

Name : Gloria Jepkurui
Batch code : LISUM35
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Deployment steps:

1. Used insurance data to train and test a model(project i did 3 months ago). I cloned the insurance repository
2. Saved the model into a file using pickle(serialization)

```
[81]: # saving the trained model to a file using pickle(serilization)

with open('multi_model.pkl', 'wb') as multimodel_file:
    pickle.dump(multi_model, multimodel_file)
```

3. Created an app using flask and loaded the model(deserilization) in a python script. Saving everything in the same directory.

```
10     # deserilization
11     with open(multimodel_path, 'rb') as multimodel_file:
12         multi_model = pickle.load(multimodel_file)
13
14     # creating the flask application
15     in_app = Flask(__name__)
16
17     # defining the prediction endpoints
18     new *
19     @in_app.route(rule: '/predict', methods = ['POST'])
20     def predictin():
21         data = request.get_json(force = True)
22         prediction = multi_model.predict(np.array(data['features']).reshape(1, -1))
23         return jsonify({'prediction': int(prediction[0])})
24
25     if __name__ == '__main__':
26         in_app.run(debug = True)
27
```

4. Runned the python file above in the terminal. Got the code below

```
* Running on http://127.0.0.1:5000
Press CTRL+C to quit
* Restarting with stat
* Debugger is active!
* Debugger PIN: 693-660-709
/Library/Frameworks/Python.framework/Versions/3.12/lib/python3.12/site-packages/
```

5. Tested the app using Curl in the terminal and, giving 3 features.

```
gloriajepkurui@glorias-MacBook-Air pythonProject2 % curl -X POST http://127.0.0.1:5000/pre
dict -H "Content-Type: application/json" -d '{"features": [5.1, 3.5, 1.4]}'
{
  "prediction": 23878
}
```