

# CHANNING PEAR

203-321-6513 | channing.pear@utexas.edu | github.com/pearsquirrel | channingpear.com

## EDUCATION

<b>2014-2018</b>	<b>University of Texas at Austin, B.S. Computer Science, B.B.A. Finance</b>	<b>Austin, TX</b>
	Turing Scholar, Computer Science Honors Program (3.8 GPA)	

## WORK EXPERIENCE

<b>Summer 2017</b>	<b>Stripe, Software Engineering Intern</b>	<b>San Francisco, CA</b>
	(Starting May 30th, 2017)	
<b>Summer 2016</b>	<b>Google, Software Engineering Intern</b>	<b>Mountain View, CA</b>
	Designed and implemented high-performance open-source Java distributed tracing API for the Google Cloud Platform	
	<ul style="list-style-type: none"><li>- Over 80% of Google's production services use the system, Census, to track RPC latency and for debugging</li><li>- Google's next-generation distributed messaging framework, gRPC, will be Census-enabled in the future</li><li>- Simplified internal codebase and developed a native implementation from the ground up for open-source release</li><li>- Heavily contributed to the design of distributed tracing API's in other languages (Go, C++)</li></ul>	
<b>Summer 2015</b>	<b>Bloomberg LP, Software Engineering Intern</b>	<b>New York City, NY</b>
	Developed premium financial analytics software and visualizations for a \$100M target market using React and D3	
	<ul style="list-style-type: none"><li>- Designed and implemented custom visualizations to portray complex financial data</li><li>- Connected front- and back-end through HTTP endpoints and restructured 30,000 line front-end codebase</li><li>- Implemented backend pipeline to streamline the process of financial engineers validating submitted data</li></ul>	
<b>Summer 2014</b>	<b>Beecher Investors, Software Developer</b>	<b>Stamford, CT</b>
	Created real-time and historical financial data scraper with excel integration using YQL and the Google Finance API	

## SELECTED PROJECTS

<b>ML Scheduler</b>	Implemented multiple types of process schedulers, including FIFO, LIFO, SJF, SRT, and a custom machine learning algorithm that uses I/O time, CPU time, and various other metrics to predict the optimal time to switch processes
<b>Muse</b>	Developed a music playlist aggregator on a team of four using Python, Flask, Postgresql, and Spotify/Youtube APIs
<b>Swim Scope</b>	Web app that scrapes an online database for the times of a specified group of swimmers, caches the results locally, and ranks the individuals in each of their events. Developed using Python, Selenium, Flask, and MongoDB
<b>Web Crawler</b>	Indexes and searches a subset of the web. Supports compound queries and efficient phrase searching
<b>Genetic Tetris</b>	Graphical Tetris game with an AI developed and optimized through a genetic algorithm
<b>Other Projects</b>	Image Filters, Markov Chains, Graphical Chess, Single-Cycle CPU, malloc and free, pre-emptive threading, automated software deployment system, mouse tracker chrome extension

## PROGRAMMING COMPETITIONS

<b>Spring 2016</b>	<b>Machine Learning Competition, USAA DataHack @ UT Austin (Honorable Mention)</b>
	Developed a model that predicts insurance holder enlistment status with 96% accuracy (competed with grad students)
<b>Summer 2015</b>	<b>Intern Hackathon @ Bloomberg (1st Place)</b>
	Developed a 3D capture-the-flag game, along with a promotional video, on a team of three using Unity
<b>Spring 2015</b>	<b>Bloomberg Coding Competition @ UT Austin (2nd Place)</b>
	Developed algorithmic stock trading software that sells/buys based on volatility, liquidity, and other calculated metrics

## SKILLS AND TECHNOLOGY

<b>Proficient</b>	Java, Python, C++, Git, Vim, LaTeX
<b>Exposure</b>	TensorFlow, MATLAB, gRPC, React, JavaScript, HTML, CSS, C, MySQL, MongoDB, Postgresql, Objective C, Bash

## RELEVANT COURSEWORK

\* denotes honors  
Data Structures\*, Discrete Math\*, Computer Architecture\*, Operating Systems\*, Algorithms\*, Programming Languages\*, Networks, Data Mining\*, Computer Vision/Machine Learning\*, Statistical Modeling\*, Vector Calculus\*, Differential Equations, Linear Algebra

## EXTRA-CURRICULARS

<b>TX Convergent</b>	Officer in and founding member of UT's first business/computer science interdisciplinary club and startup incubator
<b>Youtube</b>	Grew "PearSquirrel" youtube channel to 4,000,000+ views & 10,000+ subscribers through Minecraft inventions
<b>Trumpet</b>	Board member of 400-person band, 1st Chair Trumpet/Section Leader (Jazz and Concert Band) since 10th grade