

Respected Sir,

The task that you assigned is now completed. I have understood the problem and formulated the Hypothesis testing based on client's estimations. My findings are described below :-

We have our Null Hypothesis as – Churn rate doesn't significantly depends on price sensitivity of Client.

Alternative Hypothesis – Major reason behind high churn rate is price sensitivity of client.

There are two major causes of Churn :-

- Customers getting better/offers rates elsewhere.
- Customers not satisfied with the quality of service provided, or frequent problems related to power supply/Gas supply.

Although there are many other reasons, but in case of Power/Gas supply companies above mentioned reasons are the major ones.

If an old, regular SME client switches to another power supplier, then it is highly likely that they would be getting better rates/offers by other power suppliers. If there were issues with power supply, or other issues like late response to complaints, then that SME company would have switched to other suppliers much earlier, and would not have become a regular subscriber of PowerCo.

While regarding Small Enterprises that switched to other suppliers just after the end of their first subscription period or remained a subscriber only for a short period of time, it is likely that they would have moved towards other suppliers because they were not satisfied with quality of services of PowerCo.

Thus, if we get the data of Tenure of Client that for how long they were customers of PowerCo, then we may reach the conclusion of our Hypothesis test.

If majority of SME's that churn were old, regular clients of PowerCo then the high churn rate may be because of better rates/offers by other suppliers.

If we get the following features in the data from PowerCo, then it would be helpful in Hypothesis testing, and also in predicting which client is more likely to churn :-

- Data about the Tenure of SME being a client of PowerCo.
- Data about the units of electricity being consumed or the amount of fuel consumed by PowerCo's clients.
- Avg of total amount of bill in Invoice.
- Any other feature related to specifications of the services provided to clients by PowerCo.

I would be happy to get suggestions regarding changes to my problem formulation, or any other points that can be added to this hypothesis.

Thanking You,

Your's faithfully,

Anand Rangwani