Assignment -2
Python Programming

Assignment Date	24/09/2022
Student Name	Sathishkumar.R
Student Roll Number	512219104016
Maximum Marks	2 Marks

Question:

1.create a flask app.

2.Add home page, about page.

3.Add the bootstrap.

4.Add the sign-in page and app the sign-up page + database connectivity.

Solution:

App.py

```python
from turtle import st
from flask import Flask, render_template, request, redirect, url_for, session
from markupsafe import escape

import ibm_db
conn = ibm_db.connect("DATABASE=bludb;HOSTNAME= 0c77d6f2-5da9-48a9-81f8-
86b520b87518.bs2io90l08kqb1od8lcg.databases.appdomain.cloud;PORT=31198;SECURIT
Y=SSL;SSLServerCertificate=DigiCertGlobalRootCA.crt;UID=jjb21184;PWD=0qXEvJbc6
J8Qdphs",'','')
app = Flask(__name__)




@app.route('/')
def home():
  return render_template('home.html')

@app.route('/about')
def about():
  return render_template('about.html')




@app.route('/signin')
def signin():
```

```python
    return render_template('signin.html')

@app.route('/signup')
def signup():
  return render_template('signup.html')

@app.route('/addstudent')
def new_student():
  return render_template('add_student.html')

@app.route('/addrec',methods = ['POST', 'GET'])
def addrec():
  if request.method == 'POST':

    name = request.form['name']
    address = request.form['address']
    city = request.form['city']
    pin = request.form['pin']

    sql = "SELECT * FROM students WHERE name =?"
    stmt = ibm_db.prepare(conn, sql)
    ibm_db.bind_param(stmt,1,name)
    ibm_db.execute(stmt)
    account = ibm_db.fetch_assoc(stmt)

    if account:
      return render_template('list.html', msg="You are already a member,
please login using your details")
    else:
      insert_sql = "INSERT INTO students VALUES (?,?,?,?)"
      prep_stmt = ibm_db.prepare(conn, insert_sql)
      ibm_db.bind_param(prep_stmt, 1, name)
      ibm_db.bind_param(prep_stmt, 2, address)
      ibm_db.bind_param(prep_stmt, 3, city)
      ibm_db.bind_param(prep_stmt, 4, pin)
      ibm_db.execute(prep_stmt)

    return render_template('home.html', msg="Student Data saved
successfuly..")

@app.route('/list')
def list():
  students = []
  sql = "SELECT * FROM Students"
  stmt = ibm_db.exec_immediate(conn, sql)
  dictionary = ibm_db.fetch_both(stmt)
  while dictionary != False:
    print ("The Name is : ",  dictionary)
```

```python
        students.append(dictionary)
        dictionary = ibm_db.fetch_both(stmt)

    if students:
      return render_template("list.html", students = students)

@app.route('/delete/<name>')
def delete(name):
  sql = f"SELECT * FROM Students WHERE name='{escape(name)}'"
  print(sql)
  stmt = ibm_db.exec_immediate(conn, sql)
  student = ibm_db.fetch_row(stmt)
  print ("The Name is : ",  student)
  if student:
    sql = f"DELETE FROM Students WHERE name='{escape(name)}'"
    print(sql)
    stmt = ibm_db.exec_immediate(conn, sql)

    students = []
    sql = "SELECT * FROM Students"
    stmt = ibm_db.exec_immediate(conn, sql)
    dictionary = ibm_db.fetch_both(stmt)
    while dictionary != False:
      students.append(dictionary)
      dictionary = ibm_db.fetch_both(stmt)
    if students:
      return render_template("list.html", students = students, msg="Delete
successfully")


  return "success..."
```

home.html

```html
<!DOCTYPE html>
<html>
<head>
    <link
href="https://cdn.jsdelivr.net/npm/bootstrap@5.2.2/dist/css/bootstrap.min.css"
rel="stylesheet" integrity="sha384-
Zenh87qX5JnK2Jl0vWa8Ck2rdkQ2Bzep5IDxbcnCeuOxjzrPF/et3URy9Bv1WTRi"
crossorigin="anonymous">
<script
src="https://cdn.jsdelivr.net/npm/bootstrap@5.2.2/dist/js/bootstrap.bundle.min
.js" integrity="sha384-
```

```html
OERcA2EqjJCMA+/3y+gxIOqMEjwtxJY7qPCqsdltbNJuaOe923+mo//f6V8Qbsw3"
crossorigin="anonymous"></script>
</head>

<nav class="navbar navbar-expand-lg text-white">
    <div class="container-fluid">
        <a class="navbar-brand text-decoration-none" href="/">HOME</a>
        <button class="navbar-toggler" type="button" data-bs-toggle="collapse"
data-bs-target="#navbarNav" aria-controls="navbarNav" aria-expanded="false"
aria-label="Toggle navigation">
            <span class="navbar-toggler-icon"></span>
        </button>
        <div class="collapse navbar-collapse" id="navbarNav">
            <ul class="navbar-nav">
              <li class="navbar-brand">
                <a  class="text-decoration-none " href="/addstudent">Add New
Student</a>
              </li>
              <li class="navbar-brand">

                <a class="text-decoration-none" href="/signin">SignIn Page</a>
              </li>
              <li class="navbar-brand">
                <a class="text-decoration-none" href="/signup">SignUP Page</a>
              </li>
          </li>
          <li class="navbar-brand">
                <a class="text-decoration-none" href="/about">About Page</a>
          </li>
      </li>
      <li class="navbar-brand">
          <a class="text-decoration-none " href="/list">List Student</a>
      </li>
        </ul>
      </div>
    </div>
  </nav>




<hr>

{{msg}}

<h1 >Welcome to Home Page...</h1>
</html>
```

About.html

```html
<html>
    <head>
        <link
href="https://cdn.jsdelivr.net/npm/bootstrap@5.2.2/dist/css/bootstrap.min.css"
rel="stylesheet" integrity="sha384-
Zenh87qX5JnK2Jl0vWa8Ck2rdkQ2Bzep5IDxbcnCeuOxjzrPF/et3URy9Bv1WTRi"
crossorigin="anonymous">
<script
src="https://cdn.jsdelivr.net/npm/bootstrap@5.2.2/dist/js/bootstrap.bundle.min
.js" integrity="sha384-
OERcA2EqjJCMA+/3y+gxIOqMEjwtxJY7qPCqsdltbNJuaOe923+mo//f6V8Qbsw3"
crossorigin="anonymous"></script>
    </head>
<nav class="navbar navbar-expand-lg text-white ">
    <div class="container-fluid">
        <a class="navbar-brand text-decoration-none" href="/">HOME</a>
        <button class="navbar-toggler" type="button" data-bs-toggle="collapse"
data-bs-target="#navbarNav" aria-controls="navbarNav" aria-expanded="false"
aria-label="Toggle navigation">
            <span class="navbar-toggler-icon"></span>
        </button>
        <div class="collapse navbar-collapse" id="navbarNav">
            <ul class="navbar-nav">

              <li class="navbar-brand">

                <a class="text-decoration-none" href="/signin">SignIn Page</a>
              </li>
              <li class="navbar-brand">
                <a class="text-decoration-none" href="/signup">SignUP Page</a>
              </li>
            </li>
            <li class="navbar-brand">
                <a class="text-decoration-none" href="/about">About Page</a>
            </li>
        </li>
            </ul>
        </div>
    </div>
  </nav>
    <body>
        <h3>1. Create a Flask App</h3>
        <h3>2. Add the Home page, About Page</h3>
        <h3> 3. Add the Bootstrap</h3>
        <h3> 4. Add the Sign in page and App the Signup Page + database
connectivity</h3>
```

```
    </body>
</html>
```

Sign in .html

```
<!DOCTYPE html>
<html>
    <head>
        <link
href="https://cdn.jsdelivr.net/npm/bootstrap@5.2.2/dist/css/bootstrap.min.css"
rel="stylesheet" integrity="sha384-
Zenh87qX5JnK2Jl0vWa8Ck2rdkQ2Bzep5IDxbcnCeuOxjzrPF/et3URy9Bv1WTRi"
crossorigin="anonymous">
<script
src="https://cdn.jsdelivr.net/npm/bootstrap@5.2.2/dist/js/bootstrap.bundle.min
.js" integrity="sha384-
OERcA2EqjJCMA+/3y+gxIOqMEjwtxJY7qPCqsdltbNJuaOe923+mo//f6V8Qbsw3"
crossorigin="anonymous"></script>
    </head>

<nav class="navbar navbar-expand-lg text-white">
    <div class="container-fluid">
        <a class="navbar-brand text-decoration-none" href="/">HOME</a>
        <button class="navbar-toggler" type="button" data-bs-toggle="collapse"
data-bs-target="#navbarNav" aria-controls="navbarNav" aria-expanded="false"
aria-label="Toggle navigation">
            <span class="navbar-toggler-icon"></span>
        </button>
        <div class="collapse navbar-collapse" id="navbarNav">
            <ul class="navbar-nav">

            <li class="navbar-brand">

                <a class="text-decoration-none" href="/signin">SignIn Page</a>
            </li>
            <li class="navbar-brand">
                <a class="text-decoration-none" href="/signup">SignUP Page</a>
            </li>
        </li>
        <li class="navbar-brand">
            <a class="text-decoration-none" href="/about">About Page</a>
        </li>
    </li>
    <li class="navbar-brand">
        <a class="text-decoration-none " href="/list">List Student</a>
    </li>
```

```
          </ul>
      </div>
    </div>
  </nav>



<form action = "{{ url_for('signin') }}" method = "POST">
    <h3>SIGN IN PAGE</h3>
    Email<br>
    <input type = "text" name="name" /><br>

    Password<br>
    <input type = "password" name="password" /><br>

    <br>
    <button type="button" class="btn btn-primary">Submit</button><br>


</form>
</html>
```

Signup.html

```
<html>
<head>
    <head>
        <link
href="https://cdn.jsdelivr.net/npm/bootstrap@5.2.2/dist/css/bootstrap.min.css"
rel="stylesheet" integrity="sha384-
Zenh87qX5JnK2Jl0vWa8Ck2rdkQ2Bzep5IDxbcnCeuOxjzrPF/et3URy9Bv1WTRi"
crossorigin="anonymous">
<script
src="https://cdn.jsdelivr.net/npm/bootstrap@5.2.2/dist/js/bootstrap.bundle.min
.js" integrity="sha384-
OERcA2EqjJCMA+/3y+gxIOqMEjwtxJY7qPCqsdltbNJuaOe923+mo//f6V8Qbsw3"
crossorigin="anonymous"></script>
    </head>
</head>

<nav class="navbar navbar-expand-lg text-white">
    <div class="container-fluid">
      <a class="navbar-brand text-decoration-none" href="/">HOME</a>
      <button class="navbar-toggler" type="button" data-bs-toggle="collapse"
data-bs-target="#navbarNav" aria-controls="navbarNav" aria-expanded="false"
aria-label="Toggle navigation">
        <span class="navbar-toggler-icon"></span>
      </button>
```

```html
          <div class="collapse navbar-collapse" id="navbarNav">
            <ul class="navbar-nav">

              <li class="navbar-brand">

                <a class="text-decoration-none" href="/signin">SignIn Page</a>
              </li>
              <li class="navbar-brand">
                <a class="text-decoration-none" href="/signup">SignUP Page</a>
              </li>
            </li>
            <li class="navbar-brand">
                <a class="text-decoration-none " href="/list">List Student</a>
            </li>
        </li>
        <li class="navbar-brand">
            <a class="text-decoration-none" href="/about">About Page</a>
        </li>
            </ul>
          </div>
        </div>
    </nav>

<form action = "{{ url_for('addrec') }}" method = "POST">
    <h3>SIGN UP PAGE</h3>
    Name<br>
    <input type = "text" name="name" /></br>

    Email<br>
    <input type = "email" name="email" /><br>

    Password<br>
    <input type = "password" name="password" /><br>

    Re-Password<br>
    <input type ="password" name="password" /><br><br>
    <button type="button" class="btn btn-primary">Submit</button<br>
 </form>
 </html>
```

Database connectivity:

Add_student.html

```html
<!DOCTYPE html>
<html>
<head>
```

```html
    <link
href="https://cdn.jsdelivr.net/npm/bootstrap@5.2.2/dist/css/bootstrap.min.css"
rel="stylesheet" integrity="sha384-
Zenh87qX5JnK2Jl0vWa8Ck2rdkQ2Bzep5IDxbcnCeuOxjzrPF/et3URy9Bv1WTRi"
crossorigin="anonymous">
<script
src="https://cdn.jsdelivr.net/npm/bootstrap@5.2.2/dist/js/bootstrap.bundle.min
.js" integrity="sha384-
OERcA2EqjJCMA+/3y+gxIOqMEjwtxJY7qPCqsdltbNJuaOe923+mo//f6V8Qbsw3"
crossorigin="anonymous"></script>
</head>



<nav class="navbar navbar-expand-lg text-white">
    <div class="container-fluid">
      <a class="navbar-brand text-decoration-none" href="/">HOME</a>
      <button class="navbar-toggler" type="button" data-bs-toggle="collapse"
data-bs-target="#navbarNav" aria-controls="navbarNav" aria-expanded="false"
aria-label="Toggle navigation">
        <span class="navbar-toggler-icon"></span>
      </button>
      <div class="collapse navbar-collapse" id="navbarNav">
        <ul class="navbar-nav">
          <li class="navbar-brand">
            <a  class="text-decoration-none " href="/addstudent">Add New
Student</a>
    </li>
    <li class="navbar-brand">
        <a class="text-decoration-none " href="/list">List Student</a>
    </li>
        </ul>
      </div>
    </div>
  </nav>



<form action = "{{ url_for('addrec') }}" method = "POST">
    <h3>Student Information</h3>
    Name<br>
    <input type = "text" name="name" /><br>

    Address<br>
    <textarea name="address" ></textarea><br>

    City<br>
    <input type = "text" name="city" /><br>

    PINCODE<br>
```

```
        <input type = "text" name="pin" /><br><br>
        <button type="button" class="btn btn-primary">Submit</button><br>
    </form>
    </html>
```

List.html

```
<!doctype html>
<html>
    <head>
        <link
href="https://cdn.jsdelivr.net/npm/bootstrap@5.2.2/dist/css/bootstrap.min.css"
rel="stylesheet" integrity="sha384-
Zenh87qX5JnK2Jl0vWa8Ck2rdkQ2Bzep5IDxbcnCeuOxjzrPF/et3URy9Bv1WTRi"
crossorigin="anonymous">
        <script
src="https://cdn.jsdelivr.net/npm/bootstrap@5.2.2/dist/js/bootstrap.bundle.min
.js" integrity="sha384-
OERcA2EqjJCMA+/3y+gxIOqMEjwtxJY7qPCqsdltbNJuaOe923+mo//f6V8Qbsw3"
crossorigin="anonymous"></script>
    </head>
    <nav class="navbar navbar-expand-lg text-white">
        <div class="container-fluid">
            <a class="navbar-brand text-decoration-none" href="/">HOME</a>
            <button class="navbar-toggler" type="button" data-bs-toggle="collapse"
data-bs-target="#navbarNav" aria-controls="navbarNav" aria-expanded="false"
aria-label="Toggle navigation">
                <span class="navbar-toggler-icon"></span>
            </button>
            <div class="collapse navbar-collapse" id="navbarNav">
                <ul class="navbar-nav">
                    <li class="navbar-brand">
                        <a  class="text-decoration-none " href="/addstudent">Add New
Student</a>
                    </li>
            <li class="navbar-brand">
                <a class="text-decoration-none " href="/list">List Student</a>
            </li>
                </ul>
            </div>
        </div>
    </nav>
    <body>


    {{ msg }}

        <table class="table">
```

```
        <thead>
            <td scope="col">Name</td>
            <td scope="col">Address</td>
            <td scope="col">city</td>
            <td scope="col">Pincode</td>
        </thead>
        {% for row in students %}
            <tr>
                <td>{{row["NAME"]}}</td>
                <td> {{ row["ADDRESS"]}}</td>
                <td>{{row["CITY"]}}</td>
                <td>{{row['PIN']}}</td>
                <td><a href="/delete/{{row['NAME']}}">Delete</a></td>
            </tr>
        {% endfor %}
    </table>


  </body>
</html>
```

Screenshots:

Home:

HOME   Add New Student   SignIn Page   SignUP Page   About Page   List Student

Welcome to Home Page...

About:

HOME SignIn Page SignUP Page About Page

1. Create a Flask App
2. Add the Home page, About Page
3. Add the Bootstrap
4. Add the Sign in page and App the Signup Page + database connectivity

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Sign in:

HOME SignIn Page SignUP Page About Page List Student

SIGN IN PAGE

Email

Password

Submit

Sign up:

HOME SignIn Page SignUP Page List Student About Page

SIGN UP PAGE

Name

Email

Password

Re-Password

Submit

Database connectivity:

HOME Add New Student List Student

Student Information

Name

Address

City

PINCODE

Submit

Name	Address	city	Pincode	
DURAI RAJ	nagar	thiruvannamalai	123456	Delete