Pratyush Patel

201-301-5800 | patelpratyush28@gmail.com | linkedin.com/in/pratyush-patel/ | github.com/patelpratyush | patelpratyush.com

Education

Master of Science in Computer Science

May 2026

Stevens Institute of Technology

Hoboken, NJ

Bachelor of Science in Computer Science

May 2025

Stevens Institute of Technology

Hoboken, NJ

- Scholarships & Awards: Edwin A. Stevens Scholarship
- Coursework: Web Programming, Data Structures, Algorithms, Machine Learning, DevOps Principles and Practices

SKILLS

Languages: Java, Python, C++/C, JavaScript, HTML/CSS, SQL, OCaml Libraries: Tkinter, NumPy, Pandas, RestAPI, TensorFlow, React, Next.js

Developer Tools & Technology: Git, GitLab, VS Code, Visual Studio, PyCharm, IntelliJ, Eclipse, Jupyter

Notebook, Firebase, GCP, Vercel, OpenAI, CI/CD, Azure DevOps, Tableau Soft Skills: Teamwork, Time Management, Communication, Problem-solving

Experience

Undergraduate Research Assistant

Oct 2024 - Present

Stevens Institute of Technology

Hoboken, NJ

- Collaborated on the research project titled "Synthesizing Access Control Policies using Large Language Models."
- Contributed to creating and analyzing access control policy datasets for research purposes.

Software Engineering Fellow

July 2024 - Sep 2024

Headstarter Remote

- Boosted user engagement by 40% through AI-driven web apps built with Next.js, React, and Firebase.
- Deployed a scalable SaaS platform with NextAuth.js and Stripe, achieving 95% customer satisfaction.
- Increased query accuracy by 30% by automating data extraction using a web scraper for Rate My Professor.

Projects

Weather App | JavaScript, HTML/CSS, Git, OpenWeatherMap API

- Developed a dynamic weather application using HTML, CSS, and JavaScript, increasing user **engagement by 40%** through a user-friendly interface.
- Handled API calls asynchronously using JavaScript promises, reducing load times by 20% and improving user experience.

AI Flashcards SaaS | Next.js, Clerk, Firebase, OpenAI, Stripe

- Developed an AI-powered flashcard web application, integrating Next.js, Clerk for user authentication, and Firebase for backend services, **onboarding over 100 users**.
- Implemented Stripe for seamless payment processing, generating \$1K in revenue from paid customers.
- Executed a social media marketing strategy, increasing user engagement by 50% and expanding the user base.

Rate My Prof | React, Next.js, Google Generative AI, OpenRouter, Pinecone

- Developed ProfessAI, an AI-powered assistant providing personalized professor recommendations, increasing user retention by 30% using a Retrieval-Augmented Generation (RAG) system.
- Implemented comprehensive review analysis, real-time chat interface, and advanced search capabilities, improving user experience and engagement by 40%.
- Leveraged Google Generative AI and Pinecone for efficient text embeddings and vector storage, reducing data retrieval time by 50%.

Publications

Synthesizing Access Control Policies using Large Language Models | Adarsh Vatsa, Pratyush Patel, William Eiers

• To appear in the 4th International Workshop on NL-Based Software Engineering (NLBSE 25)