Team: Kyle White

League of Legends Win Predictor

The goal of the product is to use data of past League of Legends matches to predict the winner of any match in the future. The first step is to collect the data by using the Riot Games API. To get a large set of matches, I start with a player’s ID, and get a list of their matches. Then I get the match ID from X matches and get all the game data for each match. The API returns a lot of data, but I only want a small subset of it, so I save what I want and don’t use the rest. From the data for each match, I get the Id of the other 9 players and then repeat the process from their match history.

The specific data that I keep is mainly the champion that each player played, and how many kills/deaths/assists they had, along with who won. Each record in the data set would be one player, with all their stats, and the match Id so I still know what 10 records were in the same match. I want to know this so I can see if any champion had a relatively low or high win rate against other specific champions. I am also considering using a lot of other stats from the game, like amount of gold earned, damage dealt, player rank, and other stats. My only concern is that I may run into the curse of dimensionality and make my model worse by using too many stats.

So far, I have a python program that can collect data from as many games as I want. I have started collecting data, however I am still deciding what stats I want to use and what I don’t. Because I am collecting such a large amount of data, I don’t want unused fields wasting memory. I am working alone so all the work is me.