# CURRICULUM VITAE Mike Zhongyu He

## **PERSONAL DATA**

Department of Environmental Medicine and Public Health Icahn School of Medicine at Mount Sinai One Gustave L. Levy Place, Box 1057 New York, NY 10029-6574

(909) 569-8073

Email: <a href="mike.he@mssm.edu">mike.he@mssm.edu</a>
Website: <a href="mikezhe.com">https://mikezhe.com</a>

Teaching Portfolio: <a href="https://blogs.cuit.columbia.edu/zh2263/">https://blogs.cuit.columbia.edu/zh2263/</a>

# **ACADEMIC APPOINTMENTS**

Starting Sep 2021 Columbia University

**Department of Sociology** 

**Quantitative Methods in the Social Sciences Program** 

Adjunct Assistant Professor

**EDUCATION / TRAINING** 

Sep 2020 – Present Icahn School of Medicine at Mount Sinai

**Department of Environmental Medicine and Public Health** 

Postdoctoral Fellow

Mentors: Drs. Itai Kloog, Maayan Yitshak-Sade, and Robert Wright

Sep 2015 – Jul 2020 Columbia University Mailman School of Public Health

**Department of Environmental Health Sciences** 

Columbia Climate and Health Program

Doctor of Philosophy

Advisors: Drs. Marianthi-Anna Kioumourtzoglou and Patrick Kinney Dissertation Title: *Air pollution and adverse health effects: Assessing* 

exposure windows and sensitivity to modeling choices

Sep 2015 – Oct 2018 Columbia University Mailman School of Public Health

Master of Philosophy, Environmental Health Sciences

Sep 2014 – May 2015 Johns Hopkins Bloomberg School of Public Health

Graduate Certificate, Risk Sciences and Public Policy

Sep 2014 – May 2015 **Johns Hopkins Bloomberg School of Public Health** 

Master of Health Science, Environmental Health Sciences

Advisor: Dr. Ana Navas-Acien

Jun 2013 – Aug 2013 Johns Hopkins University

Certificate, Advanced Health Sciences Chinese

Sep 2010 – May 2014 Johns Hopkins University

Bachelor of Arts with Honors

Majors: Public Health Studies/Earth & Planetary Sciences Minors: Music/Global Environmental Change & Sustainability

**HONORS AND AWARDS** 

2015 Induction to the Delta Omega Honorary Society, Alpha Chapter, Johns

Hopkins Bloomberg School of Public Health

2015 Recipient of the AAAS/Science Program for Excellence in Science,

American Association for the Advancement of Science

**FUNDING** 

2021 Registration Award, 33rd Annual Conference of the International Society for

**Environmental Epidemiology** 

2020 Registration Award, 32<sup>nd</sup> Annual Conference of the International Society

for Environmental Epidemiology

2019 Student Conference and Leadership Experience Award (\$800), Columbia

Mailman School of Public Health

2019 HAQAST5 Travel Award (\$1,500), NASA Health and Air Quality Applied

Sciences Team Meeting

2018 Teaching Observation Fellowship (\$2,000), Center for Teaching and

Learning, Columbia University

2018 Student Conference Travel Award (\$900), Columbia Mailman School of

Public Health

2018 – 2020 Ruth L. Kirschstein National Research Service Award (F31; \$60,272),

National Institute of Environmental Health Sciences

Title: Assessing Current and Future Health Impacts of Fine Particulate

Matter in China and the United States

2017 – 2019 Sasakawa Young Leaders Fellowship (\$3,750), The Ryoichi Sasakawa

Young Leaders Fellowship Fund

2016 Weatherhead Fellowship (\$1,500), Weatherhead East Asian Institute,

Columbia University

2011 – 2014 Bloomberg Scholarship (\$117,550), Johns Hopkins University

### **PUBLICATIONS**

Peer-Reviewed Research Articles

- 20. Ma R, Ban J, Wang Q, Zhang Y, Yang Y, **He MZ**, Li S, Li S, Shi W, Li T: Random Forest Model based Fine Scale Spatiotemporal O<sub>3</sub> Trends in the Beijing-Tianjin-Hebei region in China, 2010 to 2017. Environmental Pollution 116635. **2021**.
- 19. Liu S, Xing J, Westervelt DM, Liu S, Ding D, Fiore AM, Kinney PL, Zhang Y, **He MZ**, Zhang H, Sahu SK, Zhang F, Zhao B, Wang S: Role of emission controls in reducing the 2050 climate change penalty for PM<sub>2.5</sub> in China. <u>Science of the Total Environment</u> 765: 144338. **2021**.
- 18. Sun Z, Chen C, Yan M, Shi W, Wang J, Ban J, Sun Q, **He MZ**, Li T: Heat wave characteristics, mortality and effect modification by temperature zones: a time-series study in 130 counties of China. International Journal of Epidemiology. **2020**.
- 17. Fang X, Liu W, Ai J, **He M**, Wu Y, Shi Y, Shen W, Bao C: Forecasting incidence of infectious diarrhea using random forest in Jiangsu Province, China. <u>BMC Infectious Diseases</u> 20:222. **2020**.
- 16. **He MZ**, Kinney PL, Li T, Chen C, Sun Q, Ban J, Wang J, Liu S, Goldsmith J, M-A Kioumourtzoglou: Short- and intermediate-term exposure NO<sub>2</sub> and mortality: A multi-county analysis in China. <u>Environmental Pollution</u> 261: 114165. **2020**.
- 15. Zhang Y, Li T, Ma R, Yin Z, Wang J, **He MZ**, Xu D, Gao X, Wang Q, Kraus VB, Lv Y, Zhong Y, Kinney PL, Shi X: Long-term exposure to ambient fine particulate matter and fasting blood glucose level in a Chinese elderly cohort. <u>Science of the Total Environment</u> 717: 137191. **2020**.
- 14. Chen C, Li T, Wang L, Qi J, Shi W, **He MZ**, Sun Q, Wang J, Zhu H, Shi X: Short-term Exposure to Fine Particles and Risk of Cause-Specific Mortality China, 2013-2018. China CDC Weekly 1(1): 8-12. **2019**.
- 13. Jin X, Fiore AM, Civerolo K, Bi J, Liu Y, van Donkelaar A, Martin RV, Al-Hamdan M, Zhang Y, Insaf TZ, Kioumourtzoglou M-A, **He MZ**, Kinney PL: Comparison of multiple PM<sub>2.5</sub> exposure products for estimating health benefits of emission controls over New York State, USA. <u>Environ</u> Res Lett 14 084023. **2019**.
- 12. Westervelt DM, Ma C, **He MZ**, Fiore AM, Kinney PL, Kioumourtzoglou M-A, Wang S, Xing J, Ding D, Correa G: Mid-21<sup>st</sup> century ozone air quality and health burden in China under emissions scenarios and climate change. <u>Environ Res Lett</u> 14 074030. **2019**.
- 11. Yang Y, **He MZ**, Li T, Yang X: MRI combined with PET-CT of different tracers to improve the accuracy of glioma diagnosis: a systematic review and meta-analysis. <u>Neurosurg Rev</u> 42: 185-195. **2019**.

- 10. Li T, Guo Y, Liu Y, Wang J, Wang Q, Sun Z, **He MZ**, Shi X: Estimating mortality burden attributable to short-term PM<sub>2.5</sub> exposure: A national observational study in China. <u>Environment International 125: 245-251. **2019**.</u>
- 9. Chen C, Xu D, **He MZ**, Wang Y, Du Z, Du Y, Qian Y, Ji D, Li T: Fine particulate constituents and mortality: a time-series study in Beijing, China. <u>Environ Sci Technol</u> 52, 11378-11386. **2018**.
- 8. Zhang Y, Cui L, Xu D, **He MZ**, Zhou J, Han L, Li X, Li T: The association of ambient PM<sub>2.5</sub> with school absence and symptoms in schoolchildren: a panel study. <u>Pediatric Research</u> 84: 28-33. **2018**.
- 7. Sun Q, Wang W, Chen C, Ban J, Xu D, Zhu P, **He MZ**, Li T: Acute effect of multiple ozone metrics on mortality by season in 34 Chinese counties, 2013-2015. <u>Journal of Internal Medicine</u> 283 (5), 481-488. **2018**.
- Wang Q, Wang J, He MZ, Kinney PL, Li T: A county-level estimate of PM<sub>2.5</sub> related chronic mortality risk in China based on multi-model exposure data. <u>Environment International</u> 110: 105-112. 2018.
- 5. Liu W, **He MZ**, Wang Y, Wang Y, Zhou Y, Wu M, Tang Z, Dai Y, Yuan B, Zhen S, Cheskin LJ: Differences in health-related behaviors between middle school, high school, and college students in Jiangsu province, China. Asia Pacific J Clin Nutr 26(4): 731-737, **2017**.
- 4. Ban J, Xu D, **He MZ**, Sun Q, Chen C, Wang W, Zhu P, Li T: The effect of high temperature on cause-specific mortality: A multi-county analysis in China. <u>Environment International</u> 106: 19-26. **2017**.
- 3. **He MZ**, Zeng X, Zhang K, Kinney PL: Fine Particulate Matter Concentrations in Urban Chinese Cities, 2005-2016: A Systematic Review. Int J Environ Res Public Health 14(2), 191. **2017**.
- 2. Ban J, Huang L, Chen C, Guo Y, **He MZ**, Li T: Integrating new indicators of predictors that shape the public's perception of local extreme temperature in China. <u>Science of the Total Environment</u> 579: 529-536. **2017**.
- 1. Achey MA, **He MZ**, Akst LM: Vocal Hygiene Habits and Vocal Handicap Among Conservatory Students of Classical Singing. J of Voice 30(2): 192-197, **2016.**

#### Other Publications

- 2. **He MZ**: Singing for science. Science 364 (6439), 506, **2019**.
- 1. **He MZ**: China's Health Care System: A Summer Experience. <u>Epidemic Proportions</u> 11: 34-35, **2014.**

#### **CONFERENCE PRESENTATIONS AND POSTERS**

- 20. He MZ, Kloog I, Just AC, Gutiérrez-Avila I, Colicino E, Téllez-Rojo MM, Pizano-Zárate M, Tamayo-Ortiz M, Baccarelli AA, Wright RO, Yitshak-Sade M: Associations between air pollution and temperature on glycated hemoglobin levels in women of child bearing age. Oral Presentation. International Society for Environmental Epidemiology 2021 Conference (online). August 2021.
- 19. **He MZ**, Kinney PL, Fiore AM, Do V, Jin X, Liu S, DeFelice N, Bi J, Liu Y, Insaf T, Kioumourtzoglou M-A: Short-term PM<sub>2.5</sub> and cardiovascular admissions in NY State: assessing

- sensitivity to exposure model choice. Oral Presentation. American Geophysical Union 2020 Fall Meeting (online). December **2020**.
- 18. Zhang L, **He MZ**, Perera F, Lovasi G, Clougherty J, Carrión D, Burke K, Kioumourtzoglou M-A: Evaluating the impact of the Clean Heat Program on air pollution levels in New York City. Poster Presentation. International Society for Environmental Epidemiology 2020 Conference (online). August **2020**.
- 17. **He MZ**, Kioumourtzoglou M-A, Kinney PL, Fiore A, Jin X, Do V, Liu S, Insaf T, Michalski A: Fine particulate matter and cardiovascular admissions in NY State: an assessment of exposure model choice sensitivity and spatial-temporal effect modification. Oral Presentation. New Applications in the Use of Satellite Data Monitoring for Population Health. Huntsville, Alabama. October **2019**.
- 16. **He MZ**, Do V, Liu S, Kinney PL, Fiore A, Jin X, DeFelice N, Kioumourtzoglou M-A: Short-term PM<sub>2.5</sub> and cardiovascular admissions in NY State: assessing sensitivity of exposure model choice. Oral Presentation. International Society for Environmental Epidemiology 2019 Conference, Utrecht, Netherlands. August **2019**.
- 15. **He MZ**, Kioumourtzoglou M-A, Kinney PL, Fiore A, Jin X, Do V, Liu S, Insaf T, Michalski A: Fine particulate matter and respiratory admissions: an assessment of short-term exposure model choice sensitivity for health studies. Oral Presentation. NASA Health and Air Quality Applied Sciences Team 6<sup>th</sup> Biannual Meeting, Pasadena, California. July **2019**.
- 14. Jin X, Fiore AM, Civerolo K, Johnson S, Bi J, Liu Y, van Donkelaar A, Martin R, Al-Hamdan M, Zhang Y, Insaf T, Kioumourtzoglou M-A, **He MZ**, Kinney P: Quantifying health benefits of emission reduction over New York State using multiple PM<sub>2.5</sub> products. Oral Presentation. New York State Energy Research and Development Authority Energy-Related Air Quality and Health Effects Workshop. Albany, New York. April **2019**.
- 13. **He MZ**, Kioumourtzoglou M-A, Kinney PL, Fiore A, Jin X, Do V, Liu S, Insaf T, Michalski A: Short-Term PM<sub>2.5</sub> and Cardiovascular Admissions in NY State: Assessing Sensitivity of Exposure Model Choice. Oral Presentation. NASA Health and Air Quality Applied Sciences Team 5<sup>th</sup> Biannual Meeting, Phoenix, Arizona. January **2019**.
- 12. Jin X, Fiore A, Civerolo K, Johnson S, Bi J, Liu Y, Martin R, van Donkelaar A, Zhang Y, Kinney PL, Kioumourtzoglou M-A, **He MZ**: Quantifying health benefits of emission reduction over New York State using multiple PM<sub>2.5</sub> products. Oral Presentation. NASA Health and Air Quality Applied Sciences Team 5<sup>th</sup> Biannual Meeting, Phoenix, Arizona. January **2019**.
- 11. Westervelt D, Ma CT, Fiore AM, Kinney PL, **He MZ**, Xing J, Wang S: The impact of emissions scenarios and climate change over China on ozone air quality in China and the United States. Oral Presentation. American Geophysical Union 2016 Fall Meeting, Washington DC. December **2018**.
- 10. **He MZ**, Li T, Kinney PL, Chen C, Sun Q, Ban J, Wang J, Liu S, Goldsmith J, Kioumourtzoglou M-A: Short- and Intermediate-Term Exposure to NO<sub>2</sub> and Mortality: A Multi-County Analysis. Oral Presentation. Columbia University Air Pollution Extremes Workshop, New York, New York. November **2018**.
- 9. Du Z, **He MZ**, Ban J, Wang Q, Li T. The Research on National Heat Vulnerability Assessment of China. Poster Presentation. International Society for Environmental Epidemiology-Exposure Sciences 2018 Conference, Ottawa, Canada. August **2018**.
- 8. **He MZ**, Li T, Kinney PL, Kioumourtzoglou M-A: Short- and Intermediate-Term Exposure to NO<sub>2</sub> and Mortality in 42 Chinese Counties. Poster Presentation. International Society for

- Environmental Epidemiology-Exposure Sciences Asia Chapter 2018 Conference, Taipei, Taiwan, June 2018.
- 7. Ma C, Westervelt D, Fiore A, Kinney PL, **He MZ**, Rieder H, Wang S, Correa G: Impact of Future Emissions and Climate Change on Surface Ozone over China. Oral Presentation. American Geophysical Union 2017 Fall Meeting, New Orleans, Louisiana. December **2017**.
- 6. Jin X, Fiore A, Civerolo K, Ku M, Insaf T, Kinney PL, Kioumourtzoglou M-A, **He MZ**, Curci G, Lyapustin A, Wang Y, Martin R, van Donkelaar A: Combining satellite data and CMAQ model to map PM<sub>2.5</sub> exposure over the Northeast U.S.A. Oral Presentation. NASA Health and Air Quality Applied Sciences Team 3<sup>rd</sup> Annual Meeting, Palisades, New York. November **2017**.
- 5. **He MZ**, Kioumourtzoglou M-A, Kinney PL, Fiore A, Jin X, Insaf T, Michalski A: Associations between Air Pollution and Hospital Admissions in New York State. Oral Presentation. NASA Health and Air Quality Applied Sciences Team 3<sup>rd</sup> Biannual Meeting, Palisades, New York. November **2017**.
- 4. Wang Q, Wang J, **He MZ**, Kinney PL, Li T: A county-level estimate of PM<sub>2.5</sub> related chronic mortality risk in China based on multi-model exposure data. Oral Presentation. International Society for Environmental Epidemiology 2017 Conference, Sydney, Australia. September **2017**.
- 3. **He MZ**, Li T, Kinney PL, Kioumourtzoglou M-A: Short- and Intermediate-Term Exposure to NO<sub>2</sub> and Mortality: A Multi-County Analysis in China. Poster Presentation. International Society for Environmental Epidemiology 2017 Conference, Sydney, Australia. September **2017**.
- 2. **He MZ**, Zeng X, Zhang K, Kinney PL: Regional Differences in Fine Particulate Matter Concentrations in Urban Chinese Cities: A Systematic Review. Oral Presentation. 2016 Symposium on Public Health in Asia, Baltimore, Maryland. February **2016**.
- 1. Meyer-Fong T, Johnson Y, **He MZ**, Meyer C: Language Study and Research on Public Health in Asia. Oral Presentation. 2015 Symposium on Public Health in Asia, Baltimore, Maryland, February **2015**.

#### **SOCIETY MEMBERSHIP**

2020 – Present	American Geophysical Union
2017 – Present	International Society for Environmental Epidemiology
2015 – Present	American Association for the Advancement of Science
2015 – Present	Delta Omega Honor Society, Alpha Chapter
2014 – Present	Sigma Gamma Epsilon Honor Society, Alpha Kappa Chapter

# **LEADERSHIP**

2020 – Present Department Representative, Postdoctoral Executive Committee, Icahn School of Medicine at Mount Sinai

2019 – 2020	Vice President of Administration, University PhD Council, Columbia University
2018 – 2019	School Representative, University PhD Council, Columbia University
2016 – 2018	Department Representative, Graduate Student Advisory Council, Columbia University
INVITED PRESENTATIONS	
May 2020	Evaluating the Impact of the Clean Heat Program on Air Pollution Levels in New York City, EHS Department Seminar, Columbia Mailman School of Public Health, New York, New York (Host: Joseph Graziano)
Apr 2020	Applying to PhD & Doctoral Programs, Office of Career Services, Columbia University Mailman School of Public Health, New York, New York (Host: Heather Krasna)
Jul 2019	Five Ways of Telling the Same Story: Assessing Sensitivity of Exposure Model Choice in Air Pollution Studies, Chinese Center for Disease Control and Prevention, Beijing, China (Host: Tiantian Li)
Apr 2019	Five Ways of Telling the Same Story: Assessing Sensitivity of Exposure Model Choice in Air Pollution Studies, EHS Department Seminar, Columbia Mailman School of Public Health, New York, New York (Host: Joseph Graziano)
Nov 2018	Climate Change and Health, Workshop for the Johns Hopkins Center for Talented Youth, New York, New York (Host: Gail Garbowski)
Jul 2018	Facts and Alternative Facts: Approaches to Communicating Climate Change, Chinese Center for Disease Control and Prevention, Beijing, China (Host: Tiantian Li)
Mar 2018	Air Pollution, Climate Change, and Health in China: A Multi-County Study, EHS Department Seminar, Columbia Mailman School of Public Health, New York, New York (Host: Joseph Graziano)
Nov 2017	Climate Change and Health, Workshop for the Johns Hopkins Center for Talented Youth, New York, New York (Host: Gail Garbowski)
Sep 2017	A Brief Introduction to Missing Data, Chinese Center for Disease Control and Prevention, Beijing, China (Host: Tiantian Li)

Sep 2017	Directed Acyclic Graphs as a Tool for Epidemiology, Chinese Center for Disease Control and Prevention, Beijing, China (Host: Tiantian Li)
Mar 2017	Air Pollution, Classical Music, and Everything in Between, EHS Department Seminar, Columbia Mailman School of Public Health, New York, New York (Host: Joseph Graziano)
Jul 2016	The Effects of Air Purifiers and Education on the Jinan Children's Cohort: Preliminary Study Design, Chinese Center for Disease Control and Prevention Workshop on Air Pollution and Health, Beijing, China (Host: Tiantian Li)
Jul 2016	A Tale of Two Disciplines: Public Health in Classical Music, Chinese Center for Disease Control and Prevention, Beijing, China (Host: Tiantian Li)
Jun 2016	Fine Particulate Matter Concentrations in Six Regions of China: A Systematic Review and Evaluation of Satellite-Derived Data, Chinese Center for Disease Control and Prevention, Beijing, China (Host: Tiantian Li)
Apr 2016	Environment and Health Connections: Stories from the Deep Interior to the Ends of the Earth, Johns Hopkins Bloomberg School of Public Health, Baltimore, Maryland (Host: Ruth Quinn)
Apr 2016	Regional Differences in Fine Particulate Matter Concentrations in Urban Chinese Cities: A Systematic Review, EHS Department Seminar, Columbia Mailman School of Public Health, New York, New York (Host: Joseph Graziano)
Aug 2015	Systematic Review and Meta-Analysis: The Basics, Jiangsu Provincial Center for Disease Control and Prevention, Nanjing, China (Host: Shiqi Zhen)
Jul 2015	Model Selection in Biostatistics: Techniques and Application, Jiangsu Provincial Center for Disease Control and Prevention, Nanjing, China (Host: Shiqi Zhen)

## **PROFESSIONAL SERVICE**

Journal Referee

Applied Economics, Applied Sciences, Atmosphere, Atmospheric Environment, BMC Cancer, BMC Public Health, Chemosphere, Environmental Health, Environmental Pollution, Environmental Research, Environmental Research Communications, Environmental Research Letters, Environmental Science & Technology, GeoHealth, International Journal of Environmental Research and Public Health, Journal of Environmental Management, Mathematics, PeerJ, Science of the Total Environment, Sustainability, The Innovation, The Lancet Planetary Health, Urban Climate, Urban Science, Vaccines, and Viruses

Academic Conferences and Meetings

2021 Co-chair, Obesogenic environmental exposures (E-Poster Discussion

Session), International Society for Environmental Epidemiology 2021

Conference

2021 Abstract Reviewer, International Society for Environmental Epidemiology

2021 Conference

2020 Abstract Reviewer, International Society for Environmental Epidemiology

2020 Conference

2019 Planning Committee, Applications in the Use of Satellite Data Monitoring

for Population Health Conference

2019 Abstract Reviewer, International Society for Environmental Epidemiology

2019 Conference

Departmental and University Committees

2021 Hybrid Return to Work Taskforce, Department of Environmental Medicine

and Public Health, Icahn School of Medicine at Mount Sinai

2021 Student/Trainee Learning Environment Committee, Icahn School of

Medicine at Mount Sinai

2018 – 2019 Co-Organizer, Climate and Health Seminar Series (13 seminars),

Columbia Climate and Health Program

**TEACHING** 

Columbia University

Fall 2021 Course Instructor, Theory and Methodology for the Social Sciences,

GR5010

Fall 2019 Teaching Scholar, Atmospheric and Climate Science for Public Health,

P8301

Spring 2019 Teaching Scholar, Public Health Impacts of Climate Change, P8304

Spring 2018 Teaching Scholar, Public Health Impacts of Climate Change, P8304

Spring 2017 Teaching Scholar, Public Health Impacts of Climate Change, P8304

Johns Hopkins University Spring 2015	Teaching Assistant, Statistical Methods in Public Health IV, PH.140.624
Spring 2015	Teaching Assistant, Statistical Methods in Public Health III, PH.140.623
Spring 2015	Teaching Assistant, Introduction to the Risk Sciences, PH.317.600
Fall 2014	Teaching Assistant, Statistical Methods in Public Health II, PH.140.622
Fall 2014	Teaching Assistant, Statistical Methods in Public Health I, PH.140.621
Fall 2014	Teaching Assistant, Public Health Biostatistics, AS.280.345
Fall 2014	Course Designated Tutor, Fundamentals of Epidemiology, AS.280.350
Fall 2014	Course Mentor, General Biology II, AS.020.152
Spring 2014	Teaching Assistant, Probability and Statistics for the Life Sciences, EN.550.211
Fall 2013	Teaching Assistant, Statistical Analysis I, EN.550.111
Fall 2013	Course Mentor, General Biology I, AS.020.151
Fall 2013	Teaching Assistant, General Biology Lab I, AS.020.153
Fall 2013	Teaching Assistant, Public Health Biostatistics, AS.280.345
Spring 2013	Teaching Assistant, Probability and Statistics for the Life Sciences, EN.550.211
Fall 2012	Teaching Assistant, Public Health Biostatistics, AS.280.345
Certifications	
Jan 2019 – Oct 2020	Teaching Development Program (Advanced Track), Columbia Center for Teaching and Learning
Sep 2018 – May 2019	Teaching Observation Fellowship, Columbia Center for Teaching and Learning
Jun 2018	Innovative Teaching Summer Institute, Columbia Center for Teaching and Learning
Jan 2018 – May 2018	Reflective Teaching Seminar, Columbia Center for Teaching and Learning

Guest Lectures Mar 2021	A Brief History of Air Pollution and Health, Epidemiology II: Epidemiologic Methods and Design, Icahn School of Medicine at Mount Sinai, New York, New York (Host: Maayan Yitshak-Sade)
Feb 2020	Air Pollution, Health, and Climate Change, Public Health Impacts of Climate Change Course, Columbia University Mailman School of Public Health, New York, New York (Host: Micaela Martinez)
Oct 2019	A Brief History of Air Pollution and Health, Atmospheric and Climate Science for Public Health Course, Columbia University Mailman School of Public Health, New York, New York (Host: Jeffrey Shaman)
Apr 2019	Air Pollution and Climate Change: A Public Health Perspective, Introduction to Atmospheric Chemistry Course, Columbia University, New York, New York (Host: Arlene Fiore)
Feb 2019	Air Pollution, Health, and Climate Change, Public Health Impacts of Climate Change Course, Columbia University Mailman School of Public Health, New York, New York (Host: Micaela Martinez)
Jan 2019	Air Pollution and Health in 2018: Case-Studies from China and the United States, Diamond Bar High School, Diamond Bar, California (Host: Angela Jensvold)
Mar 2018	Air Pollution, Health, and Climate Change, Public Health Impacts of Climate Change Course, Columbia University Mailman School of Public Health, New York, New York (Host: Jeffrey Shaman)
Mar 2017	Air Pollution, Health, and Climate Change, Public Health Impacts of Climate Change Course, Columbia University Mailman School of Public Health, New York, New York (Host: Jeffrey Shaman)
Jan 2017	The Physics of Climate Change, Diamond Bar High School, Diamond Bar, California (Host: Angela Jensvold)
Jan 2017	Air Pollution and Particulate Matter: Concepts and Recent Developments, Diamond Bar High School, Diamond Bar, California (Host: Angela Jensvold)
Jan 2016	PM <sub>2.5</sub> : Overview and Case Study, Diamond Bar High School, Diamond Bar, California (Host: Angela Jensvold)

Jan 2015

Environmental Health and Air Pollution, Diamond Bar High School, Diamond Bar, California (Host: David Hong)