Programming Assignment #3 - Manual Data Annotation

1.2.1 (2 points) - Based on what we discussed in class about this dataset and the task of stance annotation (here, for attitudes towards vaccines), on what percent of the tweets that you annotate do you think the two annotators will agree? There is no right answer here, obviously, but provide a justification of your response.

Over 80% would be the agreement of two annotators. As we were grown in the same cultural sphere, had the same genders, and ages, we would have similar perspectives. So we thought we had little difference towards the agreements.

1.2.2 (3 points) - Based on what we discussed in class about this dataset, what percent of the tweets that you annotate do you think will be labeled *pro-vaccine*? Justify your answer.

About 30%. Americans regard freedom as important, but the U.S. government forces vaccines. So we thought Americans would hate vaccines that deprive their freedom.

1.2.3

We only have two people.

2.1 - What was your overall percent agreement, and how did this compare to your estimate from 1.2.1? Why were these similar/different?

The overall percent agreement was 0.68. It's slightly different compared to the estimate from 1.2.1. It's because the annotator_1 predicted 1 if the article title has a positive stance on the vaccine, and predicted -1 if the title has a negative stance on the vaccine. On the other hand, annotator_2 predicted article titles as X because the writers of tweets cannot express their opinion, so there was no stance towards the vaccine.

2.2 - Was this annotation task harder or easier than you expected? Why, and what was the hardest part?

This annotation task was harder than we expected. Because, there were a lot of tweets that merely communicated information, and our perspective on how to label them was different. Annotator1 regarded news as positive, negative, or neural, but annotator2 regarded news as X, which means that tweet provides no information at all about this person's stance towards the vaccine..

2.3 - Does this change your perspective on how people talk about health-related content on social media? Why or why not?

The perspective on how people talk about health-related content on social media has changed. At first, we thought people might be advocative towards vaccination, because we had no resistance to getting vaccinated. But, in reality, people who thought anti-vaccine were much more. So our perspective has changed that people talk negatively about health-related content on social media.

2.4 - What did you learn from this annotation task that will change your perceptions of how NLP models are trained moving forward?

We learned from this annotation task that NLP models are under the control of people who labeled the contents. So we realized that the NLP model could be subjective even if it is an Al model. Therefore, it's important to label carefully by multiple experts.

2.5 - How do you think your team's agreement (say, in terms of Krippendorf's Alpha) will compare to the other teams? Why do you think so?

Our team's Krippendorf's Alpha would be lower than other team's. Because as stated in 2.2, our perspective about news was different, so our Krippendorf's Alpha was low.