

# Mark Nemecek

PHD CANDIDATE · COMPUTER SCIENCE

Duke University, 308 Research Dr, Durham, NC 27705

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## Education

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### Duke University

PHD COMPUTER SCIENCE

- Advisor: Ronald Parr

Durham, NC  
(expected) May 2023

### Duke University

MS COMPUTER SCIENCE

- Advisor: Ronald Parr
- Thesis: Transition Space Distance Learning

Durham, NC  
May 2019

### Florida Atlantic University

BS COMPUTER SCIENCE

Boca Raton, FL  
December 2011

## Professional Experience

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- 2017 - 2023 **Research Assistant**, Duke Computer Science
- 2016 - 2017 **Graduate Teaching Assistant**, Duke Computer Science
- 2015 - 2016 **Research Assistant**, Duke Computer Science
- 2012 - 2015 **Software Developer**, Farragut Systems, Inc.
- 2007 - 2010 **System Administrator**, Alliant Techsystems, Inc. (Now part of Northrop Grumman)

## Publications

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### REFEREED PAPERS

**Nemecek, M**; Parr, R. 2021. Policy Caches with Successor Features. Internation Conference on Machine Learning (ICML).

### OTHER PAPERS

**Nemecek, M**. 2019. Transition Space Distance Learning. Master's thesis, Duke University.

### IN PREPARATION

Hierarchical Learning with Successor Features

Value-based Transfer with Continuous Actions

## Awards

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2020 **Outstanding Departmental Service Award**, Duke Computer Science

## Presentations

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### INVITED TALKS

October 2022. *Improving Transfer Learning with Successor Features*. Invited talk at the Intelligent Robot Lab at Brown University, Providence, RI.

## CONTRIBUTED PRESENTATIONS

**Nemecek, M;** Parr, R. 2021. Policy Caches with Successor Features. Short Talk/Poster: International Conference on Machine Learning (ICML), Virtual.

**Nemecek, M.** 2018. Transition Space Distance Learning. DRIV seminar: Duke Computer Science, Durham, NC.

## Teaching Experience

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Spring 2017 **CS 270: Intro to AI (Undergraduate)**, Graduate Teaching Assistant

Fall 2016 **CS 570: Artificial Intelligence (Graduate)**, Graduate Teaching Assistant

## Mentoring

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### DUKE CS FIRST-YEAR STUDENT MENTORSHIP PROGRAM

2021 - 2022 **Raghuveer Thirukovalluru**, PhD Student

2020 - 2021 **Shujun Qi**, PhD Student

2017 - 2018 **Alina Barnett**, PhD Student

## Service

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### SERVICE

2019 - 2020 **Duke CS**, Graduate Liaison to Faculty

2017 - 2020 **Duke CS PhD Recruitment**, Graduate Committee Chair

2017 - 2018 **Duke CS Faculty Search**, Graduate Committee Chair

2016 **Duke CS Faculty Search**, Graduate Committee Member

2016 **Duke CS PhD Recruitment**, Graduate Committee Member

### PEER REVIEW

2022 **NeurIPS**, Reviewer