

1. For this practical we required MongoDB, postman, vs code install on your computer

2. Create empty folder for example ass_3_b and open this folder in vs code

3. Open cmd terminal up to this folder

4. For this practical we need package.json, so we run following cmd command :

>npm init

Note : hit enter upto 9 to 10 times

>npm i mongodb

Note : it is for installing monogdb inside the project

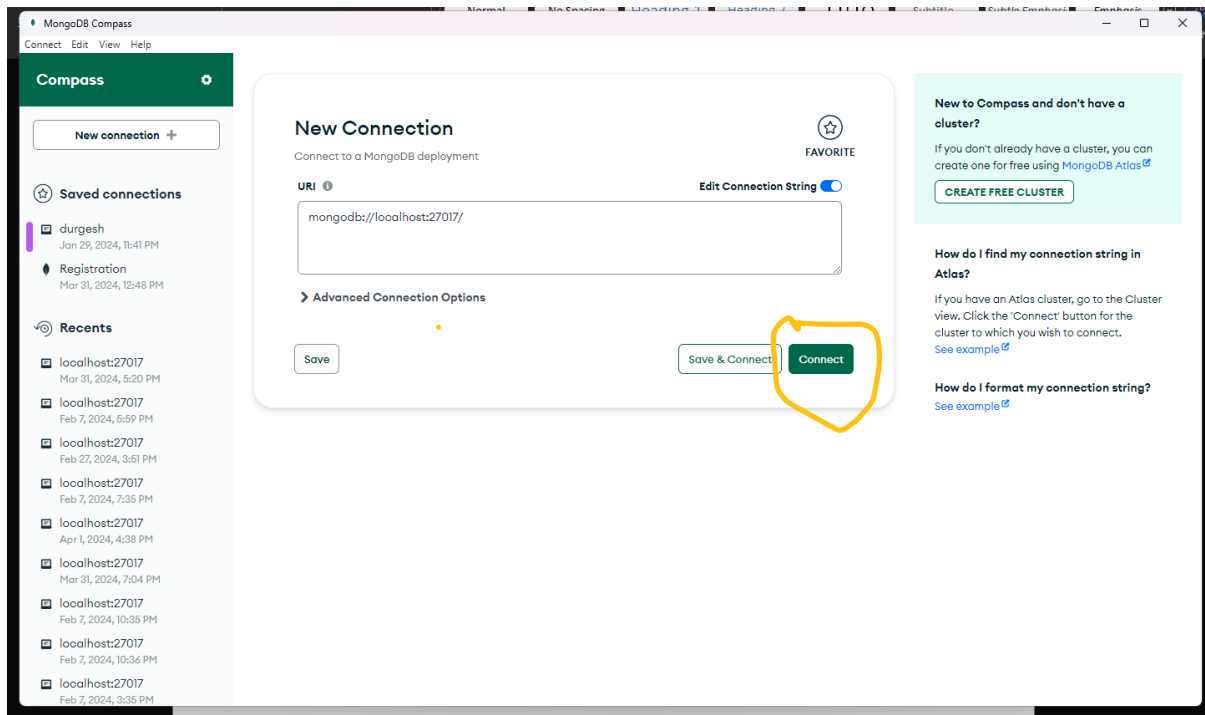
>npm i express

5. Create file index.js in practical folder

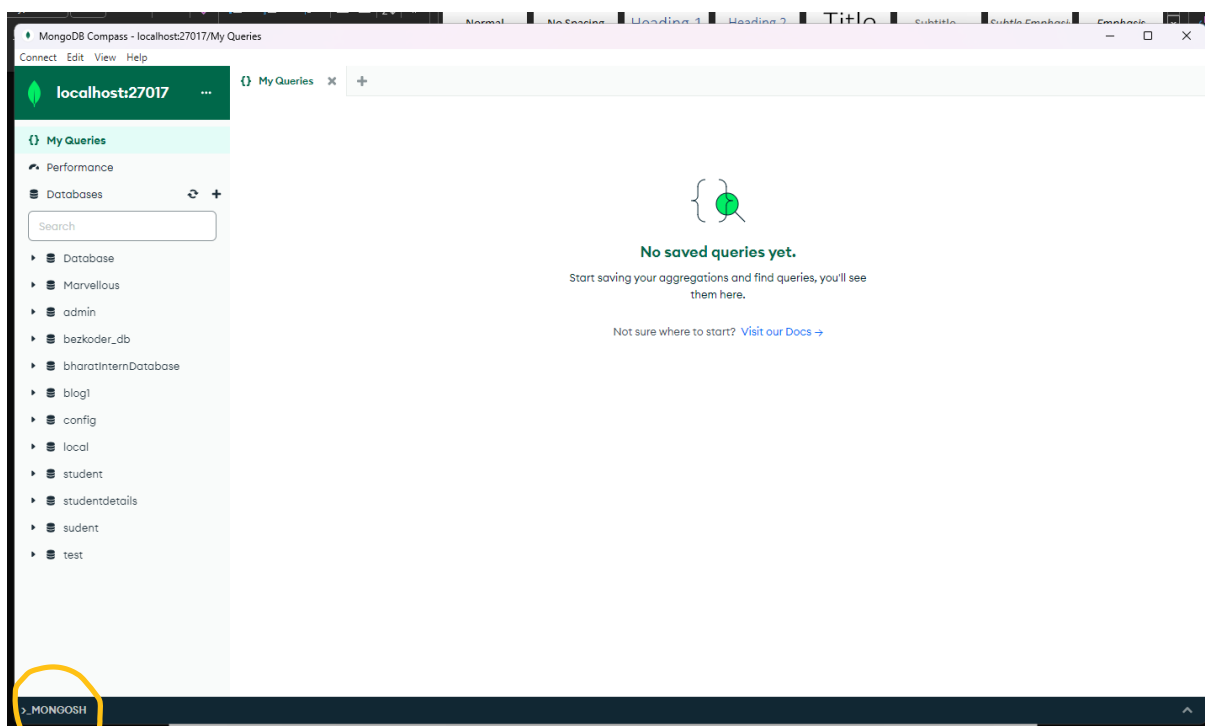
6. Create file mongodb.js in practical folder

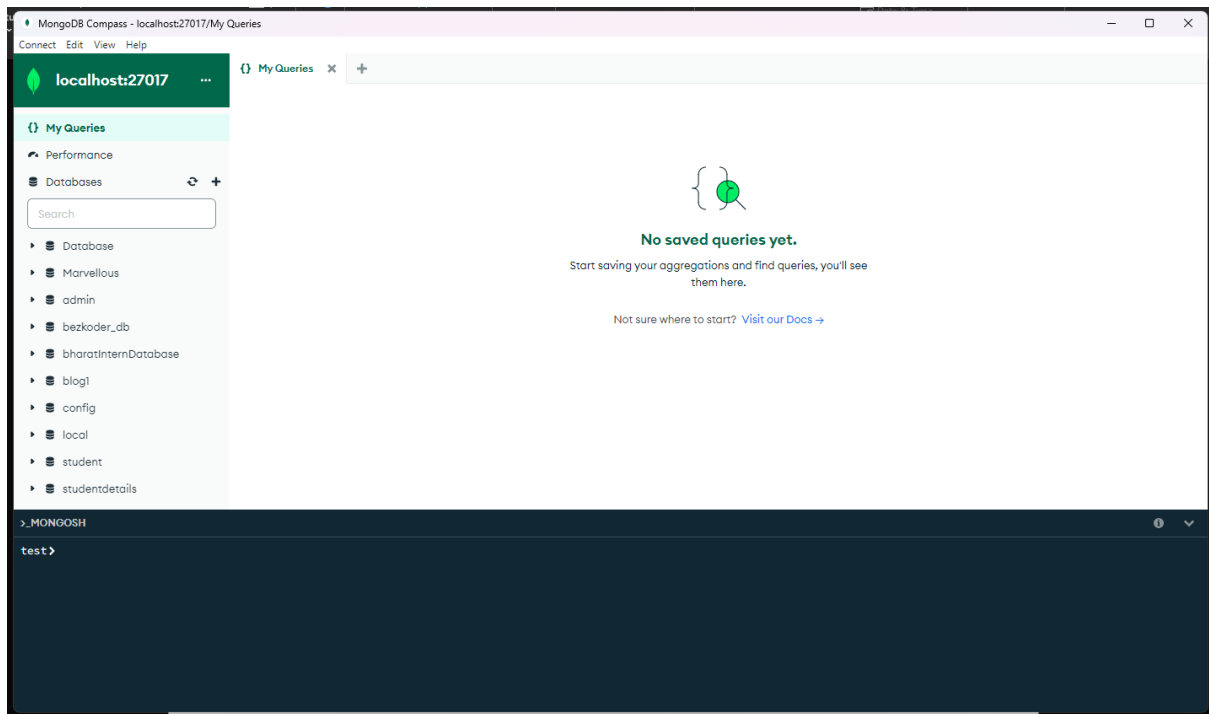
7. Go to MongoDB compass and connect following link and click connect button

Link = (mongodb://localhost:27017)



8. After connect link we show this page and click on (>_MONGOSH)

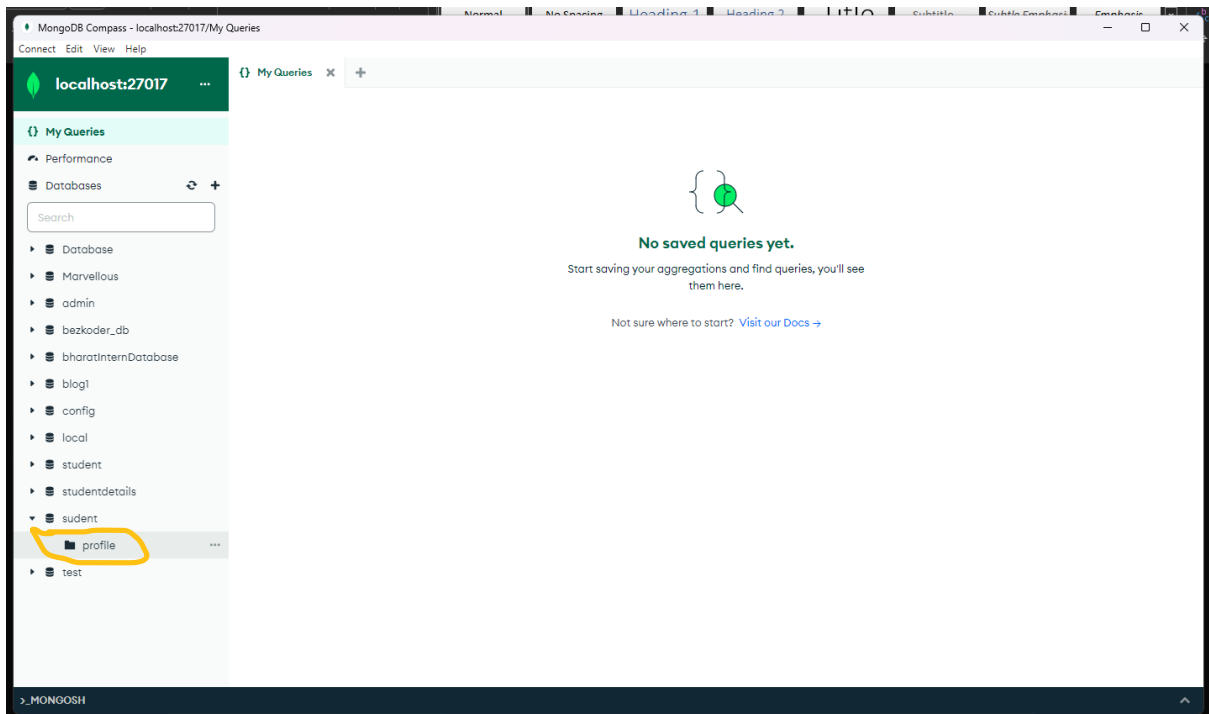




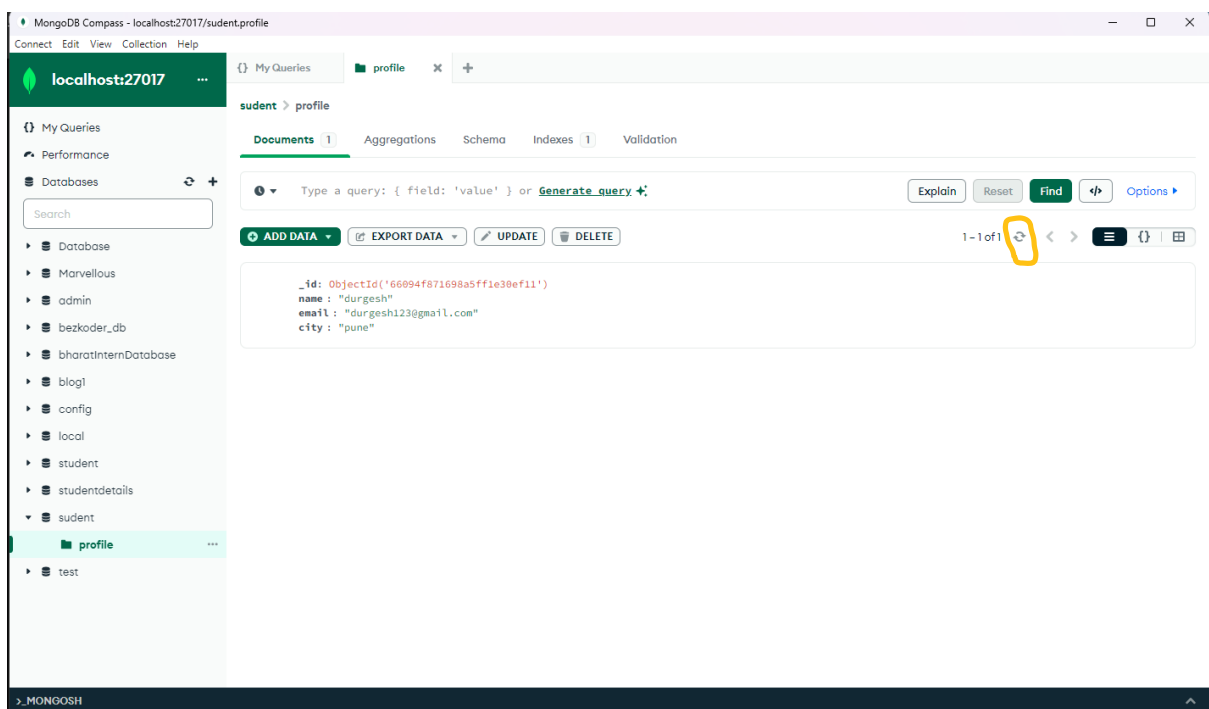
9. After the mongosh open the write one by one command for create data base and collection :

```
>show dbs
>use student
>db.createCollection('profile')
>db.profile.insertOne({name:"durgesh", email:"durgesh123@gmail.com",
city:"pune"})
```

10. After that check the student and then profile as follow :



11. After that refresh the profile the you see the data



12. Go to mongodb.js file in practical folder and write following code :

```
const { MongoClient } = require('mongodb');
const url = "mongodb://localhost:27017";
const database = 'student';
const client = new MongoClient(url, { useUnifiedTopology: true });

const dbConnect = async () => {
  try {
    await client.connect(); // Connect to MongoDB
    const db = client.db(database); // Select the database
    return db.collection('profile'); // Return the collection
  } catch (error) {
    console.error('Error:', error); // Log any errors
    throw error; // Re-throw the error to be handled by the caller
  }
};

module.exports = dbConnect;
```

13. Go to index.js file in practical folder and write following code :

```
const dbConnect = require('./mongodb');
const express = require('express');
const app = express();
app.use(express.json())

// GET API
app.get('/', async (req, res) => {
  try {
    const collection = await dbConnect(); // Connect to MongoDB
    const result = await collection.find().toArray(); // Query the collection
    res.send(result); // Send response
  } catch (error) {
    console.error('Error:', error); // Log any errors
    res.status(500).send('Internal Server Error'); // Send a generic error
  }
});

//post API
app.post('/', async (req, res) => {
  let result = await dbConnect();
  result = await result.insertOne(req.body);
  res.send("Data Inserted Successfully")
});

//put API
```

```

app.put('/:name', async(req, res) => {
  let result = await dbConnect();
  result = await result.updateOne({name: req.params.name}, {$set: req.body});
  res.send("Data updated Successfully")
});

// delete API
app.delete('/:name', async(req, res) => {
  let result = await dbConnect();
  result = await result.deleteOne({name: req.params.name});
  res.send("Data deleted Successfully")
});

const PORT = 3000;
app.listen(PORT, () => {
  console.log(`Server is running on http://localhost:${PORT}`);
});

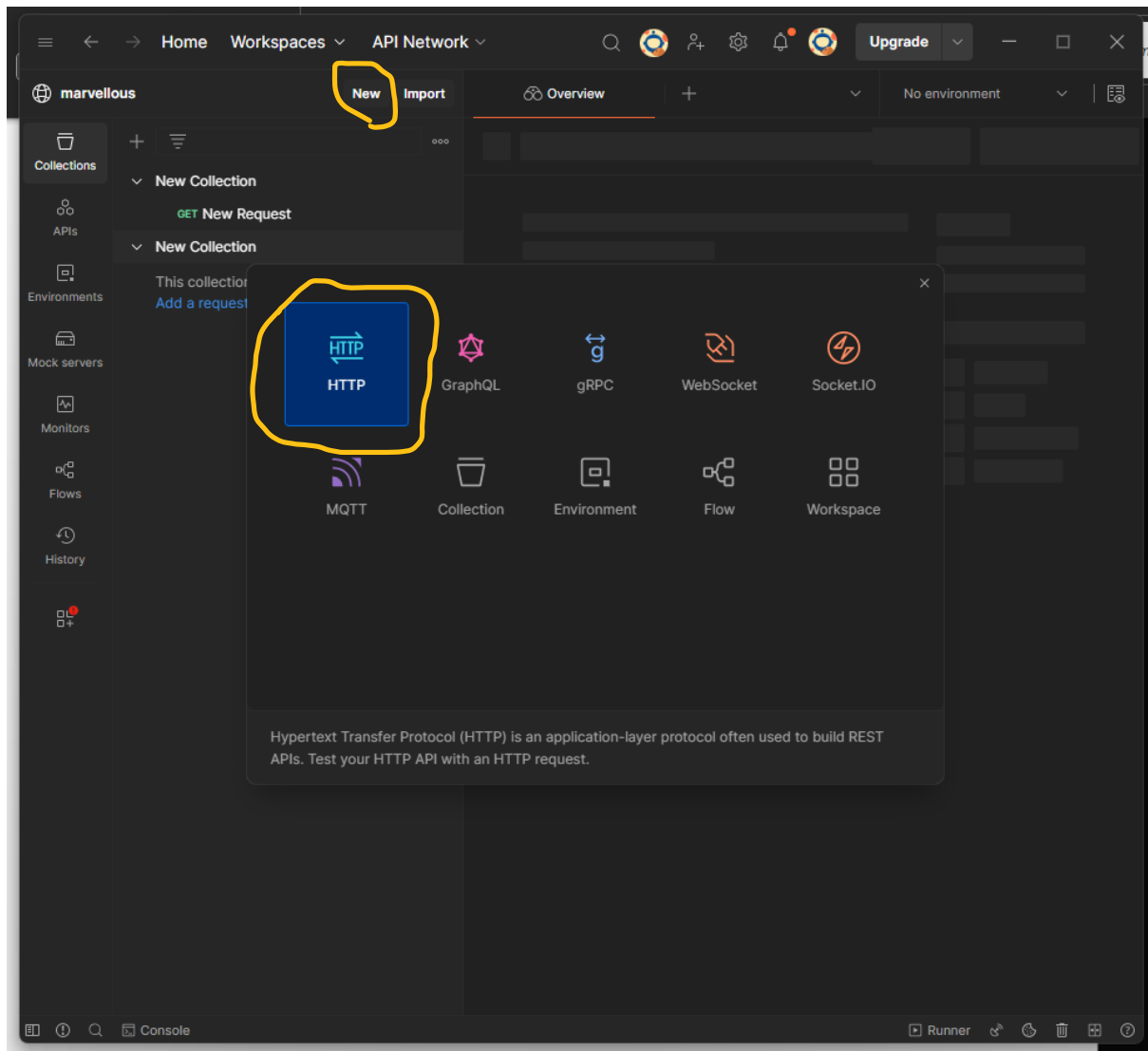
```

- 14. To run code, open cmd for practical folder then following cmd command enter :**
 >node index.js

15. Then open the postman

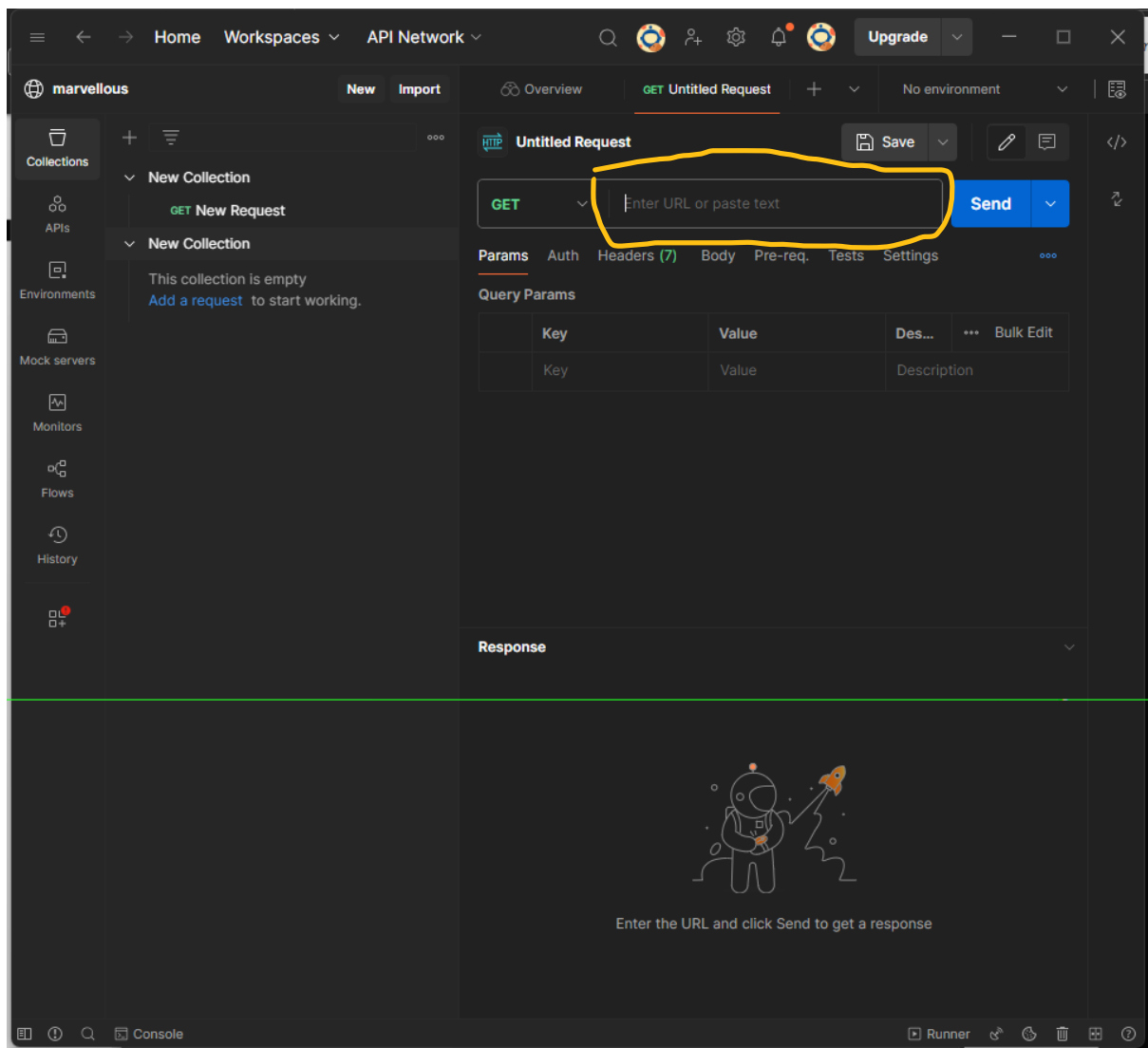
Note = connect the internet your computer or laptop

Then open postman and click on **new** button and then click on **HTTP**



16. Enter the URL in it as follow as :

URL = `http://localhost:3000`



17. After the enter the URL select get method and JSON formate and send the request as follow as :

