

EDUCATION	B.S. Computer Science (in progress) ▀ University of Utah	2022 - 2027 <i>expected</i>
	A.S. Computer Science (incomplete) ▀ SLCC	2019 - 2022 <i>transferred</i>
TECHNOLOGY	Expert	
	Zig, Dart, JS, WASM (WAT), CSS, SVG, GitHub Actions, MIPS asm	
	Proficient	
	Angular, C, C#, Cordova, Flutter, HTML, Java, Python, TS, Typst	
	Familiar	
	Bash, C++, CICD, CircleCi, Metal, MongoDB, OpenCL, PHP, Ruby, Rust, Swift	
EXPERIENCE	Research Assistant ▀ University of Utah	Nov 2025 - <i>present</i>
	Benchmarking gradual typing in Meta's Cinder variant of python	
	Teaching Assistant ▀ University of Utah	Sep 2025 - <i>present</i>
	Leading labs, grading, assisting students for COMP 1020	
	Software Engineer/Dev ops ▀ Stutor Inc.	Sep 2023 - Apr 2024
	Architected CICD pipeline	
	Optimized DB indexes, reducing query times by up to 8x	
	Web Developer/Dev Ops ▀ Jerran Software Solutions	Apr 2022 - Sep 2023
	Overhauled LDS MTC QA/CICD workflow, substantially reducing regression burden	
	Rewrote Embark app startup to reduce first time loading by up to 50%	
	Research Assistant Intern ▀ Earl Keefe PhD	Nov 2020 - Jun 2021
	Visualizations for anthropology research	
	Web Dev. Intern ▀ Frelia	May 2019 - Sep 2019
	Web scraping SNPedia for AI training	
PROJECTS	Optimized bead/gravity sort ▀ zig	2026
	Bead sort done via popcount intrinsics and bit matrix transpositions. Only for 32 u5s	
	Tiny nkey rollover tester OS ▀ zig	2025
	Ported as OS class assignment to zig and then added keyboard input and vga output	
	Fast approximate change of base ▀ python	2025
	Novel algorithm for printing numbers larger than $10^{10^5}$ efficiently	
	Automated resume ▀ typst	2025
	Automated typst resume deployed to website	
	Held-karp ▀ zig	2025
	Well optimized bitset based Held-karp TSP algorithm	
	Spreadsheet formulas to DLL compiler ▀ c	2025
	A spreadsheet which compiles formulas to a DLL which can be used in DOTNET projects	
	Color alchemy ▀ qt c++	2024
	A game for learning color mixing	
	CSS grid examples ▀ css html	2024
	Examples of common design patterns implemented with css grid as a good reference	
	Randomized Pacman game ▀ java	2021
	Pacman game using some algorithms from my 2420 class: A*, DFS, BFS, Union find	
Misc	Added code field to instruction decoder ▀ MARS IDE	2025
	#12 Ranked team at Rocky Mountain Regional Contest ▀ ICPC	2025

Jane Street Leaderboard

Number Cross 5

May 2025

Sum One, Somewhere

Apr 2025