Mina Ghadimi Atigh | CV

+31 6 38869236 • m.ghadimiatigh@uva.nl
Homepage Google Scholar LinkedIn

Research Interests

- **Hyperbolic representation learning**
- **Image and Video Understanding**
- **Deep Learning**

Education

- **University of Amsterdam** **Amsterdam, Netherlands**
  Ph.D. in Artificial Intelligence, *2020–now*

- **Amirkabir University of Technology** **Tehran, Iran**
  M.Sc in Artificial Intelligence, *2016–2019*
  GPA: 18.14/20
  Thesis: Human Pose Estimation in Video

- **Amirkabir University of Technology** **Tehran, Iran**
  BSc in Software Engineering, *2012–2016*
  GPA: 18.24/20
  Thesis: Design and Implementation of a user interface to control a mobile phone using hand gestures

Honors and Awards

- **Member of scientific committee for the second Amirkabir Data Mining Cup.**(2018)
- **Ranked 4th in Cumulative GPA among 45 registered Artificial Intelligent Master students in Computer Engineering and IT Department, Amirkabir University of Technology, Tehran, Iran.**(2018)
- **Offered Direct Admission to graduate school (M.Sc.) of Computer Engineering and IT Department, Amirkabir University of Technology, without taking the national entrance exam for graduate schools as a reward of academic records and achievements.**(2016)
- **Ranked 4th in Cumulative GPA among 100 undergraduate students in Computer Engineering and IT Department, Amirkabir University of Technology, Tehran, Iran.**(2016)
- **Ranked Top 0.5% in the National University Entrance Exam among 230000 students and Admission to Amirkabir University of Technology**(2012)
- **Member of National Organization for Development of Exceptional Talents (NODET)**(2008-2012)

Research Projects and Publications

- **Hyperbolic Image Segmentation**
  Conference on Computer Vision and Pattern Recognition (CVPR) 2022
  Under Supervision of Prof. Mettes
  Members: Mina Ghadimi Atigh, Julian Schoep, Erman Acar, Nanne van Noord, Pascal Mettes
- **Hyperbolic Busemann Learning with Ideal Prototypes**
  Conference on Neural Information Processing Systems (NeurIPS) 2021
  Under Supervision of Prof. Mettes
  Members: Mina Ghadimi Atigh, Martin Keller-Ressel, Pascal Mettes
- **Convolutional Relational Machine for Group Activity Recognition**
  Conference on Computer Vision and Pattern Recognition (CVPR) 2019
  Under Supervision of Dr. Nickabadi and Prof. Alahi
  Members: Sina Mokhtarzadeh Azar, Mina Ghadimi Atigh (Equal Contribution)
- **Bidirectional Human Pose Estimation in Video**
  24th Annual Conference of Computer Society of Iran(CSICC) 2019:
  Under Supervision of Dr. Nickabadi
  Members: Mina Ghadimi Atigh
- **A Multi-Stream Convolutional Neural Network Framework for Group Activity Recognition**
  arXiv preprint arXiv:1812.10328, 2018.:
  Under Supervision of Dr. Nickabadi
  Members: Sina Mokhtarzadeh Azar, Mina Ghadimi Atigh
- **Zoom-RNN: A Novel Method for Person Recognition Using Recurrent Neural Networks**
  arXiv preprint arXiv:1809.09189, 2018.:
  Under Supervision of Dr. Nickabadi
  Members: Sina Mokhtarzadeh Azar, Mina Ghadimi Atigh, Sajjad Azami, Mohammad Javadi

Notable Course Projects

- **Projects in Neural Networks Course:** *'using Python and Tensorflow Library on GPU'*

  Projects including Perceptron, Adaline, Multilayer Perceptron(MLP), Self Organizing Maps(SOM), Growing Self Organizing Maps (GSOM), Image Classification using CNNs(MSCOCO), clustering using AutoEncoders and text generation using LSTMs topics.
- **Projects in Probabilistic Graphical Model Course:** *'using Python'*

  Projects including Image Segmentation using Markov Random Fields and Human Pose Estimation using Graphical Models.
- **Projects in Natural Language Processing Course:***'using Python'*

  Projects including feature selection algorithms (Mutual Information, Information Gain) Implementation, Document Classification and Clustering, Part of Speech Tagging, Named Entity Recognition, Word Sense Disambiguation.
- **Projects in Statistical Machine Learning Course:***'using Python and Matlab'*

  Projects including Statistics, Regression, Time Series Prediction and Probabilistic Graphical Model topics.

- **Projects in Computer Vision Course:** *'using Python and C++ and OpenCV library'*

  Projects including Basic operations, Image Segmentation, Descriptors and Corner Detection, Stereo Vision, Motion Analysis and Quad-copter Stabilization topics.

- **Projects in Machine Learning Course:** *'using Python and Matlab'*

  Projects including Credal C-mean Clustering Based on Belief functios,SVM, Gaussian Naive Bayes, Logistic Regression, KNN, Regression .

Teaching Experience

- **Applied Machine Learning**, Under supervision of Dr. Pascal Mettes
- **Machine Learning**, Under supervision of Dr. Nazerfard
- **Statistical Machine Learning**, Under supervision of Dr. Nickabadi
- **Data Mining**, Under supervision of Dr. Nazerfard
- **Artificial Intelligence**, Under supervision of Dr. Nickabadi

Work Experience

- **Balad Maps, CafeBazaar** — **Tehran, Iran**
  Data Scientist — *October 2019– September 2020*
- **Balad Maps, CafeBazaar** — **Tehran, Iran**
  Data Scientist Intern — *July 2019– October 2019*
- **AI Bridge** — **Tehran, Iran**
  Computer Vision Engineer — *May 2019– July 2019*

Technical and Personal skills

- **Programming Languages:** Python, Matlab, C, C++,Java.
- **Tools and Frameworks:** Tensorflow, Keras, PyTorch, Caffe, OpenCV, Docker, LaTex.
- **Operating Systems:** Linux, Windows.

References

- **Dr. Pascal Mettes:** P.S.M.Mettes@uva.nl
- **Dr. Ahmad Nickabadi:** nickabadi@aut.ac.ir
- **Dr. Ehsan Nazerfard:** nazerfard@aut.ac.ir
- **Dr. Maryam Amir Haeri:** haeri@aut.ac.ir