

# MATTHEW (JOONHO) MOON

2338 Bancroft Way, Berkeley, CA 94704 ■ mattmoon@berkeley.edu ■ (415) 900-6536

## EDUCATION

### University of California, Berkeley

College of Letters and Science | B.A. Computer Science and B.A. Economics

**Expected Graduation:** May 2021

**GPA:** 3.4 / 4.0 | **Major GPA:** 3.6 / 4.0

**Relevant Coursework:** Efficient Algorithms and Intractable Problems, Machine Structures, Data Structures, Structure and Interpretation of Computer Programs, Discrete Mathematics and Probability Theory, Linear Algebra and Differential Equations, Multivariable Calculus

## PROJECTS

### BearMaps | Java

**August 2019**

- Implemented the backend for a map application, which focuses on the campus town of Berkeley, with zoom and drag functionality
- Calculated and displayed optimal routing between locations, by utilizing A\* search algorithm
- Built and integrated an autocomplete feature to suggest locations from inputted search terms, using trie data structure

### GitLet | Java

**July 2019**

- Created a version-control system using serializable objects that closely mimics Git from scratch
- Designed internal file structures and other functionalities such as backup commits, merge, branches and remote usage

### Enigma | Java

**June 2019**

- Implemented an encryption/decryption machine, with heavy usage of object-oriented programming and inheritance
- Emphasized on modular code and polymorphism, focusing on reusability of the code and proper logic implementation

### DaniBio | Ruby on Rails, HTML

**May 2017**

- Implemented a website that assists biology graduate students with their labs, such as DNA translation to RNA sequences
- Created and designed the front end of the website with heavy emphasis on user experience, for better lab efficiency

### Scheme Interpreter | Python

**April 2017**

- Developed an interpreter for a subset of Scheme programming language using Python, parsing string inputs for various cases
- Implemented based on read-eval-print loop, utilizing tokenizing, parsing, evaluating commands and parsing

## EXPERIENCE

### Republic of Korea Army | 5<sup>th</sup> Corps Logistics Support Brigade 15<sup>th</sup> Supply Battalion

**August 2017 – May 2019**

*Logistics Specialist, Squad Leader, Sergeant*

- Analyzed the deployment flow of class II items, increased storage efficiency by 15%, and commanded a squadron of 10+ soldiers during five axis-wide trainings, boosting time efficiency of class II and class IV items deployment by 20+%
- Protocolled bimonthly meeting between battalion commanders of the 70<sup>th</sup> BSB Commander from the US Army and the 15<sup>th</sup> BN Commander, while preparing necessary operations-related slides and other documents and scripts necessary for the meetings
- Commanded a squadron of 10+ soldiers during multiple trainings such as boosting time efficiency of class II items deployment by 20%
- Founded a station-wide “Learning English in Pocheon” ESL program for soldiers, to accelerate communication with the US Army

### X-Lab Inc. | Berkeley, California

**August 2016 – December 2016**

*Business Operation Intern*

- Marketed Spendwallet, a payment solution device that works with a combination of a patented magnetic flux emulation technology and near field connection technology, through various social media platforms, raising \$170,000+ from crowd-funding websites
- Assisted the head of Business Development in negotiation of a partnership deal, resulting in enhancement of customer experience
- Developed and sourced a list of 30+ Venture Capital firms in Northern California through active online research

### Seoul Credit Rating & Information | Seoul, South Korea

**June 2016 – July 2016**

*Fintech Intern*

- Analyzed personal financial information, such as individual credit information, and made reports for regulatory institutions
- Led a project on the company’s establishment of a new cyber security branch by communicating with a potential benchmark company
- Conducted research on growing fin-tech companies to assist in investment pitches to board members

## LEADERSHIP & ACTIVITIES

### Korean American Student Association (KASA) | Berkeley, California

**January 2016 – May 2017**

*Fundraising Chair, Community Service Chair, Family Head*

- Created and managed fundraising events to fund for organization operations, increasing raised funds by 15% than previous years
- Led community service opportunities for 20+ KASA members and officers and raised \$700+ for charity funds
- Marketed Korean American Student Association to incoming Freshmen and increased memberships by 50+

## SKILLS & INTERESTS

**Technical:** Python, Java, C, SQL, Ruby on Rails, HTML, Adobe Photoshop, Microsoft Office Suite

**Languages:** Korean (Native), Chinese (Conversational)

**Interests:** Weight Training, Soccer, Rugby, Books, Stock Investing, Traveling (35+ countries)