

CSE498R
Spring 2021
WEEKLY REPORT

Intelligent Reply System (NSU Chatbot)

Week 05 (28th March - 1st April)

Abdullah Al Mahfuj Shaan
172 1275 042

Date: 1st April, 2021

Date	Today's Task	Tomorrow's Task	Roadblocks
28th March, 2021	This week I am going to build and train our model on the dataset we created last week. I looked into some of the models that were used on many Conversational Chatbots on the web.	To select some of the models that are available with resources. And to work on them.	There were very few conversational chatbot models, most of them were Support Chatbots with selective features.
29th March, 2021	Today I read some articles on medium.com regarding some NLP Models that can be used on our project. I also selected a specific model that is based on the NLTK Python Package for solving NLP problems.	To find some other models if they are available with source codes and compare them with the existing model that I found.	These models are a bit complex than usual and it's taking more time to understand how it is implemented.
31st March, 2021	I made the initial Chatbot architecture using Python's NLTK package. And used our dataset on the model to train it.	Fine tune the model based on today's performance of the model and also to look at some other architectures.	During the initial training phase there were many wrong predictions.
1st April, 2021	We fine tuned the model according to the dataset. It is working well now. I have also looked into another Python/Cython Package named spaCy which is mainly used in enterprise level chatbots. Since NLTK is mainly used for research purposes. I will also look into that model if it's necessary. Until then, the NLTK based model task is finished.	Next week, I am going to work on the Web Design and Deployment process.	I got a little confused when I found out that NLTK is used for research purposes and not enterprise model building. Nonetheless, I am still using it, because it is working fine till now. If it fails during the Testing phase I can easily switch to the spaCy version of the Chatbot. I just to train the model using the dataset that we have already completed and fixed.