LITERATURE SURVEY

INTRODUCTION

The purpose of the literature survey is to give the brief overview and to establish complete information about the reference papers. The goal of literature survey is complete specify the technical details related to the main project in a concise and unambiguous manner.

Sushruta Mishra and Soumya Sahoo "A Quality Based Automated Admission System for Educational Domain", pp.221-233, 2016.

In last two decades several educational institutes have started gaining momentum while many of them are in self-financing mode. Every institute wants to have good student strength to allow a smooth academic session. This paper proposes the use of machine learning techniques in educational domain to enhance the quality of student admissions in any higher educational institute. The focus of this paper is to identify those admissions inquires which most likely to turn into actual admissions. The result of analysis will assist the academic to take admission in the institution after enquiry.

Annam Mallikharjuna Roa, Nagineni Dharani, A. Satya Raghava, J. Buvanambigai, K. Sathish "College Admission Predictor" Vol. 8, Issue 4, 2018.

College Admission Predictor System is a web based application system in which students can register their marks along with their personal information. This helps to predict their admissions in colleges. Administrator can add the college details and the batch details. Using this Application, the entrance seat allotment becomes

easier and efficient. The main advantage of the project is the computerization of the entrance seat allotment process. Administrator has the power for the allotment. Admin can add the allotted seats into a file and the details are saved into the system. The total time for the entrance allotment becomes lower and the allotment process becomes faster. It helps students to make right decisions for choosing their college. In which students can register with their personal as well as marks details to prediction the admission in colleges and the administrator can allot the seats for the students. Administrator can add the college details and the batch details. Using this Application, the entrance seat allotment becomes easier and efficient. The main advantage of the project is the computerization of the entrance seat allotment process. Administrator has the power for the allotment. Admin can add the allotted seats into a file and the details are saved into the system. The total time for the entrance allotment becomes lower and the allotment process becomes faster. It helps students to make right decisions for choosing their college.

Md.Protikuzzaman, Mrinal Kanti Baowaly, Maloy Kumar Devnath and Bikash Chandra Singh "Predicting Undergraduate Admission", Vol. 11, No. 12, 2020.

The University admission tests find the applicant's ability to admit to the desired university. Nowadays, there is a huge competition in the university admission tests. The failure in the admission tests makes an examinee depressed. This paper proposes a method that predicts undergraduate admission in universities. It can help students to improve their preparation to get a chance at their desired university. Many factors are responsible for the failure or success in an admission test. Educational data mining helps us to analyze and extract information from these factors. Here, the authors apply three machine learning algorithms XGBoost, LightGBM, and GBM on a collected dataset to estimate the probability

of getting admission to the university after attending or before attending the admission test. They also evaluate and compare the performance levels of these three algorithms based on different evaluation metrics-accuracy and F1 score. Furthermore, the authors explore the important factors which influence predicting undergraduate admission.

Prince Golden, Kasturi Mojesh, Lakshmi Devarapalli, Pabbidi Naga Suba Reddy, Srigiri Rajesh, Ankita Chawla "A Comparative Study on Admission Predictions Using Machine Learning Techniques" Vol. 7, Issue 2, 2021.

In this era of Cloud Computing and Machine Learning where every kind of work is getting automated through machine learning techniques running off of cloud servers to complete them more efficiently and quickly, what needs to be addressed is how we are changing our education systems and minimizing the troubles related to our education systems with all the advancements in technology. One of the prominent issues in front of students has always been their graduate admissions and the colleges they should apply to. It has always been difficult to decide as to which university or college should apply according to their marks obtained during their undergrad as not only it's a tedious and time consuming thing to apply for number of universities at a single time but also expensive. Thus many machine learning solutions have emerged in the recent years to tackle this problem and provide various predictions, estimations and consultancies so that students can easily make their decisions about applying to the universities with higher chances of admission. In this paper, we review the machine learning techniques which are prevalent and provide accurate predictions regarding university admissions. We compare different regression models and machine learning methodologies such as Random Forest, Linear Regression, Stacked Ensemble Learning, Support Vector Regression, Decision

Trees, KNN(K-Nearest Neighbor) etc, used by other authors in their works and try to reach on a conclusion as to which technique will provide better accuracy.

Kiran Kumari, Meet Kataria, Viral Limbani, Rahul Soni "College Admission Predictor and Smart List Predictor Generator" 2019.

Students face a lot of difficulties to secure an admission in the college of their choice. The current scenario of an engineering admission process is little complicated and not so easy in terms of selecting an appropriate college according to the scores and field of interest. Accurate choice, varying with the entrance exam result and academic scores, is very important to the candidates to fill in the application form. There are many colleges offering multiple engineering courses. So it becomes trouble for some students to organize and list-out the proper colleges of their choice for courses according to their performance score. The CAPSLG system consists of a smart list generator working together with the help of college predictor, to aid students in the admission process. The college admission predictor uses historical colleges cut-off student admission data for predicting the most probable colleges. The system analyses student academic merits, background, and college admission criteria. Based on that, it predicts the likelihood of a university college that a student may enter. The smart list generator would enable the student to prepare the list of colleges, which could be needed to be filled in during the admission process. The system would also get feedback from the users, which would prove helpful for prediction evaluation and improving the performance factor.