CHKR: Fact Checking Project Proposal
Alex Weinstein

1. The problem I want to solve is that people often don't know or understand whether what they read in social media is or is not a fact. I want to create a service where people can log into their social media accounts and have the option to fact check everything they see. I think this is an interesting problem because it helps people better understands the world around them and can even help combat fake news.
2. I am going to use open source databases that verify facts in a ranked way as well as fake news and verified news datasets. I am also going to reach out to a Fake News challenge and a fact extraction workshop
   a. https://competitions.codalab.org/competitions/21163
   b. https://figshare.com/articles/PHEME_dataset_for_Rumour_Detection_and_Veracity_Classification/6392078
   c. https://www.kaggle.com/mrisdal/fake-news
   d. https://github.com/thiagorainmaker77/liar_dataset
   e. http://www.fakenewschallenge.org/
   f. https://fever.ai/
3. Overview:
   a. This is a supervised problem because we can provide solution data (fact/fiction tags) for our inputs (social media statuses articles in links).
   b. This is can be approached as either a classification or regression problem because the output tag is a binary classification (fact/fiction)
   c. I am trying to predict whether a given social media status or news article includes facts or fictions (can have a mix of both)
   d. I will use social media statuses and their linked articles for my inputs (predictors)
   e. I am apt to use both ML and DL. I've read that transformers might be particularly useful
4. My final product will be a web API with a mobile app called CHKR, possibly with a chrome extension as well
5. Resources:
   a. CPU - 8-16 cores
   b. Memory - 50GB
   c. Specialized hardware - 200 hours on a medium GPU box