

Akhil Madipalli

 github.com/akhilmadipalli  [linkedin.com/in/akhilmadipalli](https://www.linkedin.com/in/akhilmadipalli)  akhimadi@vt.edu  571-577-3695

EDUCATION

Virginia Tech <i>Bachelor of Science in Computer Science, Minor in Philosophy</i>	June 2027 Current GPA: 4.0/4.0
St Paul VI Catholic High School <i>Chantilly, VA</i>	June 2023 GPA: 4.46/4.0
Tufts University <i>Pre-College Summer Program</i>	Summer 2022 GPA: 4.0/4.0

RELEVANT COURSEWORK

Grades: 5/5 on ALL AP exams taken (10). Exclusively A's on all listed, completed courses

Courses: AP Computer Science A, Software Design and Data Structures (in progress), AP Calculus BC, AP Calculus AB, Multivariable Calculus (in progress), AP Statistics, AP Physics C: Mechanics/EM, Foundations of Engineering (in progress)

Awards: Commended Student National Merit Scholarship Program, 3x AP Scholar with Distinction Awards

SKILLS

Languages: Java, Python, JavaScript/TypeScript, HTML/CSS, Rust

Tools: Git/GitHub, Tensorflow, Flask, VS Code, Jupyter Notebook

Technical: Data Analysis, Technical Writing, Data Structures and Algorithms, AI/Machine Learning, Object-Oriented Programming

Soft: Public Speaking, Analysis, Problem Solving, Critical Thinking, Communication, Teamwork

PROJECTS

- port-pulse** | *Rust, Git/Github, Computer Networking* July 2023 - September 2023
- Developed an IP port scanner CLI in Rust programming language to help to detect vulnerabilities or ensure that only the necessary ports are open for specific service.
 - Utilized the std library and multithreading to allow scan function to scale based on amount of ports receiving or transmitting communication.
 - Published CLI using crates.io, now available to use by anyone.
- M3 MathWorks Modeling Challenge** | *MATLAB, Microsoft Office, Research* March 2023
- Assessed and determined the future for electric bicycles in the economy
 - Created a model that estimated the future of the market of e-bike sales
 - Examined the most-likely reasons for e-bike market growth
 - Quantified the effect of e-bikes on issues such as carbon emissions, traffic congestion, and health

EXPERIENCE

- AI/ML Club** | *Member* Present
- Virginia Tech club centered around Artificial Intelligence and Machine Learning.
 - Paper discussions, monthly challenges, guest lecturers.
- PVI Coding** | *President, Lecturer* August 2021 – June 2023
- Taught Python, JavaScript, and web development to students through project-based learning.
- PVI ItsAcademic Team** | *Captain* August 2022 - June 2023
- Academic trivia tournament similar to QuizBowl.
 - Competed on NBC against other high schools around the US.
- PVI Philosophy** | *President* August 2021 - June 2023
- Engaged in difficult yet beautiful philosophical topics that most students do not think to discuss.