

29 October 1990



**Environmental  
Toxicology**  
International, Inc.

Mr. Tom Aldrich  
ASARCO Incorporated  
Tacoma Plant  
P.O. Box 1677  
Tacoma, Washington 98401

Dear Tom:

I am delighted to hear that you might be interested in putting together a short paper for the session titled "Effective Risk Communication Methods" (P141) as part of the 84th annual meeting of the Air and Waste Management Association in Vancouver, Canada, June 16-21, 1991. I will also be a presenter during this session and it will be chaired by Megan Bailiff, Projects Director of the Combustion Research Institute, a division of ETI.

As promised, I have enclosed a copy the paper proposal form and the call for papers announcement; the paper proposal form is due 1 November 1990. This is a firm deadline, as over two hundred sessions have been proposed and those sessions which fail to receive sufficient paper proposals will be eliminated. However, my delay in getting these forms to you and my participation on the technical committee provides some leeway with regards to this deadline. For your future planning, you will be notified by 5 December 1990 of the status of your paper and, assuming the panel survives the cuts, draft manuscripts will be due 1 March 1991.

As I mentioned during our conversation, this session is being organized to provide scientists and engineers with some practical guidance on how to effectively communicate controversial issues to a concerned audience or hostile media. It is my expectation that you and the other invited speakers from government, industry, consulting and academia will share experiences with the audience, focusing on key elements of successful risk communication regarding industrial facilities. About 6,000 to 7,000 will be attending five concurrent sessions, so it will be a good-sized audience.

If you have any questions regarding the forms or the focus of your paper, please do not hesitate to contact Megan Bailiff at ETI. Thank you for you interest and enthusiasm, with your participation I think this will be a very worthwhile and informative session. I look forward to hearing your response.

Sincerely,

Kathryn E. Kelly, Dr.P.H.  
President

Plaza 600 Building  
Sixth and Stewart, Suite 700  
Seattle, WA 98101 USA  
Telephone (206) 441-6142  
Facsimile (206) 443-1812

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# Call for Papers

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On behalf of this year's Technical Program Chairman Dr. Richard A. Kester (CH2MHill) and Technical Program Co-Chairman Dr. Michael J. Pilat (University of Washington) the Air & Waste Management Association is pleased to announce its call for papers for the 84th Annual Meeting & Exhibition to be held in Vancouver, B.C., June 16-21, 1991.

Original papers for presentation at the meeting are invited on a wide range of environmental topics. A listing of the sessions tentatively approved for the meeting follows this announcement. Interested parties should select a session from the list and complete the Paper Proposal Form which is inserted in this brochure. Timely papers on subjects not listed will also be considered (see proposal form for instructions). Completed forms should be sent to:

Dave Haseleu  
Technical Program Coordinator  
Air & Waste Management Association  
P.O. Box 2861  
Pittsburgh, PA 15230

The deadline for receipt of Paper Proposal Forms at A&WMA Headquarters is **November 1, 1990**. Any proposal received after that date will be treated as an alternate only.

All proposals received will be logged in and acknowledged, then forwarded to the Technical Program Chairs and their committee for evaluation. Copies will be sent to the appropriate session chair and vice-chair as well. Final decisions on all proposals received will be made by early December. Draft manuscripts for the meeting are due by March 1, 1991, for proposals which are approved.

Please Note:

**Poster papers** on specific environmental topics are being solicited for sessions marked with an asterisk. Poster papers on miscellaneous environmental topics are also welcomed and should be proposed for session P300 (see end of list).

AIR & WASTE MANAGEMENT ASSOCIATION

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 **84<sup>TH</sup> ANNUAL  
MEETING & EXHIBITION**

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JUNE 16 - 21, 1991 ♦ VANCOUVER, B.C.

## WASTE ISSUES

### A. Management

- P25 Status of Superfund - Progress and Reauthorization
- P28 Groundwater Site Investigations for Remediation
- P30 Effective Underground Storage Tank Management Programs
- P73 Applications of Modeling to Groundwater Remediation
- P78 Transportation of Hazardous Wastes - Changing Policies in Regulatory Routing and Risk Assessments
- P80 Government Activity in Compliance Programs and in Enforcing UST Regulations
- P81 Above Ground Storage Tank Management
- P90 Hanford - A National Effort at Clean-up
- P91 Problems Faced During Site Cleanups
- P95 Case Studies of Abandoned Hazardous Waste Site Cleanups
- P96 The Modern Solid Waste Landfill: Today's Challenges & Tomorrow's Needs
- P97 Hazardous Waste Cleanups at "Operating" Facilities
- P127 Air Impacts from Superfund and Other Hazardous Waste Sites
- P134 Biomedical Waste Disposal
- P247 Landfill Gas Emissions

### B. Treatment Technologies

- P27 Groundwater Remediation Case Histories
- P29 Recent Advances in Groundwater Treatment Technologies
- P31 Mixed Waste Physical/Chemical Treatment
- P35 Full Scale Applications of Bioremediation for Hazardous Waste Treatment
- P37 Bioremediation - Emerging Technologies

### B. Treatment Technologies *continued*

- P75 Best Demonstrated Available Technology for RCRA Wastes
- P76 Treatability Testing for Physical and Chemical Treatment Technologies
- P93 Proven Soil Treatment Technologies
- P94 Innovative Soils Treatment Technologies

### C. Incineration

- P39 Impacts of New Regulations on Boilers, Furnaces, and Incinerators
- P41 Operation and Maintenance of Thermal Treatment Systems
- P65 Emerging Regulatory Framework for Mixed and Medical Waste
- P66 Emissions Monitoring and Controls for Hazardous and Mixed Waste Incinerators
- P67 Emissions Monitoring and Control Systems for MSW, Sewage Sludge and Hospital Waste Incineration
- P68 Thermal Treatment Residuals Management: Hazardous Waste/ Mixed Waste/MSW
- P69 New Thermal Treatment Technologies for Soil Remediation
- P70 Waste Stream Modification Impacts on Thermal Treatment Technology
- P71 State of the Art Treatment Technologies for Medical Waste Disposal
- P72 The Impact of New Air Regulations on the Thermal Treatment of Wastes
- P248 Design and Operation of Sludge Incineration Systems

### D. By-Products and Waste Minimization

- P74 Integrated Pollution Prevention
- P82 Alternative Methods for MSW Reduction and Recycling
- P83 Air Quality and Hazardous Waste Issues at DOD Installations

#### D. By-Products and Waste Minimization *continued*

- P84 Leaching, Transport and Fate of Chemicals from Disposed Utility Wastes
- P85 Utility Waste and By-Products Management
- P86 Industrial Waste Utilization
- P87 Pollution Prevention During New Process Development (Chemical/Electronics/Petroleum)
- P99 Toxic/VOC Control Using Recovery/ Recycling
- P162 Pollution Prevention/ Source Reduction
- P207 Product Life Cycle and Environmental Impacts
- P234 Multimedia Waste Reduction: Impediments and Solutions

#### AIR ISSUES

##### E. Atmospheric Science and Modeling

- P6 Measurement of Highway Emission
- P9 Navajo Generating Station Experiment
- P10 Urban Visibility
- P11 Recent Visibility-related Measurements in the Eastern U.S.
- P12 Regional Visibility Regulations
- P13 Recent Developments in Visibility Monitoring, Modeling and Perception
- P14 Air Toxics - Cross Media Transfer and Innovative Control Technology
- P21 Toxic Organic Deposition
- P44 Advances in and new Applications of Receptor Modeling
- P45 Recent Developments In Atmospheric Dispersion Modeling
- P48 Meteorology in Monitoring and Field Studies
- P107 Use of Fine Particulate Data in Source Apportionment

##### E. Atmospheric Science and Modeling *continued*

- P108 Fine Particulate Sampling Artifacts
- P110 Characterization of Acid Aerosols
- P113 Modeling of Air Toxics & Accidental Chemical Releases
- P114 Air Quality Issues in Complex Terrain
- P116 Emissions and Dispersion Modeling: New Developments for Accidental and Non-Traditional Releases
- P117 Visibility Modeling and Data Interpretation Issues
- P118 Monitoring of Meteorological Parameters: Issues & Solutions
- \* P122 New Developments in Ambient Samplers: Prototype Display and Demonstrations  
\* Poster Paper Session
- P138 Trace Elements Emissions from Coal Fired Power Plants
- P149 Fugitive Emissions from Secondary Waste water Treatment Sources
- P168 Wilderness and Air Resource Management
- P181 Path Integrated Ambient Air Monitoring: Application and Data Usage
- P183 Air Toxics/ VOC Emission Inventories and Emission Factors
- P196 Estimating Emission Changes from Transportation Control Measures
- P201 Air Toxics/VOC's in Terrestrial Ecosystems
- P204 Air Toxic Emissions from Waste Water Treatment Plants - Policy, Regulation and Strategies
- P205 Air Toxics Measurement and Estimating Emissions from Wastewater Treatment Plants
- P212 Air Toxics Monitoring; Data Quality & Analysis
- P213 Fugitive Sources of Air Toxics
- P214 Practical Experiences in Ambient Air Toxic Monitoring and Analysis

## E. Atmospheric Science and Modeling *continued*

- P217 State Air Toxics Initiatives Experience
- P220 Air Toxics Emissions and Health Risks from Mobile Sources
- P242 Dust Suspension Chambers: Design Considerations and Field Applications
- P243 Hazardous Air Pollutant Source Emission Test Methods for Title III CAA Amendments

## F. Indoor Air Quality

- P7 Research Technology Advancements to Improve Efficiency and Emissions from Residential/Commercial Appliances
- P17 Moisture and Indoor Air Quality Control In Cold Climates
- P18 Advances in Measurement and Control of Radon
- P19 Environmental Tobacco Smoke - Control & Abatement
- P120 Indoor Air Quality Modeling, Verification and Monitoring

## G. Ozone

- P16 Advances in Low Pollution Coatings for Ozone Control
- P46 Ozone Modeling and Chemistry
- P98 Enhanced Enforcement in Nonattainment Areas
- P115 Photochemical Modeling & Meteorological Aspects of the Ozone Non-Attainment Problem
- P216 The Ambient Air Quality Standard for Ozone: Forms and Function
- P229 Atlanta Ozone Precursor Study
- P230 Field Studies in Support of Ozone SIP Development
- P240 Ozone Attainment Problems

## G. Ozone *continued*

- P251 San Joaquin Valley Air Quality Study with AUSPEX - Planning, Overviews and Goals (Part I)
- P252 San Joaquin Valley Air Quality Study with AUSPEX - Planning, Overview, and Goals (Part II)
- \* P253 San Joaquin Valley Air Quality Study with AUSPEX - Technical Support Studies for Project Planning \* Poster Paper Session

## H. Deposition

- P1 Atmospheric Deposition Cross-Media Transfer of Air Toxics
- P23 Atmospheric Deposition: Measurement, Modeling and Source-Receptor Relationships

## I. Control, Operations, Strategies

- P5 Alternative Fuels and Fuel-Blends - International Experience
- P15 Developments in Wood Dryer Emission Control Technology
- P101 Upgrading Equipment & Maintenance Procedures to Meet the Revised Clean Air Act
- P102 Recent Advances in Clean Coal Technology
- P103 Control Technology for Air Toxics
- P140 Strategies for NOx Control from Gas Turbines and Boilers
- P151 Performing Evaluation Studies of Existing Emission Control Systems - Operation and Implementation Errors
- P176 Stationary Source Inspection Procedures
- P198 Advanced VOC and Odor Control Methods for Industrial and Municipal Sources
- P199 Chemistry and Modeling of Emissions from Alternative Fuels and Reformulated Gasoline

## I. Control, Operations, Strategies

- P202 Catalytic Controls: New Developments & Recent Operating Experience
- P203 VOC Emission Control Technology
- P231 A "QUALITY" Approach to Environmental Issues
- P237 VOC Emission Controls from Wastewater Treatment Facilities
- P250 Automotive Air Pollutant Emission Control Technology

## ENVIRONMENTAL MANAGEMENT ISSUES

### J. Management

- P49 Information Resources: Knee Deep and Rising
- P51 Hazardous Waste Control in the Non-Ferrous Industry
- P55 Transportation Demand Controls: An International Perspective
- P100 Risk Management and Prevention from Acutely Hazardous Material Releases
- P125 Environmental Issues in the Iron & Steel Industry
- P135 Energy Usage, Global Climate Change, and the Utility Industry
- P137 Using Decision Analysis to Help Manage Environmental Decisions in the Utility Industry
- P152 Multimedia Exposure to Lead
- P185 International Experience: Pollution Prevention
- P186 Overview of Environmental Pollution in Eastern Europe
- \* P189 Public Information/ Education Tools  
\* Poster Paper Session
- P191 Multimedia Exposure Monitoring and Assessment at Superfund Sites and Hazardous Waste Sites

### J. Management *continued*

- P192 Update on Organic and Metals Emissions from Cement Kilns
- P193 The Acid Rain Title of the Clean Air Act Amendments: The Electric Utility Perspective
- P194 Reducing Industrial/Transportation Emissions through Electrotechnologies
- P195 Data Analysis Techniques and Application
- P197 Microcomputer Applications Including Expert Systems
- P224 Environmental Job Market Crisis
- P227 Environmental Audits - Value as A Management Tool
- P241 Environmental Assessments - Concepts and Case Studies

### K. Global Management

- P47 Global Climatic Change: International Mitigation Perspective
- P144 Ecological Implications of Global Climatic Change
- P175 Emission Estimate for Global Climate Studies
- P184 Residential Biomass Combustion Mitigate the Greenhouse Effect
- P215 Global Climate Change Effects on Vegetation: Methods of Assessment
- P254 Global Climate Change: Response and Feedbacks from Terrestrial Biosphere

### L. Effects

- P8 The Urban Crisis: Community Noise
- P52 U.S. EPA Integrated Air Cancer Project
- P105 Recent Developments in Assessing the Health and Environmental Effects of Incineration Facilities
- P139 Electromagnetic Fields and Human Health - State of Science

## L. Effects *continued*

- P142 Ecological Effects of Air Pollutants
- P143 Pacific Northwest Ecological Issues
- P177 Community Exposure to Naturally Occurring Asbestos Deposits
- P182 Materials Damage - Impact on the Community
- P187 Woodsmoke Exposure and Human Health Impacts
- P188 Exposure and Health Effects of Chemical Mixtures
- P218 Air Pollution and Wilderness Areas: The Ozone Dilemma
- P221 Recent Developments in Carbon Monoxide Exposure Patterns and Health Effects of Moderate Concentrations
- P222 Recent Developments in Applying Animal Models to Evaluating Human Health Effects
- P232 Odor Control Technology Applications - Part I
- P233 Odor Control Technology Applications - Part II

## M. Toxic Chemicals

- P156 SARA Section 313 - What Are Its Impacts
- P159 Successes and Failures in Reducing the Risk of the Accidental Release of Hazardous Chemicals
- P166 New Requirements of the Clean Air Act Pertaining to Accidental Releases
- P167 Air, Water and Soil Detection and Monitoring of Releases for Emergency Response
- P246 Pesticides and Herbicides

## N. Legal, Regulatory & Public Issues

- P53 Market Incentives to Control Pollution and Reduce Environmental Risk
- P129 Frontier Justice - Superfund Liability Issues

## N. Legal, Regulatory & Public Issues

- P132 Consultant Liability
- P133 Guilty Without Intent: Criminal Enforcement of Environmental Laws
- P141 Effective Risk Communication Methods (Incineration)
- P147 Advances In Risk Assessment: Impact of Alternative Assumptions on Risk Decisions
- P148 Small Business-Big Polluter: Special Programs to Increase Environmental Compliance Among Small Businesses
- P153 Status of Air Toxic Policy, Regulation, and Strategies Throughout North America
- P170 Applications of Risk Assessment to Contaminated Sediments and Wetlands
- P171 Apportioning Sources of Environmental Risk
- P172 Personal Exposures to Air Pollutants and Their Application to Risk Assessment
- P174 Alternative Approaches to Non-Cancer Health Risk Assessment
- P208 Contaminated Site Remediation
- P209 Hazardous Waste Management in Canada
- P210 The Use of Mediation Processes in Hazardous Facility Location
- P211 Air Quality Issues in Canada
- P239 Canada's Waste Minimization Program
- P257 CAA Amendments (Title II) - Mobile Sources
- P258 CAA Amendments (Title III) - Air Toxics-MACT Technology-Based Controls
- P259 CAA Amendments (Title IV) - Acid Rain Pre-cursor Controls/ Emission Trading
- P260 CAA Amendments (Title V) - Site Permitting Requirements
- P262 CAA Amendments - Ambient Monitoring Implications

N. Legal, Regulatory & Public Issues *continued*

P263 Prescribed Fire: Planning & Policy Issues

**P300 General Poster Sessions**

**A poster paper on any timely environmental topic may be proposed for these sessions. (The total number of sessions scheduled will be determined by the number of proposals received and the amount of space available on site.)**



# PAPER PROPOSAL FORM

AIR & WASTE MANAGEMENT ASSOCIATION

 84<sup>TH</sup> ANNUAL

MEETING & EXHIBITION

JUNE 16-21, 1991 ♦ VANCOUVER, B.C.

Technical Program Chairman  
Dr. Richard A. Kester, CH2M Hill  
Technical Program Co-chairman  
Dr. Michael J. Pilat, U. of Washington

## To the prospective Author:

Before proposing a paper please be aware of the following:

- If your paper proposal is approved by the Technical Program Committee you will be expected to provide A&WMA Headquarters with a completed draft manuscript on or before March 1, 1991.

- A&WMA's Board policy stipulates that all authors and speakers who attend the Annual Meeting must register for the conference and pay the appropriate registration fee.

## Instructions:

1. Examine the list of sessions tentatively approved for this year's Annual Meeting (it accompanies this form). Select one for which your proposal is appropriate. Enter its 'P-number' in the space provided below. You may enter a second choice if more than one session title seems appropriate.

2. If you cannot find a suitable session on the list check the box below marked 'Other' and provide a topic that accurately categorizes your proposal.

3. Carefully fill in the remainder of the form. Be sure to provide all requested information. PRINT or TYPE legibly.

4. Send your completed form to: Dave Haseleu  
Technical Program Coordinator  
Air & Waste Management Association  
P.O. Box 2861  
Pittsburgh, PA 15230

**This form must be received at A&WMA Headquarters by November 1, 1990.**

(Any paper proposal received after this date will be treated as an alternate. It will be considered only if an appropriate session has failed to accumulate enough regular paper proposals to remain viable.)

## Paper is proposed for session:

(Please enter session number below)

P 141 (1st choice)

P \_\_\_\_\_ (2nd choice)

Other \_\_\_\_\_

## Paper is:

Unsolicited

Solicited

By: Kathryn E. Kelly

I certify that the paper described on this form will represent either the first publication of original material or an original compilation or review of information from a number of sources (specifically referenced by footnotes and/or a bibliography). I also certify that the proposed paper is not a commercial endorsement.

initials: \_\_\_\_\_ Date: \_\_\_\_\_

(OVER)