Telecom Churn

Case study

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Problem statement

In the telecom industry, customers are able to choose from multiple service providers and actively switch from one operator to another. In this highly competitive market, the telecommunications industry experiences an average of 15-25% annual churn rate. Given the fact that it costs 5-10 times more to acquire a new customer than to retain an existing one, customer retention has now become even more important than customer acquisition.

For many incumbent operators, retaining high profitable customers is the number one business goal. To reduce customer churn, telecom companies need to predict which customers are at high risk of churn. In this project, you will analyse customer-level data of a leading telecom firm, and build predictive models to identify customers at high risk of churn.

Business goal

> " Goal is to build a machine learning model that is able to predict churning customers based on the features provided for their usage. "
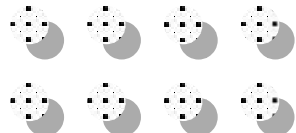
Steps

- Data Understanding, Preparation, and
- Pre-Processing
- Exploratory Data Analysis
- Feature Engineering and Variable Transformation
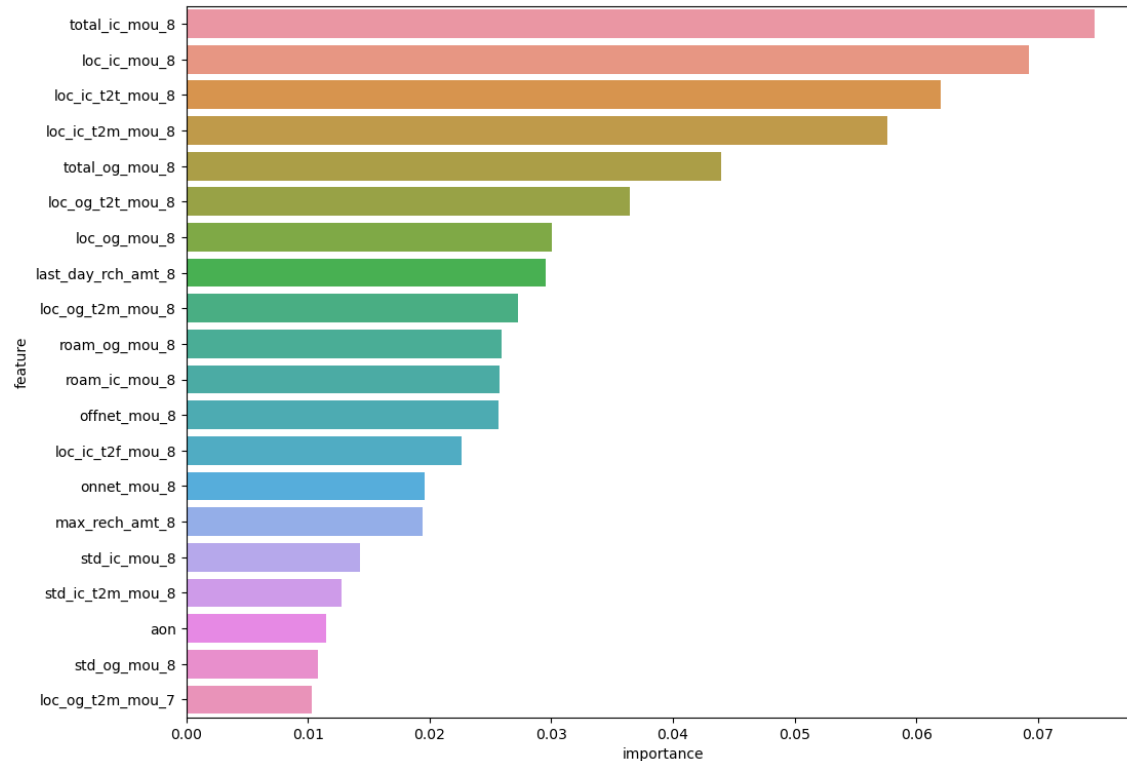- Model Selection, Model Building, and Prediction

Illustrations by Pixeltrue on icons8

Conclusion

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We have used Random Forest as final model to create sample solution as it is giving test accuracy for 94%
August month's data is very useful in predicting as most of the important features belongs to august month
We can see various trends in august month like incoming and outgoing calls, last recharge date etc

Thank you