

MOHAMMAD MOHAMMADI

LinkedIn

m.mohammadi1378@outlook.com

EDUCATION

University of Toronto

1st Year, PhD Degree

Department of Computer Science

01/2024-present

Sharif University of Technology

BS Degree

Department of Computer Engineering

09/2018-07/2023

Overall GPA: 19.56/20

Rank: 6 out of 136

Allame Helli 1 High School

Diploma of Theoretical Mathematics and Physics

09/2014-09/2018

RESEARCH INTERESTS

Computer Vision, Event-Based Vision, Reinforcement Learning, Deep Learning, Graph Theory, Algorithms, Combinatorics

PUBLICATIONS

Published

- **Mohammad Mohammadi**, Jonathan Nöther, Debmalya Mandal, Adish Singla, Goran Radanovic, "Implicit Poisoning Attacks in Two-Agent Reinforcement Learning: Adversarial Policies for Training-Time Attacks", International Conference on Autonomous Agents and Multiagent Systems (**AAMAS**) 2023
- Onur Beker, **Mohammad Mohammadi**, Amir Zamir, "PALMER: Perception - Action Loop with Memory for Long-Horizon Planning", Conference on Neural Information Processing Systems (**NeurIPS**) 2022

RESEARCH EXPERIENCE

University of Toronto

PhD Student / Research Assistant

09/2024-present

- Project : Representation Learning in Event-Based Vision.
 - Supervisor : Prof. Igor Gilitschenski

Ecole Polytechnique Fédérale de Lausanne (EPFL)

Internship

03/2022-06/2023

- Projects : PALMER/PALMER++: A graph-based long-horizon planning method in MDPs.
 - Supervisor : Prof. Amir Zamir, Onur Beker

Max Planck Institute

Internship

07/2021-08/2021

- Project : Studying poisoning attacks in multi-agent MDPs.
 - Supervisor : Dr. Goran Radanovic

Sharif University of Technology

Research Assistant

10/2021-Present

- Project : Adversarial robustness of classifiers against Corner-Search attack.
 - Supervisor : Prof. Mohammad Hossein Rohban

Chinese University of Hong Kong

Summer Internship

07/2020-09/2020

- First Project : Tackling straggling workers while using distributed systems to compute the multiplication of two matrices.
 - Supervisor : Prof. Pascal Vontobel
- Second Project : Finding and counting the perfect matchings of a given graph in parallel(in NC).
 - Supervisor : Dr. Gautam Prakriya

WORK EXPERIENCE

Allame Helli 1 High School

Informatics Olympiad Teacher

07/2018-06/2020

- Teaching algorithms and programming to 10th grade students
- Preparing 10th grade students for the Iranian National Olympiad in Informatics

TEACHING ASSISTANT EXPERIENCE

Neural Networks and Deep Learning

Fall2023

Advanced Programming

Fall 2019 & Spring 2020

Data Structures and Algorithms

Spring 2020 & Spring 2021

Linear Algebra

Fall 2020

Artificial Intelligence

Fall 2020 & Fall 2021

Engineering Probabilities and Statistics

Spring 2021

Design of Algorithms

Fall 2021

Discrete Structures

Spring 2020

RELEVANT COURSES

• University Major Courses

Artificial Intelligence, Machine Learning, Game Theory, Design of Algorithms, Engineering Probabilities and Statistics, Modern Information Retrieval, Theory of Languages and Automata

• Online Courses

Reinforcement Learning - Deep Mind x UCL - By David Silver

Deep Reinforcement Learning - CS 285 - Berkeley - By Sergy Levine

Machine Learning - CS229 - Stanford University - By Andrew NG

Deep Learning - CS230 - Stanford University - By Andrew NG

Convolutional Neural Networks for Visual Recognition - CS 231n - Stanford University - By Fei-Fei Li

Convex Optimization - EE364a - Stanford University - By Stephan Boyd

Deep Neural Networks - EECS182 - Berkeley - By Anant Sahai

Computer Vision - University of Tuebingen - By Andreas Geiger

HONORS AND AWARDS

- Silver Medal at 26th INOI, Iran, 08/2016

- 20th of Iranian National Olympiad in Informatics in 2016
- Silver Medal at 27th INOI, Iran, 08/2017
 - 9th of Iranian National Olympiad in Informatics in 2017
- National Countrywide University Entrance Exam(aka Konkour), Iran, 2018
 - Rank 76 in among approx. 170,000 participants
- Silver Medal at West Asia Regional ACM-ICPC Contest, 12/2020
 - 7th of West Asia Regional ACM-ICPC Contest

LANGUAGES

- English: Proficient (TOEFL 115/120; R30, L30, S26, W29)
- Persian: Native
- German: Limited Working Proficient (A2)

SKILLS

- **Programming Languages**
Python, C++, C, Java, Verilog, 8086 assembly, MIPS assembly, ARM, SQL
- **Technologies**
Git, Bash, L^AT_EX
- **Tools**
Pytorch Lightning, Pytorch, Gym, Habitat, Tensorflow

HOBBIES

Piano, Sightseeing, Novels, Movies, Tennis