# RYO KAMOI

# rfk5465@psu.edu https://ryokamoi.github.io/

#### **EDUCATION**

Pennsylvania State University - Ph.D. in Computer Science	Aug 2023 -
Advised by Dr. Rui Zhang	
University of Texas at Austin - Master of Science in Computer Science	Aug 2020 - Dec 2022
Advised by Dr. Greg Durrett	GPA 4.00
Keio University, Japan - Bachelor of Engineering in Statistics	Apr 2016 - Mar 2020
Advised by Dr. Kei Kobayashi, Top student in the Department of Mathematics	GPA 3.95

## RESEARCH INTERNSHIPS

Amazon, Cambridge, UK - Applied Scientist Intern in Alexa Team (NLP)

Jul - Dec 2021

- Proposed an interpretable model for answer quality evaluation for chatbots.

SenseTime Japan - Research Internship in CV for autonomous driving

Feb 2020 - Jan 2021

Proposed a SOTA system of unknown instance detection on a monocular camera for autonomous driving.

Datasection Inc, Japan - Research Internship in NLP

May 2017 - Aug 2018

- Research in Natural Language Generation (especially text VAEs) trained on a small training dataset.

## SELECTED PUBLICATIONS https://scholar.google.com/citations?user=40WTLKAAAAAJ

My main research area is natural language generation, with particular interests in evaluation metrics and error detection.

## **Natural Language Processing**

**Kamoi, R.**, Goyal, T., & Durrett, G. (2023). Shortcomings of Question Answering Based Factuality Frameworks for Error Localization. In *EACL* (main).

**Kamoi, R.**, Goyal, T., Rodriguez, J. D., & Durrett, G. (2023). WiCE: Real-world Entailment for Claims in Wikipedia. *arXiv preprint 2303.01432*.

## **Anomaly Detection in Computer Vision**

**Kamoi, R.,** & Tomite, K. (2021). Efficient Unknown Object Detection with Discrepancy Networks for Semantic Segmentation. In *the NeurIPS 2021 Workshop on Machine Learning for Autonomous Driving*.

**Kamoi, R.**, & Kobayashi, K. (2020). Out-of-Distribution Detection with Likelihoods Assigned by Deep Generative Models Using Multimodal Prior Distributions. In *The AAAI's Workshop on Artificial Intelligence Safety*.

**Kamoi, R.**, & Kobayashi, K. (2020). Why is the Mahalanobis Distance Effective for Anomaly Detection? *arXiv* preprint arXiv:2003.00402.

#### HONORS AND AWARDS

Keio University Global Fellowship - Scholarships for graduate study at UT Austin	2020
Keio Engineering Foundation Award - Graduation with highest honors (First place in the Dept. of Mathematics)	2020
Japan Student Services Organization (JASSO) Exchange Student Scholarship	2018

## **SKILLS**

- Python, PyTorch, TensorFlow
- Language: Japanese (native speaker)