Jessica Myers

1025 Oak Trace • Evansville, IN 47725
(812) 604-5431 • jmmyers3@illinois.edu

EDUCATION

University of Illinois Urbana-Champaign, Urbana-Champaign, IL   August 2021–Present
PhD in Computer Science

Rose-Hulman Institute of Technology, Terre Haute, IN   May 2021
Bachelor of Science, Computer Science   GPA: **3.98/4.0**
Minors in Data Science, Math, and Music   *Summa Cum Laude*

PUBLICATIONS

Myers, Jessica, "Music Generation with Deep Neural Networks Using Flattened
Multi-Channel Skip-3 Softmax and Cross-Entropy," *Rose-Hulman Scholar,* 2021.
Available: https://scholar.rose-hulman.edu/computer_science_seniorproject/2/

EXPERIENCE/PROJECTS

Research Assistantship, UIUC, Urbana-Champaign, IL   Spring 2022
Advised by Dr. Timothy Bretl

UIUC Computer Science Department, Urbana-Champaign, IL   Fall 2021
CS124 Introduction to Computer Science teaching assistant

Lockheed Martin Space, Special Programs, Littleton, CO   Summer 2020
Software Engineering Intern
- Wrote code for a web application that uses machine learning to analyze data regarding the locations and movements of objects over time.
- Full stack experience working on machine learning clustering algorithms, backend, database access, test code, API calls, and UI/UX.
- Acquired skills working with Docker containers, coding in Python and JavaScript React, and using Jira software in a fast-paced, Agile environment.

Rose-Hulman CSSE Department, Terre Haute, IN   Fall 2019
Computer Science teaching assistant   –Fall 2021

Deep Learning to Disqualify LASIK Candidates   Fall 2020
Created a system that employs Convolutional Neural Networks to disqualify
LASIK candidates through corneal topographic data (group project).

Preliminary Orbit Determination Software   Spring 2019
Coded in Scheme the Gauss method of preliminary orbit determination with
iterative improvement (individual project).

Highlighted Text Scanner App   Winter 2019
Developed an Android app that extracts highlighted text from an image and
adds them to a notes page (partner project).

Optical Sheet Music Recognition   Winter 2019
Created software to detect rhythms and note values in sheet music using
image recognition techniques in MATLAB (group project).

PlantUML Diagram Generator   Winter 2019
Using design patterns, wrote code that parses Java code into PlantUML code
to generate class diagrams (group project).

HONORS AND ACTIVITIES

- UIUC Computer Science Excellence Fellowship   March 2021
- Rose-Hulman CSSE Frank Young Outstanding Scholarship award   May 2021
- Upsilon Pi Epsilon Honor Society   2020–Present
- Alpha Lambda Delta Honor Society   2018–Present
- Blue Key Honor Society   2019–Present
- Dean's List, Rose-Hulman Institute of Technology   Fall 2017–Spring 2021
- Faculty-selected member of ESCALATE, an entrepreneurship program,   2017–2018
  with specialized courses, a living-learning community, and participation
  in startup weekend with an original business idea
- Competitive pianist (14 years), clarinet player (10 years), and composer (7 years)

SKILLS

Related courses: Celestial Mechanics, Deep Learning, Image Recognition, Artificial Intelligence, Observational Astronomy, Data Mining, Object-Oriented Software Development, Databases, Operating Systems, Android App Development

Programming Languages: Python, Java, Scheme, MATLAB, Kotlin, C, C++, SQL, React and Angular JavaScript, HTML

Data Science Skills: TensorFlow Keras, Pandas, Scikit-learn, NumPy, Matplotlib

Software: Jupyter Notebook, Visual Studio, Eclipse, PyCharm, Docker, Git, GitLab, Windows, Apple, Linux, Microsoft Office Suite (Word, Excel, PowerPoint, Outlook), Skype for Business, Postman

World Languages: proficient in French