

AYAN CHOUDHARY

B.Tech. Electrical Engineering
UG(III Year I Semester)
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Registration No: B.Tech./EE/18117019/2021

Indian Institute of
Technology
Roorkee



Area of Interest

Cloud computing, DevOps, Network Security, Computer Architecture, Distributed Systems, Software Dev

Education

Year	Degree/Examination	Institution/Board	CGPA/Percentage
2020	B.Tech. 2nd Year	Indian Institute of Technology, Roorkee	8.574
2017	Twelfth	Narayana Junior College (TSBIE)	98.6 %
2015	Tenth	O.P. Jindal School, Urjanagar (CBSE)	10.0

Internships

Google Summer of Code | Creative Commons

1 June 2020 - 24 August 2020

- Conducted accessibility and usability audits for the cc search website using various tools such as pa11y, lighthouse, and accessibility insights.
- Conducted tab index audits using accessibility insights tab-index audit tools.
- Made accessibility improvements(which also involved redesigning certain aspects and a changed configuration for modals and other interactive elements) to CC Search.
- Internationalized the CC search website and setup CI workflow for future accessibility audits before integration.
- Automated the internationalization process by setting up automation tasks with Github actions and Transifex API.

Project Engineer | Exikonnnect

16 July 2020 - 16 September 2020

- Created a virtual exhibition system in which people can visit an online expo without being there themselves.
- Managed cloud systems for the software and handled project management along with deployment on gamelift instance.
- Setup multiplayer interaction functionalities and worked on the world design and architecture.
- Contributed in key measures to automate world generation and quick deployment of the expo.

Projects

StuDYportal | SDSLabs

15 May 2019 - Present

- Developed the ReactJs frontend for the web-application to facilitate resource exchange.
- Implemented the django based backend and the google drive integrations to develop the file storage architecture.
- Integrated a docker-based environment for unit-testing and proper service management

InstaVote | SDSLabs

1 August 2019 - 30 January 2020

- [InstaVote](#) is a blockchain-based electronic voting system built using solidity.
- Developed a central Node.js server for storing important admin related information.
- Developed ReactJs based frontend and configured central server for a highly secure facial recognition login system.
- Developed and integrated voting systems that run on the solidity based blockchain system.

Quizio | SDSLabs

1 March 2019 - 1 June 2019

- Quizio is an online test platform created with the vision of conducting safe unsupervised tests.
- Integrated redis-caching for the routes to improve real-time network performance.

SPARK Website | SPARK

18 August 2019 - Present

- [Spark](#), IIT Roorkee is the summer internship program of IIT Roorkee.
- The website consists of a ReactJS based frontend and a NodeJS backend with Mongo as the database.
- Implemented google oauth support, developed the underlying cloud architecture and setup the website analytics.

zeronet | SDSLabs

1 July 2020 - Present

- zeronet is a tic-tac-toe game with an AI-controlled opponent. The tech consists of a VueJs based frontend and go based backend.
- Each game has its own session to facilitate the parallelization of the games without affecting performance.
- Developed the AI algorithm and implemented the complete backend functionalities in Go.

Application of maximum probable power point tracking in battery charging | EEN-291

28 September 2019 - 30 October 2019

- The purpose of this project was to demonstrate the effectiveness of the technique with which we can track maximum power point in a solar cell.
- Ran multiple simulations using MATLAB to determine the effective technique and presented the results.

zap-db | SDSLabs

13 May 2020 - Present

- zap-db is an easy to use JSON database written with ease of setup and memory management of slack-bots in mind.
- It is written in TypeScript and follows a session-token based architecture to maintain data.
- Implemented store, database and middleware functionalities for the db and corresponding APIs.

ReproX | SDSLabs

31 January 2020 - 2 February 2020

- [ReproX](#) is a completely indie VR first-person shooter and uses UE4 as the engine.
- Generated world and developed character mechanics and also helped design game flow.

- The SDSLabs portfolio is written in Vuejs with Django-drf based backend.
- Revamped the portfolio with a complete rewrite of the frontend in Vue and the backend was migrated to Django to support dynamic updation of the site.

ParElections | SDSLabs

22 December 2018 - 3 January 2019

- [ParElections](#), is a mobile App written in JAVA for android.
- Developed the e-voting system for voting on the go and with its own built-in notification system.

Awards / Scholarships / Academic Achievements

- Distinction, Cambridge ESOL Level 1, 2013
- Quater-Finalist, RBI Quiz, 2015
- First Runner Up, 4 INSPIRE NLEPC, Regional Award(Central Region), 2015
- Invited, Sakura Exchange Program, Japan, 2016
- AIR 771, KVPY SA, 2016
- Winner, Bal Shree Award (Age Group 14-16), 2016
- AIR 546, KVPY SX, 2017,
- Invited, Vijyoshi Science Camp, 2017,
- AIR 1936, JEE Advanced 2018,
- Winner, Microdoft Codefundo++ 2019, IIT Roorkee

Skills

Computer languages	C++, Javascript, TypeScript, Go, Java, Rust, Solidity, Python, php, Coffeescript, Ruby on Rails
Software Packages	Github, Docker, Kubernetes, UE4, ReactJS, VueJS, Postman, NodeJS, Flask, Django, Azure Ethereum Workbench, Android Studio, React-native, NodeJS, MongoDB, PostgreSQL, Mysql, sqlite, GraphQL
Languages Known	English (SRW) , Hindi (SRW)

Positions of Responsibility & Extra Curriculars**Member, Debating Society**

1 September 2018 - Present

- Took part in various inter-varsity debate tournaments across the country in Delhi, Bombay and Bengaluru circuits.
- Conducted workshops and debate tournaments in the campus to promote the culture of debating.

Developer, SDSLabs

21 January 2019 - Present

- Regularly conducted hackathons, public lectures, and competitions to foster the technical culture on the campus.
- Responsible for maintaining current applications and server management and also for maintaining the portfolio.
- Mentored freshmen students in their projects for the Winter of Code program and also helped improve the technical culture in the campus.

Developer, SPARK IIT Roorkee

18 August 2019 - Present

- Made performance improvements and configured site analytics along with cloud setup of the present website.
- Responsible for maintaining current application and server management.

Core-Committer, CC Search, Creative Commons

1 June 2020 - Present

- Conducted accessibility audit tests and improvements in cc-search.
- Internationalised the cc-search website and made feature improvements.
- Developed some of the important features to improve the website functionality.

Member, Vocabulary, Creative Commons

1 June 2020 - Present

- Participated in making appropriate design changes to make components more accessible.
- Worked in assessing the changes in components to support internationalization and accessibility changes.

References**Prateek Kumar Jha**

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Zack Krida

Front End Engineer
Creative Commons
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