%>

</table>

**7.Admin get all Flights list**

<%@pagelanguage=*"java"*contentType=*"text/html; charset=ISO-8859-1"*

pageEncoding=*"ISO-8859-1"*%>

<%@pageimport=*"java.sql.\*"*%>

<%

Class.forName("com.mysql.jdbc.Driver");

String url = "jdbc:mysql://localhost:3306/flyaway";

String user = "root";

String pass = "2022";

String sql = "select \* from flights order by name";

Connection con = DriverManager.getConnection(url, user, pass);

Statement st = con.createStatement();

ResultSetrs = st.executeQuery(sql);

%>

<tableborder=*"1"*>

<tr>

<th>name</th>

<th>airline</th>

<th>way</th>

<th>price</th>

</tr>

<%

**while** (rs.next()) {

%>

<tr>

<td>

<%=

rs.getString(1)

%>

</td>

<td>

<%=

rs.getString(2)

%>

</td>

<td>

<%=

rs.getString(3)

%>

</td>

<td>

<%=

rs.getString(4)

%>

</td>

</tr>

<%

}

%>

</table>

**8.Admin change password**

<%@pagelanguage=*"java"*contentType=*"text/html; charset=ISO-8859-1"*

pageEncoding=*"ISO-8859-1"*%>

<%@pageimport=*"java.sql.\*"*%>

<%

String PASS = request.getParameter("new password");

String oldpass = request.getParameter("existing password");

String OLDPASS = "";

String confirmPassword = request.getParameter("confirm password");

Class.forName("com.mysql.jdbc.Driver");

String url = "jdbc:mysql://localhost:3306/flyaway";

String user = "root";

String pass = "root";

String sql1 = "select password from login where password='" + oldpass + "'";

String sql2 = "update login set password=" + confirmPassword + " where username='Dhawalyerekar'";

Connection con = DriverManager.getConnection(url, user, pass);

Statement st = con.createStatement();

ResultSetrs = st.executeQuery(sql1);

**if** (rs.next()) {

OLDPASS = rs.getString("password");

}

**if** (PASS.equals(confirmPassword)) {

**if** (oldpass.equals(OLDPASS)) {

st = con.createStatement();

**int** i = st.executeUpdate(sql2);

out.println("password updated");

RequestDispatcherrd = request.getRequestDispatcher("/passdata.jsp");

rd.include(request, response);

} **else** {

out.println("old password doesn't match");

RequestDispatcherrd = request.getRequestDispatcher("/passdata.jsp");

rd.include(request, response);

}

} **else** {

out.println("passwords dont match");

RequestDispatcherrd = request.getRequestDispatcher("/passdata.jsp");

rd.include(request, response);

}

%>

**9.Admin change password page**

<%@pagelanguage=*"java"*contentType=*"text/html; charset=ISO-8859-1"*

pageEncoding=*"ISO-8859-1"*%>

<!DOCTYPEhtml>

<html>

<head>

<metacharset=*"ISO-8859-1"*>

<title>Insert title here</title>

</head>

<body>

<formaction=*"changepassword.jsp"*method=*"post"*>

Enter existing password <inputtype=*"password"*name=*"existing password"*></br></br>

Enter new password <inputtype=*"password"*name=*"new password"*></br></br>

Confirm password <inputtype=*"password"*name=*"confirm password"*></br></br>

<inputtype=*"submit"*value=*"change"*>

</form>

</body>

</html>

**10.Payment Logic for Passenger Count**

<%@pagelanguage=*"java"*contentType=*"text/html; charset=ISO-8859-1"*

pageEncoding=*"ISO-8859-1"*%>

<%

**int** count=Integer.parseInt(request.getParameter("no of persons"));

out.println("<h1>"+"Payment of amount " + 5000\*count + "/- is successful" +"</h1>");

RequestDispatcherrd = request.getRequestDispatcher("/showdetails.jsp");

rd.include(request, response);

%>

**11.Search Flights**

<%@pagelanguage=*"java"*contentType=*"text/html; charset=ISO-8859-1"*

pageEncoding=*"ISO-8859-1"*%>

<%@pageimport=*"java.sql.\*"*%>

<%

String SOURCE = request.getParameter("source");

String DESTINATION = request.getParameter("destination");

Class.forName("com.mysql.jdbc.Driver");

String url = "jdbc:mysql://localhost:3306/flyaway";

String user = "root";

String pass = "root";

String sql = "select \* from flights where source='" + SOURCE + "'and destination='" + DESTINATION + "'";

Connection con = DriverManager.getConnection(url, user, pass);

Statement st = con.createStatement();

ResultSetrs = st.executeQuery(sql);

%>

<tableborder=*"1"*>

<tr>

<th>name</th>

<th>airline</th>

<th>way</th>

<th>price</th>

<th>source</th>

<th>destination</th>

</tr>

<%

**while** (rs.next()) {

%>

<tr>

<td><%=rs.getString(1)%></td>

<td><%=rs.getString(2)%></td>

<td><%=rs.getString(3)%></td>

<td><%=rs.getString(4)%></td>

<td><%=rs.getString(5)%></td>

<td><%=rs.getString(6)%></td>

</tr>

<%

}

%>

</table>

</br>

<formaction=*"customerdetails.jsp"*method=*"post"*>

No of Persons <inputtype=*"number"*name=*"no of persons"*></br>

</br><inputtype=*"submit"*value=*"Book Ticket"*>

</form>

**12.Payment Page**

<%@pagelanguage=*"java"*contentType=*"text/html; charset=ISO-8859-1"*

pageEncoding=*"ISO-8859-1"*%>

<%@pageimport=*"java.sql.\*"*%>

<%

String SOURCE = request.getParameter("source");

String DESTINATION = request.getParameter("destination");

String time = "10:45 PM";

Class.forName("com.mysql.jdbc.Driver");

String url = "jdbc:mysql://localhost:3306/flyaway";

String user = "root";

String pass = "root";

String sql = "select \* from flights where source='" + SOURCE + "'and destination='" + DESTINATION + "'";

Connection con = DriverManager.getConnection(url, user, pass);

Statement st = con.createStatement();

ResultSetrs = st.executeQuery(sql);

%>

<h1>Your Flight Details :</h1>

<tableborder=*"1"*>

<tr>

<th>Flight name</th>

<th>airline</th>

<th>way</th>

<th>price</th>

<th>source</th>

<th>destination</th>

<th>Time</th>

</tr>

<%

**while** (rs.next()) {

%>

<tr>

<td><%=rs.getString(1)%></td>

<td><%=rs.getString(2)%></td>

<td><%=rs.getString(3)%></td>

<td><%=rs.getString(4) + "/-"%></td>

<td><%=rs.getString(5)%></td>

<td><%=rs.getString(6)%></td>

<td><%=time%></td>

</tr>

<%

}

%>

</table>

</br>

<formaction=*"payment.jsp"*method=*"post"*>

No of Persons <inputtype=*"number"*name=*"no of persons"*></br></br>

<h1>Payment Details :</h1>

Debit card Number : <inputtype=*"number"*></br>

</br>Expiry Date : <inputtype=*"text"*></br>

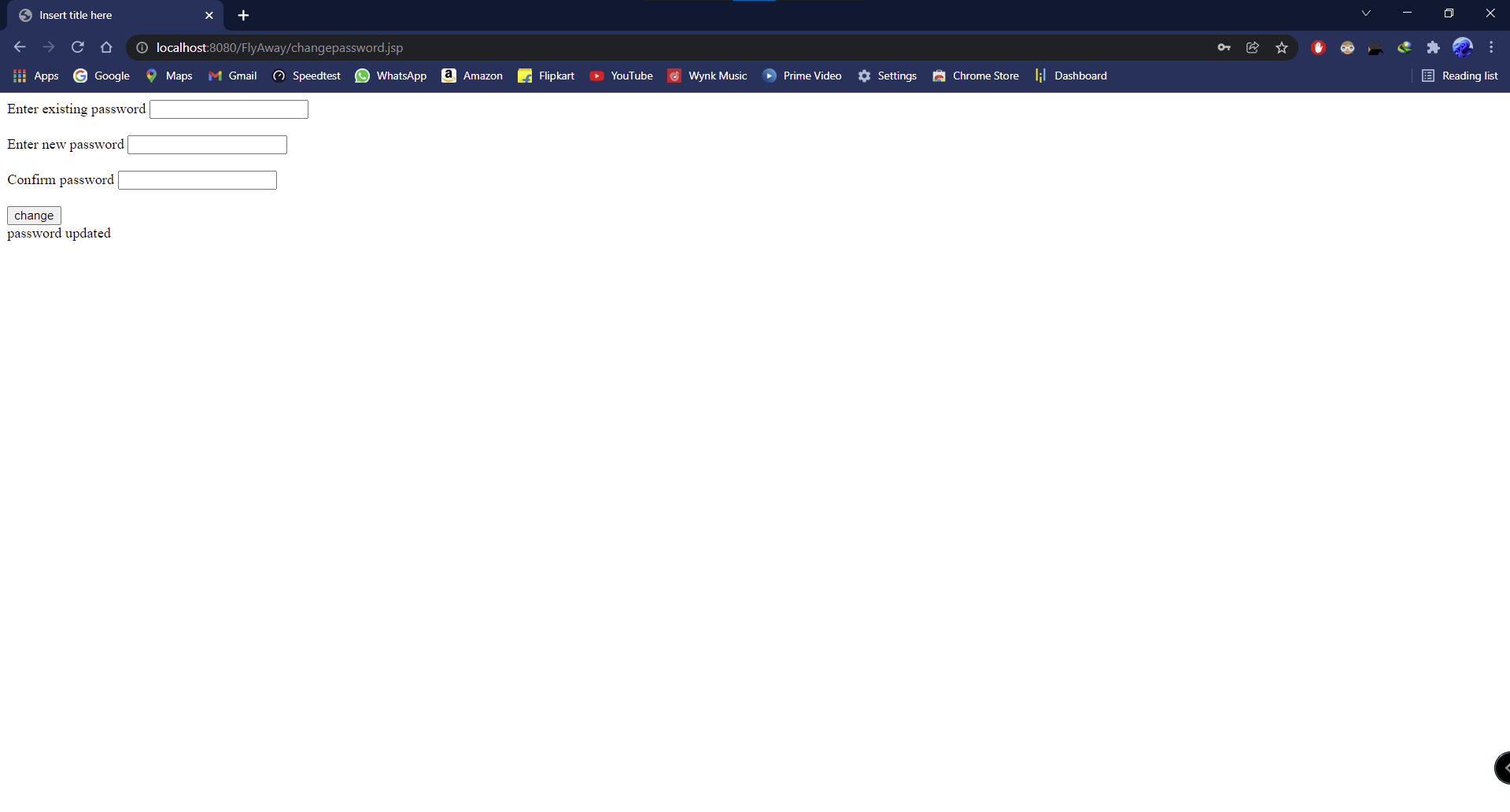
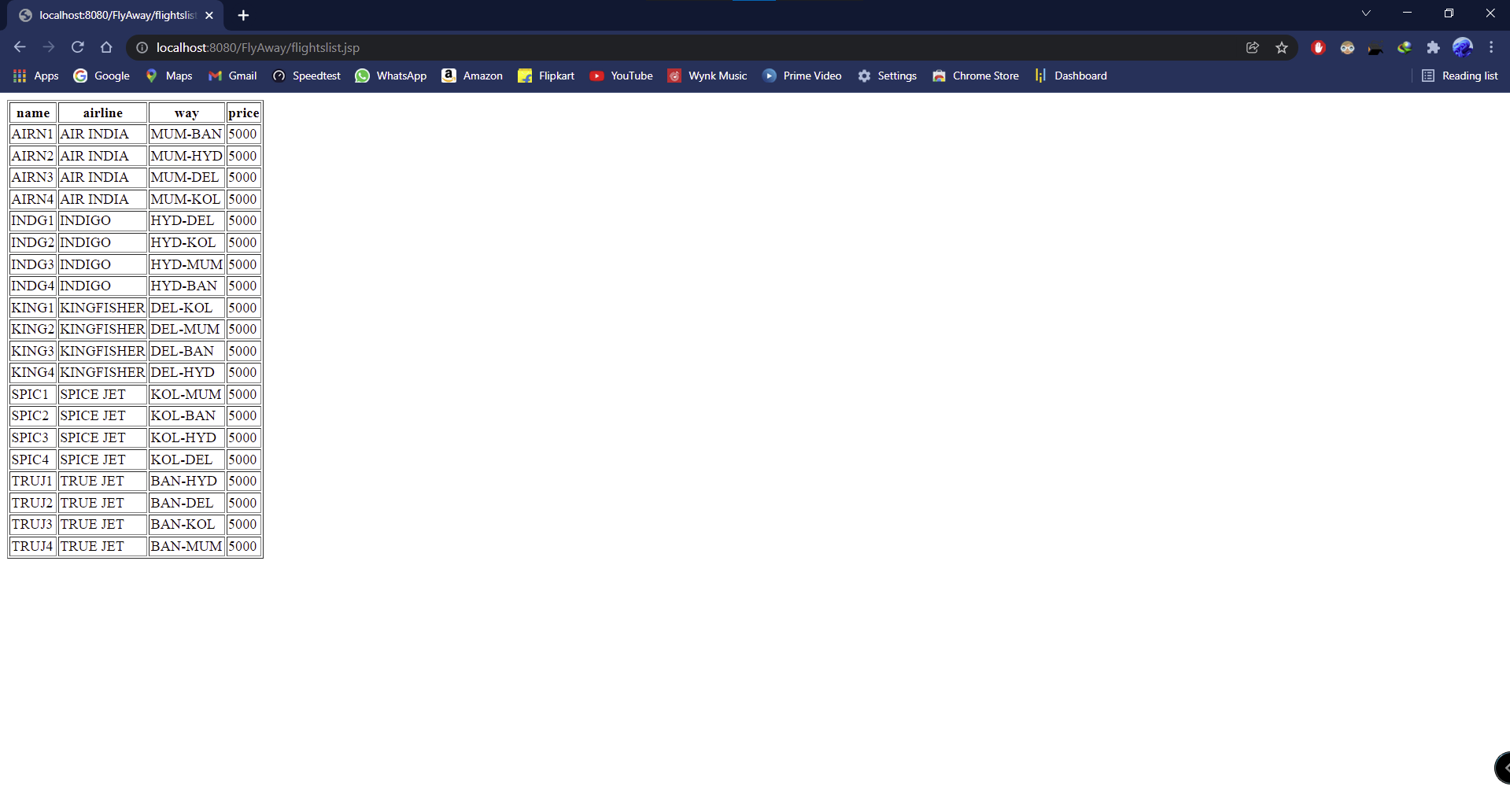
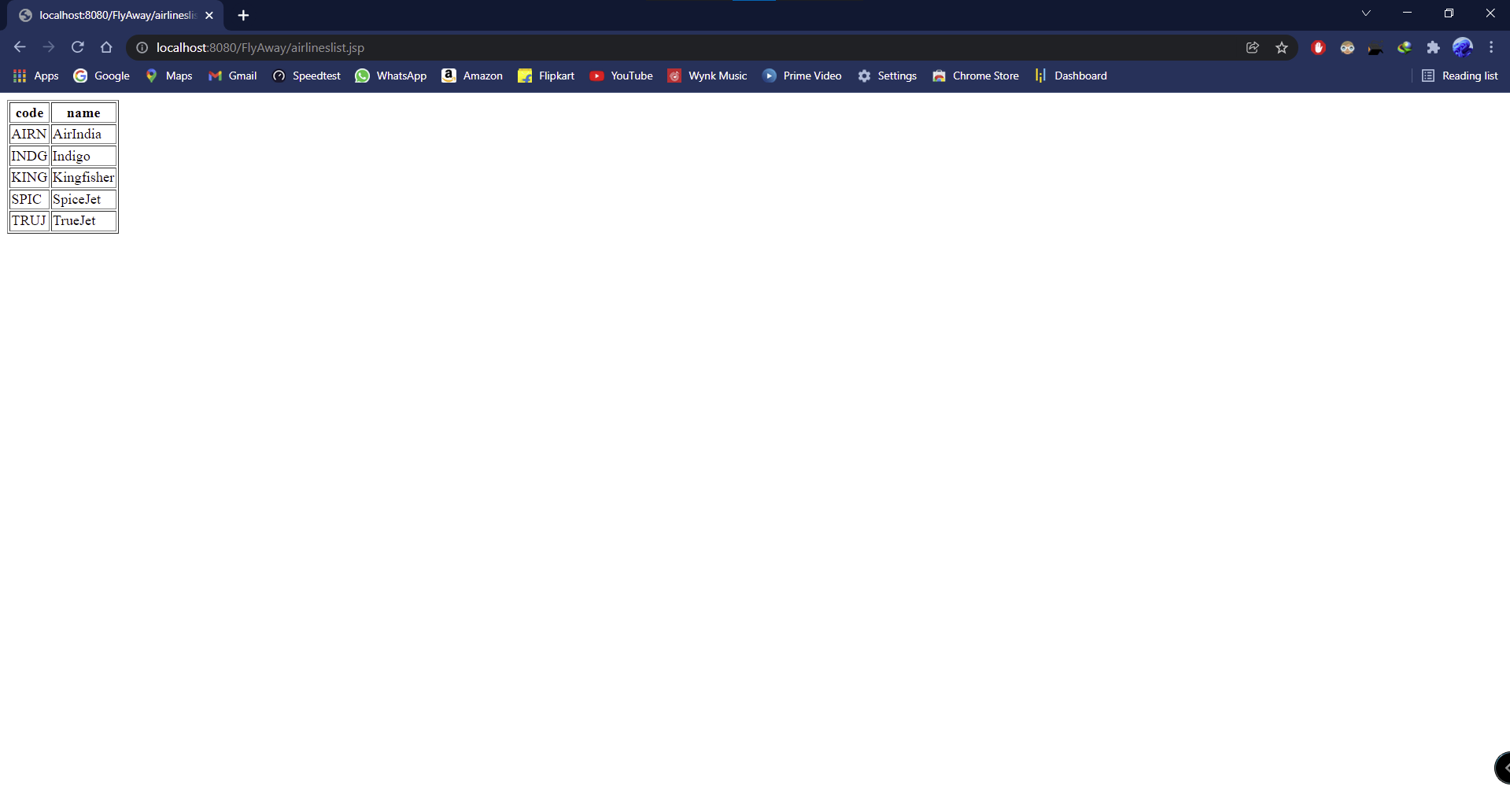
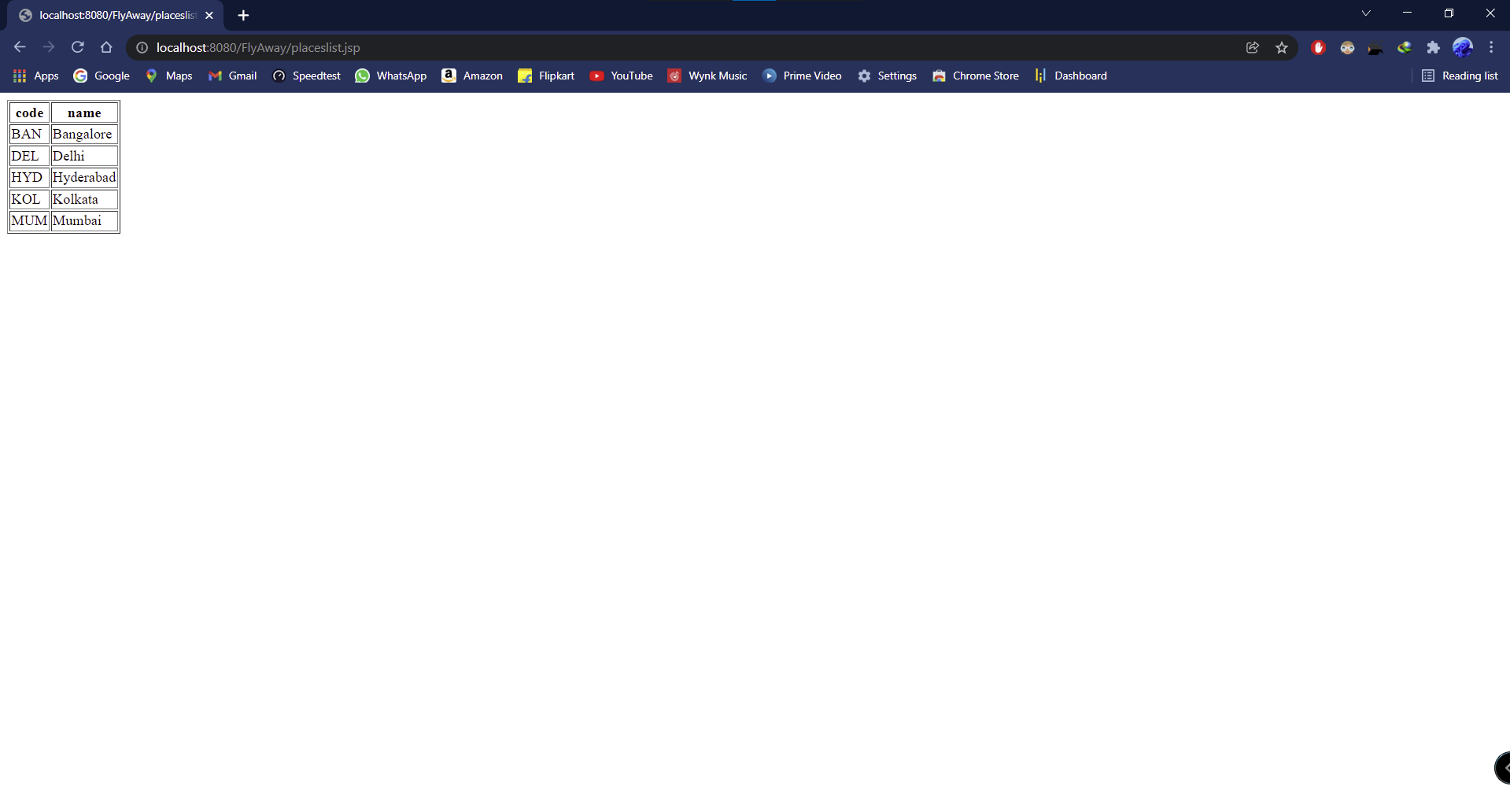
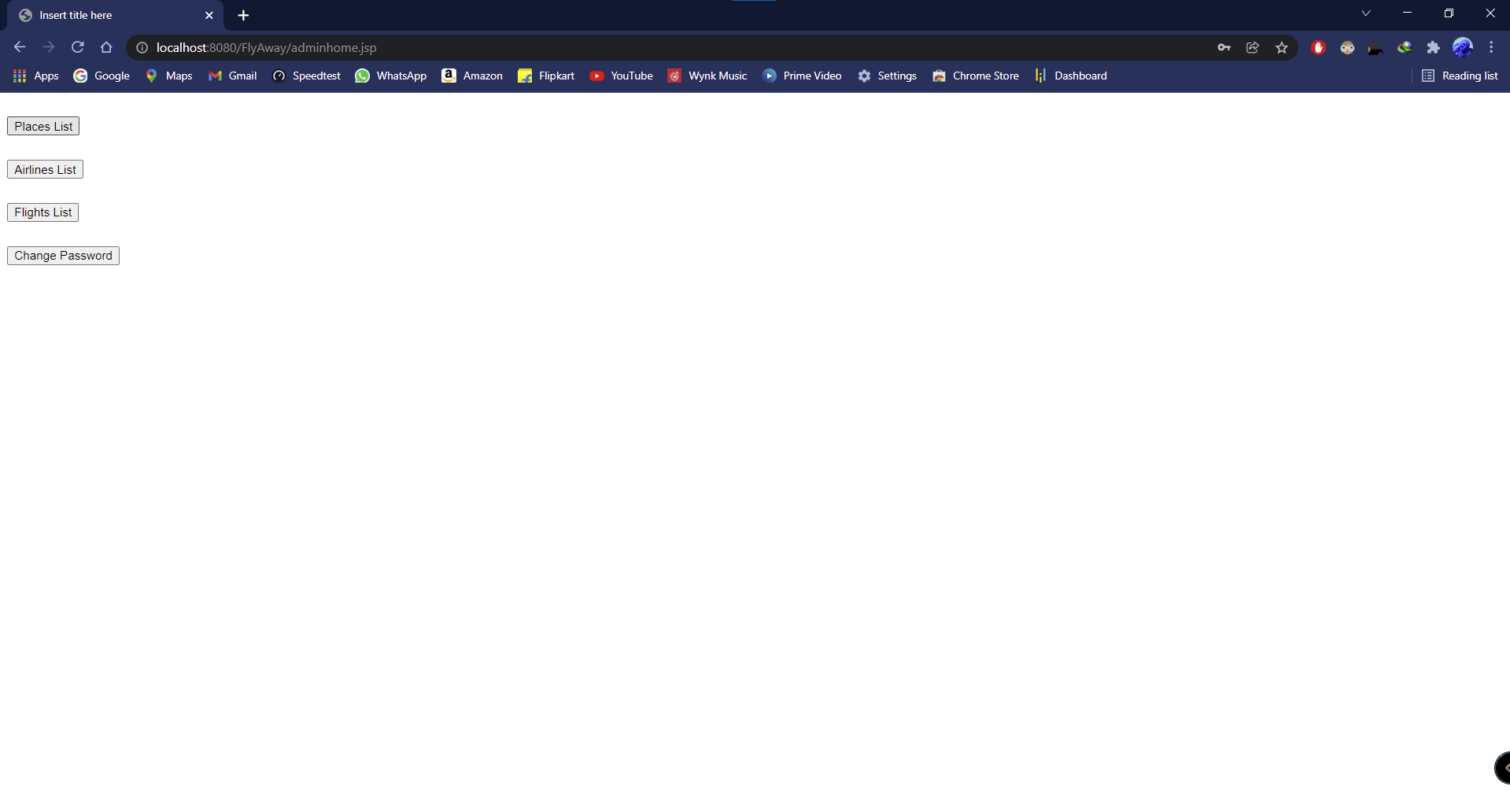
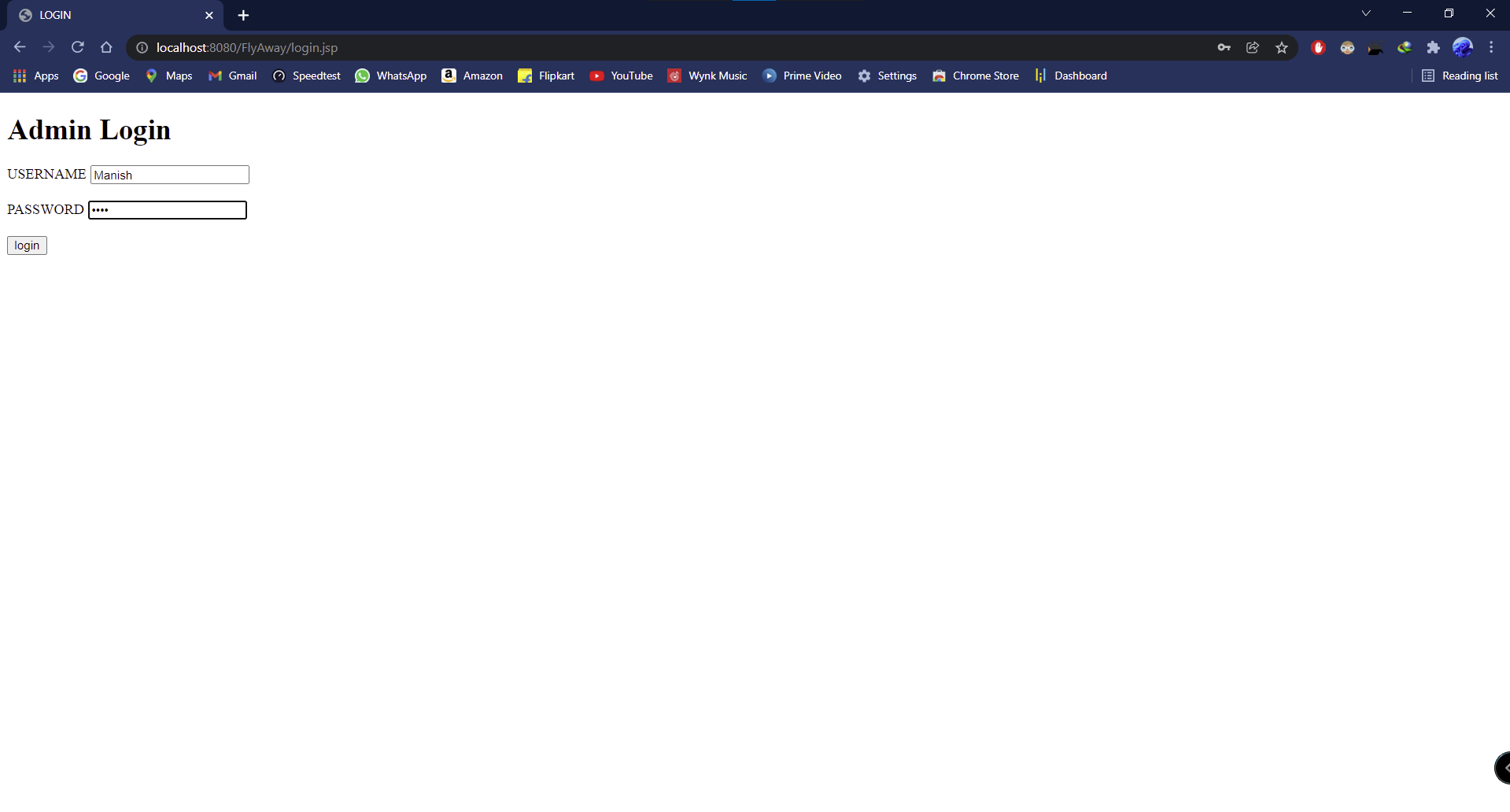
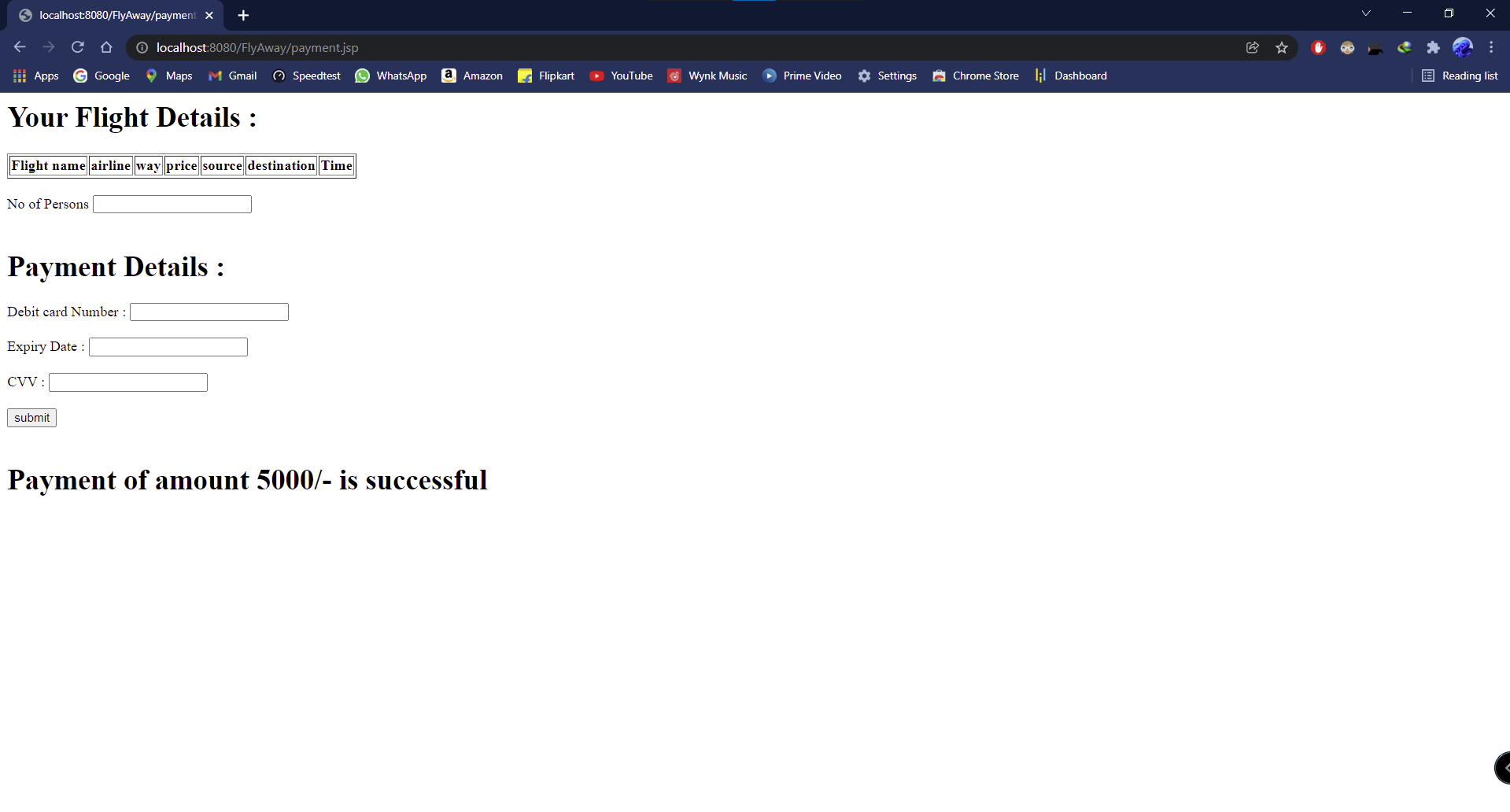
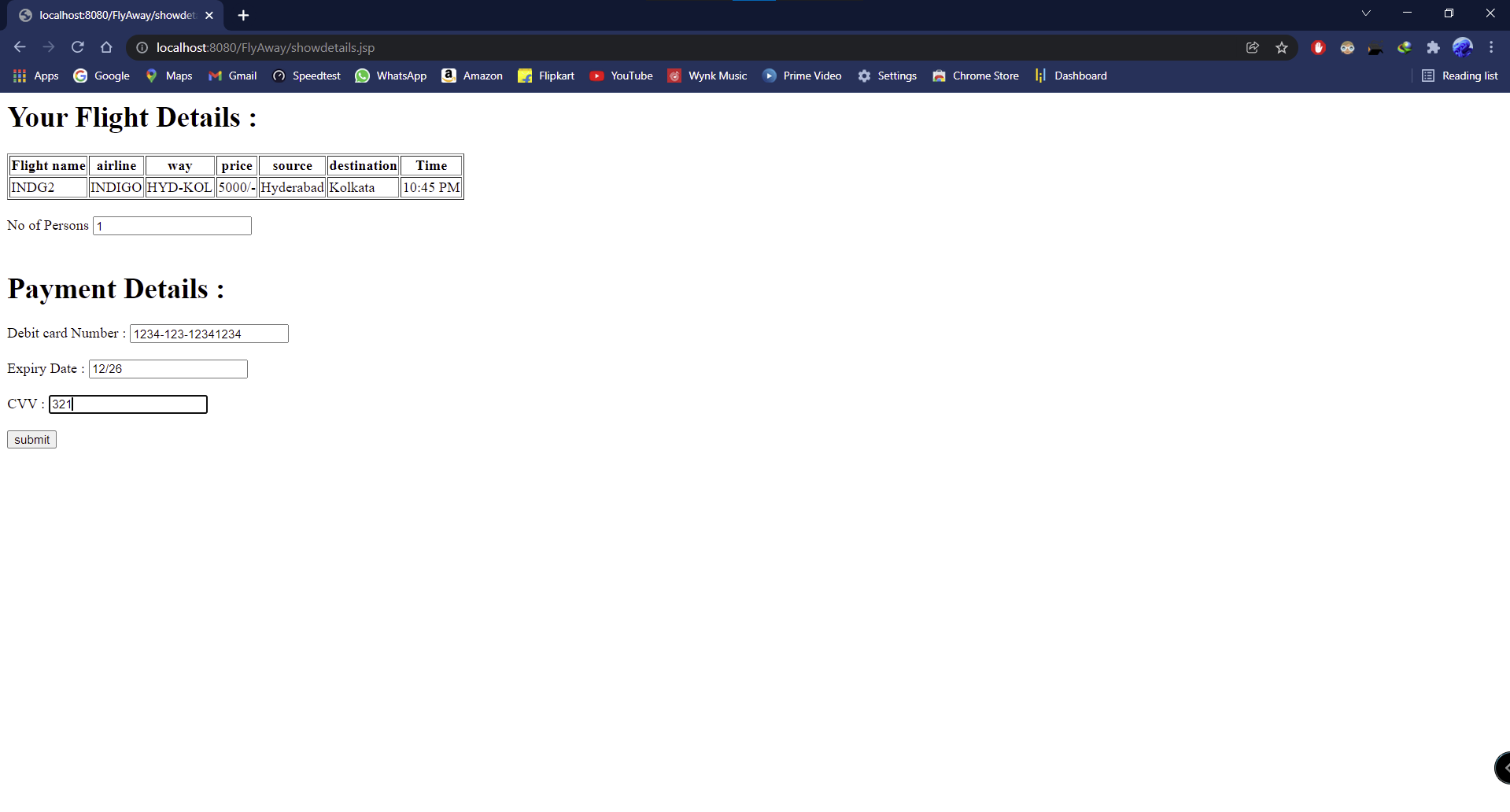
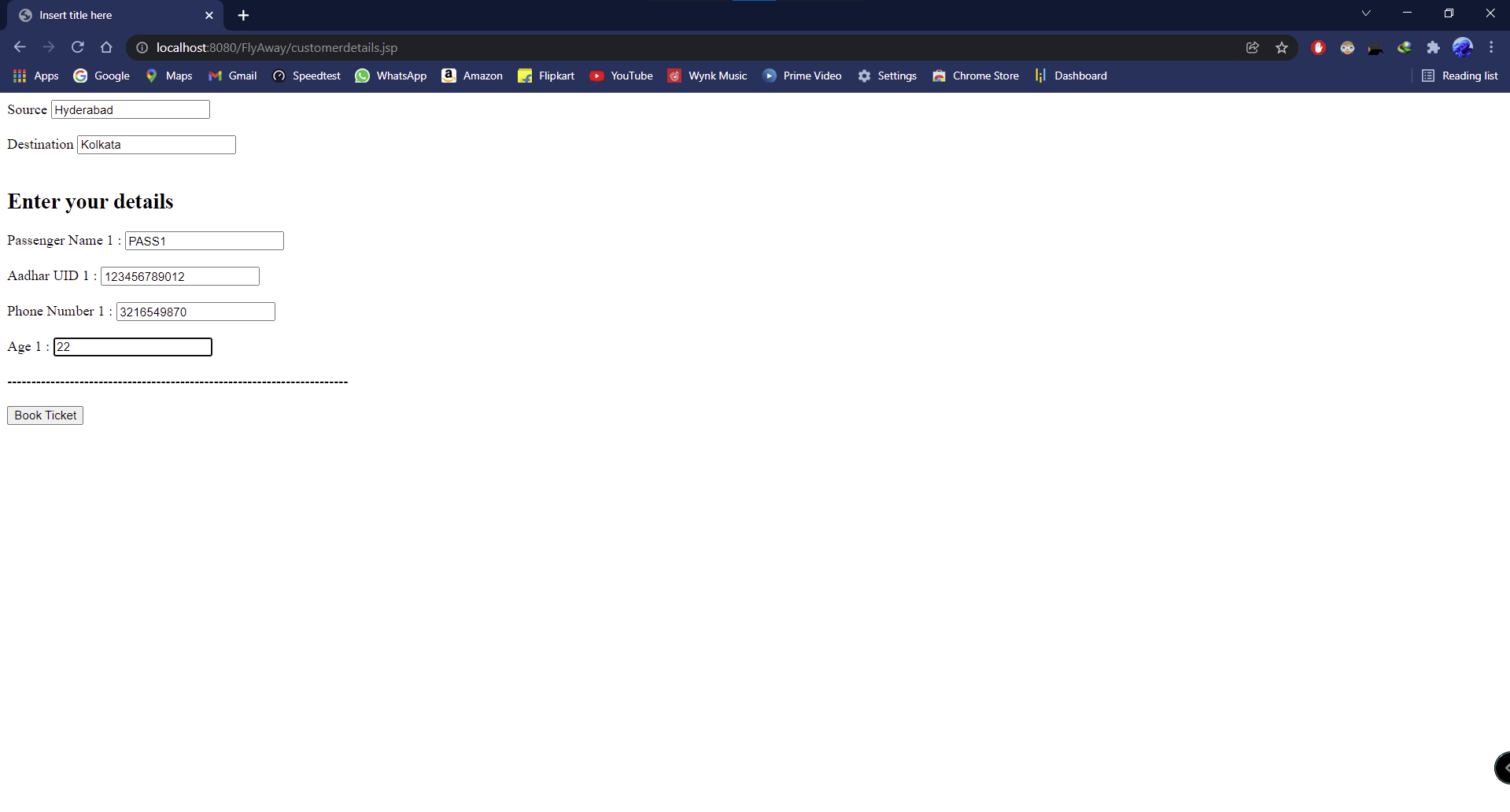
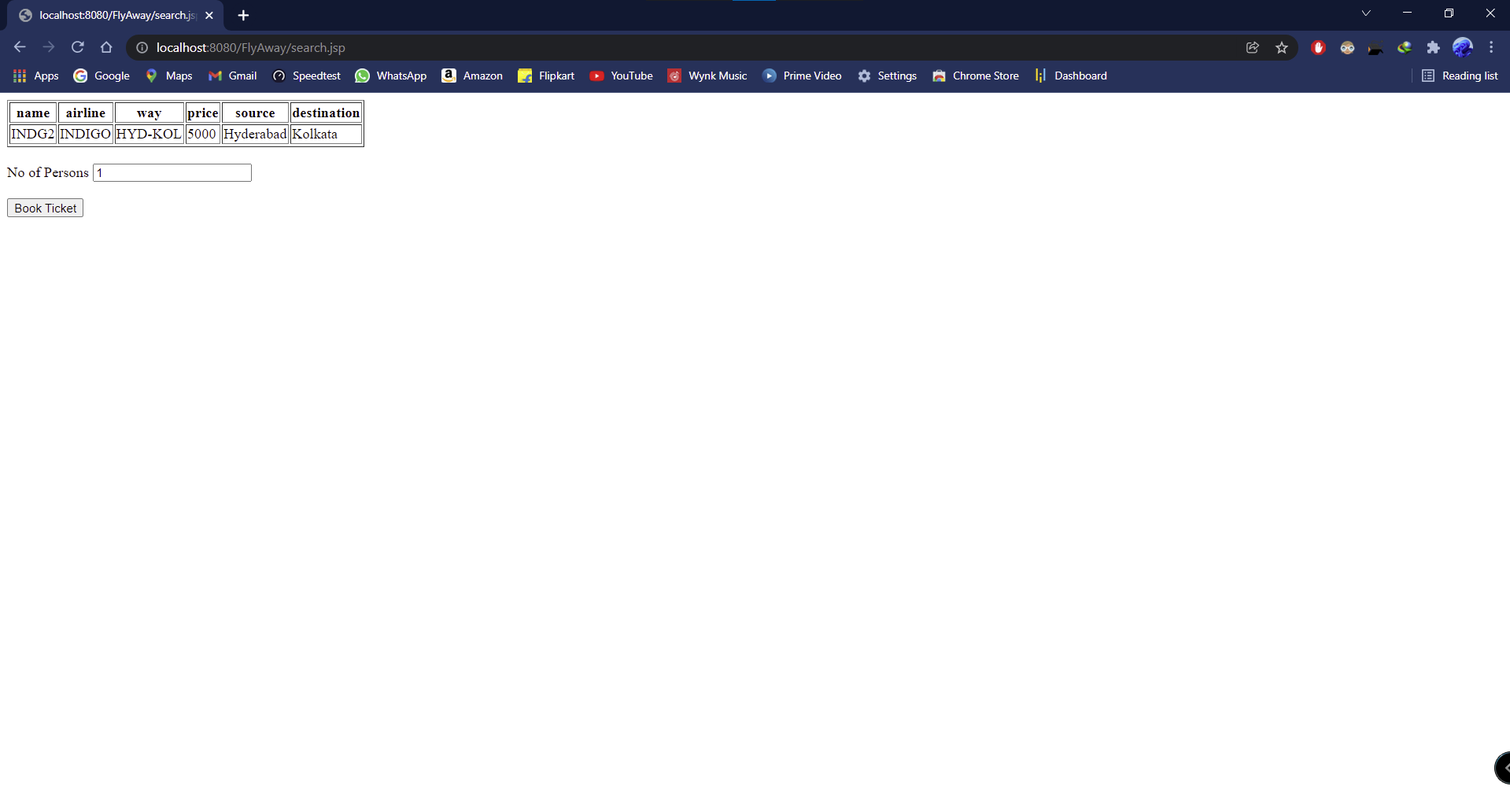
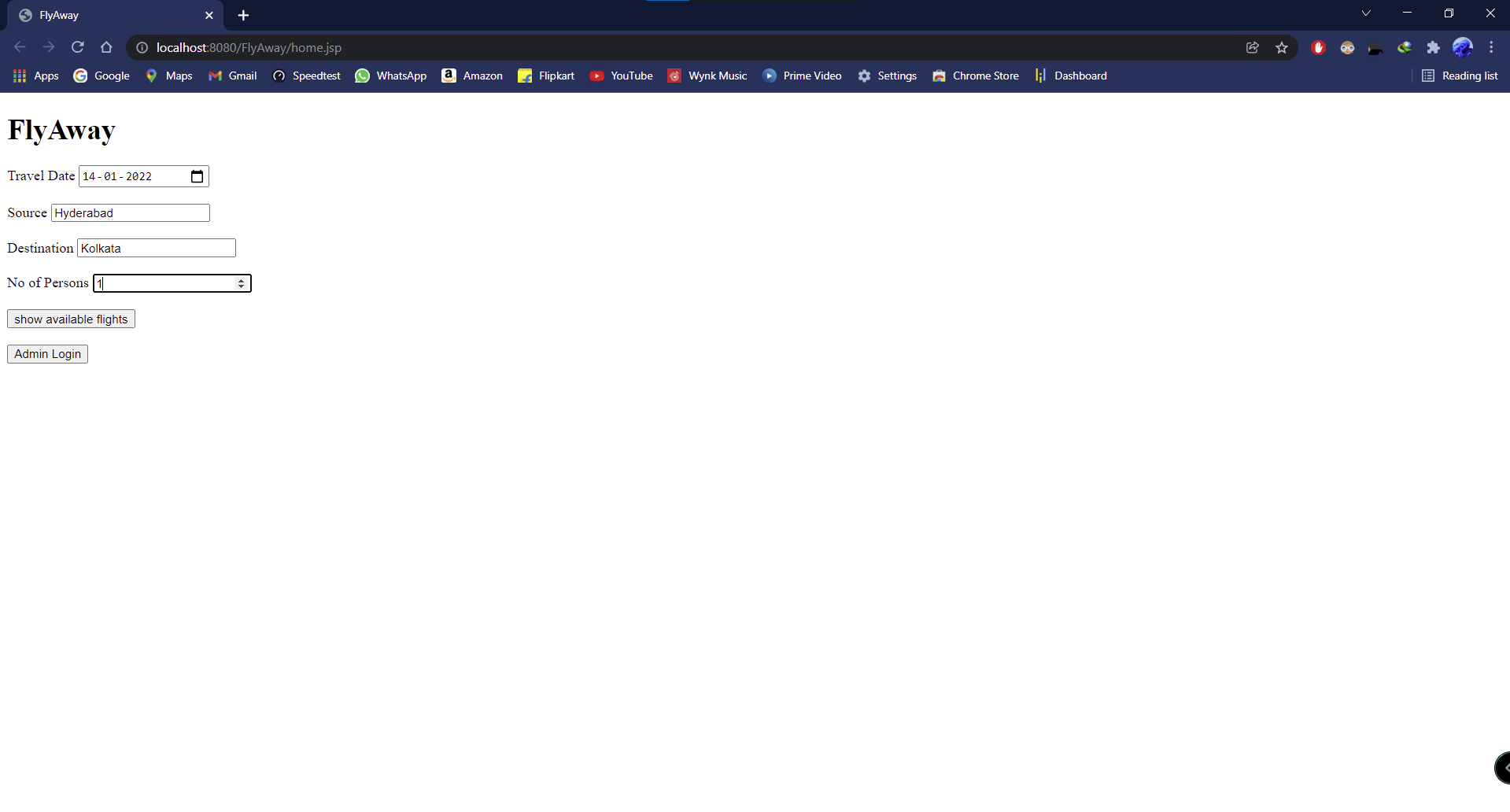
</br> CVV : <inputtype=*"text"*></br>

</br><inputtype=*"submit"*value=*"submit"*></br>

</br>

</form>

**Screenshots:**

****