1. Which are the top three variables in your model which contribute <u>most</u> towards the probability of a lead getting converted?

Following are the top three variables in the model which <u>contribute</u> most (either positively or negatively) towards the probability of a lead converting to a paid customer

Variable	Co-efficient	Interpretation
Occupation_Working	3.8785	Working Professionals are more likely (+ve
Professional		influence) to convert to paid users.
LeadQuality_Worst	-3.7954	Leads marked as Worst quality are least likely (-
		ve influence) to convert to paid users.
Occupation_Other	3.4415	Customers with occupation Other are more
_		likely (+ve influence) to convert to paid users.

2. What are the top 3 categorical/dummy variables in the model which should be focused the most on in order to increase the probability of lead conversion?

Following are the top three categorical/dummy variables in the model which should be focused the most to increase probability of a lead conversion.

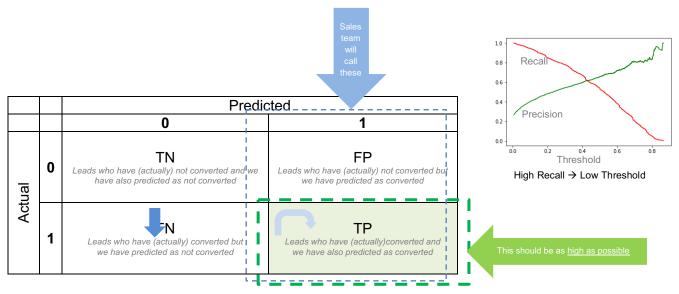
Variable	Co-efficient	Interpretation
Occupation_Working	3.8785	Working Professionals are more likely (+ve
Professional		influence) to convert to paid users
Occupation_Other	3.4415	Customers with occupation Other are more
_		likely (+ve influence) to convert to paid users.
LeadQuality_High in	2.8699	Leads marked with High Relevance are more
Relevance		likely (+ve influence) to convert to paid users

So, the Sales team should focus more on the leads

- Who are Working professionals or
- Who have occupation that falls in the 'Other' category and/or
- Leads who are marked as "High in Relevance"

3. X Education has a period of 2 months every year during which they hire some interns. The sales team, in particular, has around 10 interns allotted to them. So during this phase, they wish to make the lead conversion more aggressive. So they want almost all of the potential leads (i.e. the customers who have been predicted as 1 by the model) to be converted and hence, want to make phone calls to as much of such people as possible. Suggest a good strategy they should employ at this stage.

The goal of this phase is **Aggressive Lead Conversion** i.e., target <u>as many</u> potential leads as possible in a fixed duration of 2 months. In this case, our requirement is to reduce False Negatives i.e leads who would have in actual converted but we have predicted as not converted. This means the recall value should be high.



We can reduce the cut-off probability to reduce the False Negatives and increase the True Positives. Since there is no specific number of leads to target, we can adopt the following strategy

- Define cut-off ranges > 0.8, 0.8 to 0.6, 0.6 to 0.4, 0.4 to 0.2, <0.20
- For each of these defined cut-offs, identify the customers/leads that would convert
- First target the customers/leads in the >80 cut-off range. Once this is complete, move on to the next cut-off range and so on.

This way, the sales team can prioritize and target the most probable converts earlier on in the duration and then proceed to the next set. By the end of the (fixed) duration of 2 months, the sales team would have reached out as many potential candidates (if not all) as possible.

4. Similarly, at times, the company reaches its target for a quarter before the deadline. During this time, the company wants the sales team to focus on some new work as well. So during this time, the company's aim is to not make phone calls unless it's extremely necessary, i.e. they want to minimize the rate of useless phone calls. Suggest a strategy they should employ at this stage.

The goal of this phase is to **minimize useless phone calls** i.e., target <u>only</u> the high probable leads. In this case, our requirement is that the <u>precision (or the True positives)</u> <u>should be high</u> so that leads the sales team are calling will convert to paid customers. So, the sales team should use a high cut-off like 0.9 (or 0.8) to get the high probably leads and reach out to only them.

