

Pranav Murthy

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OBJECTIVE

- Highly motivated computer science student with a strong foundation in programming and problem-solving, eager to gain real-world experience and contribute to any computer science role. Seeking part-time or internship opportunities to apply and expand my knowledge while developing valuable skills in a professional setting.

EDUCATION

GEORGIA INSTITUTE OF TECHNOLOGY, Atlanta, GA

June 2023 – May 2026

- Candidate for Bachelor of Computer Science
- Concentration in Artificial Intelligence
- GPA: 4.00 – Recipient of Zell Miller Scholarship
- CS 1331 (Intro to OOP/Java), MATH 1554 (Linear Algebra), MATH 2550 (Multivar. Calc.), CS 2051 (Honors Discrete Math)

CHATTAHOOCHEE HIGH SCHOOL, Johns Creek, GA

Aug 2019 – Dec 2022

- Dual Enrollment student at Georgia Tech (2022)
- GPA: 100.9/100 – Recipient of Merit Certificate (Top 5% GPA of Students)
- AP Capstone Program: AP Seminar and AP Research

WORK EXPERIENCE

Student Researcher (Automated Algorithm Design – Partnered with Google), Atlanta, GA

Aug 2023 – Present

- Utilizing genetic programming, which involves evolution of data and functions over multiple generations
- Implementing GP using multi-objective optimization, which finds optimal solution to multiple problems simultaneously
- Using Evolutionary Multi-objective Algorithm Design Engine which creates an automated method that develops hybrid algorithms that outperform existing methods

Programming Instructor (TheCoderSchool), Johns Creek, GA

Aug 2022 – Present

- Tutoring elementary and middle school students (ages 6-14)
- Teaching Python, JavaScript, HTML, CSS, Unity, GameMaker
- Marketed to potential clients and trained new employees

Machine Learning Student Research Developer (Georgia Tech Pathology Dynamics Lab), Virtual

Oct 2021 – Present

- Used Latent Dirichlet Allocation machine learning models, which classify medical articles into categories for hospital clientele
- Developed full-stack Django application with topic modeling
- Currently developing a neural-network-based curation tool using PyTorch

SKILLS

Programming: Python (Tensorflow, NumPy, Jupyter, Django, Flask, Web Scraping, Databases, GUI, Deap), Java, React
Web Pages: HTML, CSS, JavaScript
Operating Systems: Windows, Linux (Bash)
Version Control: Git and GitHub
Academia: Familiar with conducting research, writing academic papers, and formal presentations
Microsoft Office: Word, Excel, Publisher, PowerPoint

RESEARCH

Georgia Institute of Technology Pathology Dynamics Lab, Atlanta, GA

Nov 2022

Co-authored published abstract

- Topic Modeling Application for Neurology Text Mining for Predictive Medicine
- Published in American Neurological Association

PROJECTS

Travelling Salesman Problem Approximation Program

Sep 2023

- Used deap module in Python to develop a genetic programming approach to finding a minimum distance between points
- Also utilized Psuedo-Hilbert Curve and Nearest Neighbor algorithms to accelerate evolution of individuals

GPT-based Discord Chatbot (Futurista)

Dec 2022

- Collaborated with a partner to use large language model text-davinci-002 engine to simulate a Discord bot
- Utilized GPT-3 API, Discord API, and asynchronous programming in Python