

Divyanshu Saxena

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EDUCATION AND ACADEMIC DETAILS

Degree/Exam	Institution	CGPA/%age	Year
B.Tech, Computer Science & Engineering	Indian Institute of Technology, Delhi	8.382	2020 (Exp.)
ISC	City Montessori School, Lucknow	96.50%	2016
ICSE	City Montessori School, Lucknow	96.80%	2014

PROJECTS

Person Counter and Display Device - DISA

[under Prof. Subodh Kumar, May 2017-Present]

- This project was developed as a part of the **Design Innovation Summer Award (DISA)**.
- Used OpenCV and Python to process images taken in a room to count the number of people in the specified range.
- Implemented on-site real-time processing using Beaglebone. Results can either be displayed or sent via mail to a pre-specified authority.

Secure Access Logging with Vulnerability Analysis

[IoT Project, July 2017 – Present]

- Project ongoing under the mentorship of Samsung IoT Lab at IIT Delhi and is being done in two modules.
- First module is to develop a logging system in Iotivity to log every access to all the resources present and the second module of the system is a rule based vulnerability analysis module.

Maze solving Line following Bot

[Winter Project in Robotics Club, Nov 2016 - Dec 2016]

- Developed a fully autonomous line following bot using Arduino, IR sensors, etc.
- Modified Dijkstra's algorithm for solving mazes by traversing through the maze first and then processing it to find the shortest path.

Road Accidents Data Portal

[Indian Road Safety Campaign, Jun 2017 – Aug 2017]

- Developed a portal to get easy access to road crashes data in India and present it in an interactive manner.
- This portal was launched by the Ministry of Road Transport and Highways (MoRTH), India.

Study Portal

[Dev Club, Apr 2017 – Aug 2017]

- Developed a crowd-contributed web portal, using Django framework, for study purposes for the students of IIT Delhi.

RELEVANT COURSES

Computer Science: Introduction to Computer Science, Data structures*, Digital Logic and System Design*, Discrete Mathematical Structures*, Special Module on Internet of Things*

Mathematics: Linear Algebra, Calculus, Probability and Stochastic Processes*

Online: Machine Learning* (Stanford University)

*Courses currently pursuing

SCHOLASTIC ACHIEVEMENTS

- **JEE (Advanced):** Secured **All India Rank 64** for admission to IITs among a total of 1.5 million students.
- **Kishore Vaigyanik Protsahan Yojana (KVPY):** Achieved **All India Rank 61** in KVPY organised by IISc, Bangalore and Department of Science and Technology, Government of India; was awarded a fellowship for the same.
- **National Standard Examination in Physics (NSEP):** Qualified NSEP twice in 2014-15 and 2015-16, being in **top 1%** in the country.
- **National Standard Examination in Chemistry (NSEC):** Qualified NSEC the year 2015-16, being in the **top 1%** in the country.
- **National Talent Search Examination (NTSE):** Selected as NTSE scholar in 2012, conducted by NCERT.

TECHNICAL SKILLS

Advanced: Java, Python, HTML, CSS, JQuery, Git, Arduino

Intermediate: C++, Android, OpenCV, PHP, AngularJS, Django, Bootstrap, Autodesk Inventor, Linux, Iotivity, VHDL, Xilinx ISE, Vivado

Basic: NodeJS, Shell, Visual Studio

EXTRA-CURRICULAR ACTIVITIES

- **Indian Road Safety Campaign:**
 - As a member of the Technical Arm of IRSC, worked on a road accidents data portal which was later launched by the Ministry of Road Transport and Highways (MoRTH).
 - Supervised a Technical Internship of two IIT Delhi students with DIMTS (Delhi Integrated Multi-modal Transit System Ltd.) and worked on technical collaborations with various companies in the field of road safety.
- **Software Development Club, IIT Delhi:**
 - Member since February 2017. Developed a crowd-contributed study portal for the use of IIT Delhi students.
 - Actively participated in promoting applied computer science culture in the college.
- **An Initiative for National Advancement (AINA):** Member of AINA, which is a club aimed at grooming students so that they realise their duty as a part of the society.
- **Robotics Club, IIT Delhi:** Member from November 2016 to February 2017.
- **Inter-Hostel Dance Team:** Participated in Group Dance Event, in January 2017 and Duo+ Dance Competition, held in September 2017
- **Best Fresher for the year 2016-17**

POSITIONS OF RESPONSIBILITY

- **Secretary, Web Team, Indian Road Safety Campaign** (Sept 2017 - Present)
- **Student Partner at Microsoft Student Partnership (MSP) Program** (Aug 2017 - Present): Selected to represent Microsoft at IIT Delhi
- **Executive, Technical Arm, Indian Road Safety Campaign** (Jan 2017 – Aug 2017)
- **Web Executive for Alumni Affairs and International Program, IIT Delhi** (Jun 2017 - Present) and **Student Mentorship Program (SMP), IIT Delhi** (May 2017 - Present)
- **Executive, Technical Arm, Indian Road Safety Campaign** (Jan 2017 – Sept 2017)