Tami L. Lavezzo

Principal Scientist / Founder
Air & Fire Applied Sciences

Education and Training

- *Master of Business Administration (MBA)*; Saint Mary's College of California (2002 – 2004)
- *Bachelor of Science (BS) in Chemistry*; Sonoma State University (1990 – 1995)
- *National Science Foundation (NSF) Research Fellowship in Physical Chemistry*; University of New Mexico (1994)

Research and Professional Experience

Air & Fire Applied Sciences - Principal Scientist / Founder (2026 – Present, Full time)
Ms. Lavezzo is a Principal Scientist and Founder of Air & Fire Applied Sciences (AFAS), a woman-owned business based in northern California. With three decades of experience in environmental sciences, Ms. Lavezzo has cultivated deep expertise in air quality, wildfire planning and mitigation, project design, and project management. She has spent her career developing innovative solutions and strategies for environmental challenges, particularly in wildfire and smoke sciences. Her approach emphasizes collaboration with clients and cross-functional teams to create impactful data-driven decision support tools, ensuring compliance with regulatory frameworks while advancing the state-of-the-science.

Sonoma Technology, Inc. – Vice President / Senior Scientist / Senior Project Manager
Prior to founding AFAS, Ms. Lavezzo worked at Sonoma Technology. She was employed at Sonoma Technology from 1996 - 2025 and served in the positions and roles outlined below.

- ***2015 – 2025: Manager of the Wildfire & Smoke Analysis Group, Vice President, and corporate leader on the Senior Advisory Team***. Her primary duties involved helping to lead Sonoma Technology's Fire and Smoke Sciences Program and managing complex litigation service projects. In her role helping to lead Sonoma Technology's fire and smoke sciences program, Ms. Lavezzo served as the technical lead for wildland fire pre-planning and mitigation services and supported multi-disciplinary fire and smoke-related projects across the organization. As a manager of litigation services projects, Ms. Lavezzo collaborated with clients and subject matter experts to provide strategic analyses, scientific reports, and custom work products to address complex litigation and regulatory compliance matters.
- ***2007 – 2015: Senior Scientist / Senior Project Manager*** Ms. Lavezzo managed the design and development of GIS-based modeling, analysis, and outreach software tools for diverse types of fire science, air quality, and environmental data. She participated in several large-scale projects that required the development of software systems to support environmental modeling and data analysis, including the design and implementation of the first-generation

Interagency Fuels Treatment Decision Support System (IFTDSS) for the Joint Fire Science Program. Ms. Lavezzo helped develop the Kids Making Sense air quality education and outreach program which involved teaching kids in grades 6 -12 about air quality and using hand-held sensors to collect and analyze air quality data.

- ***2000 – 2005: Manager GIS Services Group /Data Analyst / Project Manager*** Ms. Lavezzo served as manager of the GIS Services Group. She was a lead data analyst and project manager for projects related to regional and national air quality assessments, emissions inventory studies, and facility-level air impact assessments.
- ***1996 – 2000: Data Analyst / GIS Analyst*** Ms. Lavezzo analyzed air quality data, estimated air emissions, and used GIS spatial analysis techniques to quality assure, analyze, and develop applications to display and manipulate environmental data. She used advanced statistical methods for mapping ozone and particulate matter data to support the EPA's AirNow public awareness program. She worked with health researchers at the University of California, Los Angeles (UCLA), the University of Southern California (USC), and the National Institute of Health (NIH) to develop methods for improving spatial data for applications requiring a high degree of spatial resolution and accuracy.

Brunsing Associates – Staff Chemist (1995 – 1996) Ms. Lavezzo worked as a staff chemist where her duties included handling, analyzing, and quality controlling soil and water samples as well as generating and editing laboratory reports.

Select Publications

- Wu J., Lurmann F., Winer A., Lu R., Turco R., and Funk T. (2005) Development of an individual exposure model for application to the southern California Children's Health Study. Atmos. Environ. 39, 259-273.
- Lurmann F., Funk T., Hyslop N., Roberts P., Hamond S.K., McConnell R., and Avol E. (2002) Measurement and modeling of personal exposure to ambient air pollution related to motor vehicle emissions. Epidemiology, 13 (4), S131-32.
- Ryder O., Brown S., Lavezzo T., McCoy W., Duvall R., Clements A., Smoak R., Freed R., Batka S., and Young I. (2022) Air Sensors for Education & Community Engagement. Presented at the Air & Waste Management Association, Air Quality Measurement Methods and Technology Conference, San Diego, CA, March 8-9, by Sonoma Technology, Petaluma, CA. STI-600600-7681.
- Haste T.L., Noha D.J., Drury S.A., Banwell E.M., Wheeler N.J.M., and Haderman M.D. (2012) Implementation of the Interagency Fuels Treatment Decision Support System. Final report prepared for the Joint Fire Science Program, Bureau of Land Management, Boise, ID, by Sonoma Technology, Inc., Petaluma, CA, STI-910901 5550, October.

Synergistic Activities

- Member, Pyregence Consortium (https://sig-gis.com/pyrecast/)
- Member, International Association of Wildland Fire
- Proposal peer-reviewer for the Joint Fire Sciences Program (2024 – 2025)