**What are situational strategies?**

Situational strategies are offensive and defensive plays or decisions made by teams within each game. These plans of action may change from game-to-game, or even within each inning, depending on how a team is doing within the match.

**How do we define “risk?”**

We define “risk” as the level of danger involved in any situation or decision made on the field. Based on our data set, we are positing that the collected baseball statistics that constitute risk within a certain situational strategy are strikeouts (SO), sacrifice flies (SF), sacrifice hits (SH), intentional bases on balls (IBB), stolen bases (SB), and caught stealing (CS). We have considered these variables to create a overall “Situational Strategy” by using the formula below; this number will be used throughout our findings.

(equation attached below)

**The dataset:**

Our dataset consists of 19 variables and 300 observations, collected from several baseball-related sources (see citation section). The data includes 10 years worth of information for all 30 Major League Baseball teams, from 2008 through 2017. These teams are classified by their abbreviations, League, and Division. We have included team data on regular season stolen base count, caught stealing, strikeouts, sacrifice hits and flies, intentional bases on balls, runs scored, hits, home runs hit, runs batted in, and runs per game. For each year, we also compiled data pertaining to whether or not each team made the playoffs, their average stadium attendance per home game, and the average age of their batters.

With this data, we were able to calculate our Situational Strategy score, explained above. This calculation of team risk plays a major role in our exploration of the data set, and allows us to answer the question “how does risk and situational strategy factor into overall gameplay and team success?”