Seonghui Min

Seoul, Republic of Korea
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RESEARCH INTERESTS

Deep Learning, Computer Vision, Generative AI, Label-Efficient Learning, Medical Image Analysis

EDUCATION

M.S. in Computer Science and Engineering, **Korea University**   *Mar. 2022 - Feb. 2024*
Advisor: Prof. Won-Ki Jeong
- GPA: 4.11/4.5

B.S. in Biomedical Engineering, **Korea University**   *Mar. 2018 - Feb. 2022*
- GPA: 3.94/4.5

PUBLICATIONS

Conference Proceedings (***** equal contribution)

[C-03] **Seonghui Min***, Hyun-Jic Oh*, Won-Ki Jeong "Co-synthesis of Histopathology Nuclei Image-Label Pairs using a Context-Conditioned Joint Diffusion Model", *European Conference on Computer Vision* (**ECCV**), 2024.

[C-02] SeungKyu Kim, Hyun-Jic Oh, **Seonghui Min**, Won-Ki Jeong "Evaluation and improvement of Segment Anything Model for interactive histopathology image segmentation", **MICCAI 2023 Workshop** MedAGI (**MICCAIW**), 2023.

[C-01] **Seonghui Min**, Won-Ki Jeong "CGAM: click-guided attention module for interactive pathology image segmentation via backpropagating refinement", *IEEE International Symposium on Biomedical Imaging* (**ISBI**), 2023.

Journal Publications (***** equal contribution)

[J-02] Hyun-Jic Oh*, **Seonghui Min***, Won-Ki Jeong "S2L-CM: Scribble-supervised Nuclei Segmentation in Histopathology Images using Contrastive Regularization and Pixel-Level Multiple Instance Learning", **Under Review**.

[J-01] **Seonghui Min**, Won-Ki Jeong "ZoomISEG: Interactive Multi-Scale Fusion for Histopathology Whole Slide Image Segmentation", *Journal of the Korea Computer Graphics Society* (**KCGS**), 2023.

RESEARCH EXPERIENCE

Research Intern in **HVCL, Korea University**   *Sep. 2021 - Feb. 2022*
Advisor: Prof. Won-Ki Jeong
- Interactive Tumor Region Segmentation in Histopathology Images

Research Intern in **BREIN Lab, Korea University**   *Mar. 2021 - Aug. 2021*
Advisor: Prof. Joon Kyung Seong
- Regional Amyloid Positivity Prediction Using Brain MRI in Alzheimer's Disease

TEACHING	**Special Lecture for Computer Science** (COSE490)	*Fall 2022*
	- Teaching Assistant at Korea University	
	Data Structure (COSE213)	*Spring 2022*
	- Teaching Assistant at Korea University	

PROJECTS	**Data Utilization Competition**, Korea University	*Fall 2021*
	Team Member	
	- White Matter Lesion Segmentation in Multiple Sclerosis	
	Campus CEO Start-Up Competition, Korea University	*Fall 2020*
	Team Leader, *3rd Place*	
	- Food Detection and Recognition for Inflammatory Bowel Disease Management	

EXTRA-CURRICULAR ACTIVITIES	**BEAT**, Student Research Group at Korea University	*Fall 2020 - Spring 2021*
	Group Member	
	- Deep Learning Theories and Research Paper Seminars	

SKILLS	**Programming:** Python, PyTorch, OpenCV, Matlab
	Languages: Fluent in English, Native in Korean

REFERENCES	**Prof. Won-Ki Jeong**
	Professor, Korea University
	Relationship: MS advisor
	Email: wkjeong@korea.ac.kr