**PROPOSED SYSTEM**

The work by Pan et al. is based entirely on machine learning, and the data set was obtained via CrunchBase. The main purpose is to forecast the state of start-ups, whether they have gone through M&A (mergers and acquisitions) or an initial public offering (IPO) (Initial public offering). Logistic Regression, Random Forests, and K Nearest Neighbors are the ML methods that have been used. The study examines the various ML algorithms listed above and determines which algorithm performs best with the dataset. F1 scores are utilised as the key criterion, and KNN was shown to have the highest F1 score.

The research by Arroyo et al. focuses not just on the traditional two classification categories of M&A and IPO, but also on other conceivable outcomes such as a second investment round or the company’s closure. ML algorithms that are used in this study are Support Vector Machines, Decision Trees, Random Forests, Extremely Randomized Trees, and Gradient Tree Boosting. The popular database CrunchBase was used in this investigation once again. The focus on early stage enterprises, time-aware analysis, and the multiclass prediction issue are the major elements of their approach. The study’s findings suggest that the best algorithm, Gradient Tree Boosting, has a worldwide accuracy of roughly 82%.