

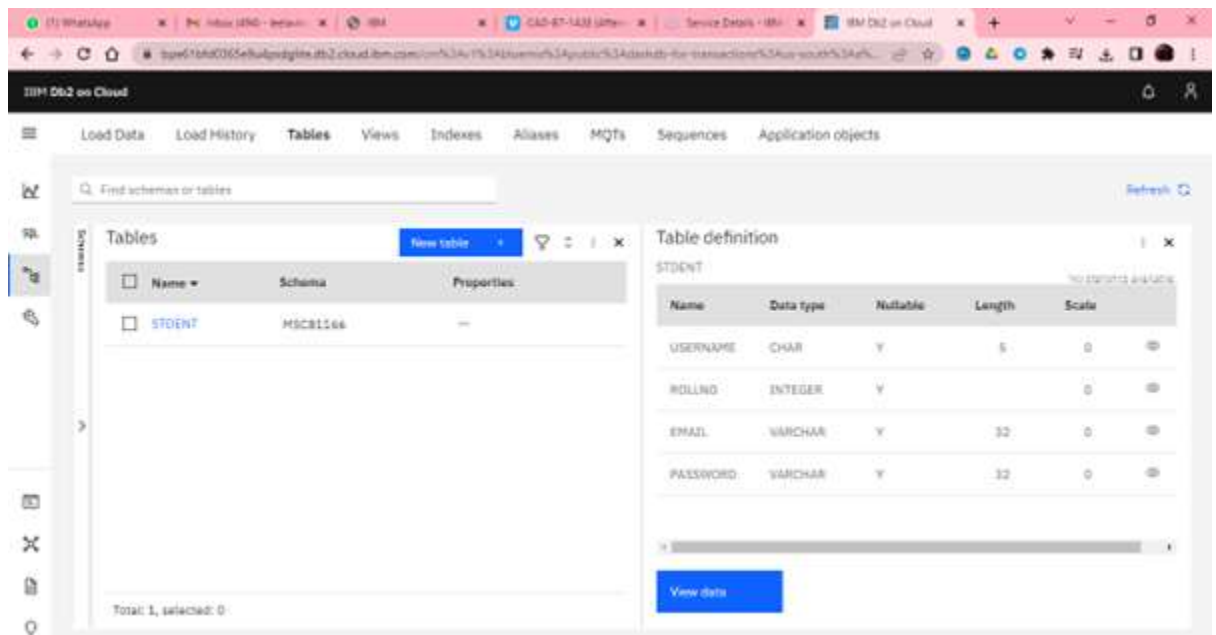
## Assignment -2

### IBM CLOUD DB2

Assignment Date	29 September 2022
Student Name	GAYATHRI S
Student Roll Number	951919CS024
Maximum Marks	2 Marks

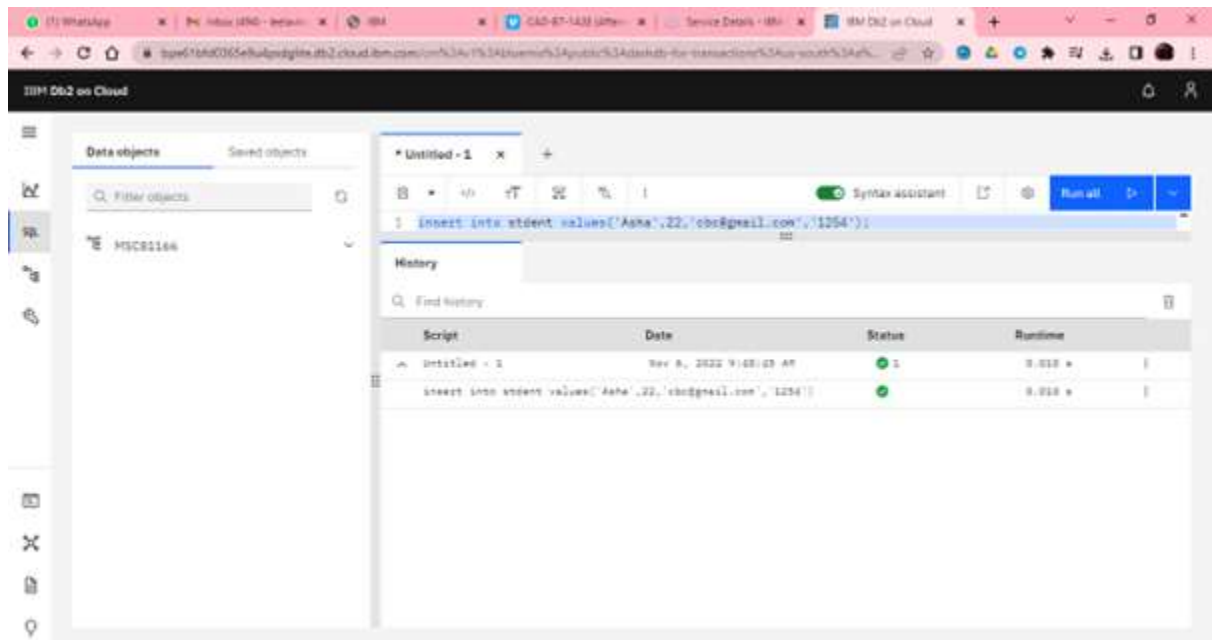
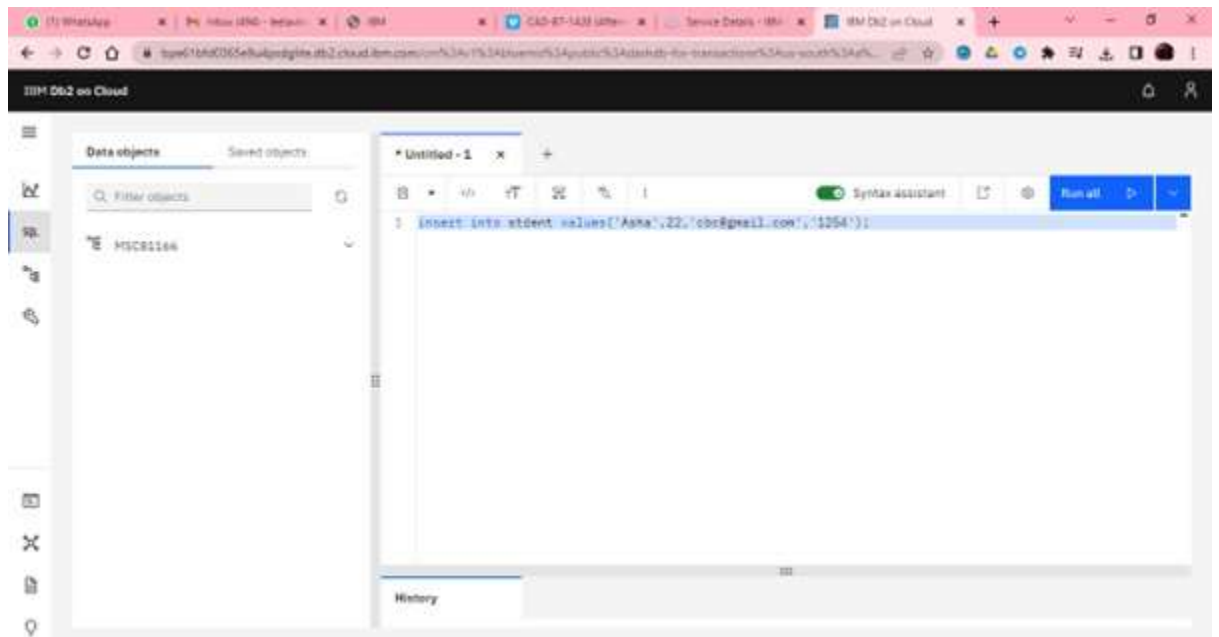
#### Questions:

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



2. Perform UPDATE,DELETE Queries with user table.

#### UPDATE TABLE:-



**DELETE TABLE:-**

IBM Db2 on Cloud

Load Data Load History **Tables** Views Indexes Aliases MQTs Sequences Application objects

MSC81166.STDENT

Back

Export to CSV

USERNAME	ROLLNO	EMAIL	PASSWORD
Asha	22	ctc@gmail.com	1254

IBM Db2 on Cloud

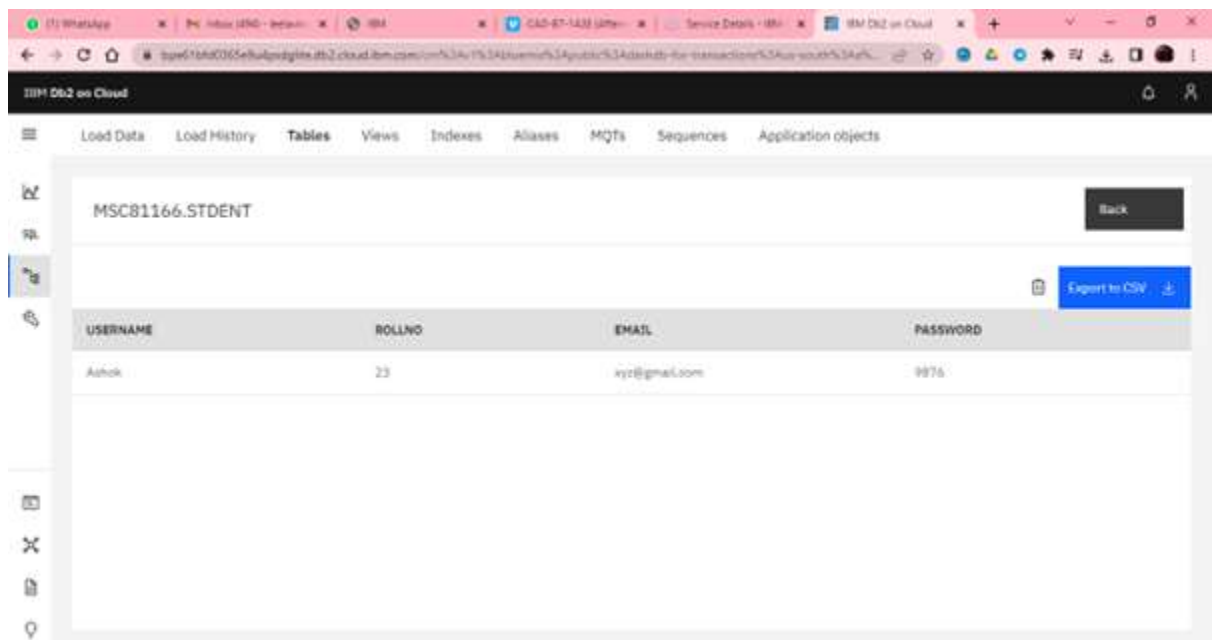
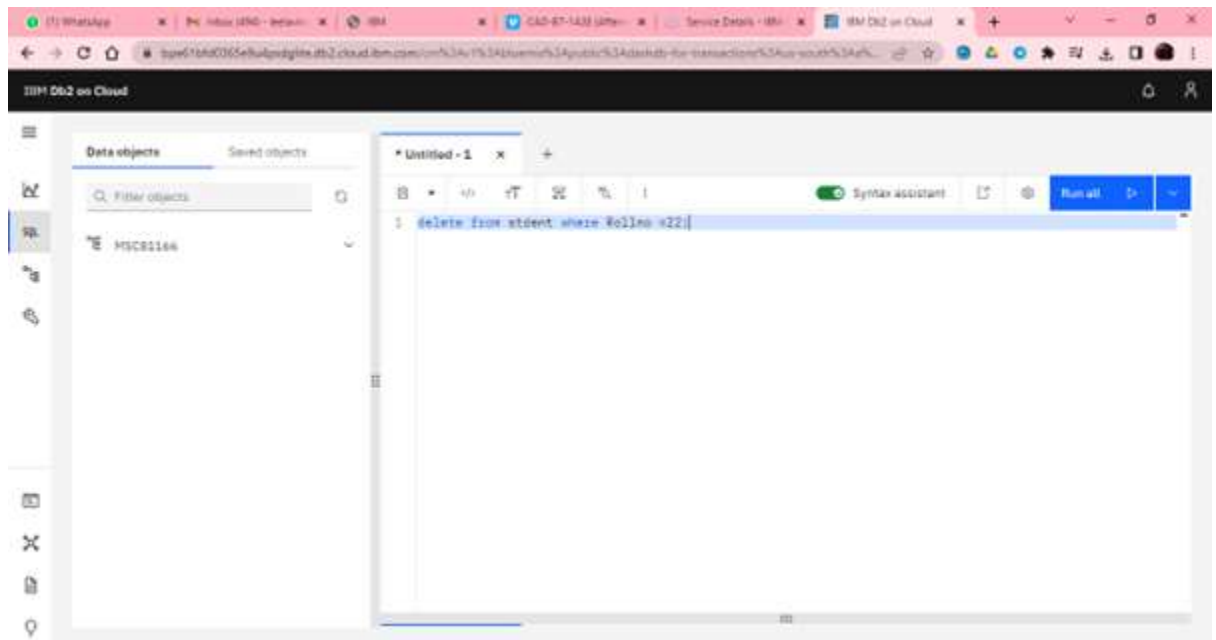
Load Data Load History **Tables** Views Indexes Aliases MQTs Sequences Application objects

MSC81166.STDENT

Back

Export to CSV

USERNAME	ROLLNO	EMAIL	PASSWORD
Asha	22	ctc@gmail.com	1254
Asha	22	ctc@gmail.com	1254
Ashok	23	xyz@gmail.com	9876



3.Connect python code to db2.

**NOTE:- Question 4 contains Question 3 answer**

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

**Answers**

**App.py**

```
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=fbd88901-ebdb-4a4f-a32e-9822b9fb237b.c1ogj3sd0tgtu0lqde00.databases.appdomain.cloud;PORT=32731;USERNAM
E=dt46044;PASSWORD=95soX0sZGhb4ToUj;SECURITY=SSL;SSLSERVERCERTIFICATE=DigiCer
tGlobalRootCA.crt;", "", "")

@app.route("/", methods=['GET', 'POST'])
def register():
    msg = ''
    if request.method == 'POST':
        username = request.form['username']
        email = request.form['email']
        password = request.form['password']
        sql = "SELECT * FROM users 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 = 'name must contain only characters and numbers !'
        else:
            insert_sql = "INSERT INTO users VALUES (?, ?, ?)"
            prep_stmt = ibm_db.prepare(conn, insert_sql)
            ibm_db.bind_param(prepare_stmt, 1, username)
            ibm_db.bind_param(prepare_stmt, 2, email)
```

```

        ibm_db.bind_param(prepare_stmt, 3, password)
        ibm_db.execute(prepare_stmt)
        msg = 'You have successfully registered !'
    elif request.method == 'POST':
        msg = 'Please fill out the form !'
    return render_template('register.html', msg=msg)

@app.route('/login', methods=['GET', 'POST'])
def login():
    global userid
    msg = ''

    if request.method == 'POST':
        username = request.form['username']
        password = request.form['password']
        sql = "SELECT * FROM users WHERE username =? AND password=?"
        stmt = ibm_db.prepare(conn, sql)
        ibm_db.bind_param(stmt, 1, username)
        ibm_db.bind_param(stmt, 2, password)
        ibm_db.execute(stmt)
        account = ibm_db.fetch_assoc(stmt)
        print(account)
        if account:
            session['loggedin'] = True
            session['id'] = account['USERNAME']
            userid = account['USERNAME']
            session['username'] = account['USERNAME']
            msg = 'Logged in successfully !'

            msg = 'Logged in successfully !'
            return render_template('dashboard.html', msg=msg)
        else:
            msg = 'Incorrect username / password !'
    return render_template('login.html', msg=msg)

if __name__ == '__main__':
    app.run(host='0.0.0.0')
    # app.run(debug=True)

```

### Register.html

```

<!DOCTYPE html>
<html lang="en">

<head>
    <meta charset="UTF-8">
    <meta http-equiv="X-UA-Compatible" content="IE=edge">

```

```

<meta name="viewport" content="width=device-width, initial-scale=1.0">
<title>Smart Fashion register</title>

<!-- bootstrap css cdn -->
<link rel="stylesheet"
href="https://stackpath.bootstrapcdn.com/bootstrap/4.5.2/css/bootstrap.min.css"
integrity="sha384-
JcKb8q3iqJ61gNV9KGb8thSsNjpSL0n8PARn9HuZOnIxN0hoP+VmmDGMN5t9UJ0Z"
crossorigin="anonymous">
<link rel="stylesheet" href="https://cdnjs.cloudflare.com/ajax/libs/font-
awesome/4.7.0/css/font-awesome.css">
<!-- css stylesheet -->
<link rel="stylesheet" href="/static/css/style.css">
<!-- font styles cdn -->
<link rel="preconnect" href="https://fonts.gstatic.com">
<link
href="https://fonts.googleapis.com/css2?family=Alegreya&display=swap"
rel="stylesheet">
<link
href="https://fonts.googleapis.com/css2?family=Alegreya:wght@600&display=swap"
rel="stylesheet">
</head>

<body>
<!-- bootstrap navbar -->
<!-- navbar ends -->
<!-- Login form -->
<div class="login text-center mt-5">

    <form action="/" method="post">
        <h2 class="form-text-h2"> Register Form </h2>
        <div class="msg">{{ msg }}</div>
        <input type="text" class="form-control" name="username"
placeholder="Enter Your Username" id="username"
required>
        <input type="email" class="form-control" name="email"
placeholder="Enter Your Email ID" id="email" required>
        <input type="password" class="form-control" name="password"
placeholder="Enter Your Password" id="password"
required>
        <button type="submit" id="button" class="btn btn-primary">
Register </button>
        <div class="note mt-3 text-center">
            <!-- Register form -->
            <p> already have an account ? please login <a
href="/login">login! </a> </p>

```

```

        </div>
    </form>

</div>

</body>

</html>

```

## Login.html

```

<!DOCTYPE html>
<html lang="en">

<head>
    <meta charset="UTF-8">
    <meta http-equiv="X-UA-Compatible" content="IE=edge">
    <meta name="viewport" content="width=device-width, initial-scale=1.0">
    <title>Smart Fashion Login</title>
    <!-- favicon -->
    <!-- <link rel="shortcut icon" href="/assets/img/favicon.ico"
type="image/x-icon"> -->
    <!-- <link rel="icon" href="/assets/img/favicon.ico" type="image/x-icon">
-->
    <link rel="icon" type="image/png" sizes="16x16" href="/assets/img/favicon-
32x32.png">
    <!-- bootstrap css cdn -->
    <link rel="stylesheet"
href="https://stackpath.bootstrapcdn.com/bootstrap/4.5.2/css/bootstrap.min.css
"
        integrity="sha384-
JcKb8q3iqJ61gNV9KGb8thSsNjpSL0n8PARn9HuZOnIxN0hoP+VmmDGMN5t9UJ0Z"
crossorigin="anonymous">
    <link rel="stylesheet" href="https://cdnjs.cloudflare.com/ajax/libs/font-
awesome/4.7.0/css/font-awesome.css">
    <!-- css stylesheet -->
    <link rel="stylesheet" href="/static/css/style2.css">
    <!-- font styles cdn -->
    <link rel="preconnect" href="https://fonts.gstatic.com">
    <link
href="https://fonts.googleapis.com/css2?family=Alegreya&display=swap"
rel="stylesheet">
    <link
href="https://fonts.googleapis.com/css2?family=Alegreya:wght@600&display=swap"
rel="stylesheet">
</head>

<body>

```



```

<div class="login text-center mt-5">

    <form action="/login" method="post">
        <h2 class="form-text-h2"> Login Form </h2>
        <div class="msg">{{ msg }}</div>
        <div class="form-group mb-3">
            <label class="label" for="username">Username</label>
            <input type="text" class="form-control" placeholder="Username"
name="username" required>
        </div>
        <div class="form-group mb-3">
            <label class="label" for="password">Password</label>
            <input type="password" class="form-control"
placeholder="Password" name="password" required>
        </div>

        <button type="submit" id="button" class="btn btn-primary"> Login
</button>

        <div class="note mt-3 text-center">
            <!--Register form -->
            <p> Don't have an account yet? Click here to <a
href="/">register! </a> </p>
        </div>
    </form>
</div>

</body>

</html>

```

#### Style.css

```

* {
    margin: 0;
    padding: 0;
}

body {
    background-color: aqua !important;
    display: flex;
    flex-direction: column;
    align-items: center;
    justify-content: center;
}

form {
    display: flex;
    flex-direction: column;
    align-items: center;
}

```

```

        justify-content: center;
        background-color: white;
        width: 40%;
        height: 450px;
        border-radius: 50px;
        margin: 100px;
        gap: 25px;
    }

    h2 {
        font-size: large;
        font-weight: bolder;
    }

    input {
        width: 80% !important;
    }

    div {
        display: flex;
        align-items: center;
        justify-content: center;
        flex-direction: column;
        width: 90%;
    }

    .form-text-vk {
        font-size: small;
        padding-bottom: 10px;
    }

    .form-text-h2 {
        font-size: x-large;
        padding-top: 10px;
    }
}

```

**Output:-**

**registration page:-**

Smart Fashion register | x | Seminar Details - IBM Cloud | x | IBM Db2 on Cloud | x | IBM | x | + |

Not secure | 192.168.202.55:10900 |

### Register Form

Gayathri

Gayathri@gmail.com

Enter Your Password

Register

already have an account ? please login login!

Login

Page:-

Smart Fashion Login | x | Seminar Details - IBM Cloud | x | IBM Db2 on Cloud | x | IBM | x | + |

Not secure | 192.168.202.55:10900/login |

### Login Form

Username

Gayathri

Password

\*\*\*\*\*

Login

Don't have an account yet? Click here to register!