

# Assignment 1

**Problem Statement:** Predicting the success rate of a Restaurant

## Scientific Approach to solve the problem:

There are certain key factors that need to be kept in perspective while working on the scientific approach of whether is it worth it to open a restaurant at a certain neighborhood or not, some of which are listed below:

- How many restaurants serving the similar kind of food are there located in the vicinity in order to know what you are competing against
- What is the **review count**, **star rating** and **price** (i.e., general dining cost) **relative to surrounding restaurants**?
- What is each restaurant's **age**? The goodwill of a restaurant tells the most about the regular trusting customers of that restaurant.

## Challenges:

There are many reasons why a restaurant can succeed or fail that are not included in our approach (e.g., Updated tax system, health inspection results etc.). A complicated decision boundary would not be beneficial in solving the problem.

Before performing data analysis and building solutions, clearly defining the business problem and objective would be another challenge while making this model .

However, despite all the challenges, with the right technical skills and having a clear understanding of the business requirements this model can be made simpler for the visualization with the analysis provided.