

Mandie Kramer, MS, CIH, CSP

SENIOR SCIENTIST I

CONTACT INFORMATION

ToxStrategies LLC
St. Paul, MN
Phone (651) 316-4584
mkramer@toxstrategies.com

PROFESSIONAL PROFILE

Ms. Mandie Kramer is a Certified Industrial Hygienist and Certified Safety Professional in ToxStrategies' Exposure Sciences practice. She holds a Masters in Industrial Hygiene and practices in the Twin Cities area, Minnesota. Ms. Kramer has 8 years of experience in the industry sector, with a background in exposure science, industrial hygiene, statistics, and product stewardship. She has both research and hands-on experience with exposure modeling, dermal exposure assessments, air/noise/dermal exposure monitoring, and ergonomic assessments at manufacturing facilities using a variety of processes with potential exposures to a wide range of substances. Her data-driven product exposure experience includes product-use simulation studies, exposure modeling, and regulatory compliance.

Ms. Kramer has broad leadership, mentoring, and communication experience, including the development of an extensive webinar series on air and noise monitoring, targeting onsite environmental health and safety staff. She has led multiple IH initiatives on such topics as confined-space entry, heat stress, COVID-19 exposure modeling, and dermal exposure assessments. She has also served in a product stewardship role, supporting a diverse portfolio of consumer products, including cleaning solutions and tools and material-protective products. In her career in industry, she has received multiple internal professional awards, including four peer-nominated team awards for industrial hygiene training, pandemic support, and product assessment.

EDUCATION AND DEGREES EARNED

2020 Master of Science (MS), Industrial Hygiene, University of Minnesota, Twin Cities

2015 Bachelor of Science (BS), Environmental Health Sciences, University of North Carolina, Chapel Hill

CERTIFICATIONS

Certified Industrial Hygienist (CIH)
Board for Global EHS Credentialing, #12471

Certified Safety Professional (CSP)
Board of Certified Safety Professionals, CSP-41888

Registered Specialist: Exposure Decision Analysis
American Industrial Hygiene Association, [registry link](#)

PROFESSIONAL MEMBERSHIPS AND HONORS

2019–present American Industrial Hygiene Association, member

- 2023 AIHA Kusnetz Award Recipient for Outstanding Achievement by an Early Career Professional
- Member, Exposure Assessment Strategies Committee & Stewardship and Sustainability Committee
- AIHA Future Leaders Institute (FLI) Class of 2022
- AIHA-Upper Midwest Local Section, President (June 2021 – June 2022), President-Elect (June 2020 – May 2021)
- AIHA/PSS Product Exposure Modeling Committee, Chair (May 2021 — December 2022)

SELECTED PROFESSIONAL EXPERIENCE

Industrial Hygiene

Comprehensive industrial hygiene experience providing support for global manufacturing facilities, including exposure assessment, ventilation design, program development, heat stress controls, and appropriate personal protective equipment.

Strong experience and professional interest with exposure modeling tools, including IH Mod, IH Skin Perm, ConsExpo, TEAS, and EPA CEM.

Designed and led multiple exposure reconstruction and original research studies, including the use of portable room air purifiers as local exhaust ventilation for office workers during the COVID-19 pandemic.

Extensive experience completing quantitative exposure assessments at manufacturing facilities using passive and active sampling techniques.

Developed and led a successful webinar series for new environmental safety and health personnel to learn air/noise exposure assessment and sampling procedures. As a supplement to the online training, co-hosted an in-person 2-day workshop with 45 participants.

Led the development of a multiple exposure assessment tools, including a dermal exposure assessment tool to interpret wipe sampling data and a welding exposure assessment tool to help determine contaminants and sampling media for different types of welding.

Environmental Health and Safety

Developed and completed aerosol transmission modeling using TEAS software to minimize risk of aerosol transmission at all global manufacturing facilities. In addition, developed the standard work based on the aerosol transmission modeling and led the development of standard work for using room air purifiers as a control for COVID-19.

Extensive experience creating global safety trainings for confined space and heat stress.

Led a global team to develop training, guidance, and tools to proactively address non-routine tasks.

Product Stewardship

Served as a product steward for a diverse set of national consumer product brands—responsible for life-cycle management of all products that totaled over \$10M in sales. As a product steward, led regulatory support to understand new regulations and potential impacts to the product line. Also served as subject-matter expert on sustainability of retail chemicals by creating a sustainability tool for use during product development. A large part of this role consisted of ensuring multiple safe and compliant substitutions of chemicals of concern out of consumer product brands (peer nominated for an individual and team internal technical award). Demonstrated technical communication and influencing skills from experience explaining complex regulations and chemical hazards to product developers, marketing staff, and management.

MANUSCRIPTS

Oberlin TJ, DuBois CK, Sheppard, M, Quam JD, **Kramer AJ**, Logan PW, Murphy MJ. 2022. COVID-19 aerosol transmission modeling in support of company HVAC guideline. *J Occup Environ Hyg* 19(5):327–334; doi: 10.1080/15459624.2022.2058701.

DuBois CK, Murphy MJ, **Kramer AJ**, Quam JD, Fox AR, Oberlin TY, Logan PW. 2022. Use of portable air purifiers and local exhaust ventilation during COVID-19. *J Occup Environ Hyg* (19(5):310–317.

Kramer AJ, Rattanavaraha W, Zhang Z, Gold A, Surratt JD, Lin Y-H. 2016. Assessing the oxidative potential of isoprene-derived epoxides and secondary organic aerosol. *Atmos Environ* 130:211–218.

Johnston JE, **Kramer AJ**, MacDonald Gibson J. 2015. Community perspectives on the risk of indoor air pollution arising from contaminated groundwater. *New Solutions* 25(1):59–77; doi: 10.1177/1048291115569026.

ABSTRACTS AND PRESENTATIONS

Gauthier A, Bare J, **Kramer M**. Tools and tips for exposure assessment throughout the product development life cycle. Education session, PSX 2024, October 2024.

Kramer AJ. Introduction to inhalation exposure modeling. Technical presentation at AIHA Upper Midwest Local Section Professional Development Conference, Roseville, MN, November 2023.

Kramer AJ, Maskrey J. Cracking the code of inhalation exposure modeling. Education session at American Industrial Hygiene Association AIHce conference, Phoenix, AZ, May 2023.

Kramer AJ. Lessons in leadership—Arrival fallacy and how to combat it in your personal and professional life. Presentation at American Industrial Hygiene Association AIHce conference, Phoenix, AZ, May 2023.

Dubois CK, Dunn K, Neu D, **Kramer AJ,** Logan P, Wong N (speakers). Evaluation, operation, and maintenance of industrial ventilation systems. Professional development course at American Industrial Hygiene Association AIHce conference, Phoenix, AZ, May 2023.

Walton J, **Kramer AJ,** Persky J, Deeds, D, Hellerstein J (speakers). Fundamentals and value of modeling product exposures. Workshop / online seminar of the Product Stewardship Society, November 2022.