

Back End Technical Test

Tugas:

API dengan kriteria :

1. Endpoint Registrasi : POST, input username,email dan password. Validasi bahwa username tidak boleh sama (registrasi ulang) dan email harus valid (xx@yyy.com)
2. Endpoint Login : POST, input username dan password yang sudah di registrasi, kembalikan token akses jika terautentikasi.
3. Endpoint Get resource : GET, gunakan akses token dari login, jika berhasil kembalikan “akses sukses”

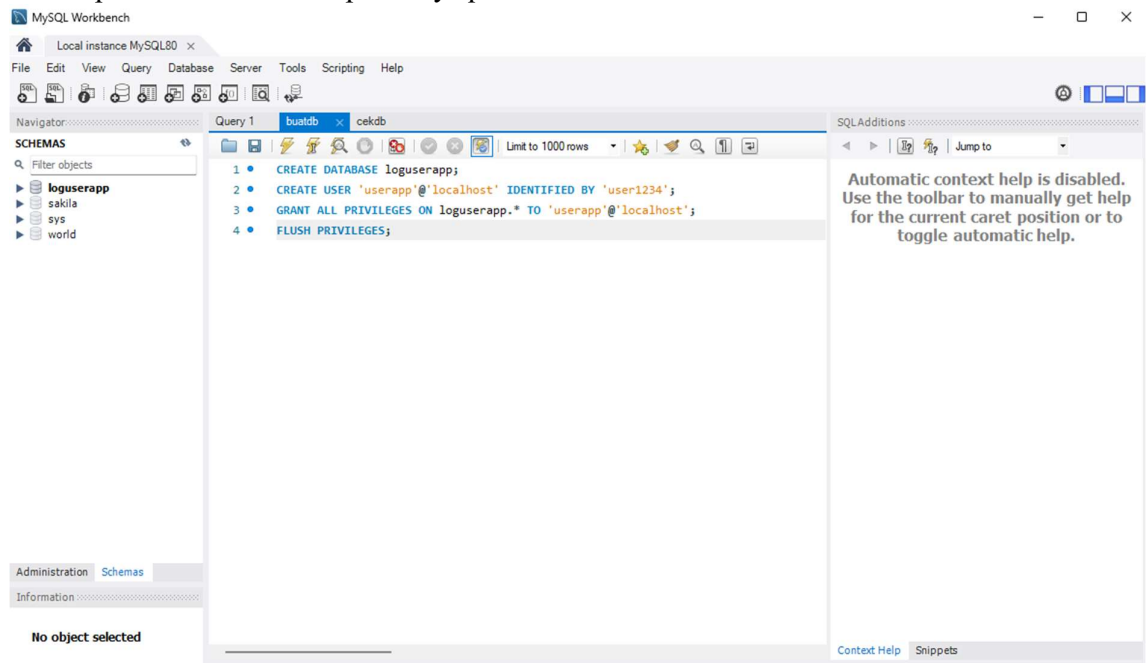
Tambahan : pastikan password di hash pada database. Untuk tugas kali ini saya buat juga tampilan sederhana (web app) untuk registrasi,login dan get resource (ditandai dengan gambar kucing).

Tools:

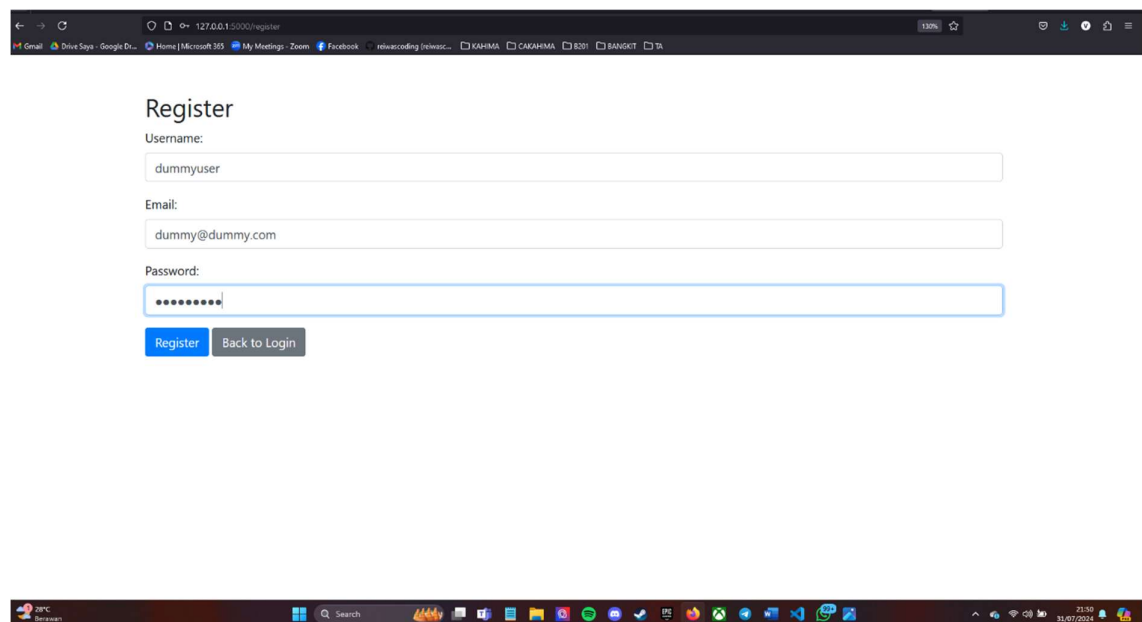
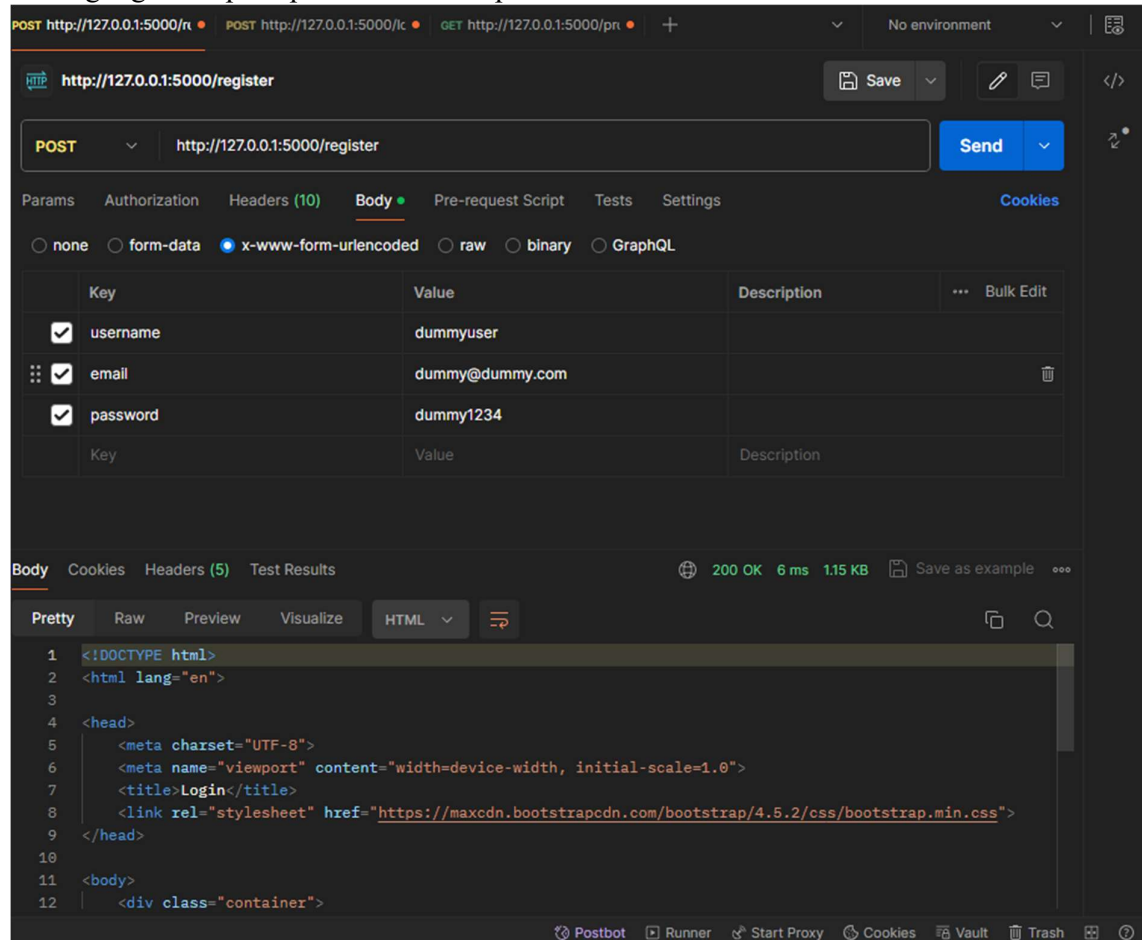
1. Flask untuk backend
2. Mysql untuk database
3. Postman untuk test API
4. HTML untuk webapp (frontend) sederhana.

Hasil:

1. Proses pembuatan database pada mysql



2. Testing registrasi pada postman dan tampilan web:



Proses validasi (user sudah ada atau email error)

POST http://127.0.0.1:5000/register

POST http://127.0.0.1:5000/register

Send

ParamsAuthorizationHeaders (11)BodyPre-request ScriptTestsSettingsCookies

noneform-datax-www-form-urlencodedrawbinaryGraphQL

Key	Value	Description	Bulk Edit
username	dummyuser		
email	dummy@dummy.com		
password	dummy1234		

BodyCookies (1)Headers (5)Test Results500 INTERNAL SERVER ERROR247 ms77.76 KBSave as example

PrettyRawPreviewVisualizeHTML

```
1 <!doctype html>
2 <html lang=en>
3
4 <head>
5   <title>sqlalchemy.exc.IntegrityError: (pymysql.err.IntegrityError) (1062, &#34;Duplicate entry &#39;
6     dummyuser&#39;
7     for key &#39;user.username&#39;&#34;)&#34;
8     [SQL: INSERT INTO user (username, email, password) VALUES %(username)s, %(email)s, %(password)s]
9     [parameters: {&#39;username&#39;: &#39;dummyuser&#39;, &#39;email&#39;: &#39;dummy@dummy.com&#39;,
10      &#39;password&#39;: &#39;$2b$12$Wl0y/zaqSnSGVbTaYTGFAu0cJsHn0y5d0huDQUaI6sU5AS/mZjLJ.&#39;}]
11     (Background on this error at: https://sqlalche.me/e/20/gkpi)
// Werkzeug Debugger</title>
```

PostbotRunnerStart ProxyCookiesVaultTrash

POST http://127.0.0.1:5000/register

POST http://127.0.0.1:5000/register

Send

ParamsAuthorizationHeaders (11)BodyPre-request ScriptTestsSettingsCookies

noneform-datax-www-form-urlencodedrawbinaryGraphQL

Key	Value	Description	Bulk Edit
username	newuser		
email	newuseroke		
password	new12344		

BodyCookies (1)Headers (5)Test Results400 BAD REQUEST14 ms219 BSave as example

PrettyRawPreviewVisualizeHTML

```
1 An email address must have an @-sign.
```

PostbotRunnerStart ProxyCookiesVaultTrash

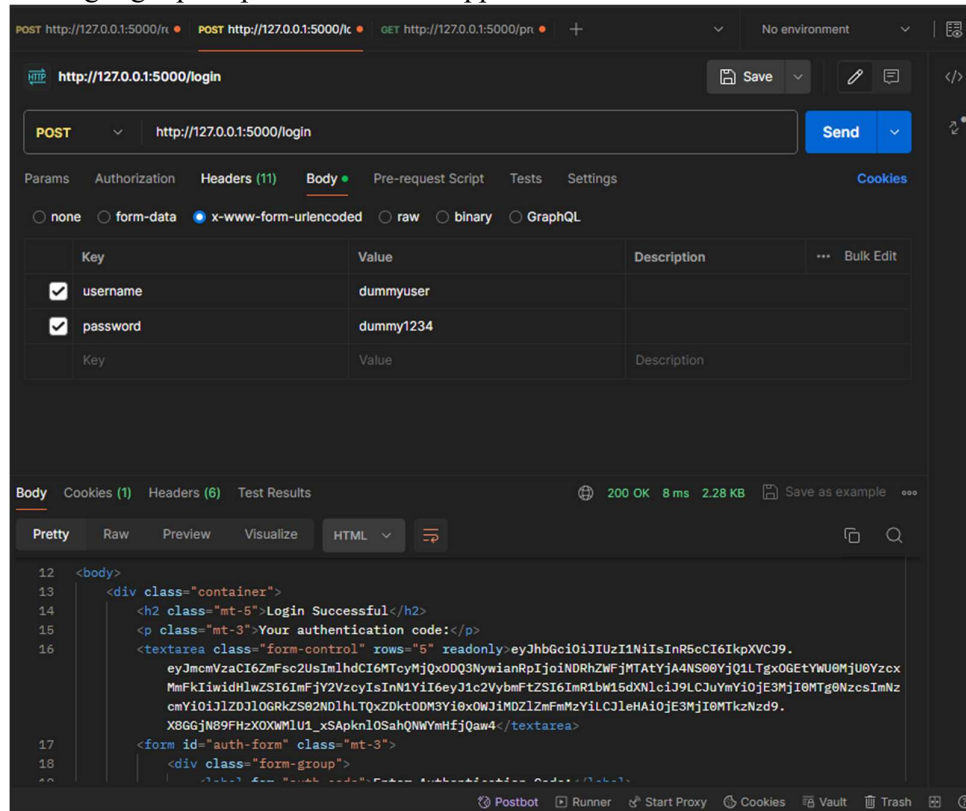
IntegrityError

```
sqlalchemy.exc.IntegrityError: (psycopg.err.IntegrityError) SQL: "Duplicate entry 'dummyuser' for key 'user.username'"
[SQL: INSERT INTO user (username, email, password) VALUES (%(username)s, %(email)s, %(password)s)]
parameters: {'username': 'dummyuser', 'email': 'dummy@dummy.com', 'password': '$20912$UzA0t0rnw6e8fAb9seAct0@5itj0rCpuF5vutE7pt0'}
(background on this error at: https://sqlalche.me/e/20/gsq)
```

[illegible]

File "ratings.py", line 2, in commit
<http://mashinoo.com/mashinoo/>

3. Testing login pada postman dan webapp



Login

Username:

dummyuser

Password:

●●●●●●●●

[Login](#)

Register



POST http://127.0.0.1:5000/login

Send

Params Authorization Headers (10) **Body** Scripts Tests Settings Cookies

☐ none ☐ form-data ☒ x-www-form-urlencoded ☐ raw ☐ binary ☐ GraphQL

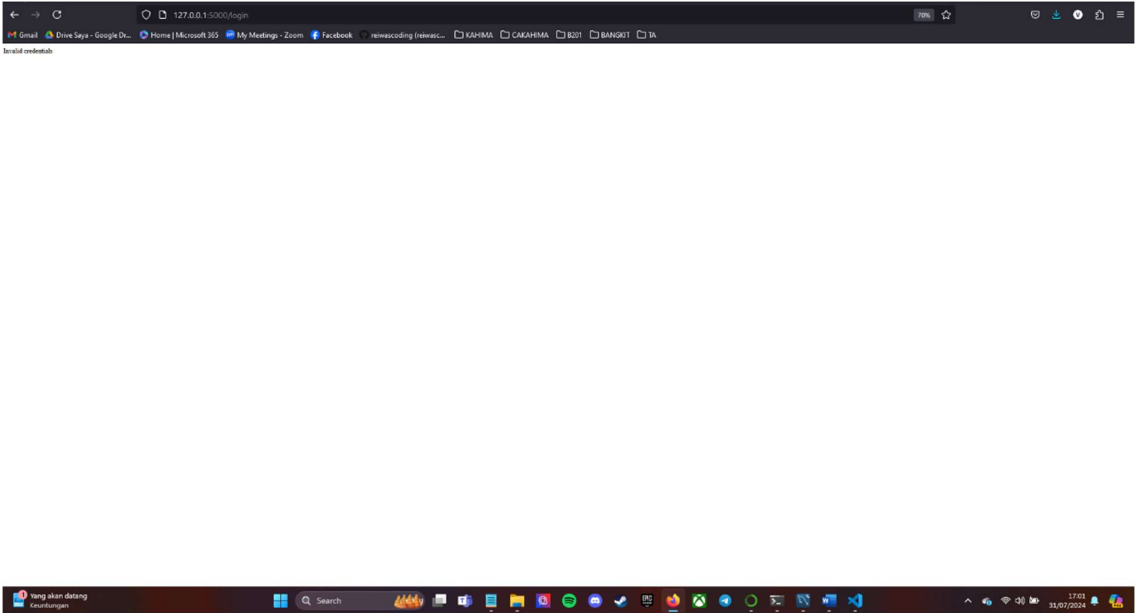
Key	Value	Description	...	Bulk Edit
<input checked="" type="checkbox"/> username	dddd			
<input checked="" type="checkbox"/> password	dadada			
Key	Value	Description		

Body Cookies Headers (5) Test Results

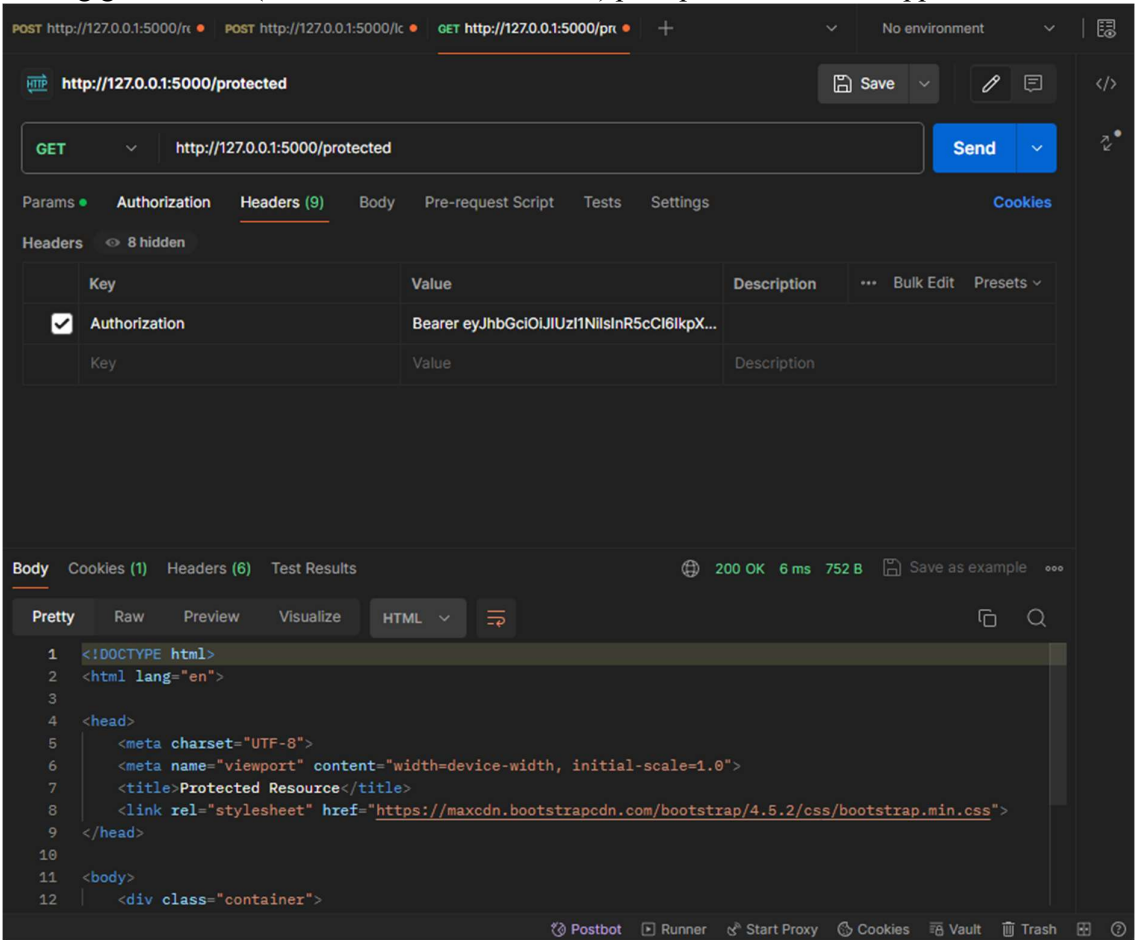
401 UNAUTHORIZED 10 ms 202 B Save as example

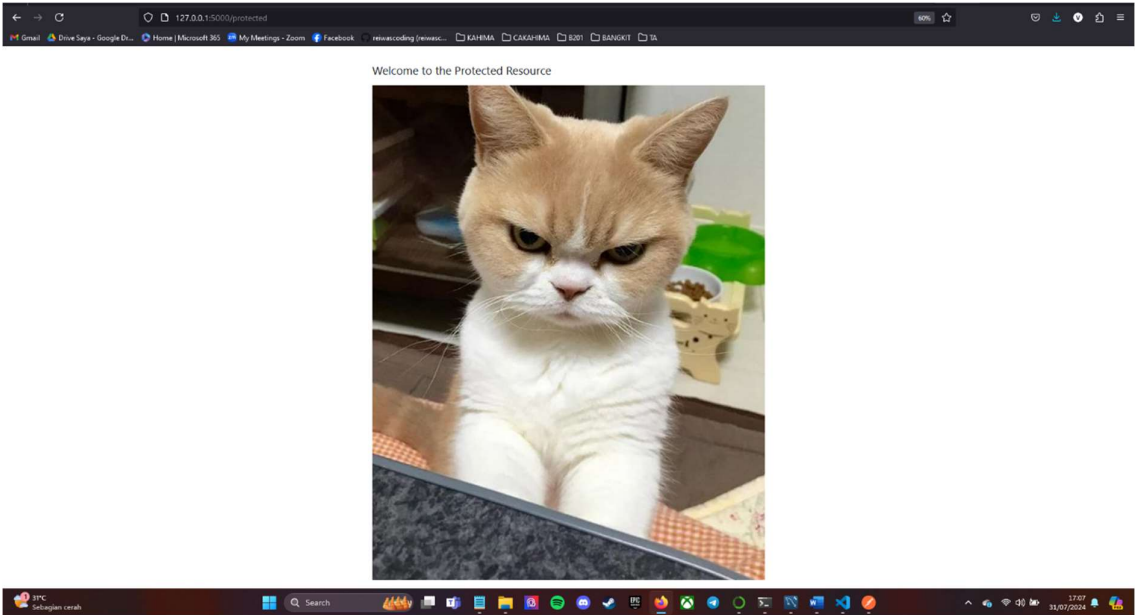
Pretty Raw Preview Visualize **HTML**

```
1 Invalid credentials
```

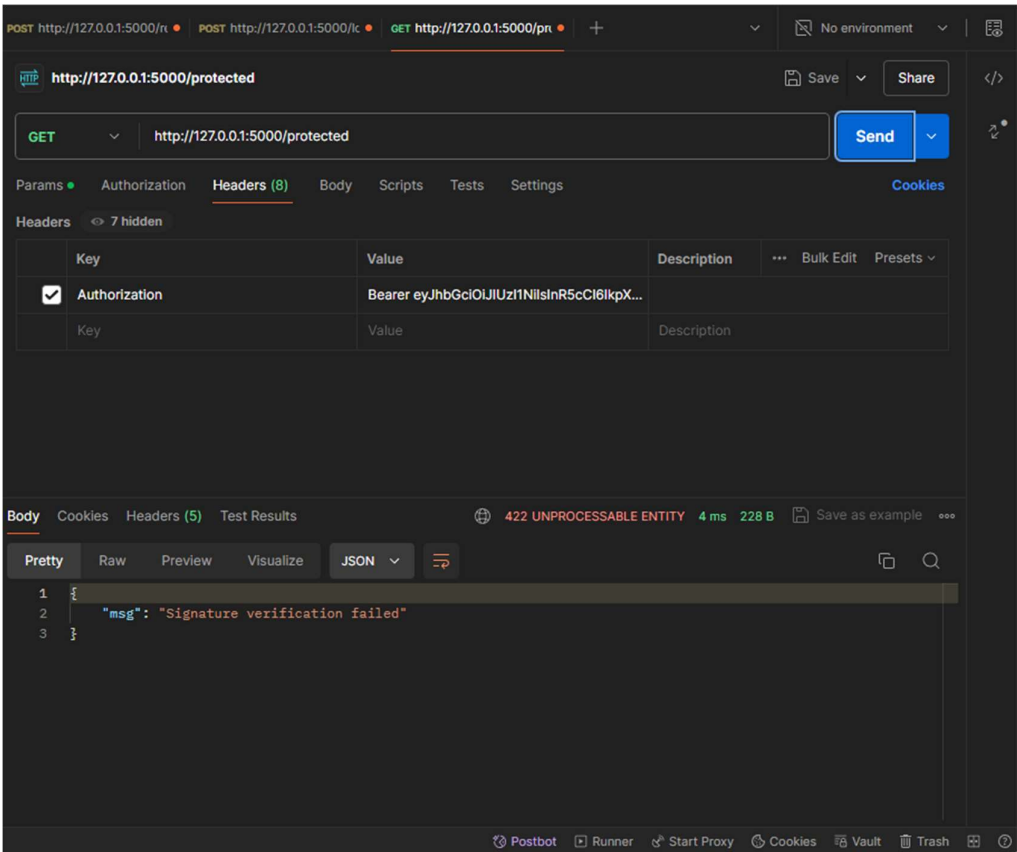


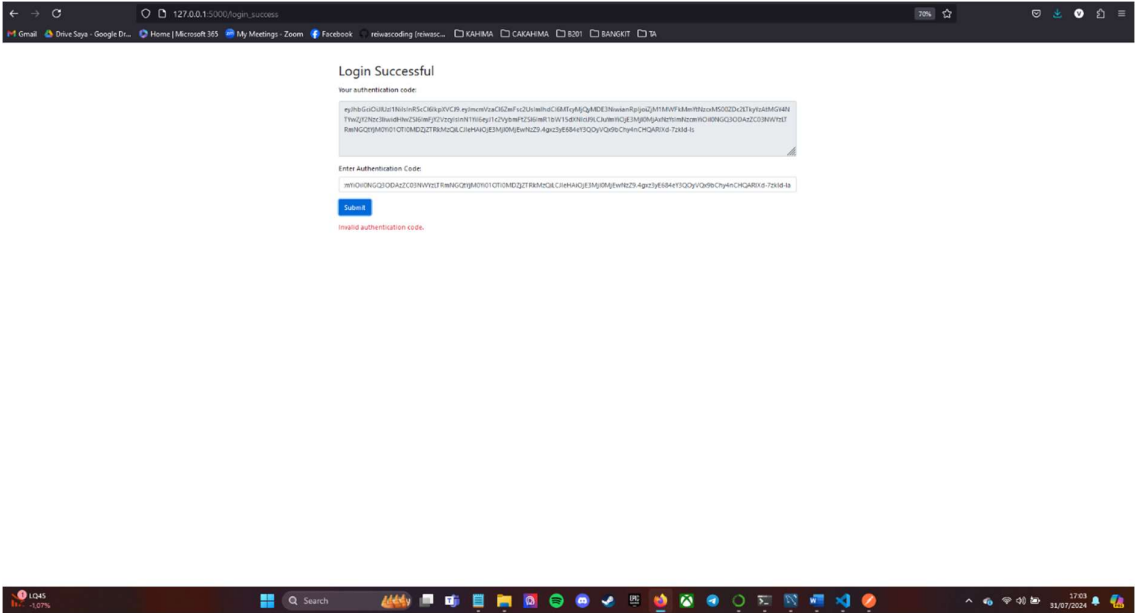
4. Testing get resource (masukkan kode akses token) pada postman dan webapp





Error Jika akses token tidak sesuai





Tambahan database pada mysql yang dibuat (password di hash)

MySQL Workbench

Local instance MySQL80

File Edit View Query Database Server Tools Scripting Help

Navigator

SCHEMAS

Filter objects

loguserapp

Tables

user

Columns

id

username

email

password

Indexes

Foreign Keys

Triggers

Views

Stored Procedures

Functions

sakila

sys

world

Administration Schemas

Information

Table: user

Columns:

id int AI PK

username varchar(80)

email varchar(120)

password varchar(200)

Query 1

SQL File 3*

1 USE loguserapp;

2

3 SELECT * FROM User;

Result Grid

id	username	email	password
1	testuser	test@example.com	\$2b\$12\$DfpAzTn1CV13DZ56xt2R.VtgEoAP9ZF776Y/Nvp9dRmtR...
2	halo	halo@halohalo.com	\$2b\$12\$dxmDoIW38p2.f1tDqT2S.eCjgcOwKpY5puOg643z1Fv.CM...
3	dummyuser	dummy@dummy.com	\$2b\$12\$8CC9fmJNH5r3E7zpHmxDmuYEpwRtG.a5PdtdfQCpFU3Xav...
NULL	NULL	NULL	NULL

SQLAdditions

Automatic context help is disabled. Use the toolbar to manually get help for the current caret position or to toggle automatic help.

Form Editor

Field Types

Query Stats

User 1

Apply Revert Context Help Snippets

Output

Action Output

#	Time	Action	Message	Duration / Fetch
1	16:37:49	USE loguserapp	0 row(s) affected	0.000 sec
2	16:37:49	SELECT * FROM User LIMIT 0, 1000	3 row(s) returned	0.000 sec / 0.000 sec

Object Info Session