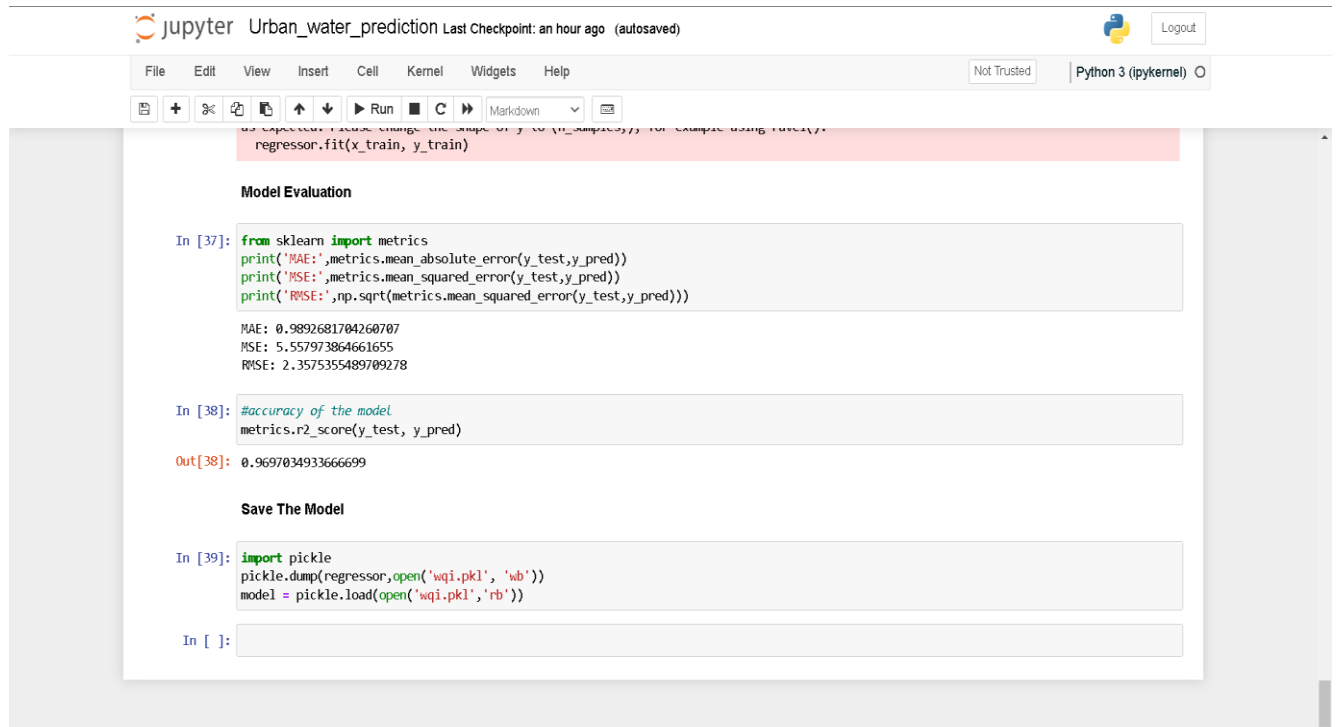


## Model evaluation and save the model (screen shot)



The screenshot shows a Jupyter Notebook titled "Urban\_water\_prediction" with a last checkpoint from an hour ago. The interface includes a top bar with the Jupyter logo, a menu bar (File, Edit, View, Insert, Cell, Kernel, Widgets, Help), and a status bar indicating "Not Trusted" and "Python 3 (ipykernel)".

The notebook content is as follows:

```
regressor.fit(x_train, y_train)
```

**Model Evaluation**

```
In [37]: from sklearn import metrics
print('MAE:', metrics.mean_absolute_error(y_test, y_pred))
print('MSE:', metrics.mean_squared_error(y_test, y_pred))
print('RMSE:', np.sqrt(metrics.mean_squared_error(y_test, y_pred)))
```

MAE: 0.9892681704260707  
MSE: 5.557973864661655  
RMSE: 2.3575355489709278

```
In [38]: #accuracy of the model
metrics.r2_score(y_test, y_pred)
```

Out[38]: 0.9697034933666699

**Save The Model**

```
In [39]: import pickle
pickle.dump(regressor, open('wqi.pkl', 'wb'))
model = pickle.load(open('wqi.pkl', 'rb'))
```

In [ ]: