**Air Fare prediction Analysis**

**Business objective-** To predict airfare, as domestic air travel is popular these days in India with different air ticket booking channels, travelers are trying to make sense and understand how airlines price their tickets over time.

We want you to explore previous airfare data and build a model to predict the price fluctuations over time so that the consumer could benefit from it. We want you to identify dependency over many endogenous variables. You are free to look at different models from the space of forecasting and regression.

**Acceptance criteria:**

To build the best model which gives the maximum performance, and need to deploy the model with either RShiny or Flask . Model with least error or rmse.

**Milestones:**

45 days to complete the Project

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| **Milestone** | **Duration** | **Task start - End Date** |
| Kick off and Business Objective discussion | 1 day |  |
| Data set Details | 1 Week – 1 ½ week |  |
| EDA | 2 Weeks – 2 ½ week |  |
| Model Building | 1 Week – 1 ½ week |  |
| Model Evaluation | 1 ½ week |  |
| Feedback |  |
| Deployment | 1 Week |  |
| Final presentation | 1 day |  |

Protocols:

1. All participants should add here to agreed timelines and timelines will not be extended
2. All the documentation – Final presentation and R/python code to be submitted before the final presentation day
3. All the participants must attend review meetings

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| Linear Regression | 2.684559e+03 | 6.769345e+07 | 8.150270e+03 | 1.625000e-01 | 1.4009 | 9.5314 |
| **1** | Ridge Regression | 2.682746e+03 | 6.769330e+07 | 8.150259e+03 | 1.625000e-01 | 1.2647 | 9.5241 |
| **2** | Least Angle Regression | 2.682861e+03 | 6.769345e+07 | 8.150268e+03 | 1.625000e-01 | 1.2646 | 9.5256 |