

## JE HOON CHAE

**RESEARCH INTERESTS** **Political Communication:** Political polarization, misinformation, news framing, deliberative democracy, and populism  
**Quantitative and Computational Methods:** Applying computational methods to causal inference, automated text analysis, and online experiment

**EDUCATION** **Yonsei University, Department of Communication** *Sep 2017 – Feb 2020*  
 M.S., Media Communication  
 Dissertation: The Effect of Fact-Check News and Perceived Media Bias  
 Committee: Sang Yup Lee (Chair), Joohan Kim, Kyungmo Kim  
 Awards:  
 - Distinguished Dissertation Research Award (Yonsei University)  
 - First Prize, The Best Graduate Student Paper (Korean Communication Association)  
**Yonsei University, Department of Communication** *Mar 2012 – Aug 2017*  
 B.A., Communication

**WORKS IN PROGRESS** [3] **Chae, J. H.**, Song, H., & Lee, S. Y. (In preparation). Perceiving Fact-Checks as Biased but Nevertheless Persuaded? Effects of Fact-Checking News Delivered by Partisan Media. [\[Brief Summary\]](#)  
 [2] Min, S., **Chae, J. H.**, Lee, J., & Lee, S. Y. (In preparation). Image as data: How Instagram photos reveal individual's characteristics and personality. [\[Brief Summary\]](#) [\[Slides\]](#)  
 [1] Min, S., **Chae, J. H.**, & Han, S. (In preparation). Event segmentation in memory for real-world social events: A case study on COVID-19. [\[Brief Summary\]](#) [\[Slides\]](#)

**CONFERENCE PRESENTATION** [9] **Chae, J. H.**, Song, H., & Lee, S. Y. (2021, October). "Perceiving Fact-Checks as Biased but Nevertheless Persuaded? Effects of Fact-Checking News Delivered by Partisan Media," *117<sup>th</sup> Annual Meeting of American Political Science Association (APSA)*, Virtual Conference.  
 [8] **Chae, J. H.**, Song, H., & Lee, S. Y. (2021, August). "Perceiving Fact-Checks as Biased but Nevertheless Persuaded? Effects of Fact-Checking News Delivered by Partisan Media," *116<sup>th</sup> Annual Meeting of American Sociological Association (ASA)*, Virtual Conference.  
 [7] **Chae, J. H.**, Song, H., & Lee, S. Y. (2021, May). "Perceiving Fact-Checks as Biased but Nevertheless Persuaded? Effects of Fact-Checking News Delivered by Partisan Media," *71<sup>th</sup> Annual Conference of International Communication Association (ICA)*, Virtual Conference.  
 [6] Min, S., **Chae, J. H.**, & Han, S. (2020, August). "Event Segmentation in Memory for Real-world Social Events," *Annual Conference of the Korean Society for Cognitive & Biological Psychology*, Virtual Conference.  
 · **Selected for The Best Presentation Award**  
 [5] **Chae, J. H.**, & Lee, S. Y. (2020, July). "The Persuasion Effect of Fact-Checking News and Perceived Media Bias," *Annual Conference of the Korean Communication Association*, Dae-gu, Republic of Korea.  
 · **Selected for The Best Graduate Student Paper (First Prize)** [\[Link \(Korean\)\]](#)

- [4] Min, S., Chae, J. H., Lee, J. H., & Lee, S. Y. (2020, July). "Image as Data: How Instagram Photos Reveal Individual's Characteristics and Personality," *Annual Conference of the Korean Psychology Association*, Virtual Conference.
- [3] Chae, J. H. (2019, October). "How News Media Covered #MeToo Movement: Application of Structural Topic Modeling and Word Embedding," *10<sup>th</sup> Honours Symposium for Asian Ph.D. Students in Communication Research*, Seoul, Republic of Korea.
- [2] Chae, J. H., & Lee, S. Y. (2019, July). "News Framing of Refugee Issue in South Korea: Application of Topic Model," *5<sup>th</sup> International Conference on Computational Social Science (IC<sup>2</sup>S<sup>2</sup>)*, Amsterdam, Netherlands.
- [1] Min, S., Chae, J. H., Lee, J., Park, J., & Kim, H. (2019, March). "Exploration of the Relationship Between Individual Psychological Traits and Behavioral Patterns on Social Media," *Yonsei Institute of Convergence Science Conference*, Seoul, Republic of Korea.

AWARDS & HONORS	<b>The Best Graduate Student Paper (First Prize)</b> , Korean Communication Association	2020
	<b>Distinguished Dissertation Award</b> , Yonsei University	2020
	<b>Academic Achievement Excellence Award</b> , Yonsei University	2015
SCHOLARSHIPS	<b>Brain Korea 21+ Scholarship</b> , National Research Foundation (NRF)	2017 – 2020
	<b>Teaching Assistant Scholarship</b> , Yonsei University	2019 – 2020
	<b>Research Assistant Scholarship</b> , Yonsei University	2017 – 2018
TEACHING EXPERIENCE	<b>Text Mining with Python</b> Department of Physical Education, Yonsei University Invited lecturer (Eight weeks course addressing machine learning based text analysis)	Jan 2020 – Mar 2020
	<b>Communication Text Mining</b> Department of Communication, Yonsei University Teaching assistant (Instructor: Sang Yup Lee)	Fall 2019
	<b>Public Relations</b> Department of Communication, Yonsei University Teaching assistant (Instructor: Jungho Han)	Spring 2019
	<b>Theories of Advanced Public Relation</b> Department of Communication, Yonsei University Teaching assistant (Instructor: Jungho Han)	Fall 2017
TRAINING	<b>Summer Institutes in Computational Social Science (SICSS)</b> Keio University, Tokyo Instructors: Hirokazu Shirado and Makiko Nakamuro	Jul 2021
	<b>Generalized Linear Model</b> Korea Social Science Data Archive, Seoul National University Instructor: Seongsoo Choi	May 2019
	<b>Linear Algebra for Data Science</b> Department of Communication, Yonsei University Instructor: Sang Yup Lee	Oct 2018
	<b>Introduction to Statistics with R</b> Instructors: Sangwook Kang, Taeyoung Park, and Hyunjoong Kim Department of Statistics, Yonsei University	Aug 2018

**GRANTS Brain Korea 21+** 2017 – 2020  
 Research assistant (PI: Yong-Chan Kim)  
 Team: Creative Applications of Communication Technologies and Social Integration  
**Institute of Convergence Science (ICONS)** 2018 – 2019  
 Co-investigator (\$3,000)  
 Team: Exploration of the Neuro-Computational, Psychological, and Social Systems (ENCOMPASS)

**WORKING Aide for Member of the National Assembly** 2014  
**EXPERIENCE** National Assembly (Assembly Member: Hak-Jae Lee)  
 Internship of New Media Communication

### **SKILLS Statistical Modeling**

Regression: Fixed effect regression, IV-regression, RDD, lme4  
 Bayesian parameter estimation: MCMC, Variational Inference, Stan, brms  
 Structural equation model: lavaan  
 Mediation/moderation: mediation, processR  
 Time-series modeling: ARIMA, HMM, VAR  
 Network analysis: ERGM, QAP

### **Behavioral Data Analysis**

Randomized controlled experiment: DeclareDesign  
 Online panel platform: Mturk, Lucid  
 Survey: Qualtrics, Google Forms

### **Online Data Analysis**

Web-scraping: BeautifulSoup4, scrapy, Selenium, Instagram Scraper  
 Social media data collection: Tweepy, rtweet  
 Web-based experiment: Empirica, breadboard

### **Machine Learning**

Penalized regression: Lasso, Ridge, Elastic Net  
 Dimensionality reduction: PCA, *t*-SNE, UMAP  
 Classification: kNN, Naive Bayes, Decision Tree, SVM, Ensemble Model  
 Unsupervised model: GMM, k-means  
 Deep Learning: CNN, RNN, LSTM, Elmo, BERT, GPT-3, GAN, Keras, PyTorch

### **Automated Text Analysis**

Pre-processing: spaCy, nltk, spacyr, quanteda, konlpy, soynlp  
 Topic modeling: LSA, LDA, STM, keyATM, rectr  
 Sentiment analysis: Dictionary-based approach, LIWC, (Semi-) Supervised ML  
 Word embedding: word2vec, Glove, fastText, BERT

### **Programming/Statistical Language and Tools**

Programming language: Python, Java, JavaScript  
 Statistical tools: R, Stata, SPSS, Jamovi, JASP  
 Other language or tools:  $\text{\LaTeX}$ , Git, GitHub, HTML, CSS, Markdown

**REFERENCES Sang Yup Lee**

Professor of Communication

Professor of Digital Analytics

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50, Yonsei-ro, Seodaemun-gu, Seoul, Republic of Korea

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**Hyunjin Song**

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**Kyungmo Kim**

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(Additional references are available upon request)