Hanall Sung

664 E, Educational Sciences, 1025 West Johnson Street, Madison, WI 53705
+1-608-960-3769 | hanall.sung@wisc.edu

EDUCATION

University of Wisconsin – Madison   **WI, USA**
Doctor of Philosophy in Learning Sciences   Sep 2017 – In progress

University of Wisconsin – Madison   **WI, USA**
Master of Science in Learning Sciences   Sep 2017 – May 2020
- **Thesis Research:** Exploring the Relationships between Gestures, Problem-solving Behaviors, and Internal Visualization Skills in Engineering with Multimodal Analysis

Ewha Womans University   **Seoul, Korea**
Master of Art in Educational Technology   Sep 2014 – Sep 2016
- **Thesis Research:** Development of Prediction model for Learning Achievement with Utilizing Test Anxiety, Behavioral Log and Psychological Response in Video-Based Learning Environment

Ewha Womans University   **Seoul, Korea**
Bachelor of Art in Educational Technology   Mar 2009 – Aug 2014

New York State University - Stony Brook   **NY, USA**
Exchange student program   Jan 2012 – Dec 2012

HONORS & AWARDS

University of Wisconsin – Madison	Sep 2020
School of Education Bridge to Success Scholarship	
University of Wisconsin – Madison	Sep 2019
The Recruitment, Admissions, Fellowships, and Awards (RAFA)	
University of Wisconsin – Madison	Apr 2019
Student Research Grants Competition - Conference Presentation	
University of Wisconsin – Madison	Aug 2017
Graduate School Fellowship	
Ewha Womans University	Sep 2016
Best Master Thesis Award	
3rd Dubai International Conference in Higher Education	Feb 2015
Highly Commended Poster Presentation Award	
49th Educational Technology Exhibition and Conference (ETEC)	Mar 2015
Certificate for Excellent Work	
E-learning Korea 2014 Conference	Sep 2014
E-learning Korea 2014 Golden Prize in Best Paper Award	

The design of the Web 2.0 Wikibook with Purdue University   Dec 2009
Certificate for Active Participation

RESEARCH EXPERIENCE

University of Wisconsin – Madison   **WI, USA**

Project Assistant   Jul 2019 – In progress
- Participated in the project, titled Support for Individual and Collaborative Learning of Internal Visualization Skills for Complex Engineering Concepts in Active Learning Classes
- Assisted in developing an adaptive educational technology—Signals Tutor
- Conducted iterative rounds of user testing to revise Signals Tutor

Project Assistant   Aug 2017 – Jul 2019
- Participated in the project, titled Assessing Complex Collaborative STEM Learning at Scale with Epistemic Network Analysis
- Developed multimodal analyses using students' behavioral log data and interactive chat data
- Conducted error analyses in using automated transcription data for Epistemic Network Analysis

Ewha Womans University   **Seoul, Korea**

Research Assistant at Korea Research Foundation   Sep 2015 – Aug 2016
- Participated in the Development of Customized Flipped Learning Design Model based on Big Data Analytics: On a Middle School Math Curriculum
- Collected students' multiple data streams through online education system by employing a wearable device
- Developed a model that predicts one's learning achievement by making a link between the psychophysiological and learning behavioral data

Department Office Assistant   Sep 2014 – Sep 2015
- Assumed administrative duties of Graduate School of Education, Graduate School, and Faculty of Science Education such as lecture schedule arrangement, human resource management, and learning materials preparations
- Performed department budget management, processing, and calculation
- Organized and planned various lectures including Educational Technology Exhibition and Conference

Research Assistant at Korea Research Foundation   Sep 2014 – Aug 2015
- Participated in the Development of Smart Learning Support Model for Higher Education by Utilizing Big Data
- Conducted Social Network Analysis by employing learning data on LMS (Learning Management System)
- Developed a prediction model for learning achievement by utilizing time management skills of Self-regulation

Brain Korea 21 Plus at Ewha Womans University   **Seoul, Korea**

Research Assistant   Aug 2014 – Feb 2016
- Performed SMILE (Smart Movement for Innovation Environment) Team research tasks
- Monitored learning behaviors and analyzed big data by utilizing data mining method
- Developed indicators for formal, informal, implicit learning in a smart learning environment

National Institute for Lifelong Education   **Seoul, Korea**
Research Assistant   Nov 2015 – Dec 2015
- Participated in Learning Analytics Design Research on K-MOOC system
- Studied with regarding applying learning analytics to K-MOOC system

Institute for Teaching and Learning Center in Ewha Womans University   **Seoul, Korea**
Research Assistant   Jul 2014 – Aug 2014
- Supported digitization of teaching and learning contents for Share Campus System
- Analyzed lecture videos and divided them into smaller units according to the materials' properties and features
- Edited learning packages and translating contents

Korea Productivity Center   **Seoul, Korea**
Intern   Aug 2013 – Dec 2013
- Supported processing Human Resource Development education programs
- Conducted analysis and investigation of education demand, education satisfaction
- Conducted job application survey for managing the quality of training programs
- Took charge of Human Resource Management

TEACHING EXPERIENCE

University of Wisconsin – Madison   **WI, USA**
Tech teaching Assistant   Aug 2020 – In progress
- Assumed a role as the primary contact person for remote instructions in the Computer Science (CS) department
- Supported faculties in the CS department to be effective for their online offerings, including arranging learning contents in the Canvas learning management system, multimedia production and edition, and having (a)synchronous discussion activities

University of Wisconsin – Madison   **WI, USA**
Guest Lecturer   Apr 2020
- Session title: Technology in Education
- In Introduction to Educational psychology: How people learn
- Undergraduate level

University of Wisconsin – Madison   **WI, USA**
Teaching Assistant   Aug 2019 – May 2020
- In Introduction to Educational psychology: How people learn
- Undergraduate level

PUBLICATIONS

Peer-reviewed Journal Articles
Sung, H. & Jo, I. (2018). Utilizing Multimodal data to Predict Learning Achievement: Behavioral Log, Psychophysiological Response, and Test Anxiety. *Journal of Educational Technology, 24*(2), 287-308.

Jo, I., Park, Y., Yoon, M., & **Sung, H.** (2016). Evaluation of Online Log Variables Estimating Learners' Time Management in Korean Online Learning Context. *The International Review of Research in Open and Distance Learning, 17*(1), 195-213.

Conference Proceedings

Kirankumar, V., **Sung, H.**, Swart, M., Kim, D., Xia, F., Kwon, O., & Nathan, M. J. (In review). Embodied Travel of Ideas: Collaborative Co-Constructing of Geometric Content and Mathematical Thinking. In *proceedings of the International Society of the Learning Sciences (ISLS) Annual Meeting*, Bochum.

Nachtigall, V. & **Sung, H.** (2019). Students' Collaboration Patterns in a Productive Failure Setting: An Epistemic Network Analysis of Contrasting Cases. *Paper presented at the International Conference on Quantitative Ethnography (ICQE)*, Madison, Wisconsin.

Sung, H., Cao, T., Ruis, A. R., & Shaffer, D. W. (2019). Reading for Breadth, Reading for Depth: Understanding the Relationship between Reading and Complex Thinking using Epistemic Network Analysis. In *proceedings of the International Conference on Computer Supported Collaborative Learning (CSCL)*, Lyon.

Wu, B., **Sung, H.**, & Shaffer, D. W. (2019). Exploring the epistemic development trajectories in jigsaw-based collaborative problem solving. In *proceedings of the American Educational Research Association (AERA)*, Toronto.

Sung, H., & Shaffer, D. W. (2018). An exploratory epistemic network analysis of combining multimodal data streams to understand student learning process. *Paper presented at Learning Sciences Graduate Students Conference (LSGS)*, Nashville, Tennessee.

Lee, H., **Sung, H.**, Yu, J., Park, Y., & Jo, I. (2015). Clustering of online students: Towards an elaborated prediction model of learning achievement. *Paper presented at E-learning Korea 2015*, Seoul.

Lee, H., **Sung, H.**, Yu, J., Park, Y., & Jo, I. (2015). Development of Prediction Models based on the clustered online learners' behavioral patterns. *Paper presented at the International Academic Conference on Teaching, Learning and E-learning*, Budapest.

Sung, H., Lee, H., Park, Y. & Jo, I. (2014). Mediating Effects of Team Activity on the Relationship between Students' Centrality and Learning Achievement in Online Discussion-based Class. *Paper presented at the International Conference of Educational Technology (ICET)*, Seoul.

Yoo, Y., Jo, I., Park, Y., Lee, H., & **Sung, H.** (2014). Analyzing Online Discussion Activity: Using Social Network Analysis with Learning Analytics Approach. *Paper presented at the Association for Educational Communications and Technology Conference (AECT)*, Jacksonville, Florida.

Kim, J., **Sung, H.**, Park, Y., & Jo, I. (2014). Applying Learning Analytics Dashboard as a Learning Supporting tool: A Case Study of Online Statistics Class. *Paper presented at E-learning Korea 2014*, Seoul.

Sung, H., Yoon, M., Park, Y., & Jo, I. (2014). Relationship of Students' Online Behavior Pattern and Their Psychological Characteristics. *Paper presented at the 12th International Conference for Media in Education, Korea University*, Seoul.

Kim, J., Lee, H., Yoo, Y., **Sung, H.**, Jo, I., & Park, Y. (2014). Towards Smart Asynchronous Discussion Activity: Using Social Network Analysis to Investigate Students' Discussion Pattern. *Paper presented at the International Conference of Smart learning Environment*, Hong Kong.

Books
Kim, J., Lee, H., Yoo, Y., **Sung, H.**, Jo, I. H., & Park, Y. (2015). Towards Smart Asynchronous Discussion Activity: Using Social Network Analysis to Investigate Students' Discussion Patterns. In *Emerging issues in smart learning* (pp. 361-370). Springer, Berlin, Heidelberg.

Research Posters
Siebert-Evenstone, A., Eagan, B., Swiecki, Z., **Sung, H.**, Brohinsky, J., Wang, Y., Fogel, A., Shaffer, D. W. (2019). Zone It! A mobile application for practice- and place-based learning. *Poster will be presented at the Learning Sciences Graduate Students Conference (LSGS)*, Evanston, Illinois.

Sung, H., Cao, T., Ruis, A. R., & Shaffer, D. W. (2019). An epistemic network analysis to investigate the interaction between reading and complex thinking using multimodal data. *Poster presented at UW-Madison Education Research Poster Fair*, Madison, Wisconsin.

Bhatt, H., Cao, T., **Sung, H.**, Siebert-Evenstone, A., Eagan, B., & Shaffer, D. W. (2019). Analysis of multi-modal learning data using horizon of observation ENA. *Poster presented at UW-Madison Education Research Poster Fair*, Madison, Wisconsin.

Sung, H., Swiecki, Z., Wu, B., & Shaffer, D. W. (2018). Reading for breadth, reading depth: A multimodal analysis of student learning processes with Epistemic Network Analysis. *Poster presented at UW-Madison Education Research Poster Fair*, Madison, Wisconsin.

Lee, H., **Sung, H.**, Park, Y., & Jo, I. (2015). Investigation Influences of Participation, Regularity and Centrality on Learning Achievement. *Poster presented at the 3rd Dubai International Conference in Higher Education*, Dubai.

EXTRACURRICULAR ACTIVITIES
Global Engagement Office, University of Wisconsin-Madison　　　　　　　　　**WI, USA**
Peer mentor　　　　　　　　　　　　　　　　　　　　　　　　　　　　2020
- Provided individual-level support and guidance for international incoming graduate students
- Worked with new students to support their technology needs in acclimating to Canvas, WebEx, and other tools used for virtual instruction

Learning Sciences Graduate Student Conference　　　　　　　　　　　　　　**USA**
Executive Committee member　　　　　　　　　　　　　　　　　2018 – In progress
- Organized keynote speech, scholar panel session, and social events
- Assisted conference preparation and execution
- Managed academic conference proceedings editing and publication

Korean Students and Scholars Association, University of Wisconsin-Madison　　**WI, USA**

President   2018 – 2019
- Assumed a role as the leader, supervisor, and coordinator of all KSSA-UW activities
- Had the authority to act as a representative of the members of the KSSA-UW in dealings with UW-Madison and other external organizations in matters of general student concern

Ewha Womans University   **Seoul, Korea**
Executive Member at Korean Society for Educational Technology   2014 – 2017
- Participated in conferences
- Assisted editing periodic publications

Executive member at Association for Educational Communication and Technology   2014 – 2017
- Participated in conferences
- Assisted editing periodic publications

Assistant administrator at Korean Society for Learning and Performance   2014 – 2017
- Assisted conference preparation and execution
- Assisted academic journal editing and publication

Stony Brook Vocalists at New York State University in Stony Brook   **NY, USA**
Vocalist   2012 – 2012
- Performed at school events and regional events
- Sang solo a few times

Status Chorus   **Seoul, Korea**
Vocalist and Choreography director   2010 – 2011
- Performed twice a year at a theater that seats more than 300 people
- Assumed a role as a choreography director