# STAR SU

star\_su@brown.edu +1 734 834 9466 shinelikastar.github.io

## **EDUCATION**

**Brown University** 

September 2017 - May 2021

Sc.B. Computer Science A.B. Literary Arts GPA: 4.0

#### Skyline High School

September 2017 - May 2021

National A.P. Scholar GPA: 4.0, ACT: 35

## COURSEWORK

Intro to Functional Programming
Intro to Data Strucutres & Algorithms
Discrete Structures & Probability
Intro to Computer Systems (\*)
Artificial Intelligence (\*)
(\*) in progress

# **SKILLS**

# Programming

Java • Python • C Matlab • Scala • Racket • OCaml

### Design

Illustrator • Photoshop • LaTex

### Language

Mandarin
Fluent in reading, writing, ♂ speaking

#### Interests

pastries • sustainable fashion • Marvel Cinematic Universe

## **EXPERIENCE**

## Medical Informatics REU · Undergraduate Researcher

## PI Timothy Carroll • University of Chicago • June 2018 - August 2018

- Developed scripts in Matlab to automate the discovery of correlations between genetic information and radiomic features
- Discovered geometric features of MRI that can be extracted to detect gene expression of glioblastoma multiforme, resulted in two co-authored abstracts; submitted for SPIE and ISMRM conferences

# Brown Computer Science Department • Undergraduate Teaching Assistant

## CS0170 Introduction to Functional Programming • August 2018 - Present

- Guided students to writing and understanding complex programs in DrRacket and OCaml
- Implemented new scripts in Python to streamline evaluation of student work
- Developed and graded problems for homeworks, labs, and projects on algorithms and data structures for a class of over 170 students

# **PROJECTS**

## Guizilla • Intro to Functional Programming

• Built an interactive GUI browser in Java with HTML pages, implementing both client and server sides throught sockets, reflection, JavaFX events, and XML file parsing

## **Search** • *Intro to Functional Programming*

• Built a search engine in Scala that uses term frequency and PageRank algorithms to index a wiki and return relevant documents based on a free text query

## **Shell** • Intro to Computer Systems

• Implemented a limited version of the Linux shell in C, including file redirection, signal handling, and foreground/background jobs

#### TRON • Artificial Intelligence

• Created an AI bot to successfully play the game TRON using alpha-beta pruning with the Voronoi heuristic; placed in top 10% in a class of over 100 students

## LEADERSHIP + IMPACT

## VISIONS Magazine · Literary Editor · September 2018 - Present

- Review and edit over 100 submissions to publish for the fall 2018 print issue
- Organization aiming to amplify the voices and diverse experience of the Asian American Pacific Islander community at Brown and Rhode Island School of Design

## The College Hill Independent • Staff Writer • December 2018 - Present

- Write and extensively workshop three pieces per semester
- Providence-based publication committed to addressing systems of oppression centering the voices, opinions, and efforts of marginalized people in Providence and beyond

## Brown STEAM · Team Member · September 2018 - Present

- · Plan and design workshops, events, and discussions
- Student group focused on connecting the arts and sciences to engage in multidisciplinary work for the community at large