

### PROBLEM STATEMENT:

- X Education gets many leads, its lead conversion rate is very poor.
  - For example, if, say, they acquire 100 leads in a day, only about 30 of them are converted.
- To make this process more efficient, the company wishes to identify the most potential leads, also known as **'Hot Leads'**.
- Identifying this specific group of leads will likely result in an increase in the lead conversion rate. This is because the sales team can now concentrate their efforts on engaging with these potential leads, as opposed to making calls to a broader audience.

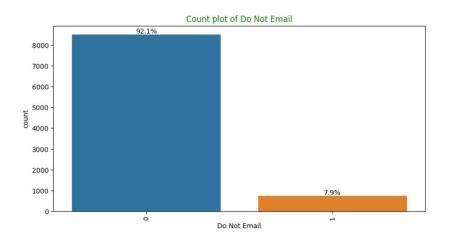
### APPROACH:

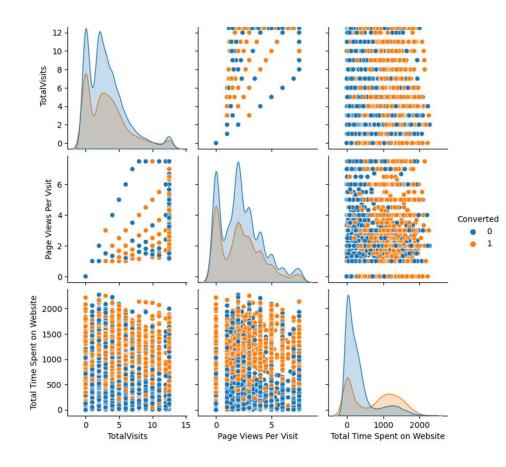
#### DATA CLEANING

- Data cleaning and manipulation will be performed on the data to remove any duplicate or NA data.
- Missing values will be imputed or dropped to get rid of the noise data.
- Outliers will be capped to ensure that the data isn't skewed.

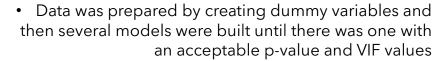
## EXPLORATORY DATA ANALYSIS

 Univariate and Bivariate analysis is performed on the data to find insights that will help build the final model

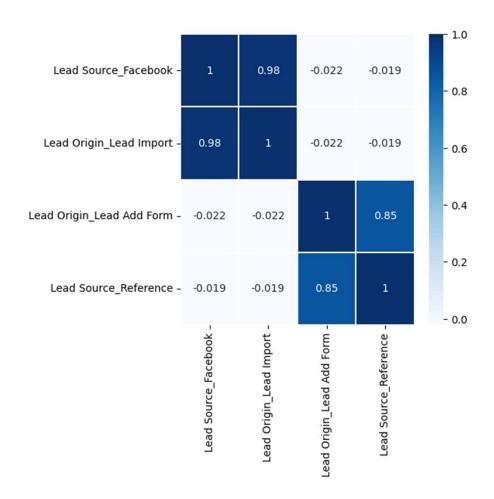




## PREPARATION AND MODEL BUILDING

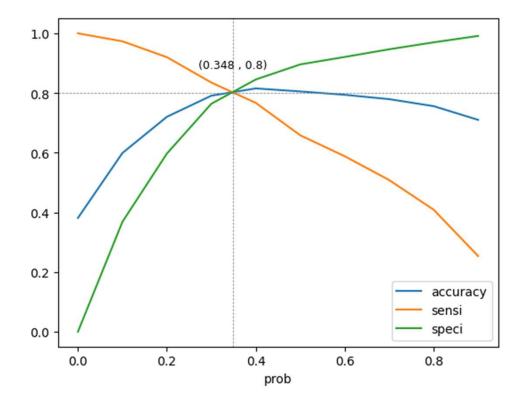


- In total, 3 models were built
- The final model was then evaluated using the test data



## ROC CURVE, PRECISION AND RECALL TRADEOFF

• We calculated the optimal cutoff point at 0.348



# TOP VARIABLES THAT AFFECT THE CONVERSION

•	Lead Source_Welingak Website	5.387708
•	Lead Source_Reference	2.885927
•	Last Activity_SMS Sent	2.077642
•	const	1.615927
•	Last Activity_Others	1.440835
•	Total Time Spent on Website	1.049712
•	Last Activity_Unreachable	0.986308
•	Last Activity_Email Opened	0.954607
•	Lead Source_Olark Chat	0.889806
•	Lead Source_Others	0.763346

Some of the main lead sources to focus on are:

- Welingak Website: Improve the advertisement.
- Referrals: Word-of-mouth is an important source of revenue.
- Olark Chat: Make use of chatbots to engage with prospective students better.

Some other avenues to focus on are:

- Building a great followup campaign.
- Building scalable SMS campaigns.
- Having a great landing page.

## CONCLUSION TO THE X EDUCATION TEAM