

Emily Herbert

emilyherbert@cs.umass.edu • emilyherbert.com

EDUCATION	University of Massachusetts Amherst , Amherst, MA May 2023 PhD in Computer Science Trinity University , San Antonio, TX May 2018 BS in Computer Science
SKILLS	Languages Scala, Python, C++, Java, Haskell, OCaml, C, C# Libraries Pytorch, Numpy, Keras, Tensorflow, Akka, ScalaFX, JavaFX, Matplotlib, Deeplearning4j, MLib, Tensorboard Software Eclipse, Greenfoot, Unity, Visual Studio, VxWorks Tools Apache Spark, LaTeX, XML, HTML, Alex, Happy
RESEARCH EXPERIENCE	University of Massachusetts Amherst , Amherst, MA June 2018 – present Simulation Input Modeling with Deep Learning Advised by Dr. Peter Haas. <ul style="list-style-type: none">• Explore previous literature covering the cross-domain of simulation and deep learning.• Implement deep learning models for input modeling.• Create comprehensive report and prototype model. Trinity University , San Antonio, TX Jan 2017 – May 2018 Audio Style Transfer with Deep Learning Advised by Dr. Matthew Hibbs. <ul style="list-style-type: none">• Reviewed relevant domain literature covering style transfer, deep learning, and audio manipulation.• Implemented deep learning models for audio style transfer.
WORK EXPERIENCE	University of Massachusetts Amherst , Amherst, MA Sept 2018 – present Teaching Assistant <ul style="list-style-type: none">• Help students in the Mathematical Foundation for Informatics course with with mathematical logic, set theory, and proof writing.• Design and implement set operation visualization application to be used as a student educational tool. Trinity University , San Antonio, TX Aug 2016 – May 2018 Teaching Assistant <ul style="list-style-type: none">• Assisted in the Principles of Computer Science I, Principles of Computer Science II, and Introduction to Programming Logic courses.• Acted as a resource for students for help with Scala, ScalaFX, Akka, Java, JavaFX, and Greenfoot.• Designed, implemented, and upkept test server for student projects using Scala, Akka, and Actors.• Monitor student progress, host office hours, meet with students by appointment, host exam review sessions. National Aeronautics and Space Administration (NASA) , Langley, VA June 2017 – Aug 2017 NASA Internships, Fellowships, and Scholarships (NIFS) Intern <ul style="list-style-type: none">• Contributed to the NASA Safeguard autonomous drone geofencing project.• Designed and implemented system for on-board flight control of GPS devices.• Refactored code from previous NASA flight missions to meet current mission standards. General Electric (GE), Oil & Gas , Billerica, MA June 2016 – Aug 2016 Information Technology Leadership Program (ITLP) Intern <ul style="list-style-type: none">• Created asset tracking system for shop floor using RFID, Bluetooth LE, and Raspberry Pi.• Worked with the SAP enterprise resource management software to automate EHSM compliance checks.