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

- Total Time Spent on Website
- Total Visit
- Tag

The above three variables seems important to me because of the following reason:

Total Time Spent on Website:
- One insight into the time spent on a website is that people spent the time to do the course. So if they are spending more time it means that these have a high possibility of getting converted or opting for the course on the website, due to which we can consider this variable as an important one.
- Time spent on the website tells us the converted rate is high for those who have spent more time on the website.
- Below plot which also shows the conversion rate for the people who spent most of their time on the website have a high probability of conversion.
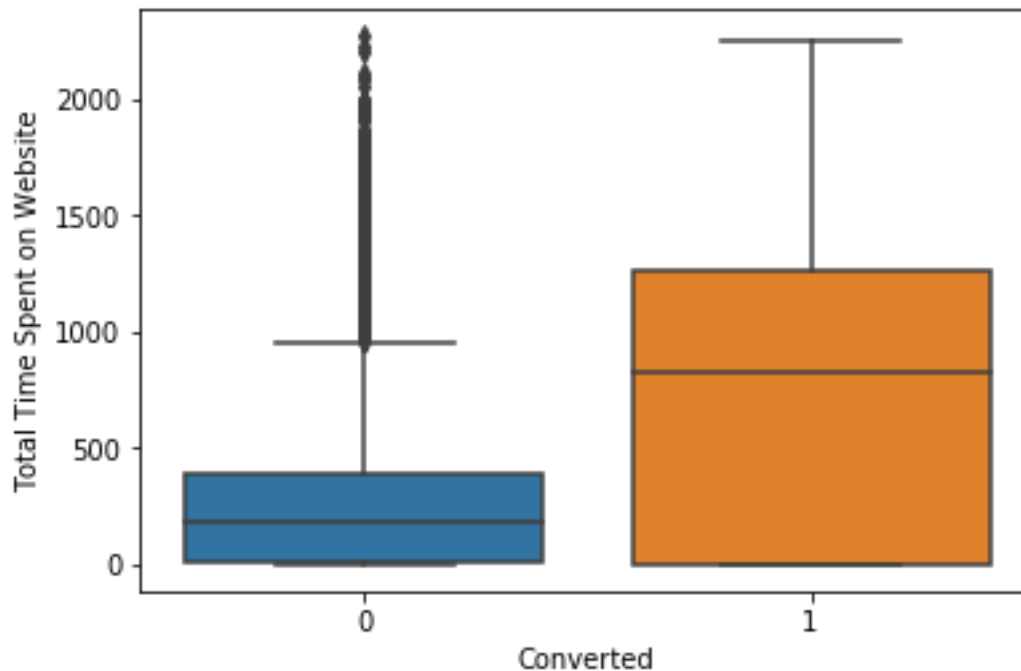
Total Visit:
- Total Visit defines the total number of visits made by the customer on the website. If a customer visits the page, again and again, it makes us understand that he has a necessity of taking up the course / he is willing to take the course.ie.., It seems like the conversion from lead can happen by opting the course.
- If they are visiting again mean that there is a high probability of conversion of them from leads to opt for buying the product.

- So the below plot also defines the same insight of people who are visiting more are likely to buy the course. It is practical also that the conversion rate will be more for those who visit the
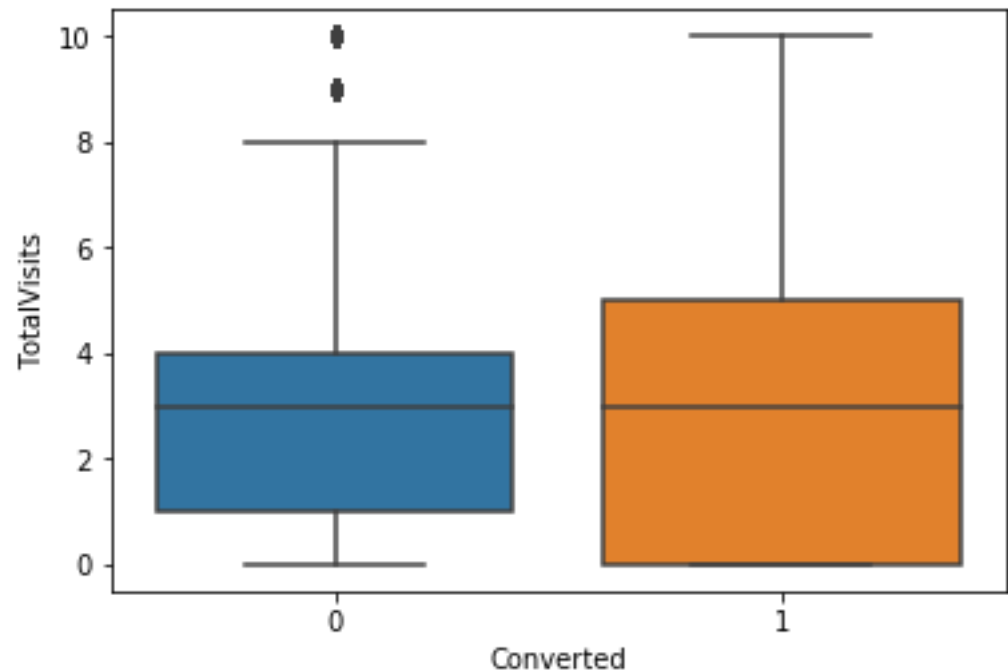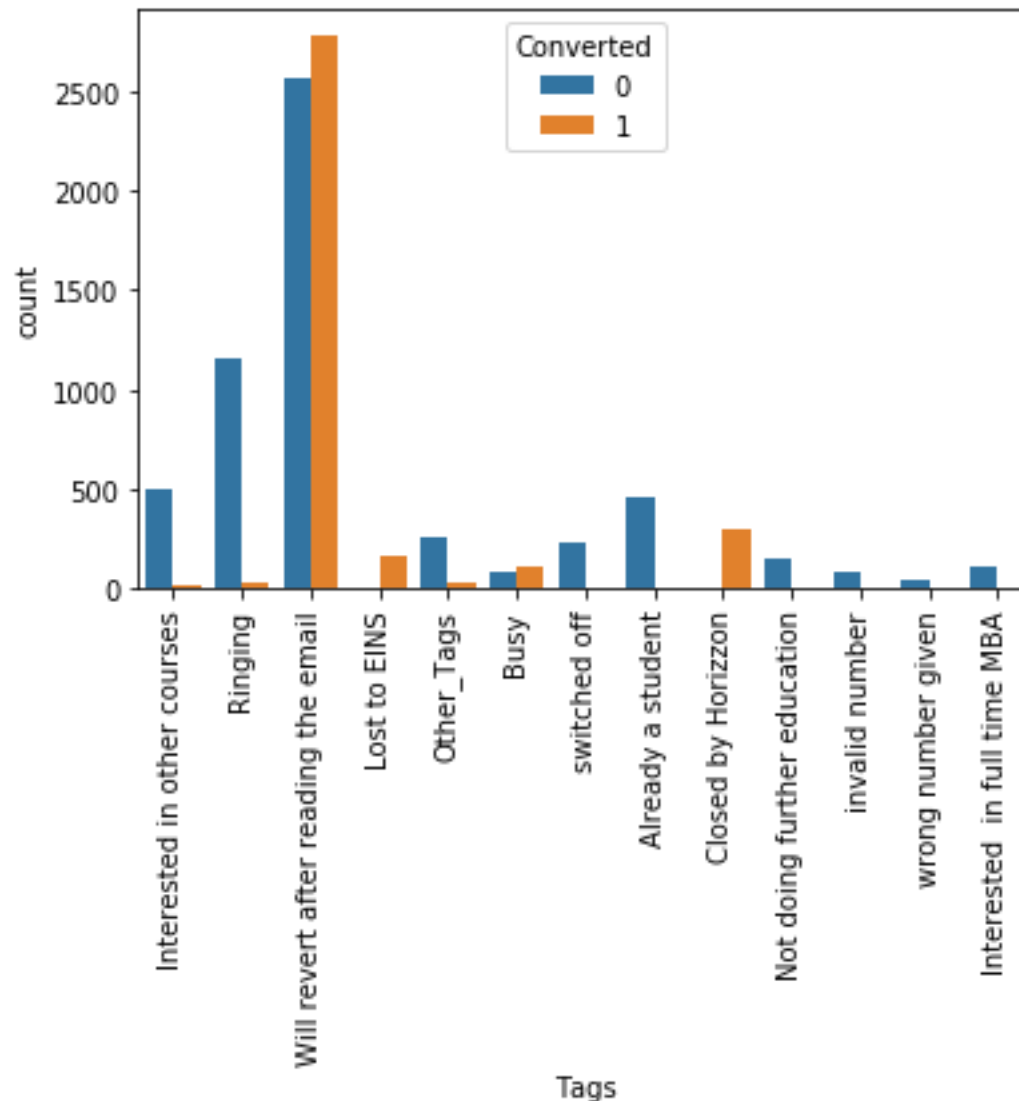

site again and again.

Tags
- The Tags assigned to customers indicating the current status of the lead.
- The customer whom we tried to reach has the status of 'Will revert after reading the email','Interested in other courses','Busy', 'Already a student' etc.., which defines that interested people will be the people who have tags of providing some reply based on the email.
- Tags also have values of sort 'Busy','Already a student' , probability of conversion of those peoples are less because they would be busy if they are not interested in the course. If they are already a student, they will not opt for the course again. Tag is a very important tag that will define the status of the conversion of a lead.
- The below plot shows the distribution of the tag column, we can say that the people who are tagged as 'Will revert after reading the email' have a high possibility of conversion.

Even from the conversion plot as per tag have a higher possibility of conversion for the values named 'Will revert after reading the email'.

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?
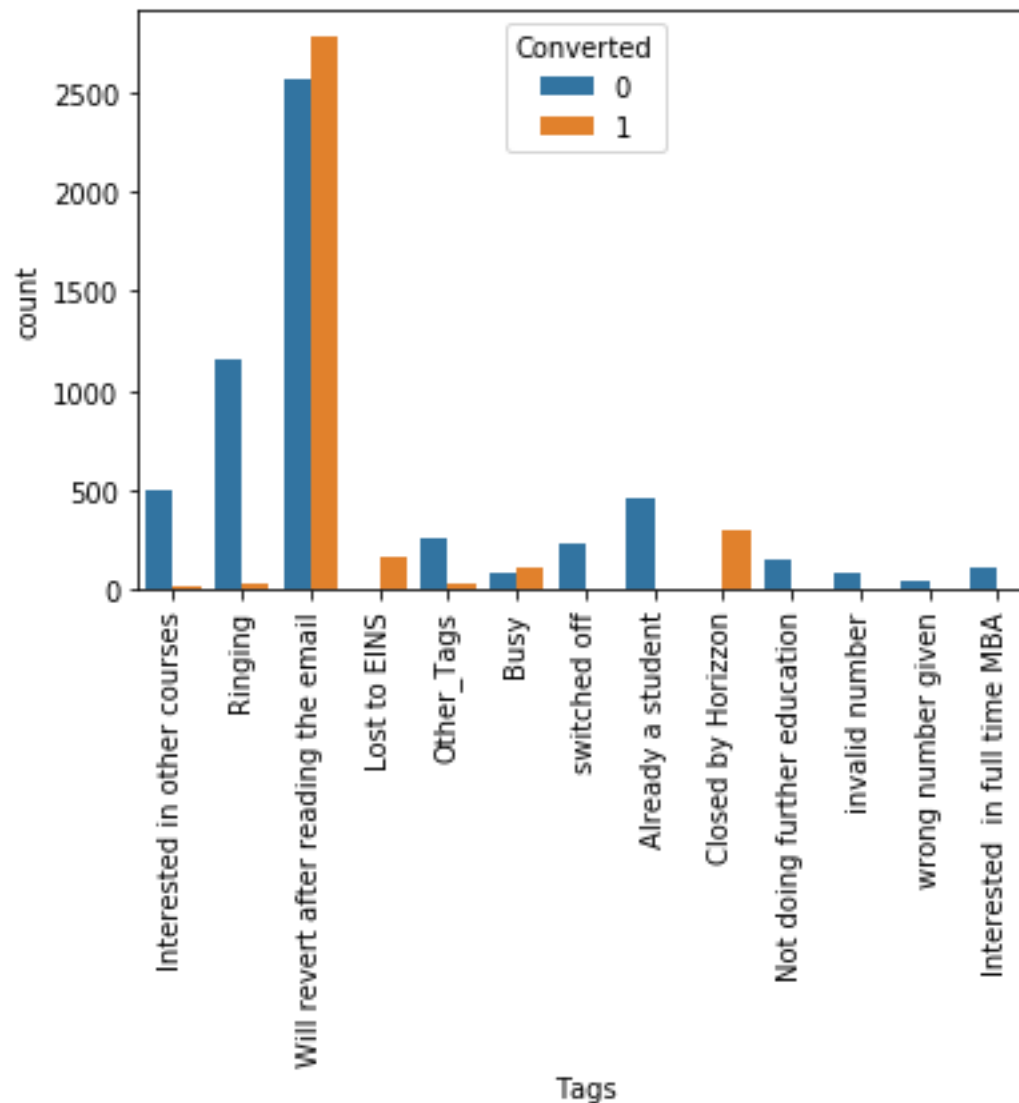
The top 3 categorical/ dummy variables in the model which has to be focused more are:

Tags

- The Tags assigned to customers indicating the current status of the lead.
- The customer whom we tried to reach has the status of 'Will revert after reading the email','Interested in other courses','Busy', 'Already a student' etc.., which defines that interested people will be the people who have tags of providing some reply based on the email.

- Tags also have values of sort 'Busy','Already a student' , probability of conversion of those peoples are less because they would be busy if they are not interested in the course. If they are already a student, they will not opt for the course again. Tag is a very important tag that will define the status of the conversion of a lead.

- The below plot shows the distribution of the tag column, we can say that the people who are tagged as 'Will revert after reading the email' have a high possibility of conversion.
Even from the conversion plot as per tag have a higher possibility of conversion for the values named 'Will revert after reading the email'.


'SMS Sent' in 'Last Activity':
- The value of SMS Sent from 'Last Activity 'has the high rate of conversion, which tells us that people who have been sent the mail, are looking through the mail and the conversion rate from leads is high.
- As conversion rate through this as it is more for SMS, we can say that people are seeing the messages, and if they are being provided some offer rates, there is a high possibility of conversion for them to opt for a course.
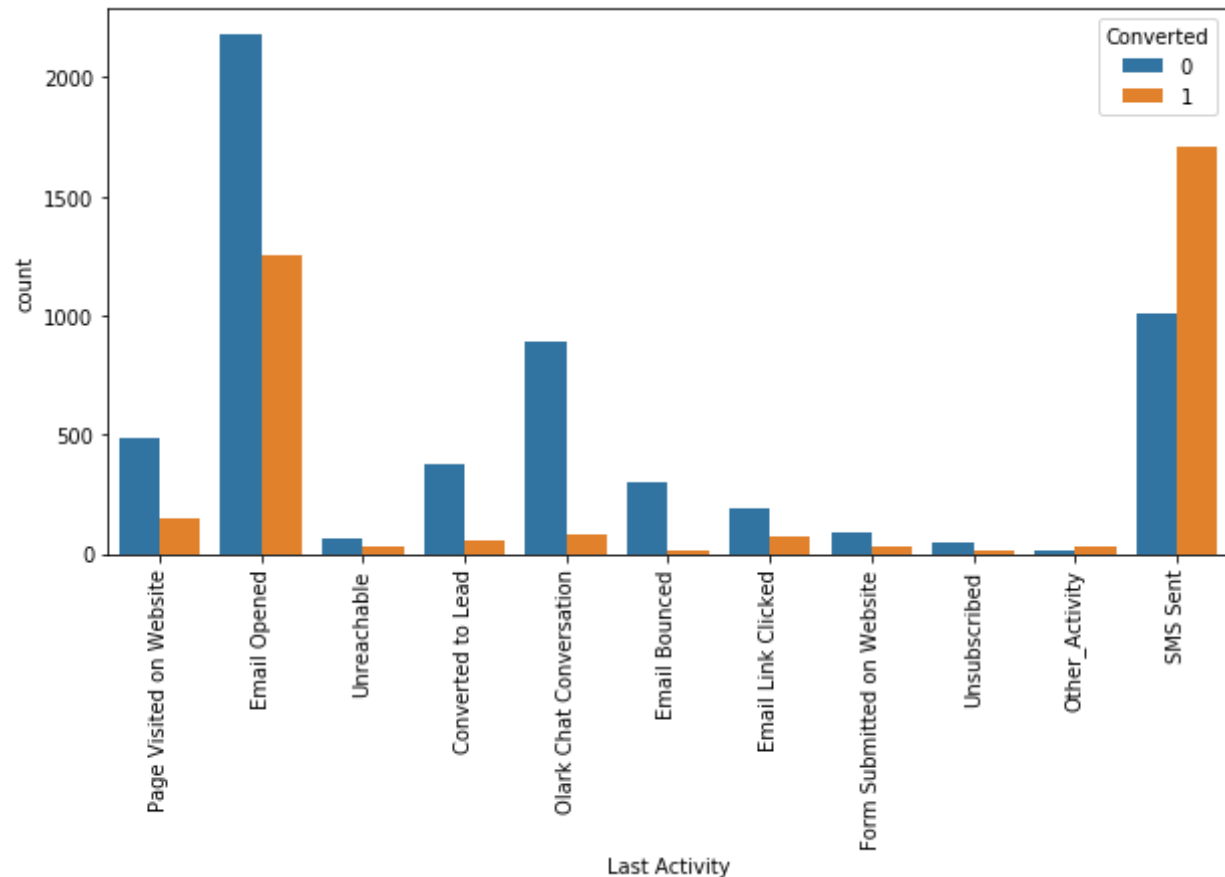
Working Professional in 'What is your current occupation:

- The value of Working Professional in 'What is your current occupation' has the high rate of conversion, which tells us that people who are working will have high probability of conversion because if they are looking into the course mean that they want to enhance their knowledge within a profession or they want to change their stream of profession. Due to which we can contact them as these peoples have a high rate of conversion from the lead.
- From the plot also we can see that working professionals having more conversion when comparing non-conversion rates. The conversion rate for working professionals is too high, which mean that even if the peoples are less we can say that the possibility of them becoming leads are more.
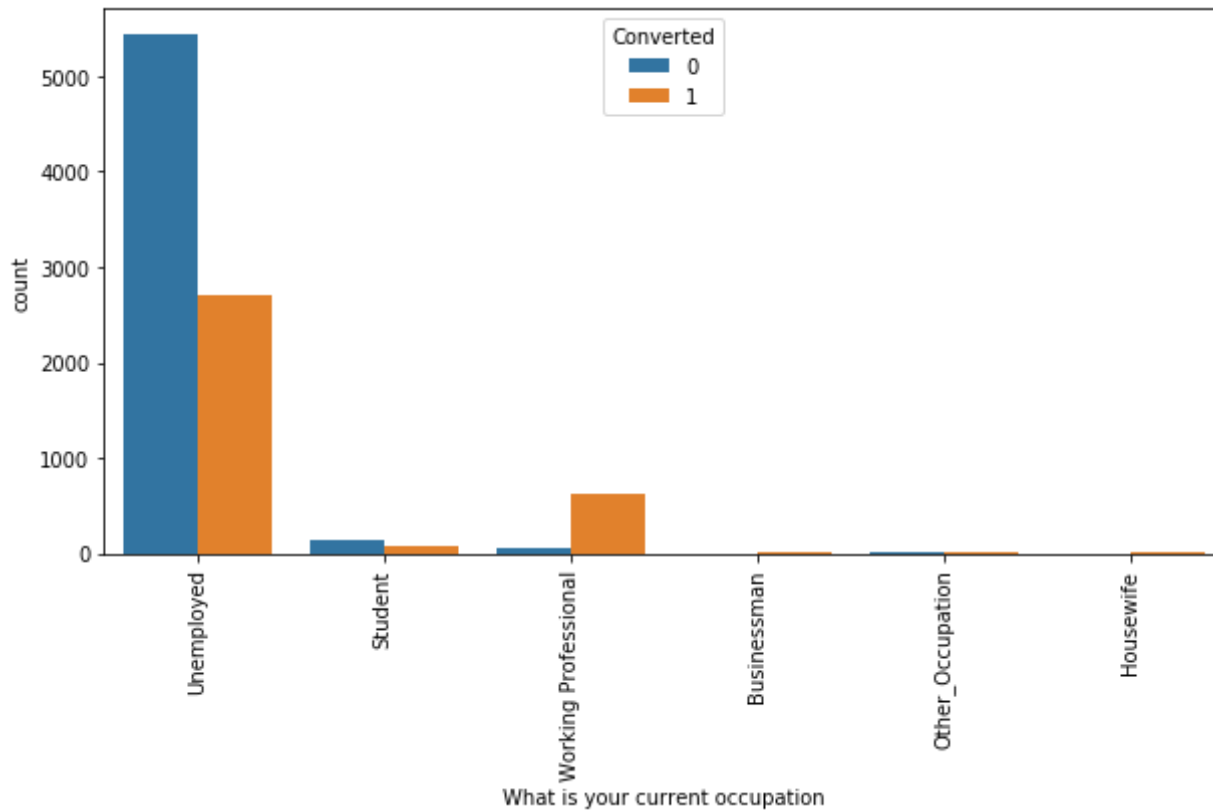
3. X Education has a period of 2 months every year during which they hire some interns. The sales team, in particular, has around 10 interns allotted to them. So during this phase, they wish to make the lead conversion more aggressive. So they want almost all of the potential leads (i.e. the customers 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.

Ans:
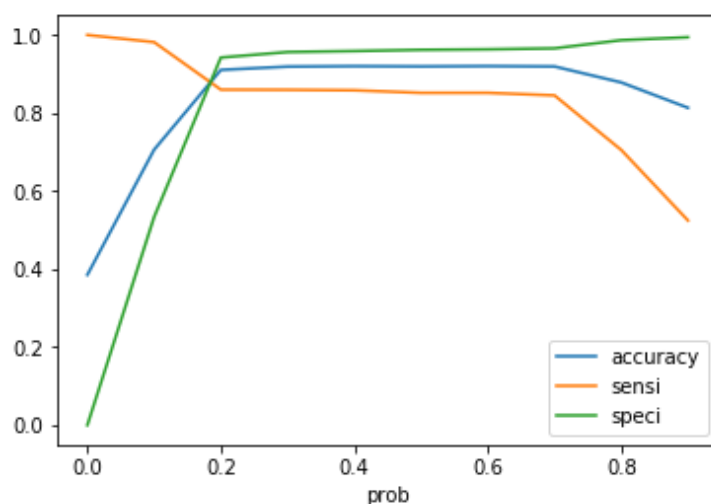
Based on our model analysis, we found that the optimal cut off probability is 0.2

So, the prospectus candidates with a predicted probability of 0.2 or a lead score of 20 will be considered a hot lead. Other candidates will be dropped from the list. We also found that it has an accuracy of more than 90%

Since we wish to target more hot leads, we must increase the sensitivity. To increase the sensitivity, we must reduce the cut off probability. Thus, it will increase the number of hot leads

With increase number of hot leads, we can engage the interns to make more phone calls

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.

   Ans: Since we have reached the target for the quarter, we want to avoid any unnecessary phone calls. That means we should target for hot leads with high specificity. This will ensure that we don't make any unnecessary calls. We call only the potential candidates
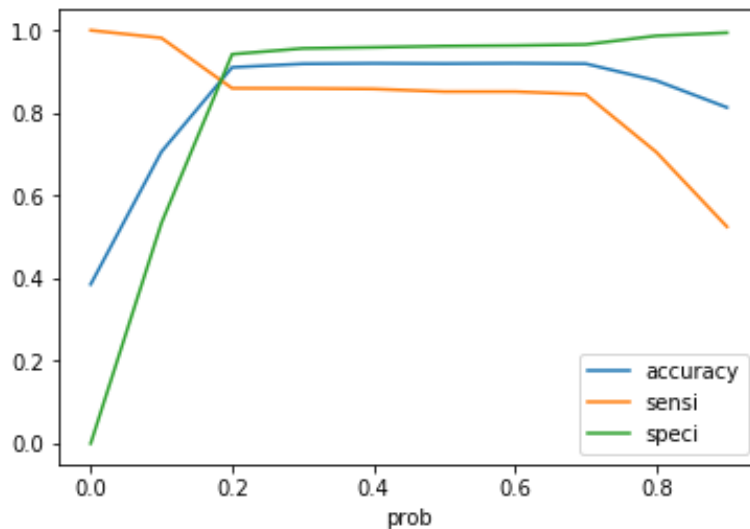
As shown before, for a better specificity, we must increase the cut off probability. With the increase in the cut off probability, we will have a smaller number of hot leads. But these hot leads will have a very high conversion rate

Thus, with the increase in the cut off probability, we can cut on the unnecessary phone calls