

Athens, GA, 30605  
USA

# Kushajveer Singh

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## SUMMARY OF QUALIFICATIONS

Full-stack developer experienced with creating fully-responsive mobile first web applications and doing API integrations, reading documentation to add new features to an existing codebase, code review processes, CI/CD testing. Self-motivated and passionate to learn new technologies and build projects on top of it. Experienced with deploying more than 6 [projects](#) on Vercel/Heroku, contributing to open-source projects on [GitHub](#) for over 5 years, and maintaining a technical [blog](#) with 16 published posts.

## EDUCATION

**University of Georgia**, Franklin College of Arts & Sciences Athens, GA, USA  
**Master of Science in Computer Science** (GPA: 3.82/4.00) Jan 2021 – Dec 2022

**Punjab Engineering College (Deemed to be University)** Chandigarh, India  
**Bachelor of Technology in Electronics and Communication Engineering** (CGPA: 7.0/10.0) Aug 2016 – Jun 2020

## TECHNICAL SKILLS

- C, C++, Python, PyTorch, Git, GitHub, Circle CI, Docker, Shell Scripting, Web Scraping, Agile (Scrum), Linux
- HTML, CSS (BEM), Sass, JavaScript, TypeScript, jQuery, React, Next.js, Redux, Material UI, Stripe, Twilio, Bcrypt, OAuth, Sanity, Jest, Node.js, Express, Django, PHP, MySQL, PostgreSQL, MongoDB, REST APIs

## WORK EXPERIENCE

**Full Stack Developer** Athens, GA, USA  
*College of Agriculture and Environmental Sciences, UGA* Jul 2022 - current

- Implemented *Node.js/Express* parser to do real time *Microsoft Access* to *PostgreSQL* query conversion
- Brought up development and production servers, including IP whitelisting and backup configuration with periodic syncing, and migrated 18 years of data from *Access* to *PostgreSQL* database
- Automated data entry pipeline using *Python/TypeScript*, resulting in a reduction of time from 2 minutes per handwritten form to 25 seconds on average, by implementing autocomplete functionality for various fields
- Rewrote the entire codebase for a proprietary language, which included converting information from a 200-page manual to a *TypeScript/Next.js* application and updating the queries from *Access* to *PostgreSQL*

**Graduate Teaching Assistant** Athens, GA, USA  
*Computer Science Department, UGA* Jan 2022 - Aug 2022

- Led weekly meetings and facilitated group discussions for the course *Discrete Mathematics for Computer Science*
- Held one-on-one office hours for 2 transfer students, covering the entire course in detail while covering practical applications of the content and mentored students on the career paths in computer science

## ADDITIONAL EXPERIENCE

**Google CS Research Mentorship Program** Athens, GA, USA (Remote)  
*Student* Sep 2022 – Dec 2022

- Selected for a 12-week Google Research program among 50 candidates from across USA and Canada

**Winner TechGig CodeGladiators** Punjab, India  
*Hackathon* May 2019 – Jul 2019

- Won the first solo place in Artificial Intelligence hackathon where 15 teams were selected from across India from a pool of about 0.6 million candidates
- Built a fully deployable and unsupervised parking space detection system using PyTorch and OpenCV
- Ability to adjust predictions based on where cars are parked over time

**Third place North-Zone IndiaSkills Nationals** Chandigarh, India  
*IT Software Solutions for Business* Sep 2018 – Nov 2018

- Built desktop application using C# and android application using Java to win third place at IndiaSkills nationals
- Both applications fetched data from a *MySQL* and *phpMyAdmin* database setup

## PROJECT EXPERIENCE

**YouTube Video Platform** | [GITHUB](#), [DEMO](#)

- Built fully-responsive *React/Next.js/TypeScript/Material-UI* web app using *YouTube API* and deployed on *Vercel*
- Implemented video section, category section, responsive channel and video cards, channel pages, video pages with ability to play videos straight from the app and see related videos

### Video Sharing App | [GITHUB](#), [DEMO](#)

- Built fully-responsive full-stack video sharing social media app using *React/Next.js/TypeScript/Tailwind CSS/Zustand/Sanity* and deployed on *Vercel*
- *Google auth* to register and login user, ability to upload, publish, share, comment on and like the videos
- Advanced search functionalities, filter by categories, profile pages, and see suggested accounts

### Chat Messaging App | [GITHUB](#), [DEMO](#)

- Built fully-responsive full-stack chat messaging application using *React/TypeScript/Bcrypt* and *Stream Chat API*
- Support for authentication, *Twilio* SMS notification, direct and group chats, emojis and reactions, GIF support
- Deployed *React* frontend on *Vercel*, and deployed *Express.js* backend on *Heroku*

### Ecommerce Website | [GITHUB](#), [DEMO](#)

- Built full-responsive and scalable modern ecommerce website using *Next.js/TypeScript* and deployed on *Vercel*
- Used *Next.js* as backend endpoint, *Stripe* for managing payments, shipping rates and entire checkout process
- Manage entire content of website using *Sanity*, change details of products or add new products on the go

### Music Player and Discovery App | [GITHUB](#), [DEMO](#)

- Built fully-responsive modern music player app using *React/Next.js/Tailwind CSS/TypeScript/Redux/Shazam API*
- Choose genre and view top songs, see top charts and artists for the country or worldwide
- Music player with controls to go to next/previous song, repeat, shuffle, fast forward, adjust volume
- Fully functional search and pages to explore most popular songs in the country, using *IP Geolocation API*
- View song's lyrics and official video, related songs, and other songs by the artist

### Group Video Chat | [GITHUB](#), [DEMO](#)

- Built group video chat app using *JavaScript/Agora*, and deployed the backend on *Heroku* and frontend on *Vercel*
- Conference chat with multiple people at same time, screen share, private/group messaging, admin controls, polls
- Worked with an enterprise scale codebase and added features on top of it by reading documentation

### Restaurant Website | [GITHUB](#), [DEMO](#)

- Converted *Figma* design into fully-responsive *Next.js/TypeScript/CSS(BEM)* web app and deployed on *Vercel*
- Modern UI/UX website built using *CSS Flexbox/Grid*, animations, and gradients

### Pathfinding Visualizer | [GITHUB](#), [DEMO](#)

- Built fully-responsive *React/Next.js/TypeScript/Redux* web app for visualizing pathfinding algorithms, maze-generation algorithms deployed on *Vercel*
- Implemented 9 different algorithms and added random weight generation methods to visualize weighted shortest cost algorithms

### Sort Visualizer | [GITHUB](#), [DEMO](#)

- Deployed fully-responsive *React/Next.js/TypeScript/Redux* web app for visualizing sorting algorithms on *Vercel*
- Implemented over 30 sorting algorithms, view multiple algorithms in parallel, generate 4 types of random array

### JSON/YAML Graph Visualizer | [GITHUB](#), [DEMO](#)

- Built *React/Next.js/Redux/Material-UI* web app to convert *JSON/YAML* data into graph for improved readability
- Wrote *YAML* to *JSON* parser in *TypeScript*

### Bookstore application | [GITHUB](#)

- Built full-stack bookstore application using *HTML/CSS/JavaScript* for frontend and *Django/SQLite* for backend
- Implemented user authentication with email, change/forgot password, edit profile, advanced search options, cart management, apply promotions, entire process for placing an order