Machine Learning

1. Simple Linear Regression (SLR)

r value : 0.9740993407213511

2. Multiple Linear Regression (MLR)

r value : 0.8752655285748308

3. Support Vector Machine (SVM)

| S.No. | Hyper | Linear | Rbf | Sigmoid |
|-------|-----------|----------------------|-----------------------|----------------------|
| | Parameter | (r value) | (r value) | (r value) |
| 1 | C10 | -0.10688472989969555 | -0.1252866489876978 | -0.12282399885801709 |
| 2 | C100 | 0.043028787192186724 | -0.12082928043721641 | -0.09643982602560075 |
| 3 | C500 | 0.5352294370636045 | -0.10145561220944055 | 0.006463608193940318 |
| 4 | C1000 | 0.7942555097665868 | -0.08004178386944938 | 0.13765819775656585 |
| 5 | C2000 | 0.8702566771208996 | -0.030598045144669017 | 0.3607138793038652 |
| 6 | C3000 | 0.8584113827650428 | 0.019267014815530947 | 0.498686411516731 |

4. Decision Tree (DT)

| S.No. | Criterion | Max Features | Splitter | R Value |
|-------|----------------|--------------|----------|--------------------|
| 1 | squared_error | | best | 0.8703329257281747 |
| 2 | squared_error | | random | 0.915127746813233 |
| 3 | friedman_mse | | best | 0.894941237346528 |
| 4 | friedman_mse | | random | 0.873574439994718 |
| 5 | absolute_error | | best | 0.9124565184225324 |
| 6 | absolute_error | | random | 0.7591741617411957 |
| 7 | poisson | | best | 0.9180709939149946 |
| 8 | poisson | | random | 0.887801824733989 |