## WOOYONG JUNG

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#### RESEARCH INTEREST

Data Science for Social Good, Computational Social Science, Probabilistic Machine Learning, Reinforcement Learning

### **EDUCATION**

2021 - Present	Ph.D. Student in <i>Informatics</i> , Pennsylvania State University
2020	M.A. in Applied Quantitative Research, New York University
2016	Master of Development Policy, KDI School of Public Policy and Management
2011	B.A. in Development Studies, University of California, Berkeley

#### PROFESSIONAL EXPERIENCE

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08/2022 -	Graduate Research Assistant at PIKE Research Group, The Pennsylvania State Univer	rsity

 Have participated in an eviction study project identifying the association between eviction filing locations and neighborhood characteristics and predicting eviction hotspots across the U.S. using machine learning techniques.

08/2021 – 05/2022 Graduate Teaching Assistant, The Pennsylvania State University

- IST 210: Organization of Data (Spring 2022)
- DS 200: Introduction to Data Science (Fall 2021)

12/2019 – 02/2020 Graduate Research Assistant, New York University

- Participated in a project led by Prof. Amanda Geller (https://doi.org/10.1007/s10940-020-09471-9)
- Analyzed the use of force (UOF) data in the 11 U.S. police departments to detect racial disparities during community policing.
- Visualized the research results.

03/2014 - 09/2014 Graduate Research Assistant, KDI School of Public Policy and Management

- RA for Prof. Jisun Baek
- Conducted literature reviews and collected relevant data on the policies for promoting small and medium enterprises (SMEs) in Korea and compared them with those of Hungary.

### Research-related

05/2022 – 08/2022 Data Science Intern, The Washington Post

 Conducted a look-alike modeling project to predict potential audiences most likely to click on specific advertisements.

10/2014 – 07/2019 Senior Research Associate, Korea Development Institute (KDI)

- Analyzed country data (economic and social indicators) and published annual country reports.
- Developed the Knowledge Sharing Program (KSP) Index quantifying project performance capability of partner countries.
- Conducted a product space analysis for developing countries' industrial diversification.

- Completed Korean government research projects for promoting economic cooperation between Korea and African countries.
- Established strategies encouraging the localization of Sustainable Development Goals (SDGs) in Korea's local governments by surveying the recognition and practices of SDGs in 15 local governments and interviewing relevant officers.

#### Others

03/2012 - 04/2013

Program Manager (Volunteer), COPION Ethiopia

- Monitored and evaluated a child education program and a sexual and reproductive health program (FGAE) in Oromia region.
- Conducted interviews with beneficiaries and assessed changes in their attitude towards reproductive health after our project.
- Coordinated short-term volunteer activities in Ethiopia for college students from Korea.

### **PUBLICATIONS**

- 1. **Wooyong Jung**, Nishant Asati, Lucy Phuong Doan, Thai Le, Aiping Xiong, and Dongwon Lee. "The Strange Case of Jekyll and Hyde: Analysis of r/ToastMe and r/RoastMe Users on Reddit." *The 18<sup>th</sup> International AAAI Conference on Web and Social Media (ICWSM) 2024*.
- 2. Maryam Tabar, **Wooyong Jung**, Amulya Yadav, Owen Wilson Chavez, Ashley Flores and Dongwon Lee. "WARNER: Weakly-Supervised Neural Network to Identify Eviction Filing Hotspots in the Absence of Court Records." *The 31st ACM International Conference on Information and Knowledge Management (CIKM)* 2022.
- 3. Maryam Tabar, **Wooyong Jung**, Amulya Yadav, Owen Wilson Chavez, Ashley Flores and Dongwon Lee. "Forecasting the Number of Tenants At-Risk of Formal Eviction: A Machine Learning Approach to Inform Public Policy." *The 31*<sup>st</sup> *International Joint Conference on Artificial Intelligence (IJCAI) 2022.*
- 4. Wonkyu Shin, **Wooyong Jung**, and Jisun Yi. 2019. "Governance Matters more than Development Constraints for Growth in Sub-Saharan African Countries." *International Development Cooperation Review* 11(2): 55-71.
- 5. Wooyong Jung and Yoon C. Cho. 2019. "Who Remains Conservative?" Korea Observer 50(1): 135-161.
- 6. Song Chang Hong, **Wooyong Jung**, and Gang I Kim. 2019. "Chapter 7. Human Capital." *KDI Research Paper, Sharing Knowledge Sharing the Future*: 264-330.

#### In Review

1. **Wooyong Jung**, Maryam Tabar, and Dongwon Lee. "The Neighborhood Characteristics and Spatial Dynamics of Eviction Filing Hotspots: A Case Study in Dallas County." (Submitted to *KDD 2024*)

#### CONFERENCES AND WORKSHOPS

06/2024	Presenter, The 18 <sup>th</sup> International AAAI Conference on Web and Social Media (ICWSM)
	2024, Buffalo, NY, USA
07/2023	Participant, Summer Institutes in Computational Social Science (SICSS) Korea, KAIST

# **AWARDS AND SCHOLARSHIP**

2021	Fund for Excellence in Graduate Recruitment (FEGR) Scholarship, Penn State University
2014	Scholarship for Academic Excellence (Dean's list with distinction), KDI School of Public Policy and Management
2013	Entrance Scholarship, KDI School of Public Policy and Management

# **SKILLS**

**Technology**: Python, R, Stan, SQL, LaTeX, ArcGIS **Language**: Korean (native), English (proficient)

# **REFERENCES**

## **Dongwon Lee**, Professor

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