

Dear Sir/Madam,

Upon conducting my initial analysis for PowerCo, I have identified two primary hypotheses that require testing. Firstly, we aim to determine if customer churn is influenced by price sensitivity. The second hypothesis involves assessing the effectiveness of offering a 20% discount to customers with a high propensity to churn.

To test these hypotheses effectively, we need to create a churn prediction model and analyse the impact of price on churn rates. Since this is a classification problem, we will employ one or more classification algorithms, such as Logistics Regression, Decision Tree, or Random Forest, among others.

However, before delving into the model building process, we must perform Exploratory Data Analysis (EDA) to validate whether customer churn is indeed driven by price sensitivity. Once we confirm the relationship, we can proceed to identify the most suitable model that fits the data best.

Once we have the chosen model, we can evaluate the influence of price on churn rates and accurately assess the business impact of the second hypothesis.

Best regards,

Ramakrushna Mohapatra