# LITERATURE SURVEY

# INTRODUCTION

In the current world scenario, it is not enough for a student to just have an Under Graduate degree. Most employers now look for higher qualifications in their new recruits. As a result, the demands for a good higher education are at an all time high. A lot of students from India prefer to continue their higher education with foreign universities, especially in the United States.

In order to get admitted to these foreign universities, a set of academic requirements are needed. However, because of the sheer number of universities of different levels, students are often stuck in a dilemma till the very last minute as to whether or not their applications will be accepted or not as no concrete documentation is available which lists the requirements.

## **ABSTRACT**

This is a Requirements Specification Document for a new web-based University Admissions Predictor — UNIPREDICT. Uni predict is an AI based application that asks for the users to input their academic transcripts data and calculates their chances of admission into the University Tier that they selected. It also provides an analysis of the data and shows how chances of admissions can depend on various factors.

This document describes the scope, objectives and goals of the system. In addition to describing the non-functional requirements, this document models the functional requirements with use cases, interaction diagrams and class models. This document is intended to direct the design and implementation of the target system in an object-oriented language.

# **REQUIREMENTS**

Project Name: University Admit Eligibility Predictor

Project type: Web Application

Developer: Aanchal Thakur

Languages used: Python, HTML, Java script, CSS

Database: MongoDB Development Platform: Visual Studios Code

# **Project Scope**

The scope of this project is a web application that allows users to enter their academic data and get predictions of their chances of admissions in the university tier of their choosing. It also provides them answers to the most common FAQ's that arise when thinking of admissions abroad for Post Graduate studies. It also provides an analysis based on the data set used that shows how the different parameters affect chances of admissions. A Database will also be implemented for the system so that students can save their data and review and edit it as they progress with the most recent predictions being saved with their profile. Issues of web security other than password protection within the website are not part of this project.

## **Goal Statement**

The goal of the system is to provide help to students who are looking for PG Abroad. The system proposes to achieve this by –

- Providing answers to the most commonly asked questions regarding university admissions for PG Studies Abroad.
- Providing an as accurate as possible prediction for the student's chances of admissions to the universities of their choice based on their academic transcripts.
- Providing an analysis conducted over our dataset to the user in order to help them understand the weightage of various academic data values on their chances of admissions.

## SOFTWARE AND HARDWARE PLATFORMS USED

The following section details the Software and Hardware platforms used to develop the UNIVERSITY ADMIT ELIGIBILITY PREDICTOR Application.

#### Hardware A home PC -

capable of handling light ML processing.

**Device Specifications:** 

- 1. I5 10th Gen processor
- 2.8 GB RAM

# 3. 64 bit Operating System

# Software

#### **Visual Studios Code**

Visual Studios is a free source-code editor made by Microsoft for Windows, Linux and MacOS. Features include support for debugging, syntax highlighting, intelligent code completion, snippets, code refactoring, and embedded Git. Users can change the theme, keyboard shortcuts, preferences, and install extensions that add additional functionality.

# **Anaconda (Jupyter Notebook)**

Project Jupyter is a non-profit organization created to "develop open-source software, open-standards, and services for interactive computing across dozens of programming languages".[2] Spun off from IPython in 2014 by Fernando Pérez, Project Jupyter supports execution environments in several dozen languages. Project Jupyter's name is a reference to the three core programming languages supported by Jupyter, which are Julia, Python and R, and also a homage to Galileo's notebooks recording the discovery of the moons of Jupiter.

# **MongoDB**

MongoDB is a cross-platform document-oriented database program. Classified as a NoSQL database program, MongoDB uses JSON-like documents with optional schemas. MongoDB is developed by MongoDB Inc. and licensed under the Server Side Public License (SSPL)

## Reference

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