

Wonjoon Goo

GDC 3.504A, 2317 Speedway Austin, Texas 78731

✉ wonjoon@cs.utexas.edu | 🏠 <http://dev.wonjoon.me> | 📷 hiwonjoon

Research Interest

Reinforcement Learning, Computer Vision, Machine Learning, and Robotics

Education

Ph.D. in Computer Science University of Texas at Austin Advisor: Prof. Scott Niekum	Aug.2016-Current
Master in Computer Science University of Texas at Austin GPA 4.0/4.0	Aug.2016-Dec.2018
B.S. in Computer Science and Engineering (Summa Cum Laude, 3/56) Seoul National University GPA 4.03/4.3 GPA in major 4.07/4.3	Mar.2008-Feb.2016
Exchange Student in Computer Science Dept. University of Toronto GPA in major 4.0/4.0	Sep.2014-Dec.2014

Work and Research Experience

Research Intern Preferred Networks, Tokyo, Japan Advisor : Tommi Kerola, Toru Ogawa • Topic: video object segmentation (VOS) Achieved 4th place on the 1st large-scale video object segmentation challenge	May.2018-Aug.2018
Lead Web Programmer Art247, Paju, Korea • Developing a commercial website with Django web framework Site link : https://m314.kr	Apr.2016-Jun.2016
Undergraduate Research Intern Vision & Learning Laboratory, Seoul National University	Mar.2015-Apr.2016

Advisor : Prof. Gunhee Kim

- Working on integrating external information, such as a taxonomy graph, to CNN architecture (see Publications below)

Collaborated with Prof. Sung Ju Hwang in Ulsan National Institute of Science and Technology

- Working on active exploration policy learning for robot vision

Collaborated with Prof. Jehee Lee in Seoul National University

Lead Server Programmer (as alternative military service)

Dec.2010-Jan.2014

Ani-Park, Seoul, Korea

- Developing a distributed game server in C++
- Maintaining RDBMS for game data with SQL
- Developing a web interface for managing clients with Node.js

Summer Engineering Intern

Jun.2010-Aug.2010

Redduck, Seoul, Korea

- Implementing an autonomous driving car in Unreal Engine using PID controller

Publications

International Conferences

1. Daniel Brown, **Wonjoon Goo**, and Scott Niekum. *Better-than-Demonstrator Imitation Learning via Automatically-Ranked Demonstrations*. Conference on Robot Learning (CoRL). Osaka, Japan, 2019. (To Appear)
2. Daniel Brown*, **Wonjoon Goo***, and Scott Niekum (*equal contribution). *Extrapolating Beyond Suboptimal Demonstrations via Inverse Reinforcement Learning from Observations*. International Conference on Machine Learning (ICML). Long Beach, CA, 2019.
3. **Wonjoon Goo** and Scott Niekum. *One-Shot Learning of Multi-Step Tasks from Observation via Activity Localization in Auxiliary Video*. International Conference on Robotics and Automation (ICRA). Montreal, Canada, 2019.
4. **Wonjoon Goo**, Juyong Kim, Gunhee Kim, and Sung Ju Hwang. *Taxonomy-Regularized Semantic Deep Convolutional Neural Networks*. European Conference on Computer Vision (ECCV). Amsterdam, The Netherlands, 2016.

Honors and Awards

Graduate Dean's Prestigious Fellowship Supplement, UT Austin

2017-2019

Kwanjeong Educational Foundation Fellowship

2016-2020 (Expected)

NVIDIA Deep Learning Contest 2016 (Korea)

Oct. 2016

- 2nd place in Free Topic

Excellent CSE Thesis Awards, Seoul National University

2016

National Scholarship for Science and Engineering

2008-2010, 2014

- Full tuition & fees during regular college years, funded by Korea Student Aid Foundation
- Outgoing Exchange Student Scholarship 2014 Fall
- \$2,000 from Office of International Affairs

Teaching Experience & Extracurricular Activities

- Graduate Teaching Assistant, UT Austin Fall, 2019
- CS 394R, Reinforcement Learning: Theory and Practice
- Graduate Teaching Assistant, UT Austin Fall, 2016
- CS 313E, Elements of Software Design
- Samsung Convergence Software Course (SCSC) Mentoring Program Mar.2015-Dec.2015
- Selected as a mentor to help students coming for double major in CSE

Skills

Programming Language / Library

Python, C++, SQL, Matlab, NoSQL (mongodb), Javascripts
Tensorflow, Chainer, Caffe
Vim, CUDA, Scala (Interested)

Last updated: October 21, 2019