



Sangraam Patwardhan
Mechanical Engineering
Indian Institute of Technology Bombay

19D100017
B.Tech.
Gender: Male
DOB: 31-12-2000

Examination	University	Institute	Year	CPI / %
Graduation	IIT Bombay	IIT Bombay	2023	

SCHOLASTIC ACHIEVEMENTS

- Achieved **99.45 percentile** out of **200,000 candidates** in **JEE Advanced** (2019)
- Among **top 0.3 percentile** in **JEE Mains** amongst **1,200,000 students** (2019)
- Pursuing a **minor degree** in **Computer Science and Engineering** (2021)
- Secured **96.6%** in Class X and **92.15%** in Class XII examinations (2017, 2019)

PROJECTS

- **Indecision App** (React.js) December 2020
 - Created an app to randomly assign to-do tasks using **React.js**
 - Used **SCSS** partials to make the app scalable **Webpack** to bundle the assets
- **Weather Website** (Node.js) October 2020
 - Used the **Mapbox API** to geocode the location and **Weatherstack API** to get the weather data
- **Bootcamp Rest API** (Node.js) March 2021
 - Built the complete backend **CRUD API** for a Bootcamp using **Express, MongoDB and Node.js**
 - Included user accounts and **authentication** using **JWT Cookies**, along with admin access functionality
 - Deployed with **PM2, NGINX, SSL**. Set up **API Security** (NoSQL injection, XSS protection, Rate Limiting)
- **Mini-JS Projects** (HTML / CSS / JS) March 2021
 - Implemented multiple mini-projects - **Form Validator, Custom Video Player, Movie Seat Booking, Exchange Rate Calculator** - using **JavaScript, HTML and CSS**.
 - Used the **HTML5 Video API** and **Fetch API** for the Video Player and Exchange Rate Calculator
- **Computer Vision** (Learners' Space Course Project - Python, OpenCV) July 2021 - Ongoing
 - Designed the **frontend** of a Video Chat App, and a **Sudoku Detector / Solver** using **OpenCV**
 - Proficient at **Object Detection, Grid Detection, Panorama Stitching, Augmented Reality**

POSITIONS OF RESPONSIBILITY

- **Intern, Holavira** May-July 2021
 - Worked as a content creator / facilitator for students aged **12-14** at Holavira, an EdTech startup aiming to help school students acquire the skills and **practical exposure** important in the **real world**
 - Conducted interactive sessions on topics like **ML, Electric Cars, SpaceTech, Cryptocurrency, and CleanTech**
 - Held **Know-Your-Career** talks, explaining what the real professionals like **IAS Officers** do and the problems they solve on the job, and moderated student discussions on how to solve these problems
 - Guided student discussions / debates on **real-world** problem statements inspired by the situations companies and businesses face - like **marketing, customer acquisition** - and made them solve these problems systematically, encouraging **structured thinking**
- **Convener, Maths and Physics Club, IIT Bombay** April 2020-21
 - Part of a team of 6 sophomore conveners working towards fostering the enthusiasm of **500+ students** in physics and mathematics and having an outreach of **10,000+ enthusiasts** online
 - Conducted group discussions, hosted trivia events for an online audience

TECHNICAL SKILLS

Languages / Frameworks	C++, Python, HTML, CSS, JavaScript, NodeJS, React, OpenCV
Operating Systems	OS X, Windows
Courses - Computer Science	CS101, Computer Networks, DS / Algo, Analysis of Algorithms*

(* to be completed November '21)

EXTRA CURRICULAR

- Completed a year-long professional training in Football under National Sports Organisation (2019-20)
- Spread awareness about cancer as a part of GCCI's nationwide programme and helped in providing relief efforts for cancer sufferers (2019-20)
- Successfully cleared 3 levels of Abacus and Mental Arithmetic training under GAMA (2008)
- Selected twice to represent school at the Inter School Spelling Bee competition (2011, 2014)
- Passed the 6th Kyu Grade examination of Traditional Shotokan Karate (2011)