

REFEREED JOURNAL ARTICLES

1. Sattler, Melanie L.; Weatherton, Yvette P.; Sumitsawan, Sulak; Johnson, C. Brooke; and Joel L. Hernandez. "Simulating Dispersion of an Airborne Bioterrorism Agent: A Comparison of Models, Source Types, Viability Assumptions, and Release Locations." *Journal of the Air & Waste Management Association*. Under review.
2. Sattler, Melanie L.; Garrepalli, Divya R.; Nawal, Chandraprakash S. "Carbonyl Sulfide Removal with Compost and Wood Chip Biofilters, and in the Presence of Hydrogen Sulfide." *Journal of the Air & Waste Management Association*. In Revision.
3. Yang, Zehua; Chen, Victoria; Chang, Michael; Sattler, Melanie; and Aihong Wen. "A Decision-Making Framework for Ozone Pollution Control." *Operations Research*. Vol. 57, No. 2, March/April 2009, pp. 484-498.
4. Kim, Seoung Bum; Temiyasathit, Chivalai; Park, Sun-Kyoung; Chen, Victoria C.P.; Sattler, Melanie; and Armistead G. Russell. "Characterization of Spatially Homogeneous Regions Based on Temporal Patterns of Particulate Matter 2.5 in the Continental United States." *Journal of the Air & Waste Management Association*. Vol. 58, No.7, July 2008, pp.965-975.
5. Sattler, Melanie L. and Sapna Devanathan. "Which Meteorological Conditions Produce Worst Case Concentrations from Area Sources?" *Journal of the Air & Waste Management Association*. Vol. 57, No. 11, Nov. 2007, pp. 1296-1306.
6. Sattler, Melanie. "Transportation and Air Quality/Environment: A Suggested Course Addition to the Environmental Engineering/Science Curriculum." *Environmental Engineering Science*. June 2006.
7. Sattler, Melanie L. and Ranjith Samuel Rosenberk. "Removal of Carbonyl Sulfide Using Activated Carbon Adsorption." *Journal of the Air & Waste Management Association*. Volume 56, Feb. 2006, p. 219-224.
8. Sattler, Melanie L. and Howard M. Liljestrand. "Chemical Mass Balance Model with Fractionation for Apportioning PM 2.5: A Test Case for Los Angeles Traffic Sources." *Journal of the Air & Waste Management Association*. Vol. 55, September 2005, pp. 1335-1344.
9. Nagaraj, Archana and Melanie L. Sattler. "Correlating Emissions with Time and Temperature to Predict Worst-Case Emissions from Open Liquid Area Sources." *Journal of the Air & Waste Management Association*. Vol. 55, August 2005, pp. 1077-1084.
10. Sattler, Melanie L. and Howard M. Liljestrand. "Method for Predicting Photocatalytic Oxidation Rates of Organic Compounds." *Journal of the Air & Waste Management Association*. Volume 53, Number 1, January 2003, pp. 3-12.
11. Stuckey, H. Troy and Melanie L. Sattler. "Air quality in the 21st century: community outreach in North Central Texas." *Environment International*. Volume 29. January 2003, pp. 341-346.

CONFERENCE PRESENTATIONS

With Refereed Paper

1. Mattingly, Stephen P.; Sattler, Melanie L.; Bhatt, Hetal; Sumitsawan, Sulak; Natchanok, Pala-En; Parikh, Parthen. "Model for Estimating NO_x Emission Reductions After Closing Drive-Throughs." *Transportation Research Board Annual Meeting*. January 2009.
2. Sule, Neelesh V.; Chen, Victoria; Sattler, Melanie L. "Assessing Control Strategies for Ground-Level Ozone." *Proceedings of the 101st Annual Conference of the Air & Waste Management Association*. June 2008.
3. Afotey, Benjamin; Sattler, Melanie L.; Mattingly, Stephen P. "Statistical Approach to the Development of a Microscale Model for Estimating Exhaust Emissions of a Light Duty Gasoline Vehicle." *Proceedings of the 101st Annual Conference of the Air & Waste Management Association*. June 2008.
4. Kanukolanu, S.; Mattingly, S.; and M. Sattler. "Impact of a Pre-Combustion Retrofit Device on Vehicular Emissions: A Case Study." *Proceedings of the 100th Annual Conference of the Air & Waste Management Association*. June 2007.
5. Satyanarayan, S.; Mattingly, S.; and M. Sattler. "Trends of Vehicular Emissions Due to the Effect of ETHOS FR as Fuel Additive: A Case Study." *Proceedings of the 100th Annual Conference of the Air & Waste Management Association*. June 2007.
6. Upahdyay, Mita and Melanie Sattler. "Development of Photocatalytic Oxidation Reaction Rate Constants for Compounds Commonly Emitted from Wastewater Treatment Plants and Solid Waste Landfills." *Proceedings of the Air & Waste Management Association 100th Annual Meeting*. June 2007.
7. Bhatt, Hetal H. and Melanie L. Sattler. "Determination of Safe Buffer Width to Protect Human Health from Harmful NO_x Exposure." *Proceedings of the Air & Waste Management Association 99th Annual Meeting*. June 2006.
8. Garrepalli, Divya and Melanie Sattler. "Removal of Carbonyl Sulfide in Combination with Hydrogen Sulfide Using Biofiltration." *Proceedings of the Air & Waste Management Association 99th Annual Meeting*. June 2006.
9. Munshi, Rupangi; Sattler, Melanie; and Stephen Mattingly. "Impacts of Signal Synchronization on Vehicular Emissions – An Onboard Measurement Case Study." *Proceedings of the Air & Waste Management Association 99th Annual Meeting*. June 2006.
10. Rosenberk, Ranjith Sam and Melanie L. Sattler. "Removal of Carbonyl Sulfide Using Activated Carbon Adsorption." *Proceedings of the Air & Waste Management Association 98th Annual Meeting*. June 2005.
11. Nawal, C.P. and Melanie L. Sattler. "Removal of Carbonyl Sulfide Using Biofiltration." *Proceedings of the Air & Waste Management Association 98th Annual Meeting*. June 2005.
12. Devanathan, Sapna and Melanie Sattler. "Which Meteorological Conditions Produce Worst Case Concentrations from Area Sources?" *Proceedings of the Air & Waste Management Association 97th Annual Meeting*. June 2004.
13. Sattler, Melanie L. and Howard M. Liljestrang. "Chemical Mass Balance Model with Fractionation: Source Apportionment of PM 2.5." *Proceedings of the Air & Waste Management Association 96th Annual Conference*. June 2003.
14. Nagaraj, Archana and Melanie L. Sattler. "Correlating Hydrogen Sulfide Emissions with Temperature to Predict Worst-Case Odor Emissions." *Proceedings of the Air & Waste Management Association 96th Annual Conference*. June 2003.
15. Sattler, Melanie L. and Ellen T. McDonald. "Time, Temperature, and Wind Speed: The Importance of Varying Emission Rates in Odor Modeling." *Odor and Toxic Air Emissions 2002*. Air & Waste Management Association Specialty Conference. April 2002.

16. Sattler, Melanie L. "Predicting Hydrogen Sulfide Emissions from Expanded Wastewater Treatment Plants." *Odor and Toxic Air Emissions 2002*. Air & Waste Management Association Specialty Conference. April 2002.
17. Sattler, Melanie L. "Technologies for Reducing NO_x Emissions from Non-Road Diesel Vehicles: An Overview." *Proceedings of the Air & Waste Management Association 94th Annual Conference*. June 2001.
18. Sattler, Melanie L. and H. Troy Stuckey. "Planning for Air Quality Compliance in Texas: A Case Study in Local SIP Development." *Proceedings of the Air & Waste Management Association 94th Annual Conference*. June 2001.
19. Sattler, Melanie L. and Howard M. Liljestrand. "Method for Predicting Photocatalytic Oxidation Rates of Organic Compounds." *Proceedings of the Air & Waste Management Association 94th Annual Conference*. June 2001.
20. MacKay, James; Thomas, Ronald; Mai, Saadia; Rae, Scott; Ross, Charlotte; Sattler, Melanie; Schoonmacher, Scott; Sims, Mike; and Troy Stuckey. "Hierarchical Emissions Inventory Development for Nested Photochemical Modeling. Part 4: Area and Nonroad Mobile Sources." *Emissions Inventory: Living in a Global Environment '98*. Air & Waste Management Association specialty conference. December 1998.

Without Refereed Paper

21. Mattingly, Stephen P.; Sattler, Melanie L.; Bhatt, Hetal; Sumitsawan, Sulak; Pala-En, Natchanok; and Parthen Parikh. "A Model for Estimating Hydrocarbon and CO₂ Emission Reductions after Closing Drive-Thrus." 19th CRC (Coordinating Research Council) On-Road Vehicle Emissions Workshop. San Diego, March 2009.
22. Sumitsawan, Sulak; Kalidindi, Sahithi Raj; Parikh, Parthen; Sattler, Melanie; Mattingly, Stephen P.; Ladd, H. Michael; and Jim Humphreys. "School Bus Emission Testing: Retrofit Device, Combustion Chamber Conditioner, Biodiesel." American Society of Civil Engineers, Texas Section Fall 2008 Conference. Dallas, TX. October 2008.
23. Sattler, Melanie and Stephen Mattingly. "On-Road Measurement of Emissions Impact of Ethos Fuel Reformulator." 18th CRC (Coordinating Research Council) On-Road Vehicle Emissions Workshop. San Diego, March 2008.
24. Mattingly, Stephen and Melanie Sattler. "On-Road Measurement of Emissions Impact of Clean Air Catalytic Converter." 18th CRC (Coordinating Research Council) On-Road Vehicle Emissions Workshop. San Diego, March 2008.
25. Sattler, Melanie. "Transportation and Air Quality: Interdisciplinary Education." Association of Environmental Engineering and Science Professors Biennial Research and Education Conference. Potsdam, New York. July 2005.
26. Deshmukh, Namrata B. (My student – she inadvertently left my name off.) "Adsorption of hazardous air pollutants using nanoadsorbents." Preprints of Extended Abstracts presented at the ACS National Meeting, American Chemical Society, Division of Environmental Chemistry, 2005, 45(2), pp. 634-638.
27. Sattler, Melanie and Archana Nagaraj. "Correlating Hydrogen Sulfide Emissions with Time and Temperature to Predict Worst-Case Emissions." San Antonio, 2nd Bi-Annual Texas Odor & Corrosion Conference sponsored by Water Environment Association of Texas. August 2003.
28. Sattler, Melanie. "Odor Abatement Evaluation and Master Plan." March 28, 2003, Garland, Texas, Texas Association of Municipal Sewage Agencies.
29. Sattler, Melanie. "Air Stripping/Aeration System Basics." March 4, 2003. Texas A&M University, Texas Water Utilities Association's 85th Annual School.
30. H. Troy Stuckey and Melanie L. Sattler. "Air Quality Community Outreach 2000: The North Central Texas Experience" (Poster). 2001 International Conference on Future Directions in Air Quality Research, sponsored by Air Resources Research Consortium, Air & Waste

- Management Association, Mid-Atlantic Regional Air Management Association, US Dept. of Energy, US Environmental Protection Agency. February 2001.
31. Sattler, Melanie and Jack Tidwell. "Going Above and Beyond NFIP to Truly Stabilize Flood Risks: The Corridor Development Certificate Process." Floodplain Management: 2000 and Beyond - Association of State Floodplain Managers 24th Annual Conference. June 2000.
 32. Medlock, Samantha; Sattler, Melanie and Jack Tidwell. "Multiple-Objective Management Case Study: The Trinity River COMMON VISION Program." Floodplain Management: 2000 and Beyond - Association of State Floodplain Managers 24th Annual Conference. June 2000.
 33. Scott Rae; Sattler, Melanie, and Jack Tidwell. "Floodplain Mapping: State-of-the Art." Floodplain Management: 2000 and Beyond - Association of State Floodplain Managers 24th Annual Conference. June 2000.
 34. Sattler, Melanie L. and Howard M. Liljestr nd. "Rates of Photocatalytic Oxidation of Organic Compounds in Air over Titanium Dioxide." Society of Environmental Toxicology and Chemistry 17th Annual Meeting. November 1996.
 35. Sattler, Melanie L. and Howard M. Liljestr nd. "Method for Predicting Rates of Photocatalytic Oxidation of Organic Compounds in Air over Titanium Dioxide." The Second International Conference on TiO₂ Photocatalytic Purification and Treatment of Water and Air. October 1996.
 36. Sattler, Melanie L. "Photocatalytic Oxidation of Gas-Phase Compounds over Titanium Dioxide." Texas Section American Society of Civil Engineers. April 1995.

OTHER PUBLICATIONS

Sattler, Melanie L. "Technologies for Reducing NO_x Emissions from Off-Road Diesel Vehicles: An Overview." *EM*, a publication of the Air & Waste Management Association for Environmental Managers. February 2002, pp. 20-29.

Sattler, Melanie and H. Troy Stuckey. "Dallas/Ft. Worth SIP Development: A Case Study in Local Involvement." *EM*, a publication of the Air & Waste Management Association for Environmental Managers. April 2001, pp. 32-36.