Sangyoon Lee

CONTACT

Ph.D. student
School of Computing, KAIST
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KAIST, 291 Daehak-ro, Yuseong-gu
Daejeon 34141, Republic of Korea

RESEARCH
INTERESTS

Human-Computer Interaction

EDUCATION

Korea Advanced Institute of Science and Technology (KAIST)　　　Daejeon, Korea
Ph.D. student in Computer Science　　　MAR. 2018 – Present
Advisor: Geehyuk Lee, Ph.D.

Korea Advanced Institute of Science and Technology (KAIST)　　　Daejeon, Korea
M.S. in Computer Science　　　2018
Thesis: "Diagnosing and Coping with Mode Errors in using a Dual-language Keyboard"
Advisor: Geehyuk Lee, Ph.D.

Korea Advanced Institute of Science and Technology (KAIST)　　　Daejeon, Korea
B.S. in Computer Science　　　2016

PUBLICATIONS

International Conference Papers

1. **Diagnosing and Coping with Mode Errors in Korean-English Dual-language Keyboard**
   Sangyoon Lee, Jaeyeon Lee, Geehyuk Lee
   CHI 2019

2. **Auto-switching List Search Interface for Touchscreen Smartwatches**
   Jingun Jung, **Sangyoon Lee**, Sunggeun Ahn, and Geehyuk Lee
   MobileHCI 2018

Domestic Conference Papers

1. **First Principles Study of spin polarization in Fe-doped monolayer C2N-h2D**
   Sangyoon Lee and Geumbi Jung
   5th 2016 EDISON Challenge

2. **An experimental comparison of user postures between tabletbased reading activities and book-based reading activities**
   Sangyoon Lee
   KCC 2015

Extended Abstracts: Demonstrations

1. **MirrorPad: A Touchpad for Direct Pen Interaction on a Laptop**
   Sangyoon Lee and Geehyuk Lee
   ISS 2019 (to apper)

Patents

1. **Smart-toggle for auto recovering from Korean-English mode errors**
   KR Patent Application. 10-2019-0060681, 2019-05-23.

WORK EXPERIENCE	**Gold Spoon**	MAY. 2015 – FEB. 2016

WORK EXPERIENCE

Gold Spoon MAY. 2015 – FEB. 2016
Software Engineer, Co-Founder
- Backend engineer, API server construction
Skills: Django, Go, Meteor, MongoDB, AWS, React.js, Youtube API

Langpoo JAN. 2015 – MAR. 2015
Software Engineer
- Backend engineer, API server construction
Skills: Django, AWS, RabbitMQ, Android GCM

Graduate School of Science and Technology Policy, KAIST JUN. 2014 – JAN. 2015
Work-study Program
- Homepage renewal

Computational Nanotech Lab, KAIST JAN. 2014 – DEC. 2015
Research Intern & Software Engineer
- Hybrid Interface Materials DB construction
- Application of the Machine Learning Algorithm to Electronic Structure Calculations
Skills: Django, Mysql, Scikit-learn, Machine Learning techniques, Tensorflow
Publications:

1. **Application of the Machine Learning Algorithm to Electronic Structure Calculations: A Test Case of B/N-doped Graphene**
   Kim, et al
   KPS, 2016.
   - Contribution in developing the web application & machine learning techniques.

Interactive Computing Lab, KAIST JAN. 2014 – MAR. 2014
Research Intern
- Machine State Estimation Using Electric Current Measurement Sensor
Skills: Android

Social Computing Lab, KAIST MAY. 2013 – JUN. 2015
Research Intern & Software Engineer
- User Depression Mitigation Project
Skills: Facebook login API, Flask, Django, Html, Javascript, CSS
Publications:

1. **Manifestation of depression and loneliness on social networks: a case study of young adults on Facebook**
   Park, Sungkyu, et al
   CSCW, 2015.
   - Contribution in developing the web application.

Intelligence in Science & Technology, KISTI JUN. 2013 – AUG. 2013
Summer Intern
- Big data(scientist's bio) analysis and processing
Skills: Mysql, Java, Hadoop, MapReduce

ACTIVITIES

CS Undergraduate Student Council, KAIST JAN. 2014 – JAN. 2015
President

CS Undergraduate Student Council, KAIST JAN. 2013 – JAN. 2014
Vice Representative of '12

AWARDS

UIST '17 Student Innovation Contest Fall 2017
People's Choice award

OPEN SOURCE CONTRIBUTION	**Konlpy, Konlpy**	MAY. 2016 – Present

Konlpy, Konlpy MAY. 2016 – Present
Python package for Korean natural language processing
Url: https://github.com/konlpy/konlpy

PinPoint, Naver DEC. 2014 – Present
Pinpoint is an open source APM (Application Performance Management) tool for large-scale distributed systems written in Java
Url: https://github.com/naver/pinpoint

OPEN SOURCE PROJECT

Web Speech AI for youtube player SEP. 2017 – Present
This project is a speech-ai for managing youtube video player.
This is a wrapper server written by Flask to integrate http://api.ai/ and Mozila Web speech recognition api
Url: https://github.com/pinetree408/speech-ai

Wrist Gesture Recognizer On Smartwatch SEP. 2017 – Present
This project recognizes four wrist gesture on smartwatch with machine learning technique(SVM)
Url: https://github.com/pinetree408/tilt_selection_server

BookmarksReminder SEP. 2016 – Present
This chrome extension gives you a reminder alarm for bookmarks
Url: https://chrome.google.com/webstore/detail/bookmarksreminder/jeegdkkmnjonkoefmnhokohkbheoeadi

korean-corpus-generator JUL. 2016 – Present
Python package for Korean corpus generating
Url: https://github.com/pinetree408/korean-corpus-generator

VFT MAY. 2016 – Present
Visualization Tool for Filtering Test Logs based on Eclipse plug-in
Url: https://github.com/pinetree408/VFT

django-facebook-auth MAY. 2015 – Present
Django facebbook auth helper
Url: https://pypi.python.org/pypi/django-facebook-auth-helper

TEACHING EXPERIENCE

Teaching Assistant
CS550 Software Engineering Spring 2019
CS584 Human-Computer Interaction Fall 2018
CS420 Compiler Design Fall 2016
CS220 Programming Principles Spring 2016

Tutor
CS311 Computer Architecture Fall 2016

INVITED TALKS

Coping with Mode Errors in Dual-language Keyboard OCT. 2019
Hancom TechDay, Hancom

ACADEMIC SERVICES

Reviewer
CHI' 19, MobileHCI' 19