

OUTPUT FOR EXP-5

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EXP_NO: 5

```
In [9]: ┌─ test_loss = model.evaluate(X_test, y_test)
      └─ print(f'Test Loss: {test_loss:.4f}')

7/7 [=====] - 0s 5ms/step - loss: 0.0241
Test Loss: 0.0241
```

```
In [10]: ┌─ y_pred = model.predict(X_test)
      ┌─ r2 = r2_score(y_test, y_pred)
      └─ print(f'Test Accuracy (R^2): {r2:.4f}')

7/7 [=====] - 0s 5ms/step
Test Accuracy (R^2): 0.9974
```

```
In [11]: ┌─ new_data = np.random.randn(5, seq_length, 1)
      ┌─ predictions = model.predict(new_data)
      ┌─ print("Predictions for new data:")
      └─ print(predictions)

1/1 [=====] - 0s 52ms/step
Predictions for new data:
[[ 1.7613161 ]
 [ 0.40740597]
 [-2.23266   ]
 [-0.6163975 ]
 [-3.7167645 ]]
```