



Akshay Patidar
Computer Science & Engineering
Indian Institute of Technology Bombay

160050050
UG Second Year
Male
DOB: 26 Jan 1999

Examination	University	Institute	Year	CPI / %
Graduation	IIT Bombay	IIT Bombay	2018	9.35
Intermediate/+2	CBSE	Samta Shiksha Niketan,Ratlam	2016	98.20
Matriculation	CBSE	Shri Guru Tegh Bahadur Academy,Ratlam	2014	9.80

SCHOLASTIC ACHIEVEMENTS

- Secured **All India Rank 41** in JEE Advanced 2016 among 150 thousand candidates 2016
- Secured **All India Rank 13** in JEE Mains 2016 among over 1.3 million candidates 2016
- Recipient of **Kishore Vaigyanik Protsahan Yojna (KVPY)** Fellowship instituted by the Department of Science and Technology, Government of India 2016
- Awarded Advanced Performer's (**AP**) grade for exceptional performance in **Quantum Physics And Applications** course (awarded to top 1% of class) 2016-17
- Awarded Certificate Of Merit for being in **National Top 1%** in National Standard Examination In Chemistry and Physics (**NSEC,NSEP**) conducted by Indian Association of Physics Teachers 2015-16
- Received certificate of merit for being in the top 0.1% students in **Mathematics**, All India Senior School Certificate Examination (**AISSCE**) 2016 2016
- City topper in All India Secondary School Examination, **CBSE 2016** 2016
- Scored **392** marks out of 450 in Birla Institute of Science and Technology Aptitude Test 2016
- Awarded Gold Medals for being school topper in **International Mathematics Olympiad** conducted by Science Olympiad Foundation SOF consecutively in classes 5th to 10th 2008-14

PROJECTS

GetPlaced Android Application

Autumn 2017

Prof. Kavi Arya | Softwares Systems Lab

(Course Project)

- Designed an android application for Internships and Placements in IIT Bombay with personalized accounts for students (using SSO Login) and companies
- Developed separate interfaces for admins, companies and students with functionalities like Job Application, News Feed, Questions & Answers Forum, Notification system
- Used Django for automatic database-abstraction API to create, update, retrieve and delete objects
- Built a custom-lexer and parser for generating tex file from user data for building their resume

Minesweeper Game in Racket

Spring 2017

Prof. Amitabha Sanyal | Abstractions and Paradigms for Programming

(Course Project)

- Used functional Programming Language Racket to develop classical game of Minesweeper with randomized position of mines, timer and ability to flag mines
- Used Racket Graphical Interface Toolkit to make the game look attractive and user friendly
- Implemented a Custom Difficulty feature to allow users to choose the number of mines and size of the grid according to his/her ability

Rule based Syntactic Parser

Spring 2017

Prof. Amitabha Sanyal | Abstractions and Paradigms for Programming

(Course Project)

- Constructed a syntactic parser for a small rule-based language given its grammatical rules
- Tailored a variable parser, term parser and an expression parser based on the basic sequential and alternate parsers using functional programming in Racket, multi-paradigm programming language

Android app controlled racing bot

August 2016

Electronics and Robotics Club, IIT Bombay

- Designed and fabricated an Android app controlled Racing Bot by analysing the working of RF circuit for XLR8 competition conducted by Robotics Club, IITB
- Analysed mechanical and electrical aspects of the bot leading to a stable motion and gained insights into the usage of Bluetooth module and basic of steering mechanism

2D - Gravity Simulator

Spring 2017

Prof. Amitabha Sanyal | Abstractions and Paradigms for Programming

(Course Project)

- Implemented a N body gravity simulator in functional programming language Racket using list-comprehensions and trees
- Used Divide and Conquer algorithm to minimise the time required for each time step, and approximate the forces to attain feasible computing speeds

TECHNICAL SKILLS

Programming Languages : C++, Python, Bash, Java, Racket, Prolog

Software Skills : \LaTeX , MATLAB, GNU Plot, AutoCAD, Make

Web Development : HTML, CSS, JavaScript, PHP, Django, SQL, Android Studio

KEY COURSES UNDERTAKEN

Computer Science Computer Programming and Utilization, Abstractions and Paradigms in Programming, Data Structures and Algorithms*, Software Systems Lab*, Data Analysis & Interpretation*, Discrete Structures*, Design & Analysis of Algorithms**, Logic for Computer Science**, Digital Logic Design**, Computer Networks**

Mathematics Calculus, Linear Algebra, Differential Equations

Others Introduction to Electrical and Electronics Circuits*, Basics of Electricity and Magnetism, Quantum Physics and Applications, Biology, Organic, Inorganic and Physical Chemistry, Engineering Graphics and Drawing

*to be completed by December 2017

**to be completed by April 2018

POSITIONS OF RESPONSIBILITY

Web Coordinator

2017

Entrepreneurship Cell IIT Bombay

- Developed an interactive portal in which professors can enlist projects and students can apply for them
- Actively involved in maintaining the homepage of E-Cell, IIT Bombay, NEC (National Entrepreneurship Challenge) web application and CR (College Representative) web application
- Involved in making an android application for E-cell IIT Bombay

EXTRACURRICULAR ACTIVITIES

- Awarded certificate of recognition for securing 1st runner up position in National Level Competition of **Master Mind Abacus** 2008 held in Indore
- Successfully completed National Himalayan Trekking Expedition **Chanderkhani Pass**, Himachal Pradesh during May-June 2017 organized by Youth Hostels Association of India (YHAI)
- Participated in Inter Hostel Crossy General Championship, a 5 km long marathon
- Successfully completed year long training in cricket under **National Sports Organization(NSO)**
- Bagged Gold Medal in **Cricket General Championship**, IIT Bombay 2017
- Worked as organizer in Mood Indigo and Techfest, Asia's largest college festivals
- Active member of Rubiks Cube Club, IIT Bombay