Derek Tam

Education

2018-2020 University of Masssachusetts Amherst, Amerst, MA.

Master of Science in Computer Science; Concentration in Data Science; GPA: 4.0

2013–2017 Carnegie Mellon University, Pittsburgh, PA.

Bachelor of Science in Computer Science; Additional Major: Statistics

Experience

May 2018 - IESL Lab, Researcher, Professor Andrew McCallum.

Present Improved deep learning string edit models by adding optimal transport

Implemented search based kernel methods in graphs for nearest neighbor problem

July 2017 - Carnegie Mellon University, Researcher, Qinlan Shen.

May 2018 Scraped the web to create parallel corpora data in over 150 different languages

Ran state of the art machine translation models to determine sources of error

May 2017 - **RoboTutor**, Android Studio Developer, Professor Jack Mostow.

May 2018 Contributed to Android app for Global Learning XPrize that won 1M $\,$

Implemented various games for children to learn math in Swahili

May 2015 - YogaTailor, Backend Developer.

August 2015 Set up backend database to handle users with CRUD functionality

Developed global push notification system

Publications

Tam, D., Monath, N., Kobren, A., Traylor, A., Das, R., McCallum, A. "Optimal Transport-based Alignment of Learned Character Representations for String Similarity" in *Association of Computational Linguistics (ACL) 2019*. https://www.aclweb.org/anthology/P19-1592/

Skills

Languages Python, Java, Linux Shell

Frameworks PyTorch

Tools Git, Eclipse

Coursework

UMass Reinforcement Learning, Probabilisic Graphical Models, Deep Learning for Natural

Amherst Language Process, Machine Learning, Advanced Algorithms

CMU Graduate Artificial Intelligence, Introduction Machine Learning, Data Mining, Advanced Data Analysis, Modern Regression, Algorithms