ASSIGNMENT – 3

Assignment Date	28 October 2022
Student Name	Gatharine Kerenhap E
Student Roll Number	950019104013
Maximum Marks	2 Marks
Team ID	PNT2022TMID49592

1.Create User table with user with email, username, roll number, password.

CREATE TABLE user(username varchar(17) not null, password varchar(20) not null,email varchar(30) not null,password(10)not null);

INSERT INTO "STUDENT" VALUES ('GATHARINE','950019104013','gath@gmail.com','Cath@123');

INSERT INTO "USER" VALUES ('STELLA','950019104037','stell@gmail.com','23STELLJ');

2.Perform UPDATE,DELETE Queries with user table

UPDATE "student" SET ROLLNO='950013' WHERE USERNAME='GATHARINE'
DELETE FROM "student" WHERE username = 'STELLA'
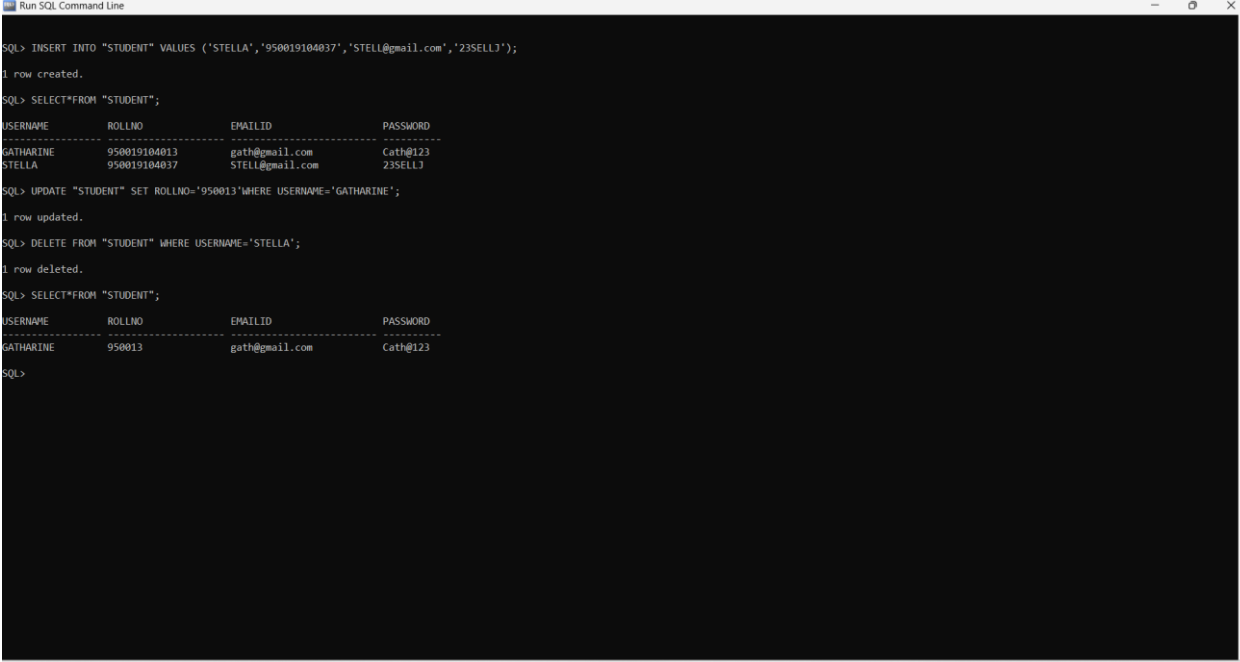
3.Connect python code to db2.
conn = conn=ibm_db.connect("DATABASE=bludb;HOSTNAME=b1bc1829-6f45-4cd4-bef4-

10cf081900bf.c1ogj3sd0tgtu0lqde00.databases.appdomain.cloud;PORT=32304;SECURITY=SSL;SS

LServerCertificate=DigiCertGlobalRootCA.crt;UID=jpg92341;PWD=5HWT2lmD7POkuLnv","","")

**4.Create a flask app with registration page, login page and welcome page. By default load the
registration page once the user enters all the fields store the data in database and navigate to login
page authenticate user username and password. If the user is valid show the welcome page.**

Login.html:
```
<html>
<head>
<meta charset="UTF-8">
<title> Login </title>
</head>
<body></br></br></br></br></br>
<div align="center">
<div align="center" class="border">
<div class="header">
<h1 class="word">Login</h1>
</div></br></br></br>
<h2 class="word">
<form action="{{ url_for('login') }}" method="post">
<div class="msg">{{ msg }}</div>
```

```html
<input id="username" name="username" type="text" placeholder="Enter Your Username"
class="textbox"/></br></br>
<input id="password" name="password" type="password" placeholder="Enter Your Password"
class="textbox"/></br></br></br>
<input type="submit" class="btn" value="Sign In"></br></br>
</form>
</h2>
<p class="bottom">Don't have an account? <a class="bottom" href="{{url_for('register')}}"> Sign Up
here</a></p>
</div>
</div>
</body>
</html>
```

Register.html:

```html
<html>
<head>
<meta charset="UTF-8">
<title> Register </title>
</head>
<body></br></br></br></br></br>
<div align="center">
<div align="center" class="border">
<div class="header">
<h1 class="word">Register</h1>
</div></br></br></br>
<h2 class="word">
<form action="{{ url_for('register') }}" method="post">
<div class="msg">{{ msg }}</div>
<input id="username" name="username" type="text" placeholder="Enter Your Username"
class="textbox"/></br></br>
<input id="password" name="password" type="password" placeholder="Enter Your Password"
class="textbox"/></br></br>
<input id="email" name="email" type="text" placeholder="Enter Your Email ID"
class="textbox"/></br></br>
<input type="submit" class="btn" value="Sign Up"></br>
</form>
</h2>
<p class="bottom">Already have an account? <a class="bottom" href="{{url_for('login')}}"> Sign In
here</a></p>
</div>
</div>
</body>
</html>
```

Base.html:

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

<title>Page Title</title>

    {% block head %} {% endblock %}
    <!-- <link rel="stylesheet" href="static/css/style.css"> -->
    <link href="https://cdn.jsdelivr.net/npm/bootstrap@5.2.1/dist/css/bootstrap.min.css" rel="stylesheet"
integrity="sha384-iYQeCzEYFbKjA/T2uDLTpkwGzCiq6soy8tYaI1GyVh/UjpbCx/TYkiZhlZB6+fzT"
crossorigin="anonymous">
    <script src="https://cdn.jsdelivr.net/npm/bootstrap@5.2.1/dist/js/bootstrap.bundle.min.js"
integrity="sha384-
```

u1OknCvxWvY5kfmNBILK2hRnQC3Pr17a+RTT6rIHI7NnikvbZlHgTPOOmMi466C8"

```html
crossorigin="anonymous"></script>
</head>
<body>


    <a href="/register"><i>REGISTER</i></a>&nbsp
    <a href="/login"><i>LOGIN</i></a>&nbsp
    <hr><br>
    <div class="container">
     {% block body %} {% endblock %}

    </div>

</body>
</html>
```

Index.html:

```html
{% extends 'base.html' %}
{% block head %}
<title>Home Page</title>
{% endblock %}
{% block body %}
<h1><b>Hello everyone This is Shrimathi,</b></h1>
<h2><p>Welcome to my Website</p></h2>
  {% endblock %}
```

App.py:

```python
 from flask import Flask, render_template, request, redirect, url_for, session
 import ibm_db
 import re
 app = Flask(__name__)
 app.secret_key = 'a'
 conn = ibm_db.connect("DATABASE=bludb;HOSTNAME=ba99a9e6-d59e-4883-8fc0-
 d6a8c9f7a08f.c1ogj3sd0tgtu0lqde00.databases.appdomain.cloud;PORT=31321;SECURITY=SSL;SSLSer
 verCertificate=DigiCertGlobalRootCA.crt;UID=cpk00923;PWD=ZYyhzUTXtTqKMs3j","","")
 @app.route("/")
 def index():
  return render_template('index.html')
 @app.route('/login', methods =['GET', 'POST'])
 def login():
   global userid
   msg = ''
   if request.method == 'POST' and 'username' in request.form and 'password' in request.form:
     username = request.form['username']
     password = request.form['password']
     stmt = ibm_db.prepare(conn,'SELECT * FROM user WHERE username = ? AND password = ?')
     ibm_db.bind_param(stmt,1,username)
     ibm_db.bind_param(stmt,2,password)
     ibm_db.execute(stmt)
     account = ibm_db.fetch_assoc(stmt)
     if account:
       session['loggedin'] = True
       session['username'] = account['USERNAME']
       msg = 'Logged in successfully !'
       return render_template('index.html', msg = msg)
```

```python
      else:
        msg = 'Incorrect username / password !'
    return render_template('login.html', msg = msg)

@app.route('/logout')
def logout():
  session.pop('loggedin', None)
  session.pop('id', None)
  session.pop('username', None)
  return redirect(url_for('login'))

@app.route('/register', methods =['GET', 'POST'])
def register():
  msg = ''
  if request.method == 'POST':
    username = request.form['username']
    password = request.form['password']
    email = request.form['email']
    sql = "SELECT * FROM user WHERE username = ? "
    stmt = ibm_db.prepare(conn,sql)
    ibm_db.bind_param(stmt,1,username)
    ibm_db.execute(stmt)
    account = ibm_db.fetch_assoc(stmt)
    print(account)
    if account:
      msg = 'Account already exists !'
    elif not re.match(r'[^@]+@[^@]+\.[^@]+', email):
      msg = 'Invalid email address !'
    elif not re.match(r'[A-Za-z0-9]+', username):
      msg = 'Username must contain only characters and numbers !'
    elif not username or not password or not email:
      msg = 'Please fill out the form !'
    else:
      insert_sql = "INSERT INTO user VALUES (?, ?, ?)"
      stmt = ibm_db.prepare(conn,insert_sql)
      ibm_db.bind_param(stmt, 1, username)
      ibm_db.bind_param(stmt, 2, password)
      ibm_db.bind_param(stmt, 3, email)
      ibm_db.execute(stmt)
      msg = 'You have successfully registered !'
  elif request.method == 'POST':
    msg = 'Please fill out the form !'

  return render_template('register.html', msg = msg)
if __name__ == '__main__':
  app.run(debug = True)
```
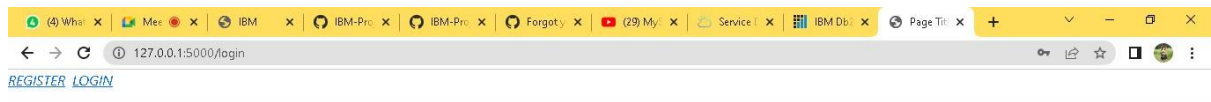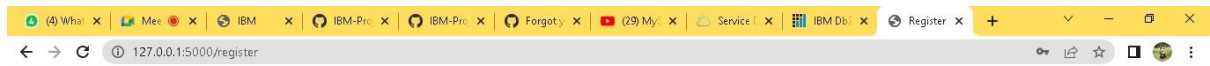
OUTPUT:

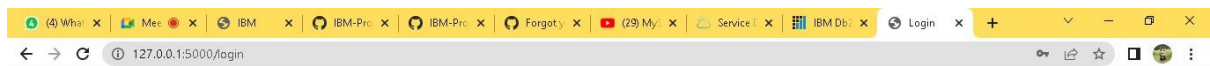# Hello everyone This is Gatharine Kerenhap,

Welcome to my Website

Register

You have successfully registered !

Gathrine

••••••

gatharine@gmail.com

Sign Up

Already have an account? Sign In here

Login

Gathrine

••••••

Sign In

Don't have an account? Sign Up here