ISES-ISEE 2018
JOINT ANNUAL MEETING
PROGRAM

2018 ISES-ISEE
JOINT ANNUAL MEETING

OTTAWA-CANADA
26-30 AUGUST

Addressing Complex Local and Global Issues in Environmental Exposure and Health

www.isesisee2018.org

MEETING-AT-A-GLANCE

Time	Sunday 26-Aug	Monday 27-Aug	Tuesday 28-Aug	Wednesday 29-Aug	Thursday 30-Aug
7:00 am - 8:00 am		Morning Workshops	Morning Workshops	Morning Workshops	
8:00 am - 8:30 am					
8:30 am - 9:00 am		Plenary	Plenary	Plenary	90 m Oral
9:00 am - 9:30 am	Pre-Conference Courses				
9:30 am - 10:00 am		60 m Oral	75 m Oral	60 m Oral	
10:00 am - 10:30 am					Break
10:30 am - 10:45 am		Posters & Break	Posters & Break	Posters & Break	90 m Oral
10:45 am - 11:00 am					
11:00 am - 11:15 am		90 m Oral		90 m Oral	
11:15 am - 11:30 am			75 m Oral		
11:30 am - 12:00 pm					
12:00 pm - 12:15 pm					Closing Remarks & Awards Ceremony
12:15 pm - 12:30 pm					
12:30 pm - 1:00 pm	ISES & ISEE Board Meetings (Closed)	Lunch & Student Poster Competition	Lunch & Poster Viewing	Lunch & Poster Viewing	
1:00 pm - 1:30 pm	Pre-Conference Courses				
1:30 pm - 2:00 pm					Optional Excursions & Ancillary Workshops
2:00 pm - 2:15 pm					
2:15 pm - 2:30 pm		90 m Oral	90 m Oral	90 m Oral	
2:30 pm - 3:00 pm					
3:00 pm - 3:30 pm					
3:30 pm - 3:45 pm					
3:45 pm - 4:00 pm		Posters & Break	Posters & Break	Posters & Break	
4:00 pm - 4:15 pm					
4:15 pm - 4:30 pm		75 m Oral	75 m Oral	75 m Oral	
4:30 pm - 5:00 pm					
5:00 pm - 5:30 pm					
5:30 pm - 5:45 pm	Welcome & Opening Plenary				
5:45 pm - 6:00 pm			ISES & ISEE Annual General Membership Meetings	Technology and Sensor Fair & Chapters and Committees Fair	
6:00 pm - 6:30 pm		Women's Networking Event			
6:30 pm - 6:45 pm	Welcome Reception & Student Poster Competition				
6:45 pm - 7:00 pm					
7:00 pm - 7:30 pm			Conference Dinner		
7:30 pm - 8:00 pm				Joint ISES-ISEE SNR Networking Happy Hour!	
8:00 pm - 8:30 pm					
8:30 pm - 9:00 pm					
9:00 pm - 9:30 pm					
9:30 pm - 10:00 pm					
10:00 pm - 10:30 pm					
10:30 pm - 12:00 am					

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WELCOME FROM THE CO-CHAIRS

Dear Friends and Colleagues,

We are delighted to welcome you to the 2018 Joint Annual Meeting of the International Society of Exposure Science and the International Society for Environmental Epidemiology (ISES-ISEE 2018) in Ottawa, Ontario, Canada! Ottawa provides an historic and picturesque setting for this conference, where the meeting of many cultures serves as a reminder of the value in bringing together diverse perspectives to tackle complex issues.

Markey Johnson, Co-Chair
Health Canada, Ottawa, ON, Canada

ISES-ISEE 2018 gathers experts and new researchers from around the world to engage in cross-disciplinary discussions under the theme "**Addressing Complex Local and Global Issues in Environmental Exposure and Health.**" The scientific program includes over 1900 oral presentations and posters representing the diverse issues, disciplines, and methods that comprise environmental exposure and health research.

Just as cross-cutting disciplines enrich exposure science and environmental epidemiology, so do the contributions of researchers from different backgrounds and regions enhance the caliber of science conducted in these fields. ISES-ISEE 2018 welcomes attendees from over 68 countries; and we are proud to provide travel awards to 64 scientists from 30 countries. We hope that you will take the opportunity this week to reach out to fellow scientists, and enrich your understanding of the complex interactions that exist between the environment, exposure, and health.

Angelika Zidek, Co-Chair
Health Canada, Ottawa, ON, Canada

The program features numerous activities and events to promote networking and dialogue. The Welcome Reception, Student Poster Competition, Technology and Sensor Fair, and Chapters and Committees Fair are open to all attendees; and the Joint ISES-ISEE Student and New Researcher (SNR) Networking Happy Hour is open to all SNR attendees. The 2018 Women's Networking Event (WNE) marks the 5th anniversary of the inaugural ISES event, and the first WNE held with ISEE. ISES and ISEE chapters and committees have also organized events throughout the week to discuss mentorship, harassment, and local issues. Last but not least, the conference offers a variety of social activities and excursions ranging from the research incubator to white water rafting.

Audrey Smargiassi, Co-Chair
Université de Montréal, Montreal, QC, Canada

All program activities are detailed in the electronic App, developed as part of our efforts to reduce the footprint of the conference. Other green initiatives include the selection of a Gold Certified Leadership in Energy and Environmental Design facility for our conference venue, the "Make a Green Choice" program offered by Ottawa Westin, the emphasis on local and sustainable food in the conference menus, and the collection of carbon offset donations during online registration.

We could not have achieved our many goals for the meeting without the support, enthusiasm, and hard work of our Technical Organizing Committee (TOC). Over 120 TOC members from government, academia, the private sector, and NGOs worked tirelessly to organize every facet of ISES-ISEE 2018. We also thank the scientists who contributed to the conference program, as well as the course instructors, student volunteers, sponsors and exhibitors, Congress by Design, and the leadership of ISES and ISEE. Because of your support, ISES-ISEE 2018 is the largest, and one of the most globally representative, meetings of ISES and ISEE.

Veronica Vieira, Co-Chair
University of California, Irvine, CA, U.S.A.

We hope the diverse offerings of the ISES-ISEE 2018 conference will inspire new collaborations and research ideas for addressing complexity in environmental exposure and health research.

Thank you for coming to Ottawa – we hope you have a great meeting!

Markey, Angelika, Audrey, and Veronica, ISES-ISEE 2018 Co-Chairs

WELCOME FROM THE PRESIDENTS

It is our honor and great pleasure to welcome you on behalf of the International Society of Exposure Science and International Society for Environmental Epidemiology to the annual conference in Ottawa, Canada. Ottawa is the political center of Canada, along with being considered a wonderful place to live. This conference is being held in the city with the highest standard of living in Canada and encourages us to reflect on the kind of sustainable practices we can research, embrace, and help implement in cities around the world to generate the environmental quality of life that Ottawans enjoy. The city of Ottawa will no doubt inspire our participants with its beauty and ample possibilities for exploration and discovery. It is the perfect setting to engage into this year's conference focus "Addressing Complex Local and Global Issues in Environmental Exposure and Health" in the areas of science, politics, and community organizing.

This year's conference marks a milestone of extremely high participation of members from both Societies and will provide unique opportunities for communication and organizing among members of both Societies as they participate in many different activities to promote interdisciplinary scientific, and of course social, exchange. The conference will offer chances to connect and learn with colleagues from around the world in a place where some of the biggest challenges towards sustainable environmental practices are already being actively negotiated.

We hope to see you all at our annual membership meetings as well as the Chapters and Committees Fair to which everyone is invited, and the student and new researcher meet-ups that will promote mentorship and peer-to-peer communication amongst our many disciplines and practitioners. We are certain that the wide range of activities and topics of this conference will allow for a rich atmosphere of dialogue and debate, from panels on sustainability and technology to the Women's Networking Event and dinners. In the past year, ISEE engaged strategically in capacity building and the newly formed Africa Chapter is the latest success of this effort. Similarly, ISES has two new chapters: one in the U.S. (California) and the other in Europe.

Judy S. LaKind

Every annual meeting requires a phenomenal amount of blood, sweat and (perhaps) tears from the meeting co-chairs. Many thanks to Veronica Vieira, Audrey Smargiassi, Angelika Zidek and Markey Johnson for chairing this year's conference. Their leadership, along with the hardworking Technical Organizing Committee, numerous reviewers and organizers of symposia and the generosity of sponsors, together have made this conference possible. We are excited about the record number of participants from both of our organizations. This attests to the commitment of our members to research and policy work that contributes towards healthier societies and environments around the world. Let us use this meeting to strengthen our networks and build or maintain connections across disciplines and continents and make this event one more stepping stone towards a truly sustainable future on a livable planet.

Beate Ritz

Judy S. LaKind, PhD
ISES President

Beate Ritz, MD, PhD
ISEE President

GREENNESS AND SUSTAINABILITY

To minimize the environmental impact of the ISES-ISEE 2018 Joint Annual Meeting, we endeavored to promote environmentally friendly choices throughout conference planning.

The conference venue, Shaw Centre, has demonstrated a strong commitment to sustainability and eco-friendly business practices. The Shaw Conference Centre is a Gold Certified Leadership in Energy and Environmental Design facility, and was the first Canadian Founding Industry Member of the Convene Green Alliance. The centre uses regionally manufactured and recycled materials to reduce transportation emissions; as well as low VOC carpets, paints, and building materials to reduce indoor emissions. The roof is highly reflective to minimize urban heat island effects. The centre uses low flow plumbing to reduce water consumption, a cistern system to provide recycled water for toilets and irrigation, an advanced collection and sorting program to reduce waste, and a green housekeeping and maintenance program. The Shaw Centre's environmental commitment also extends to meal preparation. The menu emphasizes local, regional, organic, and sustainable ingredients; condiments are served in non-disposable containers; and surplus food is donated where permissible.

In addition to choosing an eco-friendly venue, we reduced the environmental impact of ISES-ISEE 2018 by using an electronic App to host the conference program; offering cooler bags and luggage tags made from recycled materials as our giveaway items; and emphasizing local and sustainable menu items for all conference events, including the Conference Dinner and Women's Networking Event. In addition, the official conference hotel, Ottawa Westin, will plant a tree if you opt to "Make a Green Choice" when you check in.

The host city for ISES-ISEE 2018 provides an eco-friendly and accessible location. Ottawa boasts a 203.5 square kilometer (78.6 square miles) Greenbelt that encircles the city from east to west, and is the most ecological diverse area in eastern Ontario. Ottawa is highly walkable, with most tourist attractions within a 20-minute walk from the conference centre and downtown hotels. Ottawa is also bicycle friendly with 600 kilometres (373 miles) of bike paths in the city, including scenic routes along banks of the Ottawa River and the Rideau Canal connecting the downtown area. Conference attendees can sign up for excursions to explore the city by bicycle at the registration desk or online at: https://isesisee2018.org/social-program. Ottawa also has an extensive public transportation system including buses, light rail, and water taxis, which provide a scenic trip between downtown hotels and tourist attractions.

Finally, we're pleased to announce that ISES-ISEE 2018 attendees provided over $6,500 CAD to fund carbon offsets during conference registration, helping to mitigate the meeting's greenhouse gas emissions, and making the conference a Climate Friendly Event with Offsetters. Three weeks before the event, 277 tonnes were offset by these donations. This is the equivalent of removing approximately 59 cars from the road for a year. You can learn more about the projects we've supported here: www.offsetters.ca/project-services/offset-projects/by-portfolio/general.

We'd like to extend our sincere thanks to all of the conference attendees who purchased carbon offsets, the ISES-ISEE 2018 Sustainability, Eco, and Green Committee who led the carbon offsetting initiative, and all of our local partners and vendors, for helping us to host a green meeting!

SCIENTIFIC PROGRAM OVERVIEW

PLENARY SESSIONS

Sunday, August 26, 2018, 5:30 pm – 6:30 pm
Welcome & Opening Plenary
Keynote by Paul Demers, *The Role of Occupational Studies in Expanding Our Knowledge of Environmental Carcinogens*

Monday, August 27, 2018, 8:30 am – 9:30 am
Keynote by Gina McCarthy, *Climate Change: The Greatest Public Health Challenge of Our Time*
Keynote by Maria Neira, *WHO Global Strategy on Health, Environment and Climate Change*

Tuesday, August 28, 2018, 8:30 am – 9:30 am
Keynote by Eriel Deranger, *The Health of the Land and Our Culture: Indigenous Rights as Pathways to Healthy Environments*
Keynote by Shoji Nakayama, *How Can Birth Cohort Studies Contribute to Knowledge and Policies of the World to Reduce Risks of Emerging Contaminants?*

Wednesday, August 29, 2018, 8:30 am – 9:30 am
Keynote by Petros Koutrakis, *2018 ISES Excellence in Exposure Science Awardee*
Keynote by Mark Nieuwenhuijsen, *2018 ISEE John Goldsmith Awardee*

Thursday, August 30, 2018, 12:00 pm – 1:00 pm
Closing Remarks & Awards Ceremony

SUNDAY, AUGUST 26, 2018

9:00 am | 12:00 pm	**PC01A.** Big Data, Machine Learning Techniques to Investigate Health Effects in Environmental Health Studies R201	**PC02A.** Consumer Exposure Modeling for Human Health Risk Assessment: Advanced Tools R202	**PC03.** Bayesian Methods for Environmental Health Researchers R204	**PC04.** Application of New Approach Methodologies for Exposure Assessment and Prioritization: Tools for Researchers and Regulators Including Use of Quantitative Structure Use Relationships (QSUR) R209	**PC05.** Model-Based Geostatistics and Spatial Epidemiology: A Practical Introduction with R R210
1:00 pm | 4:00 pm	**PC01B.** Big Data, Machine Learning Techniques to Investigate Health Effects in Environmental Health Studies R201	**PC02B.** Consumer Exposure Modeling for Human Health Risk Assessment: Advanced Tools R202	**PC06.** Predicting Microscale Urban Features Using Street-Level Images: An Introduction to Machine Learning R204	**PC07.** Causal Inference Foundations and Applications in Environmental Health Sciences R209	**PC08.** Advanced Modelling Techniques for Time Series Analysis Using R R210

MONDAY, AUGUST 27, 2018

9:30 am | 10:30 am	**S01.01K.** Novel Methods for Assessing Complex Exposure Mixtures in Environmental Epidemiology CAN1	**S01.01A.** Addressing Complex Local and Global Issues in Environmental Exposure and Health: Addressing the Health of Children and Adolescents R201	**S01.01J.** Multi-Response and Multi-Pollutant Models for Environmental Exposure and Health: From Gap-Filling to Decorrelating Structure in Data R202	**S01.01F.** Complex Rural Exposures and Health R203	**S01.01I.** Mobilizing Data for Healthy Environments: Platforms Facilitating Health and Environmental Exposure Linkage R204
	S01.01D. Bronchiolar and Interstitial Lung Disease by Occupational and Environmental Exposure: Their Implication and Future Task to be Solved for Health Protection R205	**S01.01C.** Air Pollution Exposure and Metabolomics R206	**O01.01A.** Chemical Exposures and Fish Consumption R207	**S01.01B.** Air Pollution and Physical Activity: Environmental Health Perspective R208	**S01.01H.** Harmonization of Biomonitoring Measurements: Approaches Used by Laboratory Networks in Canada, Europe and the United States R209
	O01.01B. Occupational Exposures and Respiratory Outcomes R210	**S01.01E.** Climate, Air Pollution, and Environmental Health in Africa - Part 1 R211	**S01.01G.** Evaluating High-Throughput New Approach Methods (NAM) for Exposure R212		
11:00 am | 12:30 pm	**S01.02C.** Investigating Chemical Constituents and Exposure Potential in Recycled Tire Crumb Rubber Infill Used in Playing Fields and Playgrounds: State, Federal, and International Governmental Perspectives CAN1	**O01.02E.** Environmental Exposures and Adult Health Outcomes R201	**O01.02C.** Characterizing near Road and Point Sources of Air Pollution R202	**O01.02G.** Exposures in Contaminated Communities and Children's Health R203	**S01.02A.** Advances in Air Pollution Exposure Assessment for Population Health Studies in Low and Middle Income Countries: Insights from India and Beyond R204
	O01.02A. Cancer and the Environment R205	**O01.02H.** Neurodevelopmental Outcomes Associated with Perinatal Exposure to Air Pollution R206	**O01.02I.** New Policy Directions in Exposure Assessment & Environmental Epidemiology R207	**S01.02D.** Sound Off for Environmental Noise Research: Milestones in Exposure Assessment and Health Evidence R208	**S01.02B.** High-Resolution Metabolomics: A Platform Linking the External and Internal Environment R209
	O01.02B. Cardiopulmonary Outcomes Associated with Long Term Exposure to Air Pollution R210	**O01.02D.** Climate and Health R211	**O01.02F.** Exposures and Health Impacts of Perfluorinated Substances R212		
2:15 pm | 3:45 pm	**O01.03E.** Environmental Exposures and Birth Outcomes CAN1	**S01.03A.** Effects of Prenatal Exposure to Environmental Neurotoxicants on Health and Neurodevelopment R201	**S01.03C.** High Resolution Air Pollution Mapping: Translating Data to Action R202	**O01.03F.** Natural Environment and Health R203	**O01.03H.** Panel Studies of Air Pollution, Inflammation, COPD, and Lung Function R204
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Scientific Program Overview - Continued

TUESDAY, AUGUST 28, 2018

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	O02.01C. Methods in Occupational Exposure Assessment R205	**O02.01A.** Air Pollution and Diabetes R206	**S02.01B.** Contaminant Exposures in Indigenous Communities: Tribal Research Avenues and Health Effects R207	**S02.01F.** Healthy Climate Solutions: What is the Evidence for Health Benefits of Climate Change Mitigation Strategies? R208	**O02.01E.** Understanding Early Life Exposures and Nutritional Health through the Exposome R209
	O02.01B. Air Pollution Related Hospitalization, Mortality, and Life Expectancy R210	**S02.01E.** Fluoride Exposure and Health Outcomes in North America R211	**S02.01G.** New Approaches for Environmental Health Impact Studies: Assessing Human Health Risks from Chemical and Non-Chemical Stressors R212		
11:15 am | 12:30 pm	**S02.02C.** Monitoring versus Modeling PM 2.5 Concentrations: Does it Matter for Air Pollution Health Effects? CAN1	**O02.02F.** Lead Exposure and Health Effects Across the Lifespan R201	**O02.02A.** Advances in Ambient Air Pollution Modeling - Part 1 R202	**S02.02H.** Exploring Current Worker Exposure Tools and Their Capability to Support Risk Evaluations of Chemicals under Amended TSCA R203	**O02.02E.** Household Environmental Risk Factors and Health R204
	S02.02A. E-Waste: A Growing Global Problem and Next Steps R205	**S02.02D.** Opportunity to Accelerate Knowledge on Complex Developmental Chemical Exposures and Child Health: Environmental Influences on Child Health Outcomes (ECHO) R206	**S02.02E.** Solutions for Tackling the Link between Complex Exposures and Human Health R207	**S02.02F.** The Complexity of Microbiomes for Exposure Science R208	**S03.04B.** Consensus Modeling of Chemical Exposure R209
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	O02.03C. Exposure and Health Effects Related to Waste R205	**O02.03I.** Source-Specific Air Pollution Exposures and Health R206	**S02.03C.** Fossil Fuels, Environmental Epidemiology, and the 2008 UN Declaration on the Rights of Indigenous Peoples (UNDRIP) R207	**O02.03G.** Noise Effects - Part 1 R208	**S02.03D.** The European Human Biomonitoring Initiative HBM4EU: Harmonizing Exposure and Health Risk Assessment in Europe to Support Science and Policy R209
	O02.03D. Exposure Assessment, Susceptibility, and Demographic Factors in Studies of Air Pollution Mediated Mortality R210	**O02.03B.** Effects of Temperature - Part 1 R211	**S02.03A.** Advances in Assessment of Dermal Exposures and Absorption R212		
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Scientific Program Overview - Continued

WEDNESDAY, AUGUST 29, 2018

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	S03.01B. Environmental Exposures and Breast Cancer across the Life-Course: Interdisciplinary Collaborations to Stimulate New Research Approaches, Improve Exposure Assessment during Critical Windows, and Accelerate the Translation of Research Findings into Disease Prevention R205	**S03.01I.** Translating Scientific Evidence about near Source Traffic Pollution into Policy and Practice R206	**O03.01D.** Environmental Disasters and Climatic Events R207	**S03.01F.** NASA Applications for Public Health and Air Quality Models and the Translation of Research into Policy and Other Decision Making R208	**O03.01C.** Impacts and Evaluation of Arsenic Exposures R209
	O03.01B. Estimating Exposures and Health Outcomes Associated with Wildfire Smoke R210	**S03.01G.** Novel Methods for Assessing Exposure to Temperature and Its Health Effects R211	**S03.01H.** Science and Action for Safer Materials and Products R212		
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	O03.02D. Geographic Location and Cancer R205	**O03.02B.** Air Pollution, Fetal Growth, and Birth Outcomes R206	**O03.02G.** The Influence of Chemical Exposures on Vulnerable Populations R207	**S03.02C.** Environmental Justice and Women's Health R208	**S03.02D.** Omics in Environmental Epidemiology for Understanding Current Environmental Health Issues R209
	O03.02A. Air Pollution, Atherosclerosis, and Cardiovascular Disease R210	**O03.02H.** Water Contaminants and Their Effects R211	**O03.02F.** New Advancements in Consumer Exposure Risk Assessment R212		
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	O03.03D. Cancer Epidemiology R205	**O03.03C.** Air Pollution, Obesity, and Metabolic Disease R206	**O03.03E.** Chemical Exposures in Vulnerable Populations R207	**S03.03A.** Filling in the Gaps: Maximizing Data Linkages to Enhance Environmental Health Studies R208	**S03.03D.** The Benefit of Sharing Data for Unravelling the Complex Issue of Combined Exposures to Multiple Chemicals and Their Effects to Humans and the Environment and in Support of Policies in EU and Globally: The European Information Platform for Chemical Monitoring (IPCHEM) R209
	S03.03C. Milestones in Air Pollution Epidemiology: A Symposium in Honour of Dr. Richard T. Burnett R210	**S03.03E.** Transforming Air and Water Quality Research into Concrete Actions R211	**O03.03B.**. Advancing Exposure Methodology through Suspect Screening and Non-Target Analysis R212		
4:15 pm | 5:30 pm	**O03.04C.** Multiple Exposures and Development CAN1	**S03.04D.** Exposure to Pesticides and Heavy Metals in the African Context: Electronic Waste, Artisanal and Small-Scale Mining, and Indoor Residual Spraying R201	**O03.04A.** Characterizing Long Term Trends in Air Pollution Using Stationary and Low Cost Monitoring R202	**O03.04D.** Social and Environmental Determinants and Health - Part 1 R203	**S03.04G.** The NIH PRISMS Program: Informatics Systems for Pediatric Asthma Research with Integrated Sensor-Based Exposure, Context and Health Monitoring R204
	S03.04H. Women at Work: How Exposed Are They? R205	**O03.04B.** Health Outcomes Associated with Perinatal Exposure to Air Pollution R206	**S03.04A.** Chemical Policy in the 21st Century: Comparing Canadian, U.S., European and Asian Approaches R207	**S03.04E.** Exposure, Vulnerability, and Capacity Assessment for Health Risks of Climate Change: Measuring and Communicating the Effectiveness of Interventions and Policy Responses R208	**S03.04F.** Exposures to Emerging Trace Elements R209
	S03.04C. Effects of Long-Term Exposure to Ambient Air Pollution in the Asia-Pacific Region R210	**O03.04E.** Society Presidents' Call for Discussion: Intersection of Epi, Exposure and Decision-Making: Data Quality for Public Health Protection R211	**S02.02B.** Exposure and Risk Assessment of Chemicals in Consumer Articles R212		

Scientific Program Overview - Continued

THURSDAY, AUGUST 30, 2018					
8:30 am | 10:00 am	**O04.01D.** Health Outcomes and Biomarkers Associated with Household Cooking and Biomass Burning - Part 2 CAN1	**O04.01G.** Noise Effects - Part 2 CAN2	**S04.01A.** Neuroimaging in Studies of Children's Environmental Health R201	**S04.01B.** The Impact of Long-Range Wildfire Smoke Plumes on Air Quality and Health R202	**O04.01B.** Climate and Temperature Effects R203
	O04.01E. Investigating Exposures to PAHs R204	**O04.01F.** New Methods and Novel Matrices in Chemical Monitoring R209	**O04.01A.** Simulation, Scenario, and Policy Modeling of Air Pollution Emissions and Health R210	**O04.01C.** Exposures and Effects in Communities R211	**O04.01H.** PFAS and Metabolic Function R212
10:30 am | 12:00 pm	**O04.02F.** New Methods, Models and Tools in Chemical Exposure Estimation CAN1	**O04.02B.** Effects of Temperature - Part 2 CAN2	**O04.02E.** Neurodevelopment in Children R201	**S04.02A.** Innovation in Community-Based Assessment of Residential Wood Smoke Exposure, Health and Solutions R202	**O04.02D.** Greenness Effects-Part 3 R203
	O04.02A. Building Ventilation and Indoor Air Quality: Monitoring, Intervention, Risk Assessment, and Benefits Analysis R204	**O04.02C.** Global Trends in Human Biomonitoring R209	**O04.02H.** Air Pollution Accountability and Quasi Experimental Studies R210	**O04.02I.** Social and Environmental Determinants and Health - Part 2 R211	**O04.02G.** PFAS and Other Health Outcomes R212

CAN1 Canada Hall 1

CAN2 Canada Hall 2

R201 Room 201

R202 Room 202

R203 Room 203

R204 Room 204

R205 Room 205

R206 Room 206

R207 Room 207

R208 Room 208

R209 Room 209

R210 Room 210

R211 Room 211

R212 Room 212

ISES ORGANIZATION

About ISES

The International Society of Exposure Science (ISES) promotes and advances exposure science (methods, measurements and models) as it relates to the complex inter-relationships between human populations, communities, ecosystems, wildlife, and chemical, biological, and physical agents, and non-chemical stressors.

ISES members have diverse expertise and training in biological, physical, environmental, and social sciences, as well as various engineering disciplines. According to the U.S. National Research Council, "exposure science links human and ecological behavior to environmental processes in such a way that the information generated can be used to mitigate or prevent future adverse exposures." The Society's multidisciplinary expertise and international reach make it the premiere professional society for practitioners associated with all aspects of exposure science (research, teaching, policy, communication, outreach).

We are an influential professional society with a mission to serve and promote our members and advance the field of exposure science. When you join ISES, you will make a difference in furthering this mission and have opportunities to meet others who share your passion for exposure science.

ISES Membership benefits include:

- Online subscription to our official journal: Journal of Exposure Science and Environmental Epidemiology (JESEE);
- Early notification of annual meetings;
- Regular emails about our Society and its activities;
- Opportunities to actively engage in our Society, including involvement in the ISES Mentoring Program, annual meeting development and participation on committees;
- Networking opportunities during the year and at our annual meetings;
- Reduced page charges if you are the first or corresponding author on a paper published in JESEE.

ISES membership is a smart investment in your professional development. ISES is only as strong as its membership. If you are not a member, we welcome you to join. If you are member, we encourage you to help the Society advance exposure science though active and full engagement in its various committees, social media outlets, the annual meeting, and the journal. Find out more about how to make this happen at the Chapters and Committees Fair at the ISES-ISE 2018 Joint Annual Meeting. Or visit www.intlexposurescience.org.

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ISEE ORGANIZATION

About ISEE

This meeting marks the 30th scientific annual conference of the ISEE (International Society for Environmental Epidemiology, www.iseepi.org) that is among the largest international associations in environmental health. Our **Vision** is to improve human health globally through ethically sound environmental epidemiology research, education and practice.

ISEE fosters epidemiological studies on the effects of environmental exposures in people, facilitates communication between health professionals, promotes methodological advances, and strengthens environmental health policy. ISEE supports the involvement of scientists from around the world at all stages of their careers and subsidizes membership costs for scientists in developing countries to encourage their participation. ISEE has regional chapters in Africa, Asia, Eastern Mediterranean, Europe, Latin America and the Caribbean (LAC) and is now considering creating a North American chapter.

Active ISEE members receive many benefits including:

- Discounted registration for the annual meeting and ISEE-affiliated workshops and conferences;
- Professional development opportunities including eligibility for ISEE Career Awards;
- Free online subscription to EPIDEMIOLOGY and reduced cost for print version;
- Opportunity to contribute solicited commentaries to EPIDEMIOLOGY with no publication charges;
- 20% discount for publishing in EPIDEMIOLOGY and ENVIRONMENTAL EPIDEMIOLOGY;
- 20% discount on books published by Wolters Kluwer when ordering online;
- Professional opportunities to engage in our Society including participating in the executive council, committees, chapters, the ISEE AuthorAid mentoring program, annual meeting organization and development, and networking events.

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Join an ISEE committee and make a difference today!

- Annual Conference Committee
- Awards Committee
- Capacity Building and Education Committee
- Communications Committee
- Ethics and Philosophy Committee
- Membership Committee
- Nominations Committee
- Policy Committee
- Students & New Researchers Network

CONFERENCE ORGANIZERS

Meeting Co-Chairs

- Markey Johnson, Health Canada, Ottawa, ON, Canada
- Angelika Zidek, Health Canada, Ottawa, ON, Canada
- Audrey Smargiassi, Université de Montréal, Montreal, QC, Canada
- Veronica Vieira, University of California, Irvine, CA, U.S.A.

Technical Organizing Committee

Abstracts

- Nina Dobbin, Health Canada (Committee Chair)
- Tarik Benmarhnia, University of California, San Diego
- Stéphane Buteau, McGill University
- Cathy Campbell, Health Canada
- Hong Chen, Public Health Ontario
- Yiqun Han, Peking University Beijing
- Adetoun Mustapha, Imperial College London
- Shoji F. Nakayama, National Institute for Environmental Studies
- Marie-Elise Parent, Institut National de la Recherche Scientifique
- Audil Rashid, Pir Mehr Ali Shah Arid Agriculture University
- Hind Sbihi, University of British Columbia
- Robin Shutt, Health Canada
- Tim Takaro, Simon Fraser University
- Michelle Turner, Barcelona Institute for Global Health
- Violaine Verougstraete, Eurometaux
- Greg Wellenius, Brown University School of Public Health

Chapters and Committees Fair

- Allison Patton, Health Effects Institute (Committee Chair)
- Narges Khanjani, Kerman Medical University
- Francine Laden, Harvard University
- Adetoun Mustapha, Imperial College London
- Shoji Nakayama, National Institute for Environmental Studies
- Hua Qian, ExxonMobil
- Martin Tondel, Uppsala University
- Danielle Vienneau, Swiss Tropical and Public Health Institute
- Gregory Wellenius, Brown University
- Kai Zhang, University of Texas Houston

Diversity and Travel Awards

- Gueladio Cisse, Universität Basel (Committee Co-Chair)
- Ana María Mora, Universidad Nacional Costa Rica (Committee Co-Chair)
- Hind Sbihi, University of British Columbia (Committee Co-Chair)
- Perry Hystad, Oregon State University
- Zheng Li, U.S. Centers for Disease Control and Prevention
- Shoji F. Nakayama, National Institute for Environmental Studies
- Allison Patton, Health Effects Institute
- Aolin Wang, University of California, San Francisco
- Julie Shu-li Wang, National Health Research Institutes
- Joyce Zhang, Health Canada

Exhibitors

- Christina Daly, Health Canada (Committee Chair)
- Michael Breen, U.S. Environmental Protection Agency
- Marianne Hatzopoulou, University of Toronto
- Erin Haynes, University of Cincinnati
- Dave Henderson, Environment and Climate Change Canada
- Tom Long, U.S. Environmental Protection Agency
- Daniel Rainham, Dalhousie University
- Sara Rumbolt, Government of Nova Scotia
- Amina Salamova, Indiana University Bloomington
- Eleanor Setton, Canadian Urban Environmental Health Research Consortium
- Robin Shutt, Health Canada
- Fuyuen Yip, U.S. Centers for Disease Control and Prevention

Plenary Speakers

- Andy Nong, Health Canada (Committee Chair)
- Jill Baumgartner, McGill University
- Tarik Benmarhnia, University of California, San Diego
- Mike Brauer, University of British Columbia
- Cathy Campbell, Health Canada
- Andres Cardenas, Harvard University
- Laurie Chan, Ottawa University
- Jonathan Chevrier, McGill University
- Maxine Croteau, Health Canada
- Marie-Ève Héroux, Health Canada
- Perry Hystad, Oregon State University
- Narges Khanjani, Kerman Medical University
- Cheryl Khoury, Health Canada
- Melanie Lemire, Université Laval
- Ling Liu, Health Canada
- Jaymie Meliker, Stony Brook University
- Shoji F. Nakayama, National Institute for Environmental Studies
- Telma Nery, Heart Institute InCor
- Tor Oiamo, Ryerson University
- Halûk Özkaynak, U.S. Environmental Protection Agency
- Rajendra P. Parajuli, Ottawa University
- Allison Patton, Health Effects Institute
- Hwashin Shin, Health Canada
- Nicolle Tulve, U.S. Environmental Protection Agency
- Michelle Turner, Barcelona Institute for Global Health
- Mathilda van den Bosch, University of British Columbia
- Marc-André Verner, University of Montreal
- Greg Wellenius, Brown University
- Rosemary Zaleski, ExxonMobil
- Yi Zhang, Health Canada
- Kate Zinszer, University of Montreal

Pre-Conference Courses

- Hong Chen, Public Health Ontario (Committee Co-Chair)
- Tarik Benmarhnia, University of California, San Diego (Committee Co-Chair)
- Tye Arbuckle, Health Canada
- Jeff Brook, Health Canada
- Allison Clarke, Health Canada
- Amir Hakami, Carleton University
- Yiqun Han, Peking University Beijing
- Frauke Hennig, Universität Düsseldorf
- Cheryl Khoury, Health Canada
- Eric Lavigne, Health Canada
- Telma Nery, Heart Institute InCor
- Daniel Rainham, Dalhousie University
- Tamara Schikowski, Universität Düsseldorf
- Eleanor Setton, Canadian Urban Environmental Health Research Consortium
- Hwashin Shin, Health Canada
- Michelle Turner, Barcelona Institute for Global Health
- Yi Zhang, Health Canada

Prizes

- Liz Boyle, National Academies of Sciences, Engineering, and Medicine (Committee Chair)
- Cathy Campbell, Health Canada
- Christina Daly, Health Canada
- Cheryl Khoury, Health Canada
- Sandra Kuchta, Health Canada
- Hua Qian, ExxonMobil

Program App and Multi-Media

- Nicolle Tulve, U.S. Environmental Protection Agency (Committee Chair)
- Perry Hystad, Oregon State University
- Francine Laden, Harvard University
- Lucas Neas, U.S. Environmental Protection Agency
- David Richardson, University of North Carolina Chapel Hill
- Amina Salamova, Indiana University Bloomington
- Danielle Vienneau, Swiss Tropical and Public Health Institute
- Marc Weisskopf, Harvard University
- Greg Wellenius, Brown University
- Amanda Wheeler, University of Tasmania

Social Events

- Cheryl Khoury, Health Canada (Committee Chair)
- Rocio Aranda, Health Canada
- Sandra Kuchta, Health Canada
- Ryan Kulka, Health Canada
- Chandresh Ladva, Emory University
- Eric Lavigne, Health Canada
- Anna Lukina, Health Canada
- Gary Mallach, Health Canada
- Amanda Pappin, Statistics Canada
- David Richardson, University of North Carolina Chapel Hill
- Sara Rumbolt, Government of Nova Scotia
- Marc Weisskopf, Harvard University

Sponsorship

- Jennifer Thomasen, Bayer Crop Science (Committee Chair)
- Sara Adar, University of Michigan
- Carla Ancona, Regional Health Service
- Dean Baker, University of California, Irvine
- Maryse Bouchard, University of Montreal
- Liz Boyle, National Academies of Sciences, Engineering, and Medicine
- Christina Daly, Health Canada
- Judy LaKind, LaKind Associates, LLC
- Jennifer Lantz, Bayer Crop Science
- Rajendra P. Parajuli, Ottawa University
- Hua Qian, ExxonMobil
- Daniel Rainham, Dalhousie University
- Amina Salamova, Indiana University Bloomington
- Violaine Verougstraete, Eurometaux
- Amanda Wheeler, University of Tasmania

Students and New Researchers

- Cecilia Alcala, Tulane University School of Public and Tropical Medicine (ISES Committee Co-Chair)
- Frauke Hennig, Universität Düsseldorf (ISEE Committee Co-Chair)
- Andres Cardenas, Harvard University
- Dany Doiron, Maelstrom Research
- Laís Fajersztajn, University of São Paulo
- Yiqun Han, Peking University Beijing
- Laura Kwong, Stanford University
- Aparna Lal, Australian National University
- Donghai Liang, Emory University
- Elizabeth Marder, California Environmental Protection Agency
- Amanda Pappin, Statistics Canada
- Larissa Pardo, U.S. Environmental Protection Agency
- Allison Patton, Health Effects Institute
- Marissa Perry, Climate Change Research Centre
- Hind Sbihi, University of British Columbia
- Crystal Romeo Upperman, University of Maryland

Sustainability, Eco, and Green

- Miriam Diamond, University of Toronto (Committee Co- Chair)
- Daniel Rainham, Dalhousie University (Committee Co- Chair)
- Rocio Aranda, Health Canada
- Jill Baumgartner, McGill University
- Elyse Bernard, Health Canada
- Cathy Campbell, Health Canada
- Gueladio Cisse, Universität Basel
- Perry Hystad, Oregon State University
- Leona MacKinnon, Health Canada
- Jaymie Meliker, Stony Brook University
- Tim Takaro, Simon Fraser University
- Danielle Vienneau, Swiss Tropical and Public Health Institute
- Joyce Zhang, Health Canada

Technology and Sensor Fair

- Robin Shutt, Health Canada (Committee Chair)
- Christina Daly, Health Canada
- Greg Evans, University of Toronto
- Amir Hakami, Carleton University
- Marianne Hatzopoulou, University of Toronto
- Erin Haynes, University of Cincinnati
- Dave Henderson, Environment and Climate Change Canada
- Ryan Kulka, Health Canada
- Tor Oiamo, Ryerson University
- Halûk Özkaynak, U.S. Environmental Protection Agency
- Allison Patton, Health Effects Institute
- Daniel Rainham, Dalhousie University
- Eleanor Setton, Canadian Urban Environmental Health Research Consortium
- Fuyuen Yip, U.S. Centers for Disease Control and Prevention

Womens Networking Event

- Anna Lukina, Health Canada (Committee Co-Chair)
- Joyce Zhang, Health Canada (Committee Co-Chair)
- Maxine Croteau, Health Canada
- Miriam Diamond, University of Toronto
- Narges Khanjani, Kerman Medical University
- Sandra Kuchta, Health Canada
- Lisa McKenzie, University of Colorado
- Katie McMillan, The Royal College of Physicians and Surgeons of Canada
- Ana María Mora, Universidad Nacional Costa Rica
- Telma Nery, Heart Institute InCor
- Ana Rule, Johns Hopkins University
- Sara Rumbolt, Government of Nova Scotia
- Robin Shutt, Health Canada
- Neha Sunger, West Chester University

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- Susanne Breitner
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- Narges Khanjani
- Cheryl Khoury
- Molly Kile

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- Adetoun Mustapha
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- Wei-Te Wu
- Fuyuen Yip
- Elizabeth Young
- Rosemary Zaleski
- Kai Zhang
- Yi Zhang
- Xueying Zhang
- Kate Zinszer

GENERAL INFORMATION

Registration Desk Hours

Sunday, August 26	8:00 am	-	8:00 pm
Monday August 27	7:00 am	-	5:45 pm
Tuesday August 28	7:00 am	-	5:45 pm
Wednesday August 29	7:00 am	-	7:30 pm
Thursday August 30	8:00 am	-	1:00 pm

Speaker Service Center Hours

Sunday, August 26	12:00 pm	–	8:00 pm
Monday August 27	7:00 am	-	5:45 pm
Tuesday August 28	7:00 am	-	5:45 pm
Wednesday August 29	7:00 am	–	5:45 pm
Thursday August 30	8:00 am	–	1:00 pm

Coat Room Hours

Sunday, August 26	8:00 am	-	8:00 pm
Monday August 27	7:00 am	-	5:45 pm
Tuesday August 28	7:00 am	-	5:45 pm
Wednesday August 29	7:00 am	-	7:30 pm
Thursday August 30	8:00 am	-	6:00 pm

Exhibitor Hours

Sunday, August 26	5:00 pm	-	8:00 pm
Monday, August 27	10:00 am	-	5:30 pm
Tuesday, August 28	10:00 am	-	5:30 pm
Wednesday, August 29	10:00 am	-	7:30 pm
Thursday, August 30	10:00 am	-	1:00 pm

Registration Materials, Badges & On-Site Staff

At check-in, each attendee will receive a name badge, program flyer, and other materials. Printed programs will only be available to those who purchased one during pre-registration. Each participant must wear her/his own badge during the entire meeting. Your badge is the admission pass to all meeting areas including the plenary and poster halls, meeting rooms, and the exhibition area. For social events you will either receive a separate ticket or find the ticket printed on the back of your badge.

Feel free to ask the meeting staff and volunteers for information at any time. The registration area will always be staffed by at least one person during hours of operation. Conference volunteers will be wearing t-shirts with the conference logo on the front and "Can I Help You?" on the back.

WiFi Access

Complimentary WiFi is available for all participants in the meeting venue.

Login: ISESISEE2018
Password: ISESISEE2018

Official Language

The official language of the ISES-ISEE 2018 Joint Annual Meeting is English. No simultaneous translation will be offered.

About the ISES-ISEE 2018 Joint Annual Meeting

Scope of the Meeting

The Joint Annual Meeting of the International Society of Exposure Science and the International Society for Environmental Epidemiology (ISES-ISEE 2018) brings together scientific experts from academia, government, industry, and nongovernmental organizations under the theme "Addressing Complex Local and Global Issues in Environmental Exposure and Health."

Exposure Science and Environmental Epidemiology

Exposure science and environmental epidemiology are dynamic fields that investigate complexities ranging from the very big (macro/ecosystem) to the very small (micro/molecular) environments. Environmental exposure scientists and epidemiologists:

- Develop and apply traditional and innovative methods for assessing exposures to environmental stressors and their health effects;
- Address exposures to a broad array of environmental stressors as well as factors that contribute to or mitigate exposure;
- Elucidate potential health effects from environmental stressors during the life cycle including outcomes from in utero development to death; and
- Promote interdisciplinary approaches to solving complex environmental public health problems.

Meeting Themes

ISES-ISEE 2018 encompasses the following broad themes:

- Environmental health and exposure methodologies;
- Environmental exposure and environmental health issues; and
- Interdisciplinary environmental exposure and health research, knowledge translation, and intervention.

Meeting Goals

ISES-ISEE 2018 is inclusive to delegates from around the world, and will leverage local and international expertise to address complex local and global topics relevant to exposure science and environmental epidemiology, such as:

- Interactions between social and environmental determinants;
- Combined assessments of both exposure and health;
- Exposures across multiple media, sources, and stressors;
- Exposures in different microenvironments;
- Temporally and spatially varying exposures;
- Mixtures and cumulative exposures;
- Gene-environment interactions;
- The vast array of clinical and subclinical health impacts; and
- Translation of research into policy and other decision making.

The ISES-ISEE 2018 Joint Annual Meeting features over 1900 abstracts focused on these topics and themes, including 83 symposium sessions with over 400 presentations, 92 general oral sessions with over 500 presentations, and more than 1000 posters. ISES-ISEE 2018 is also proud to offer 8 Pre-Conference Courses from global experts on novel tools and methods relevant to exposure science and environmental epidemiology. Finally, plenary speakers will deliver diverse keynote addresses to stimulate ideas and discussion under the conference themes.

About Ottawa

As the capital city of Canada, Ottawa is home to a diverse and active community of scientists and policy makers engaged in local and global environmental exposure and health research. Located on the boundary between Ontario and Quebec, Ottawa is shaped by indigenous culture, anglophone and francophone influences, as well as growing immigrant communities, epitomizing cultural diversity.

Ottawa is home to a rich array of monuments, museums, and landmarks, including the Rideau Canal, the only UNESCO World Heritage Site in Ontario. Across the street from the conference centre visitors can access scenic cruises on the canal, Parliament Hill or the nearby Major's Hill Park which boast amazing views of monuments and the Rideau Canal Locks.

Ottawa is also home to a variety of museums, including the War Museum, National Art Gallery, and Canadian Museum of History. The National Arts Centre, across the canal from the conference venue, hosts theater, dance, and musical performances. The Lansdowne Centre 10 minutes away hosts sporting events and concerts.

Other nearby attractions include the outdoor markets and breweries in the Byward Market as well as a vast array of diverse restaurants and pubs on Elgin Street, both within walking distance of the conference venue. Outdoor adventurers can try white water rafting and kayaking on the Ottawa River. Bicyclists and runners will enjoy Ottawa's extensive and scenic bicycle and running paths. For those venturing a bit further out, the famous Nordic baths at Le Nordic Spa and hiking trails in Gatineau Park are both a 20 minute drive from downtown Ottawa.

Conference attendees can sign up for a variety of activities and excursions through the conference website (https://isesisee2018.org/social-program) or on-site, including bicycle tours, fun runs, white water rafting, and more.

We hope you will take the opportunity to enjoy all that Ottawa has to offer!

Ottawa Street Map

2018 ISES-ISEE JOINT ANNUAL MEETING
OTTAWA-CANADA 26-30 AUGUST

1 **Shaw Centre**
55 Colonel By Drive, Ottawa
(613) 563-1984

2 **The Westin Ottawa**
11 Colonel By Drive, Ottawa
(613) 560-7000

3 **Hotel Novotel Ottawa**
33 Nicholas Street, Ottawa
(613) 230-3033

4 **Les Suites Hotel Ottawa**
130 Besserer Street, Ottawa
(613) 232-2000

5 **Lord Elgin Hotel**
100 Elgin Street, Ottawa
(613) 235-3333

6 **Fairmont Château Laurier**
1 Rideau Street, Ottawa
(613) 241-1414

7 **National Arts Centre**
1 Elgin Street, Ottawa
(613) 947-7000

CAPITALE DU CANADA
OTTAWA
CANADA'S CAPITAL

MEETING VENUE AND APP

ISES-ISEE 2018 will be held at the Shaw Centre, in Ottawa, Canada. The Shaw Centre is within easy walking distance of most of the major landmarks and tourist attractions in Ottawa including the Rideau Canal, Parliament Hill, the Byward Market, and many parks, shopping centres and museums. The Shaw Centre is connected via walkway to The Westin Hotel and the Rideau Shopping Centre, which has over 180 shops and a food court.

Meeting Venue

Shaw Centre (Website: www.shaw-centre.com)
55 Colonel By Drive
Ottawa, Ontario
K1N 9J2 Canada

Mobile Meeting App

The ISES-ISEE 2018 Meeting App is available for all registered delegates to download. Search for The ISES-ISEE 2018 Joint Annual Meeting App in the iTunes App Store or Google Play. It will install on your device and the icon will appear on your device when the installation is complete.

Note: You may need to enter your App store password in order to install. After downloading the App, login with the email address you used during online registration. Your password is your last name (case-sensitive), as you entered it during registration.

SHAW CENTRE FLOOR PLAN

HOW TO GET AROUND OTTAWA

The Shaw Centre is easily accessible by plane, train, automobile, bicycle, and on foot. It is an easy walk from downtown hotels, landmarks, and attractions, including the Rideau Canal, Parliament Hill, and the ByWard Market.

From the Ottawa International Airport

The Shaw Centre is a 20-minute drive from the Ottawa International Airport (airport bus shuttle and taxi services available). For transportation from the Ottawa International Airport you can use a taxi service (Coventry Connections), public transportation (OC Transpo), or ridesharing (Uber).

Public Transportation

The bus (OC Transpo #97) from the airport to downtown Ottawa picks up and drops off passengers from Pillar 14 outside Level 1 at the Ottawa International Airport. The bus fare — $3.50 CAD for a single one-way fare — can be paid in cash or using a Presto card.

Bus tickets are available at the ground transportation desk in the airport, located on level one at the central door of the arrivals area.

Transportation Service for People with Disabilities

Para Transpo is a door-to-door transportation service for people with disabilities. Para Transpo picks up and drops off passengers at Pillar 4 outside Level 1 at the Ottawa International Airport.

More information on transportation from Ottawa International Airport can be found at www.yow.ca.

Getting to the Shaw Centre from Montreal International Airport

From Montreal International Airport you can travel to downtown Ottawa by bus, train or regional shuttle service. More information on public transportation options from Montreal International Airport an be found on the website www.admtl.com.

Greyhound offers a return shuttle service by coach between Montreal and Ottawa. There are several daily departures every day of the week, beginning at 11 am. Tickets can be purchased on the Greyhound website.

Getting to the Shaw Centre by Car

The Shaw Centre is a 4.5-hour drive from Toronto and a 2 hour drive from Montreal. The Centre has underground car parking as well as two bicycle parking stations, one on each side of the building and accepts payments by cash or credit card.

From Toronto

Take Highway 401 East to Highway 416 North, to Highway 417 East, and exit at Nicholas Street. Follow Nicholas Street north for 3.5 km and turn left onto Daly Avenue. Shaw Centre is located at the corner of Daly Avenue and Colonel By Drive.

From Montreal

Take Autoroute 40 West to Highway 417 West, and exit at Nicholas Street. Follow Nicholas Street north for 3.5 km and turn left onto Daly Avenue. Shaw Centre is located at the corner of Daly Avenue and Colonel By Drive.

Getting to the Shaw Centre By Train

The Shaw Centre is a 10-minute drive from the Ottawa Via Rail station with daily passenger train service from Montreal. Toronto, and points east, west, and south. For other connecting cities please visit www.viarail.ca.

Transportation in Ottawa

You can use public transportation to get around Ottawa. Information on bus routes and schedules to go around Ottawa is available at www.octranspo.com/routes.

Ottawa is easily accessible by bicycle, with extensive bike paths and quiet streets throughout the city, including paths along the canal. To explore Ottawa by bicycle, visit https://isesisee2018.org/social-program for more information about bicycle excursions. Or check out bike sharing options such as VeloGO Bike Share (https://gohopr.com/velogo) to explore the city on your own. The Shaw Centre has two bicycle parking stations, one on each side of the building.

You can also use a car share service such as VRTUCAR or ZipCar to get around Ottawa. VRTUCAR will only accept a Canadian driver's license. Rates start at $7.50/hr or $60/day. Visit www.vrtucar.com for more details. ZipCar will accept a driver's license issued outside of Canada, but drivers are required to apply in advance. Rates start at $7.75/hr or $72/day. Visit www.zipcar.com for details.

ISES-ISEE 2018 DAILY MEETINGS

A variety of meetings are scheduled during the ISES-ISEE 2018 Joint Annual Meeting.

Meeting	Date	Time	Room
Joint ISES/ISEE SNR Breakfast	Monday August 27	7:00 am - 8:30 am	201
Research Funding 101: Multiple Perspectives on the NIH Grant Process NIEHS, Fogarty, NCI & Center for Scientific Review	Monday August 27	7:00 am - 8:30 am	202
ISEE Ethics and Philosophy Committee	Monday August 27	12:30 pm - 1:45 pm	201
GRC Power Hour, Hosted by ISES Diversity Committee	Monday August 27	12:30 pm - 1:45 pm	202
MCC Collaborative Research Network	Monday August 27	12:30 pm - 1:45 pm	203
EHP Associate Editor Meeting	Monday August 27	12:30 pm - 1:45 pm	204
BICCA PI Meeting	Monday August 27	12:30 pm - 1:45 pm	205
ISEE Africa Chapter Meeting	Monday August 27	5:30 pm - 6:00 pm	204
ISES Diversity Committee Presents the Anti-Harassment Policy (Including Breakfast)	Tuesday August 28	7:00 am - 8:30 am	201
NIH Resource Room: Explore Federal Research Funding and Review Opportunities through One-On-One Conversations with NIH Staff	Tuesday August 28	7:00 am - 8:30 am	202
Meet the Editors Event	Tuesday August 28	7:00 am - 8:30 am	203
Meeting of the ISES and ISEE Asia Chapters	Tuesday August 28	7:00 am - 8:30 am	204
Meet the ISEE Ethics and Philosophy Committee Meeting	Tuesday August 28	12:30 pm - 1:45 pm	202
ISEE LAC Chapter Meeting	Tuesday August 28	12:30 pm - 1:45 pm	203
ISEE Policy Committee Meeting	Tuesday August 28	12:30 pm - 1:45 pm	205
ISEE Eastern Mediterranean Chapter Meeting	Tuesday August 28	12:30 pm - 1:45 pm	206
Ecological Exposure Work Group	Tuesday August 28	12:30 pm - 1:45 pm	207
ISES Mentorship Office Hours	Tuesday August 28	12:30 pm - 1:45 pm	208
OECD Working Party on Exposure Assessment	Tuesday August 28	12:30 pm - 1:45 pm	210
ISEE Annual Meeting Planning Committee Meeting	Tuesday August 28	12:30 pm - 1:45 pm	Jim Durrell
ISES General Membership Meeting	Tuesday August 28	5:45 pm - 6:45 pm	208
ISEE Annual General Membership Meeting	Tuesday August 28	5:45 pm - 6:45 pm	212
Joint ISES/ISEE SNR Breakfast	Wednesday August 29	7:00 am - 8:30 am	201
NIH Resource Room: Explore Federal Research Funding and Review Opportunities through One-On-One Conversations with NIH Staff	Wednesday August 29	7:00 am - 8:30 am	202
ISEE European Chapter Members Meeting	Wednesday August 29	12:30 pm - 1:45 pm	201
JESEE Editorial Board Meeting	Wednesday August 29	12:30 pm - 1:45 pm	202
Joint SNRN and Ethics and Philosophy Committee Session. The PhD Student – Supervisor Relationship: Discussion on How Ethical Guidelines Can Be Developed	Wednesday August 29	12:30 pm - 1:45 pm	203
ISEE Africa Chapter Meeting	Wednesday August 29	12:30 pm - 1:45 pm	204
Editorial Board Meeting International Journal of Hygiene and Environmental Health	Wednesday August 29	12:30 pm - 1:45 pm	205
ISES Committee Chairs Lunch	Wednesday August 29	12:30 pm - 1:45 pm	206
North America Interim Chapter Meeting	Wednesday August 29	12:30 pm - 1:45 pm	210
Joint ISES/ISEE SNR Networking Happy Hour	Wednesday August 29	7:30 pm - 8:30 pm	CH 1

ANCILLARY WORKSHOPS

A variety of Ancillary Workshops are scheduled during the ISES-ISEE 2018 Joint Annual Meeting.

Meeting	Date	Time	Room
Learn about Gene-Environment Interactions with Molecular Manipulatives (Open to All Conference Attendees)	Monday August 27	7:00 - 8:30 am	203
BenMAP-CE User's Symposium Workshop (Open to All Conference Attendees)	Monday August 27	7:00 - 8:30 am	204
MIREC Research Platform Workshop: Celebrating 10 Years of Collaborations and Planning for the Future Workshop (Closed Meeting)	Thursday August 30	1:30 - 5:00 pm	201
Human Biomonitoring: Developing a Shared Vision for National Programs Workshop (Open to All Conference Attendees)	Thursday August 30	1:30 - 5:00 pm	202
Science and Policy of Organohalogens Workshop (Open to All Conference Attendees)	Thursday August 30	1:30 - 5:00 pm	203
Introduction to APEX: Estimating Population-Based Air Pollutant Exposure, Dose, and Health Risk Workshop (Open to All Conference Attendees)	Thursday August 30	1:30 - 5:00 pm	204
Canadian Urban Environmental Health Research Consortium (CANUE) Strategic Plan Review Workshop (Closed Meeting)	Thursday August 30	1:30 - 5:00 pm	209
Translating Research on Recycled Tire Crumb Rubber: Opportunities for International Cooperation Workshop (Closed Meeting)	Thursday August 30	1:30 - 5:00 pm	210
Unleashing the Power of Prevention: Mobilizing the Science of Environmental Health to Prevent Disease Workshop (Open to All Conference Attendees)	Thursday August 30	1:30 - 5:00 pm	211
Assessing Air Pollution Exposures in Cohort Studies in the Asia-Pacific Region Workshop (Open to All Conference Attendees)	Thursday August 30	1:30 - 5:00 pm	212

PRESENTER GUIDELINES

Speaker Guidelines

Before ISES-ISEE 2018

1. Each presentation should be 12 minutes with 3 minutes for questions, for a maximum presentation length of 15 minutes. Some symposium sessions have shorter lengths; check with your chair to confirm the presentation duration.

2. Each oral session will be 60, 75, or 90 minutes and will feature 4, 5, or 6 presentations, respectively. Each session will have a chair to manage time and moderate discussion.

3. In order to maintain consistency and allow attendees to move easily between sessions, chairs have been instructed to strictly maintain presentation times and will interrupt if the presenter exceeds the allotted time (15 minutes per presentation, including questions and discussion).

4. Prepare your slides in PowerPoint using landscape orientation and standard 16:9 format ratio.

5. Standard laptops and audio-visual equipment provided by the venue will be used in the lecture room. You will be able to operate your slides by means of a remote control.

6. All presentations should be pre-loaded on the equipment in the Speaker Ready Room the day prior to your presentation. You should be prepared to bring your final presentation on a USB memory stick (or other storage device) to the conference venue.

During ISES-ISEE 2018

7. Upon arrival at the ISES-ISEE conference venue, please check in at the Registration Desk and review the final program for possible scheduling changes in your session.

8. All presentations should be pre-loaded on the equipment in the Speaker Ready Room the day prior to your presentation.

9. Introduce yourself to your session chairs 15 minutes before the session starts in the presentation room.

10. Staff will be available to assist you in the vicinity of all of the meeting rooms.

While Presenting

11. When speaking, make sure to face the microphone for good sound quality.

12. Make sure your presentation does not exceed the allotted time (15 minutes per presentation, including questions and discussion). Session chairs have been instructed to strictly maintain presentation times and will interrupt if the presenter exceeds the maximum length for each presentation.

Poster Presenter Guidelines

1. For proper display at the conference, your poster size should stay within the following maximum dimensions A0 (Portrait): Width: 841 mm Height: 1189 mm.

2. When preparing your poster, use adequate letter type and font size to ensure good readability. Well-designed figures, graphs and tables will enhance the readability and impact of your poster.

3. Print your poster and bring it with you to The Shaw Centre. Please note that there won't be a printing service provided.

4. Poster boards in the poster area will be numbered and ordered using the abstract code (beginning with the letters P) appearing in the scheduling confirmation sent to you. You will also find your abstract code in the final program on the ISES-ISEE 2018 Joint Annual Meeting website and in the meeting App.

5. The title on your poster should be identical to the title of the submitted abstract.

6. Posters should show the names of all contributing authors appearing on the abstract and the affiliation of the presenting author.

7. On the day of your poster session (Sunday, Monday, Tuesday, or Wednesday), all posters should be mounted no later than 10:00 am and can be taken down after 4:30 pm, but no later than 6:00 pm.

Important: the posters that are competing in the Student Poster Competition should be mounted on Sunday before 5.30 pm and taken down on Monday after 4.30 pm.

8. Posters not removed by the presenters will be removed by the organizers and destroyed.

9. Mounting materials (e.g., push pins) will be available in the poster area.

10. If you are competing in the student poster competition, you must be present at your poster from 7:00 pm - 8:00 pm on Sunday and from 1:15 pm – 2:15 pm on Monday. The presenting author must be a student to be eligible for the award. If you are presenting a poster on Tuesday or Wednesday, you must be at the poster from 1:15 pm - 2:15 pm on your assigned day. All poster presenters are also encouraged to be at their posters during the morning and afternoon breaks Monday-Wednesday, but this is not required.

11. You are advised to bring hard copies of your poster as handouts or allow visitors to leave their email address.

TRAVEL AWARDS

The ISES-ISEE 2018 Joint Annual Meeting awarded $73,000 CAD in travel funds to 64 students, new researchers, and senior researchers from 30 countries. The winners were selected from among 377 applicants. Award criteria included commitment and enthusiasm for the field of exposure science or environmental epidemiology, financial need, inclusion in an under-represented group, and abstract quality. We would like to acknowledge the hard work of the ISES-ISEE 2018 Diversity and Travel Awards Committee and all the volunteers who reviewed applications. Thank you to the NIEHS and the ISES and ISEE societies, who provided generous support to ensure a diverse and inclusive meeting. Also, many thanks to the conference attendees who donated to the travel awards as part of their registration. Travel award recipients should check in at the registration desk for additional award information. On behalf of ISES-ISEE 2018, we congratulate all travel award recipients and welcome you to Ottawa!

Travel Award Reviewers

- Cecilia Alcala
- Raga Avanasi
- Scott Bartell
- Maulik Baxi
- Paloma Beamer
- Andres Cardenas
- Jonathan Chevrier
- Gueladio Cisse
- Nicole Deziel
- Dany Doiron
- Elise Elliott
- Laís Fajersztajn
- Daniela Fecht
- Jessica Frank
- Christina Fuller
- Ulrike Gehring
- Yiqun Han
- Maria Harris
- Jaime Hart
- Perry Hystad
- Darpa Jyethi
- Roxana Khalili
- Laura Kwong
- Dingsheng Li
- Zheng Li
- Donghai Liang
- Ana Maria Mora
- Marsha Morgan
- Shoji Nakayama
- Amrutasri Nori-Sarma
- Amanda Pappin
- Rajendra Parajuli
- Larissa Pardo
- Allison Patton
- Annette Peters
- Kyrstal Pollitt
- Reginald Quansah
- Ana Rule
- Hind Sbihi
- Alexandra Schneider
- Neha Sunger
- Jonathan Thornburg
- Berna van Wendel de Joode
- Carolina Villanueva
- Aolin Wang
- Shu-Li Julie Wang
- Kate Weinberger
- Joyce Zhang
- Kai Zhang
- Ying Zhang

STUDENTS AND NEW RESEARCHERS PROGRAM

Student and New Researcher (SNR) events during the annual meeting provide opportunities for students and new researchers to network and socialize. The ISES-ISEE 2018 Joint Annual Meeting will provide a great opportunity for students and new researchers across disciplines and societies to meet and exchange ideas. A list of SNR activities is provided below.

Student Poster Competition

Sunday August 26 (7:00 pm) and **Monday August 27** (1:15 pm)
The Student Poster Competition provides an opportunity for students to showcase their research, and for established scientists to meet new researchers and keep abreast of cutting edge work.

Monday August 27, 2018

7:00 am – 8:30 am
Room 201: Joint ISES/ISEE SNR Breakfast Session
Topic: Non-Academic Career Paths
PhD, Post-Doc, academic careers... but what else is out there? Learn about non-academic careers from personal career paths recounted by members of our societies. If you have specific questions, please let the SNR chairs know and we are happy to include them in our panel discussion. See you there!

Tuesday August 28, 2018

12:30 pm – 1:45 pm
Room 208: ISES Mentor Office Hours
ISES members have the opportunity to connect directly with representatives and available mentors from academic, public and private sectors. During an approximately 10-minute speed-meet one-on-one attendees can ask specific questions. Please note, due to limited capacity there is no guarantee that all attendees will be able to participate in the Mentor Office Hours.

Wednesday August 29, 2018

7:00 am – 8:30 am
Room 201: Joint ISES/ISEE SNR Breakfast Session
Topic: Cross Disciplinary Panel
This joint conference is a great opportunity to gain insight into both disciplines (environmental epidemiology and exposure science) and in this morning session students and early career researchers are invited to learn from insider experiences how both disciplines go together and what are the challenges and benefits. If you have specific questions, please let the SNR chairs know and we are happy to include them in our panel discussion. See you there!

12:30 pm – 1:45 pm
Room 203: Joint SNRN and Ethics and Philosophy Committee Session
Topic: The PhD Student – Supervisor Relationship: Discussion on How Ethical Guidelines Can Be Developed.
Based on the first workshop the PhD student – supervisor relationship last year at the ISEE 2017 in Sydney, this second workshop provides an opportunity to help developing guidelines for a PhD-student-supervisor relationship aiming to gain equality regarding PhD-supervising within our society. PhD-students, PhD supervisors and everyone else, who is interested, are welcome to join us during lunch!

5:45 pm – 7:30 pm
Parliament Foyer: Chapters and Committees Fair
Come and meet us at our tables!

7:30 pm – 8:30 pm
Canada Hall 1: Joint ISES/ ISEE SNR Networking Happy Hour!
Scientific exchange and networking are the key goals of an annual conference. Save the date for our big networking event!

Thursday August 30, 2018

12:00 pm - 1:00 pm
Canada Hall 1: Awards Ceremony
Best early career abstracts and best student posters will be awarded.

PRE-CONFERENCE COURSES

Sunday, August 26

Morning Courses
9:00 am – 12:00 pm

- **PC01A (Full Day Course)**
  Room 201
  Big Data, Machine Learning Techniques to Investigate Health Effects in Environmental Health Studies

- **PC02A (Full Day Course)**
  Room 202
  Consumer Exposure Modeling for Human Health Risk Assessment: Advanced Tools

- **PC03**
  Room 204
  Bayesian Methods for Environmental Health Researchers

- **PC04**
  Room 209
  Application of New Approach Methodologies for Exposure Assessment and Prioritization: Tools for Researchers and Regulators Including Use of Quantitative Structure Use Relationships (QSUR)

- **PC05**
  Room 210
  Model-Based Geostatistics and Spatial Epidemiology: A Practical Introduction with R

Afternoon Courses
1:00 pm – 4:00 pm

- **PC01B (Full Day Course)**
  Room 201
  Big Data, Machine Learning Techniques to Investigate Health Effects in Environmental Health Studies

- **PC02B (Full Day Course)**
  Room 202
  Consumer Exposure Modeling for Human Health Risk Assessment: Advanced Tools

- **PC06**
  Room 204
  Predicting Microscale Urban Features Using Street-Level Images – an Introduction to Machine Learning

- **PC07**
  Room 209
  Causal Inference Foundations and Applications in Environmental Health Sciences

- **PC08**
  Room 210
  Advanced Modelling Techniques for Time Series Analysis Using R

PC01

Room 201

Big Data, Machine Learning Techniques to Investigate Health Effects in Environmental Health Studies

Youssef Oulhote, Department of Environmental Health, Harvard T. H. Chan School of Public Health; Boston, U.S.A.
Laura Balzer, Department of Biostatistics & Epidemiology, School of Public Health & Health Sciences, UMass Amherst; Amherst, U.S.A.
Chirag J Patel, Department of Biomedical Informatics, Harvard Medical School; Boston, U.S.A.
Martin Tondel, Department of Medical Sciences, Occupational and Environmental Medicine, Uppsala University; Uppsala, Sweden

Description

This course will present key methodological challenges that arise in environmental health, and provide recent methods that can be used to deal with these challenges. Our focus is on modern solutions to multiple testing, model misspecification, and causal inference as applied to environmental health data, with a focus on assessing health effects of chemical mixtures. Participants will gain both a theoretical understanding as well as practical experience with a hands-on session using R software. At the end of the course, participants will be aware of and be able to implement state-of-the-art epidemiologic methods, including Environmental Wide Association Studies, ensemble learning techniques, G-computation, and targeted maximum likelihood estimation. Participants will gain the skills to correctly interpret software outputs and conduct these analyses in their own research projects. R scripts and specific functions will be provided.

Outline

Morning session (9:00 am –12:00 pm) will be devoted to theoretical and conceptual descriptions of the proposed methods with concrete examples. This session will include:

1. Overview of methodological challenges in environmental epidemiology: multiple testing, model misspecification, and causal inference
2. High-throughput associations of multiple environmental and non-genetic factors
3. Ensemble learning techniques
4. G-computation
5. Targeted maximum likelihood estimation
6. Ethics guidelines for environmental epidemiologists in the era of big data

Afternoon session (1:00 pm – 4:00 pm) will be devoted to hands-on exercises using R software. Participants can choose to participate only in the morning session, but attending the morning session is a prerequisite for the afternoon hands-on session. In any case, all participants will also be given fully executable do-files, so no prior programming experience is necessary.

PC02

Room 202

Consumer Exposure Modeling for Human Health Risk Assessment: Advanced Tools

Eva Wong, U.S. Environmental Protection Agency (EPA), Office of Pollution Prevention and Toxics; Washington, DC, U.S.A.
Heidi Hubbard, ICF; Fairfax, U.S.A.
Gerlienke Schuur, Centre for Safety of Substances and Products, National Institute for Public Health and the Environment (RIVM); Utrecht, The Netherlands
Wouter ter Burg, Centre for Safety of Substances and Products, National Institute for Public Health and the Environment (RIVM); Utrecht, The Netherlands

Description

This course will introduce and review two widely used and recently updated consumer exposure modelling tools, U.S. Environmental Protection Agency's (U.S. EPA's) Consumer Exposure Model (CEM) and ConsExpo Web. The course will provide an introduction and overview of both models, for use in human health exposure and risk assessment. Course attendees will participate in a demonstration of the models and application of the models in case studies, to illustrate similarities and differences between the tools.

Morning session (9:00 am – 12:00 pm):

Introduction to CEM and ConsExpo Web

The morning session will be devoted to providing an introduction and overview of the U.S. EPA's Consumer Exposure Model followed by an introduction for ConsExpo Web

This session will include:

1. Introduction and overview of the U.S. EPA's Consumer Exposure Model which is used to estimate indoor air concentrations, indoor dust concentrations, dermal exposure, and mouthing exposure for a variety of consumer products and materials.
2. Short introduction and overview of the different models for the inhalation, dermal and oral routes in ConsExpo Web, as well as an introduction on the ConsExpo fact sheets, with default choices for models and exposure parameters for different consumer product categories (such as cosmetics, paint, cleaning products).

CEM is a user-friendly computer program which estimates indoor air concentrations, indoor dust concentrations, dermal exposure, and mouthing exposure for a wide variety of consumer products and materials. The model was developed by the United States Environmental Protection Agency for use in implementing the requirements of the Toxic Substances Control Act which was recently modified through the Frank R. Lautenberg Chemical Safety for the 21st Century Act. The model estimates inhalation, ingestion, and dermal exposures, calculated as single day doses and chronic average daily doses. CEM (2.0) retains six existing models (CEM 1.2) within E-FAST V2.0 (.exe, 32MB) and adds nine additional models.

During 2016/2017, CEM (2.0) was tested by experienced users (i.e., via beta test) and peer reviewed by independent experts. CEM was developed using Microsoft Access and Visual Basic for Applications (VBA), and it is compatible with 2007 and 2010 versions of Microsoft Office. A freely-available Microsoft Access runtime environment is available on the Microsoft website for users that do not have Microsoft Access installed on their computer.

CEM facilitates the tailoring of the exposure scenario, based on the chemical, consumer product, receptor, and environment of interest. The model estimates acute and chronic exposures and provides a variety of exposure metrics.

ConsExpo is a computer program that enables and facilitates the estimation and assessment of exposure to substances from consumer products such as paint, cleaning agents and cosmetics. The model is developed by the National Institute for Public Health and the Environment (RIVM).

In October 2016 at ISES in Utrecht, the new freely available web version of ConsExpo Web was launched. The update of ConsExpo is executed by RIVM in collaboration with the counterpart institutes ANSES (France), BfR (Germany), BAG (Switzerland) and Health Canada.

The program provides insight in exposure to substances in consumer products via multiple exposure routes. Users can choose the most appropriate consumer

exposure scenario and use the default exposure models and exposure parameters set therein (from a database based on several product category Fact Sheets). Alternatively, users can perform an exposure assessment with user-specified exposure parameters. The program consists of both screening models and higher tier models for exposure estimation, and is referenced by REACH and other regulatory programs.

Afternoon session (1:00 pm – 4:00 pm):
Comparison of Consumer Exposure Models and Related Case Studies

Several models are developed to provide exposure estimates for chemicals in consumer products. These models are developed for different purposes, and have different capabilities (single chemical vs multiple chemicals), product representation (broad categories of products vs detailed product and use scenarios), and number of parameters required.

To get more insight in the similarities and differences with regard to model algorithms (under the hood), as well as choice of default values for exposure parameters, a comparison of ConsExpo Web (RIVM) with the Consumer Exposure Model CEM (U.S. EPA) is an interesting challenge.

Two case studies on a chemical in a consumer product will be put forward, one focusing primarily on a dermal exposure assessment, and one an inhalation exposure assessment. Participants will perform the exposure assessments, using CEM as well as ConsExpo Web.

Discussion will be facilitated on the similarities and/or differences in outcomes with regard to model algorithms as well as assumptions in the exposure scenarios. This should provide some insight (for a selected scenario) between the two models and can aid users in future exposure assessments when using exposure models (in general and for CEM and ConsExpo Web in particular).

PC03

Room 204

Bayesian Methods for Environmental Health Researchers

Ghassan B Hamra, Department of Epidemiology, Johns Hopkins Bloomberg School of Public Health; Baltimore, U.S.A.

Description

The goal of this course will be to provide a primer to the rationale and use of Bayesian statistical tools for environmental health research. The course will consist of a modest didactic component and will then allow participants to practice Bayesian analyses using R statistical software. Participants should have a basic working knowledge of R statistical software and will have installed RStudio and the Just Another Gibbs Sampler softwares as well as the rjags package on their laptops (which will be necessary for the practical exercises that will be included); instructions for installation of software can be found at www.r-bloggers.com/getting-started-with-jags-rjags-and-bayesian-modelling

Outline

(3 hours)

Part 1:

- Didactic
- Bayes philosophy and why everyone is basically Bayesian
- The case for Bayes in environmental health research

Part 2:

- Practical
- Coding a simple linear regression model
- Applying a prior
- Diagnosing model convergence

PC04

Room 209

Application of New Approach Methodologies for Exposure Assessment and Prioritization: Tools for Researchers and Regulators Including Use of Quantitative Structure Use Relationships (QSUR)

John Wambaugh, National Center for Computational Toxicology, U.S. Environmental Protection Agency (EPA); Research Triangle Park, U.S.A.
Katherine Phillips, Computational Exposure Division, National Exposure Research Laboratory, U.S. Environmental Protection Agency (EPA); Research Triangle Park, U.S.A.
Kristin Isaacs, Human Exposure and Atmospheric Sciences Division, National Exposure Research Laboratory, U.S. Environmental Protection Agency (EPA); Research Triangle Park, U.S.A.

Description

This course will cover new approach methodologies for exposure assessment as available from the U.S. Environmental Protection Agency's (U.S. EPA's) CompTox Chemistry Dashboard (www.comptox.epa.gov). The objective of the course is to provide the attendees with specific examples of how Dashboard tools can be used to obtain innovative and up-to-date exposure information for chemicals in support of exposure assessment or non-targeted analyses.

We will briefly introduce high-throughput exposure modeling, including consensus exposure modeling results from the Systematic Empirical Evaluation of Models (SEEM) analysis of exposure tools such as SHEDS-HT and other near-field models developed under the ExpoDat initiative. We will then present a brief overview of non-targeted analysis (NTA) and demonstrate Dashboard tools and workflows for "exposure forensics" of chemical unknowns in NTA. We will discuss the chemical and product use data in CPDat, the U.S. EPA's Chemical-Product database, as well as the Dashboard mass search, data source rankings, and and retention-time prediction tools. Finally, we will describe machine-learning based Quantitative Structure Use Relationships (QSUR) models for chemical function, which were developed to fill gaps in existing databases. We will present an NTA case study demonstrating how these QSUR models can inform NTA.

Outline

(3 hours)

This session will include:

1. Public Exposure Information on the CompTox Dashboard (John Wambaugh)
2. A Chemical Forensics Workflow for Non-Targeted Analysis (Kristin Isaacs)
3. Quantitative Structure Use Relationships (QSUR) for Exposure Assessment and Application in NTA (Katherine Phillips)

PC05

Room 210

Model-Based Geostatistics and Spatial Epidemiology: A Practical Introduction with R

Patrick Brown, Centre for Global Health Research, St Michael's Hospital, Department of Statistical Science, University of Toronto; Toronto, Canada

Description

Participants will become familiar with methods and tools for use with spatially referenced data of the type frequently encountered in environmental epidemiology research and described in Brown (2016). A typical problem involves a study population where health outcome (i.e. lung cancer) is presumed to depend on an environmental exposure (air pollution) and one or more spatially varying counfounding variables (neighbourhood-level income and ethnic distribution). A standard linear model (logistic regression or survival model) would assume individual's health outcomes are independent of one another given the explanatory variables. The Generalized Linear Geostatistical Model (GLGM) allows for the possibility that some form of spatial dependence (or autocorrelation) may be present, possibly due to an unknown or unmeasured risk factor. Fitting a geostatistical model allows for this residual spatial variation in risk to be estimated and mapped, and takes spatial dependence into account when inferring the effect of the exposure.

The emphasis of the course will be on understanding the GLGM and the results produced when using it. The first two hours of the course will be lecture-style, and a number of examples (air pollution and mortality in India, cancer survival in north-west England) will be worked through. The final hour will be a practical session where code will be provided to fit the GLGM to one or more datasets using the geostatsp package (see Brown 2015). The emphasis of this session will be on visualizing and understanding the results, and exploring how changing the modelling assumptions affects the conclusions.

Participants should install the *geostatsp* and *INLA* packages, the later can be obtained from www.r-inla.org.

Outline

(3 hours)

Models and methods

- Spatial correlation and Gaussian Random Fields
  - Simulating random fields
  - Understanding spatial correlation functions
- Generalized Linear Geostatistical Models for spatially referenced data
- Linear regression models with spatial random effects
- A model for relating mortality to air pollution in India
- Bayesian inference, Fitting models to data
  - Bayesian inference and prior distributions
  - Making and mapping spatial predictions
  - Posterior distributions of model parameters

Practical session

- Data and R scripts will be provided
- Coffee shops and elections in Toronto
- Does the downtown intellectual elite drink lattes?
- Soil mercury in Europe
- Where is it the highest?

References:

Brown, Patrick E. 2015. "Model-Based Geostatistics the Easy Way." *Journal of Statistical Software* 63. www.jstatsoft.org/v63/i12.

Brown, Patrick E. 2016. "Geostatistics in Small-Area Health Applications." In *Handbook of Spatial Epidemiology*, edited by Andrew B. Lawson, Sudipto Banerjee, Robert P. Haining, and Maria Dolores Ugarte, 211–24. Chapman & Hall/Crc Handbooks of Modern Statistical Methods. Chapman; Hall/CRC. www.taylorfrancis.com/books/e/9781482253023.

PC06

Room 204

Predicting Microscale Urban Features Using Street-Level Images: An Introduction to Machine Learning

Mahdi Shooshtari, Canadian Urban Environmental Health Research Consortium (CANUE) Department of Geography, University of Victoria; Victoria, Canada
Joseph Paul Cohen, Montreal Institute for Learning Algorithms, University of Montreal; Montreal, Canada
Evan Seed, Canadian Urban Environmental Health Research Consortium (CANUE), Dalla Lana School of Public Health, University of Toronto; Toronto, Canada

Description

The Canadian Urban Environmental Health Research Consortium is developing a wide range of metrics related to urban form for approximately 800,000 postal codes in Canada, annually from the early 1980s onward. One area of interest is identifying the local climate zones, which are defined according to building and vegetation type, height and density, for every postal code. In this course, CANUE specialists will guide participants through a hands-on exercise using street-level images to create a training dataset for local climate zones, and then categorize a set of postal code locations into local climate zones. The process, software and scripts provided/created in the course can later be used by participants on their own for identifying many other kinds of objects in images.

Outline

(3 hours)

- Overview of course objectives
- Introduction to machine learning for image processing
- Building a tensor flow image classifier
- Creating training data – categorizing urban form by postal code
- Training the neural network and applying to new images
- Q/A, group discussion of application ideas, strengths and limitations

PC07

Room 209

Causal Inference Foundations and Applications in Environmental Health Sciences

Jay Kaufman, Department of Epidemiology, Biostatistics and Occupational Health, McGill University; Montreal, Canada
Alexander Keil, Department of Epidemiology, Gillings School of Global Public Health, University of North Carolina; Chapel Hill, U.S.A.

Description

This course will present emerging methodologic challenges in environmental epidemiology and introduce foundational concepts and practical approaches for addressing these challenges. Our focus is on introducing causal concepts that sharpen the common approaches to data analysis, and motivating the use of modern statistical methods of inverse probability weighting, g-estimation, and g-computation. These methods will be applied to environmental problems, with particular focus on assessing health effects of long-term exposure and estimating policy impacts from observational studies of non-representative populations. Participants will gain a theoretical background for deciding between methods, and will be provided with SAS, Stata, and R code for applying each approach. At the end of the course, participants will be aware of ways in which their current research questions may benefit from modern approaches to data analysis, and in which ways these modern approaches may allow them to ask and answer new questions about their data. Participants will gain skills in interpreting software output from existing packages, as well as implementing

causal inference analyses using standard software packages. SAS, Stata, and R scripts will be provided to all participants.

Outline

The first part of the course will be devoted to theoretical and conceptual descriptions of the proposed methods with concrete examples. This session will include:

1. Definitions and identification of causal effects
2. Inverse probability weighting and marginal structural models for point-exposures and time-varying exposures
3. G-estimation and structural nested models
4. G-computation and policy impact estimation

The second section of the course will be devoted to hands-on course with instructor-led discussions and guided exercises. R, SAS and Stata scripts and specific functions fromguided exercises will be provided to all participants.

PC08

Room 210

Advanced Modelling Techniques for Time Series Analysis Using R

Antonio Gasparrini, **Ana Maria Vicedo-Cabrera** and **Francesco Sera**
Department of Social and Environmental Health Research, London School of Hygiene and Tropical Medicine; London, UK

Description

Time series analysis has become a key tool for investigating short-term effects of environmental risk factors. In the last two decades, there has been an intense activity to develop more sophisticated study designs and statistical models for using time series data in this context. This course will offer an overview of recent methodological advancements, focusing on their application through the statistical software R. Participants will be provided with a theoretical introduction, as well as practical experience with a hands-on session using real-data examples, using a mix of mini-lectures and mini-practicals. At the end of the course, participants will be able to apply state-of-the-art methodologies for time series analysis using R, and will gain skills to correctly interpret software outputs and conduct these analyses within their own research projects. R scripts and specific functions will be provided to all participants.

Outline

(3 hours)

The session will involve a mix of mini-lectures and mini-practicals on the various topics covered in the course, including illustrative examples and real-data analyses. The session will cover:

1. Introduction to time series analysis with R
2. Study designs and statistical models for time series analysis: an overview of packages and functions in R
3. Modelling non-linear and delayed effects: an introduction to distributed lag linear and non-linear models and the R package dlnm
4. Pooling results in two-stage multi-location analyses: multivariate meta-analysis and meta-regression and the R package mvmeta
5. From aggregated to individual-level time series analysis: an introduction to the novel case time series design

SOCIAL PROGRAM

Many networking and social events have been organized during the ISES-ISEE 2018 Joint Annual Meeting. All of these events are open and inclusive to members of both ISES and ISEE, as well as non-members. We hope that you will take advantage of the many opportunities for learning, networking, and socializing in and around Ottawa.

With many social events already sold out, please come to the registration desk to see if tickets are still available.

Welcome Reception

Sunday August 26, 5:30 pm
Shaw Centre, Canada Halls 1 & 2 — Included in the registration fee

The ISES-ISEE 2018 Joint Annual Meeting is delighted to welcome Resident Elder Jane Ann Chartrand to open the Conference, and Aboriginal Experiences, who will perform "Spirit of Dance" at the Welcome Reception on Sunday, August 26.

Resident Elder Jane Ann Chartrand
Jane Chartrand grew up near the Madawaska River in Ontario. Her mother, Katherine and father Emmet, were both of Algonquin descent. At a young age, Jane lived in the village with her maternal Grandmother, Nokomis. Her Nokomis taught her the traditions and beliefs of the Algonquin people. It was through Nokomis's elaborate storytelling that Jane was told the tales that she now retells. At sixteen, Jane married and began a family of her own. She is the mother of three and Grandmother to eight children. She has lived in many areas but calls Whitney, Ontario, her home.

In 2004, Jane was presented with the Canadian Aboriginal Music Award's "Keeper of Traditions in Aboriginal Music Award" for her years of dedication to healing through song stories and books. People relate to the stories in Jane's songs, and feel safe sharing their own stories. Jane is an advocate for women's rights and equality, and a positive role model. She worked with Correctional Services Canada for more than 25 years, advises the Aboriginal Justice Directorate, and is a dedicated volunteer on numerous Boards of Directors. A residential school survivor, Jane has been instrumental in the healing journey of many residential school survivors through the Indian Residential Schools Adjudication Secretariat's Group Independent Assessment Process. Jane is a frequent speaker for universities, government agencies, and local communities, sharing her knowledge of Aboriginal culture and spiritual teachings. Jane is a dedicated healer, often reconnecting Aboriginal people with their own traditional teaching and culture.

Aboriginal Experiences
Aboriginal Experiences Arts & Culture programs offer a rare opportunity to experience the rich culture, teachings and history of Canada's First People from their own perspective. This talented team of Aboriginal artists represents the Aboriginal community of Ottawa today – a diversity of native nations from across Canada *(or Turtle Island)*. They pride themselves on delivering a truly authentic experience that illustrates both the diversity of the Aboriginal cultures originating in Canada, and how they've progressed through the ages. Their performances not only entertain and reflect, but more importantly, respect the diverse Aboriginal cultures of our community.

Turtle Island Tourism Company was formed in partnership with the Odawa Native Friendship Center, a cultural center serving the Aboriginal community

in the Capital region. It is through forming and maintaining partnerships within the Aboriginal community that the team ensures the authenticity of their performances. Their programs bring this rich history to life with authentic learning experiences of Aboriginal history, culture and arts.

The songs, dances, and stories are the strength of Aboriginal people and provide the legacy for our future generations. The dances shared with the audience will provide a unique insight into the traditional and contemporary lives of Aboriginal People. These dances are typically done at Pow Wows, which are a celebration of music and dance.

Spirit of Dance
The "*Spirit of Dance*" is a vibrant performance of Pow Wow dance that celebrates the diversity of evolving Aboriginal culture and captures the heart and spirit of dance for the community. "*Spirit of Dance*" showcases both men's and women's styles with vibrant performances of five unique Pow Wow dance styles set to the "heartbeat" of the drum, concluding with a special contemporary hoop dance.

Women's Networking Event

Monday August 27, 6:00 pm – 7:30 pm
National Arts Centre (NAC), 1 Elgin St, across the canal from the Shaw Centre

The Conference organizers are excited to invite delegates to attend the first ISES-ISEE Joint Women's Networking Event and the fifth ISES Women's Networking Event! Enjoy an early evening of mingling and networking activities with other women engaged in science and research. This event is a great opportunity for women in exposure and epidemiological sciences to share research ideas, expand professional networks, and discuss challenges and successes. The Women's Networking Event will be held in the newly renovated National Arts Centre (NAC), less than a 5 minute walk from the Shaw Centre where the Conference will be held. Refreshments will include appetizers and a drink (plus cash bar).

Conference Dinner

Tuesday August 28, 7:00 pm - 12.00 am
National Arts Centre (NAC), 1 Elgin St, across the canal from the Shaw Centre

We are happy to announce that the Conference Dinner will take place at the National Arts Centre (NAC). The NAC collaborates with artists and arts organizations across Canada to help create a national stage for the performing arts, and acts as a catalyst for performance, creation and learning across the country. The newly renovated NAC lies across the canal, less than a 5 minute walk, from the Shaw Centre where the conference will be held. The rooms selected for conference events feature floor to ceiling windows with views of the canal and historic buildings. The NAC also has an outdoor terrace for mingling and cocktails before dinner, weather permitting.

Technology and Sensor Fair

Wednesday August 29, 5:45 pm – 7:30 pm
Shaw Centre, Parliamentary Foyer *Included in the registration fee*

The Technology and Sensor Fair is an opportunity for researchers in the fields of exposure science and environmental epidemiology to participate in interactive, hands-on demonstrations of new, updated, or emerging technology, tools, and software. Participants will have an opportunity to interact with the technology, and determine how it might be integrated in their current or future research.

Chapters and Committees Fair

Wednesday August 29, 5:45 pm – 7:30 pm
Shaw Centre, Parliamentary Foyer *Included in the registration fee*

The Chapters and Committees Fair is a great opportunity to find out what's going on in the societies and learn ways to get involved. Representatives for all of the ISES and ISEE Chapters and Committees will be on hand to showcase their activities and recruit members. This event is traditionally a part of the ISES annual Conference, and we are excited to include ISEE for the first time as well!

Ottawa City Tour

Saturday August 25, 11:00 am – 1:00 pm
Meet at the main entrance of the Shaw Centre

This tour is the perfect mix of the city's main landmarks, its surprisingly seedy history, and some of the hottest spots locals love. Starting at the National War Memorial, we'll take you down the pedestrian mall of Sparks Street, past Parliament Hill and the Chateau Laurier, and finish up in the Byward Market. With violent Prime Ministers, political assassinations, lumberjack gang violence and vindictive governor generals, Ottawa has one of the most fascinating histories around! This private tour is led by Ottawa Free Tours. For more tours open to the public visit: www.ottawafreetour.com.

Ottawa Historical Tavern Tour

Monday August 27, 8:00 pm – 10:00 pm
Meet at the main entrance of the Shaw Centre

Come hear about Ottawa's colourful history of scoundrels, assassins and spies over a pint of local beer. We'll bring you around the Byward Market to 3 of Ottawa's coolest taverns and pubs and tell you fascinating stories over a few glasses of local craft beer. This private tour is led by Ottawa Free Tours. For more tours open to the public visit: www.ottawafreetour.com.

Fun Run: Welcome to Ottawa!

Tuesday August 28, 6:00 am (please arrive by 5:45 am)
Meet at the main entrance of the Shaw Centre

We will be running alongside the Rideau Canal for approximately 3 miles (5 km). A longer course will be offered to those who wish to do a longer run (8 to 10 km). There will be several pace groups optional. Information will be sent by email to those who register to the event and information will also be posted on the meeting website. This is just a Fun Run – the event will not be timed. Water will NOT be provided during the Fun Run. If you will need water during the run, please bring your own water bottle. Please note the entire course takes place along the Rideau Canal and that there will be no traffic closures on the route.

Pre-registration is not required

Taste of Canada Research Incubator

Wednesday August 29, 7:30 pm
Beckta Dining & Wine, 150 Elgin St, a 5 minute walk from the Shaw Centre

Unwind and get inspired in one of Ottawa's finest dining rooms and wine bars, Beckta (www.beckta.com). Join colleagues over hors d'oeuvres, wine and fine flavors of Canada only steps away from the meeting for the fine flavors of Canada. The curated event brings together Conference attendees in a warm, welcoming environment to discuss emerging issues and to form potential collaborations. The Incubator will bring together the experiences and stories of Conference attendees, from trainees to late-career, to foster new ideas in exposure science and environmental epidemiology. Move freely, follow discussions, and form lasting bonds with colleagues as the night wanes and prospective collaborations form.

Ottawa After Dark Tour

Wednesday August 29, 8:00 pm
Meet at the main entrance of the Shaw Centre

Sure, Ottawa seems like a nice town, but what happens after the sun sets? Come find out on this luminous, hilarious and fascinating tour. Our guides will take you onto Parliament Hill and through Centretown Ottawa as they recount stories from some of that darker side's of the city's past. This tour will feature Ottawa's beautiful skyline at sunset, fantastic monuments lit up at night, and will finish at Parliament Hill in time for the free light show happening throughout the summer. Come hear the darker side of Canada's past before seeing it light up on Parliament! This private tour is led by Ottawa Free Tours. For more tours open to the public visit: www.ottawafreetour.com.

Ottawa Express Bicycle Tour

Thursday August 30, 2:00 pm
Meet at 65 Sparks St, a 10 minute walk from the Shaw Centre

Ottawa is home to many bicycle paths that offer beautiful views of the landscape and a way to sustainably see its attractions. ISES-ISEE 2018 is offering the option to register for guided bicycle tours of Ottawa. Tour guides from Escape Tours & Rentals (www.escapebicycletours.ca/tours/scheduled-tours/) will lead cyclists at a leisurely pace to see the main attractions of Ottawa. This ride is 2 hours long and features Ottawa's main attractions.

Ottawa Bicycle Tour

Friday August 31, 10:00 am
Meet at 65 Sparks St, a 10 minute walk from the Shaw Centre

Ottawa is home to many bicycle paths that offer beautiful views of the landscape and a way to sustainably see its attractions. ISES-ISEE 2018 is offering the option to register for guided bicycle tours of Ottawa. Tour guides from Escape Tours & Rentals (www.escapebicycletours.ca/tours/scheduled-tours) will lead cyclists at a leisurely pace to see the main attractions of Ottawa. This ride is 3.5 hours and features an extended list of Ottawa attractions: Rideau Canal, Lansdowne Park, Old Ottawa South, Arboretum, Dow's Lake, Little Italy, the War Museum, and more.

Ottawa Boat Cruise

Friday August 31, 2:00 pm (Please arrive by 1:45 pm)
Meet at the base of the Ottawa Locks (west of the Chateau Laurier Hotel, at the north end of the canal), a 10 minute walk from the Shaw Centre

Come on out to see Canada's Capital City from the water! ISES-ISEE 2018 has arranged a sailing on the Ottawa River on Friday August 31 at 2 pm. All are welcome, bring a friend or your family! If you cannot make it with us, be sure to check out Paul's website (www.paulsboatline.com). They offer the same tour at multiple times daily. The duration of the tour is 1.5 hours. It includes live commentary (Parliament buildings, Supreme Court, Prime Minister's residence, various buildings/monuments, Rideau Falls, etc.), cash bar and snacks available for purchase.

Whitewater Rafting on the Ottawa River

Friday August 31, 7:00 am (all-day)
Meet at the main entrance of the Shaw Centre

This activity happens rain or shine. Raft Canada's most famous whitewater river! Featuring great Canadian wilderness and spectacular high volume rapids, the Esprit "Two-Channel" day trip will take you down both the Middle and the Main channels of the Ottawa River. For more information visit: www.whitewater.ca/whitewater_rafting_ottawa.html.

ISES 2018 AWARDS

Excellence in Exposure Science Award

This award is inspired by the work of visionary individuals who have helped shape the field of exposure science and who supported the origins and growth of ISES and have now passed on but left a strong legacy.

About the Excellence in Exposure Science Award

The motivation for this award is the recent loss of iconic and groundbreaking researchers exemplified by Natalie Freeman, Michael Lebowitz, Paul Lioy, and Larry Needham. The award recognizes individuals who produce significant advances in the development and/or translation of exposure science and exhibit leadership and service in ISES and/or the exposure science community.

2018 Winner:
Petros Koutrakis, PhD

Harvard University, T.H. Chan School of Public Health, Massachusetts, U.S.A.

Dr. Petros Koutrakis received his Ph.D. in Environmental Chemistry from the University of Paris VII. His research interests include: exposure assessment to indoor and outdoor air pollution; development of sampling and analysis techniques to measure concentrations of personal, indoor, and outdoor pollutants; development of particle concentration methods for toxicological studies; atmospheric chemistry and monitoring projects; and air-pollution health-effects studies. Recently his research interests have extended to include the assessment of exposures and health effects of terrestrial and cosmic radiation.

During his career, he has served as Editor-in-Chief for the Journal of the Air and Waste Management Association, the Director of the Exposure Epidemiology and Risk Program at Harvard, and a member of several National Academies and Institute of Medicine Panels. He has directed four successive Harvard EPA Centers on Air Quality and Health starting in 1999. These Centers have been multidisciplinary efforts that bring together investigators with expertise in many different fields, including exposure science, where he has had the opportunity to engage in a number of collaborative studies. He has been the Principal Investigator on numerous projects in the U.S.A. and abroad including Brazil, Canada, Chile, Cyprus, Greece, Japan, Korea, Kuwait, and Spain. He has served as a primary doctoral thesis advisor of 27 students, has authored over 360 peer-reviewed publications and holds 10 U.S.A. patents.

Joan M. Daisey Outstanding Young Scientist Award

This award recognizes outstanding contributions to the science of human exposure analysis by a young scientist

About the Joan M. Daisey Outstanding Young Scientist Award

Joan Daisey was a founding ISEA member and past president (1995-1996), continuing to be active until her death in 2000. Daisey was senior staff scientist at the U.S. Department of Energy's Lawrence Berkeley National Laboratory (Berkeley Lab) and one of the nation's leading experts on indoor air quality.

2018 Winner:
Kate Hoffman, PhD

Duke University, Nicholas School of the Environment, North Carolina, U.S.A.

Kate Hoffman is an environmental epidemiologist at the Duke University Nicholas School of the Environment. She received her PhD in Environmental Health from the Boston University School of Public Health and completed postdoctoral fellowships at the University of North Carolina at Chapel Hill and Duke University. Dr. Hoffman's research is grounded in a developmental-origins of health disease framework and focuses on determining the impacts of early life environmental chemical exposures on children's growth, development and long-term health. Her work combines

biomonitoring, environmental sampling and geospatial techniques to assess exposure to environmental contaminants and to investigate relationships between environment mixtures and children's health. Dr. Hoffman has been the leader of several projects investigating prenatal exposure to environmental contaminants, including flame retardants, demonstrating impact on early growth and neurodevelopment. Her recent work investigating infants' and toddlers' exposure to environmental contaminants suggests that exposure to semi-volatile organic compounds (SVOCs) occurs in mixtures and varies seasonally, a finding of particular importance for epidemiologic studies investigating the impacts of exposure on health outcomes. Expanding upon this research, she currently serves as Principal Investigator of a study funded by the Gerber Foundation to investigate infants' exposure to organophosphate esters and their impact on early immune system development and function.

About the JSEE Young Investigator Meeting Award

This is annual award provides travel support for a student or new researcher (within 10 years of terminal degree) to support young investigator participation in the ISES annual meeting. This award is sponsored by the Journal of Exposure Science and Environmental Epidemiology (JESEE), a Springer Nature publication.

JESEE Young Investigator Meeting Award

This award supports student and new researcher participation at the ISES annual meetings.

2018 Winner: Donghai Liang, PhD, MPH

Emory University, Environmental Health, Georgia, U.S.A

Donghai Liang is a researcher and recent PhD graduate in the Department of Environmental Health at Emory University. His current research focuses on health effect associated with traffic-related air pollution using exposure assessment and high-resolution metabolomics. During his doctoral training at Emory, he served as a lead researcher and project manager on several projects funded by U.S. Environmental Protection Agency and Health Effects Institute. Donghai has first authored and co-authored 12 papers in topics related to exposure science, environmental metabolomics, and molecular epidemiology. In addition, Donghai has presented 11 platform and 10 poster presentations in the annual Conferences of International Society of Environmental Epidemiology (ISEE) and International Society of Exposure Science (ISES). He is the recipient of several Conference Travel Awards and Best Student Poster Awards from both societies, and was a Gold Medalist in the International Genetically Engineered Machine competition in 2011 held in Boston, U.S.A. Currently, Donghai serves as the co-chair of the ISES Diversity Committee and member of the Technical Organization Committee at the 2018 joint ISES-ISEE Conference.

ISES Award for Best JESEE Paper

This is an annual award to recognize ISES members for work published in the Journal of Exposure Science and Environmental Epidemiology (JESEE) that exemplifies innovative and creative exposure science research and scholarship.

2018 Winner:

Morgan, Marsha; MacMillan Denise; Zehr, Dan; and Sobus, Jon. **"Pyrethroid insecticides and their environmental degradates in repeated duplicate-diet solid food samples of 50 adults."** *Journal of Exposure Science and Environmental Epidemiology. Volume 28 (2018): 28: 40-45.*

ISES Member Authors

Marsha Morgan
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Jon Sobus
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ISES Award for Best Student Paper

This is an annual award for the best paper authored by a student in the prior publication year. This award recognizes the scholarship of students and recent graduates and their contributions to the field of exposure science.

2018 Winner:

Hind Sbihi, PhD
University of British Columbia
Children's Health Research Institute
British Columbia, Canada

Hind Sbihi, Mieke Koehoorn, Lillian Tamburic, and Michael Brauer. **"Asthma trajectories in a population-based birth cohort. Impacts of air pollution and greenness."** *American Journal of Respiratory Critical Care Medicine, Vol 195, Iss 5, pp 607–613, (2017).*

ISEE 2018 AWARDS

ISEE 2018 recognizes outstanding scientists with the following awards:

John Goldsmith Award
Mark Nieuwenhuijsen, PhD, ISGlobal, Spain

Mark J Nieuwenhuijsen PhD (ISGlobal, Barcelona) is a world leading expert in environmental exposure assessment, epidemiology, and health risk/impact assessment with a strong focus and interest on healthy urban living. He led the international TAPAS study (www.tapas-program.org), examining the health impacts of active transport in six European cities and the EC funded PHENOTYPE (www.phenotype.eu) study, examining the relations between green space and health, and the ISGlobal funded SUMA HIA project on health impact assessment in low and medium income countries. He is/was a co-investigator in ICEPURE (www.icepure.eu), that examines exposure to and health effects of solar UV exposure, ESCAPE (www.escapeproject.eu) (and related (VE3SPA), that examines the long term health effects of air pollution, NIH funded CAVA which aims to validate smartphone based data collection methods, EC funded CITISENSE (www.citi-sense.eu) that aims to empower citizens using smartphone technology, EC funded HELIX (www.projecthelix.eu), that examines the early life exposome and childhood diseases, EC funded EXPOsOMICs (www.exposomicsproject.eu) that examines the air pollution and water exposome and health, the EC funded PASTA study (www.pastaproject.eu), which promotes active transportation through sustainable transport, the EC funded BlueHealth project (www.bluehealth2020.eu) evaluating the relationship between blue space and Health and the EC funded LifeCycle project (www.lifecycle-project.eu) on birth cohort coordination in Europe. He is a associate editor for EHP, OEM and Cities and Health. He has co-authored almost 400 papers published in peer reviewed journals and has edited 3 text books on Exposure Assessment and on Environmental Epidemiology. His latest book "Integrating human health into urban and transport planning" just came out and is essential reading for those interested in the link between urban and transport planning, environment and health.

John Goldsmith Award for Outstanding Contributions to Environmental Epidemiology

This award was created to honor the legacy of Dr John Goldsmith, one of the organizers, early leaders, and constant supporter of the International Society for Environmental Epidemiology. This award is given to investigators for "sustained and outstanding contributions to the knowledge and practice of environmental epidemiology." Recipients have typically contributed in substantive and innovative fashion to the methods and practice of epidemiology over many years.

Tony McMichael Award
Remy Slama, PhD, Inserm, France

Rémy Slama (PhD) is Senior Investigator at Inserm (the French Institute of Health and Medical Research) where he leads the Inserm-Grenoble-Alpes University joint research team in Environmental Epidemiology applied to Reproduction and Respiratory Health. He previously held affiliations at Inserm-Paris and at Helmholtz Center Munich. After a scientific formation at Ecole Polytechnique and Agro Paris-Tech, he obtained a PhD in public health from University Paris-Sud in 2002 and *a habilitation* from Grenoble medical school (2011).

His research aims at characterizing the influence of environmental contaminants on human reproduction and childhood health. A specific focus is the influence of

Tony McMichael Mid-Term Career Award

This award was created in Dr Tony McMichael's memory to recognize mid-career scientists. Tony was a world renowned epidemiologist known not only for his scientific work, but also for hIs compassionate mentoring of junior colleagues. He was President of ISEE from 2008-2009.

early life (intra-uterine) environmental exposures on the health of the fetus and the child (Developmental Origins of Health and Diseases, or DOHaD, concept). In that context, his team is particularly interested in the effects of *atmospheric pollutants, short half-lived endocrine disruptors* (phenols, phthalates) and, more recently, the *exposome* as a whole. His methodological research track focuses on approaches to limit exposure misclassification (such as the *within-subject biospecimens pooling approach*) and on study design.
R. Slama is president of the scientific council of the French research program on endocrine disruptors (PNRPE); he belongs to several experts groups and scientific councils related to environmental health, such as the scientific council of Santé Publique France (the French CDC), the Scientific Committee on Health and Environmental Risks (SCHEER) of the European Commission and acted as an elected Councilor of the International Society of Environmental Epidemiology (ISEE) where he is still in charge of relations with WHO.

Rebecca James Baker Award
Haneen Khreis, PhD, MSc
Texas A&M Transportation Institute, U.S.A.

Dr. Haneen Khreis is a cross-disciplinary researcher studying the health impacts of transport planning and policy. Khreis has a unique background in transport and health with degrees in Civil and Structural Engineering (B.Sc., Eng.) and in Transport Planning and Engineering (M.Sc., Eng.) which focused on the health impacts of transport-related air pollution. She completed her doctoral studies working between the Leeds Institute for Transport Studies (ITS) and the Leeds Institute of Cardiovascular and Metabolic Medicine (LICAMM), in collaboration with the Centre for Research in Environmental Epidemiology (CREAL) at the Barcelona's Institute for Global Health (ISGlobal). Khreis also did a short research stay at ISGlobal. Khreis has experience and training in transport planning and engineering, vehicle emissions monitoring and modeling, air quality monitoring and modeling, exposure assessment, systematic reviews and meta-analyses, health impact and burden of disease assessment, policy options generation, cross-disciplinary collaboration, curriculum development, and the science-policy link in transport and health. She also worked in the fields of epidemiology, childhood asthma, and climate action and co-benefits. To date, Khreis has published 25 peer reviewed articles on the above topics and has numerous in preparation. She co-edited a book on *"Integrating Human Health into Urban and Transport Planning"* and is now leading one on *"Traffic-Related Air Pollution: Emissions, Human Exposures and Health"* and co-editing another on *"Transport and Health"*. Khreis is currently an Assistant Research Scientist at the Texas A&M Transportation Institute (TTI) and the Center for Advancing Research in Transportation Emissions, Energy, and Health (CARTEEH) and remains an Associated Researcher at ISGlobal. At CARTEEH, she leads the development of a graduate-level cross-disciplinary curriculum on Transportation Emissions, Air Pollution, Exposures, and Health and leads a European and a U.S.A.-wide burden of disease assessment on traffic-related air pollution and childhood asthma, among other undertakings.

Rebecca James Baker Award

This award was created in memory of Dr. Rebecca Baker, a young investigator with a commitment to environmental epidemiology as a tool for improving public health and quality of life. She worked on many international studies with people from different cultures and backgrounds, and was an active member in the Society. The award is given to new investigators who embody her approach to epidemiological research.

Best Environmental Epidemiology Paper Award

This ISEE annual award for the best environmental epidemiology paper published in a peer-reviewed journal aims to recognize excellence in the field of environmental epidemiology and encourage the publication of outstanding papers.

Best Environmental Epidemiology Paper Award

2018 Award Winner

A cleaner burning biomass-fuelled cookstove intervention to prevent pneumonia in children under 5 years old in rural Malawi (the Cooking and Pneumonia Study): a cluster randomised controlled trial

Kevin Mortimer, Chifundo B Ndamala, Andrew W Naunje, Jullita Malava, Cynthia Katundu, William Weston, Deborah Havens, Daniel Pope, Nigel G Bruce, Moff at Nyirenda, Duolao Wang, Amelia Crampin, Jonathan Grigg, John Balmes, Stephen B Gordon

Lancet 2017; 389: 167–75

ISES-ISEE 2018 NEW RESEARCHERS ABSTRACTS AWARDS

Environmental Epidemiology

Keren Agay-Shay

Title: **Greenness and Adverse Pregnancy Outcomes in Tel-Aviv during 2000-2014**
Session: Greenness Effects 2 (003.03.41)
Wednesday, 3:15 pm - 3:30 pm

Dr. Agay-Shay is an environmental epidemiologist with extensive background in environment, ecological microbiology and public health. She is interested in understanding the links between beneficial and harmful exposure and their effects on health outcomes, mainly adverse pregnancy outcomes, child health, and cancer incidence.

Audrey Gaskins

Title: **Time-Varying Exposure to Fine Particulate Matter and Black Carbon and Outcomes of In Vitro Fertilization**
Session: Air Pollution, Pregnancy and Perinatal Health Outcomes (002.04.01)
Tuesday, 4:15 pm - 4:30 pm

Audrey Gaskins is a research associate at the Harvard T.H. Chan School of Public Health and instructor of medicine at Harvard Medical School. Dr. Gaskins studies how environmental and dietary factors influence fertility and fecundity in men and women. Her current career development grant from NIEHS explores the relationship between air pollution and fecundity, the potential for diet to modify these associations, and the possible mechanisms of action using a cohort of women undergoing in vitro fertilization. Her work utilizes innovative technologies to study these associations including validated models of ambient air pollution, personal fine particulate monitors, and metabolomics biomarkers. Dr. Gaskins will continue this work as an assistant professor at the Rollins School of Public Health at Emory University starting in January 2019.

Exposure Science

Qingyang Xiao

Title: **An Ensemble Machine-Learning Model to Predict Historical PM2.5 Concentrations in China from Satellite Data**
Session: Application of Machine Learning Methods to Develop Spatiotemporal Models of Air Pollution (001.04.07)
Monday, 4:30 pm - 4:40 pm

Qingyang Xiao is a researcher interested in air pollution monitoring and epidemiological analyses. She received her B.S. from Peking University and her Ph.D. from Emory University. Qingyang currently works on real-time PM2.5 prediction in China and she can be reached at qingyang.xiao3@gmail.com.

Fernán A. Villa

Title: **Artificial Neural Networks to Mix Datasets from Particulate Matters and O3 In Medellín, Colombia**
Session: Advances in Ambient Air Pollution Modeling-Part II (003.03.06)
Wednesday, 3:30 pm - 3:45 pm

Fernán A. Villa is a Professor in Universidad Nacional de Colombia, Medellín, Colombia. He received the Engineering degree in Computer and Systems Engineering in 2008, the MS degree in Systems Engineering in 2010 and the PhD in Engineering in 2016, all of them from the Universidad Nacional de Colombia. His current research interests are in the areas of computer science, data science, epidemiology, public health, artificial intelligence, big data, analytics and internet of things.

PLENARY SESSIONS

Sunday, August 26
6:00 pm - 6:30 pm

The Role of Occupational Studies in Expanding Our Knowledge of Environmental Carcinogens

Paul Demers, Occupational Cancer Research Centre, Toronto, ON, Canada

Paul Demers is the Director of the Occupational Cancer Research Centre (OCRC), based at Cancer Care Ontario in Toronto, as well as a Professor with the Dalla Lana School of Public Health at the University of Toronto and a Clinical Professor with the School of Population and Public Health of the University of British Columbia. He is also the founder of CAREX Canada, a national occupational and environmental carcinogen surveillance project. He has a PhD in epidemiology and a Master's of Science in occupational hygiene. Paul has been a member of many national and international expert panels dealing with occupational and environmental cancer for organizations such as the International Agency for Research on Cancer, the U.S. National Toxicology Program, the Canadian Cancer Society, the Royal Society of Canada, the U.S. Institute of Medicine, the Health Effects Institute, and the American Conference of Governmental Industrial Hygienists.

Monday, August 27
8:30 am - 9:00 am

Climate Change: The Greatest Public Health Challenge of Our Time

Gina McCarthy, Harvard University, T.H. Chan School of Public Health, Boston, MA, U.S.A.

McCarthy's 35-year career in public service has been dedicated to environmental protection and public health. As Administrator of the U.S. Environmental Protection Agency under President Barack Obama, she was the nation's leading advocate for common-sense strategies to protect public health and the environment, including efforts to address the challenge of climate change and ensure the protection of the country's water resources. Her leadership led to significant federal, state, and local actions on critical issues related to the environment, economic growth, energy, and transportation. Since leaving Washington, McCarthy has been a fellow at Harvard's Kennedy School of Government's Institute of Politics and the Menschel Senior Leadership Fellow at Harvard's T.H. Chan School of Public Health and joined Pegasus Capital Advisors, a private equity firm, as an operating advisor focused on sustainability and wellness investments. McCarthy now also serves as Professor of the Practice of Public Health in the Department of Environmental Health at Harvard's T.H. Chan School of Public Health and Director of Harvard Chan's Center for Health and the Global Environment, leading the development of the School's strategy in climate science, health, and sustainability.

Monday, August 27
9:00 am - 9:30 am

WHO Global Strategy on Health, Environment and Climate Change

Maria Neira, World Health Organisation (WHO) Department of Public Health, Environmental and Social Determinants of Health, Geneva, Switzerland

Dr Maria P. Neira was appointed Director of the Department of Public Health, Environmental and Social Determinants of Health at the World Health Organization, Geneva, Switzerland in September 2005. Prior to that, she was Vice-Minister of Health and President of the Spanish Food Safety Agency. She had previously held several senior positions in WHO. Dr Neira began her career as a medical coordinator working with refugees in the Salvador and Honduras for Médecins Sans Frontières (Doctors Without Borders).
Dr Neira is a Spanish national, and a medical doctor by training. She specialized in Endocrinology and Metabolic Diseases; and Public Health. Dr Neira has been awarded the Médaille de l'Ordre national du Mérite by the Government of France and is a member of the Academy of Medicine, Asturias, Spain.

Tuesday, August 28
8:30 am - 9:00 am

The Health of the Land and Our Culture: Indigenous Rights as Pathways to Healthy Environments

Eriel Tchekwie Deranger, Indigenous Climate Action, Edmonton, AB, Canada

Eriel Tchekwie Deranger is a mother of two and a proud Denesuline Indigenous woman and member of the Athabasca Chipewyan First Nation (ACFN), Treaty 8 Northern Alberta. Deranger is currently the Executive Director and co-founder of Indigenous Climate Action (ICA) – Canada's premier Indigenous-led climate justice organization. Prior to her work with ICA, Deranger spent 6 years working for her First Nation to build out one of the largest intersectional and powerful keep in the ground campaigns on the planet – the international Indigenous Tar Sands campaign challenging the expansion of Alberta's Tar Sands, one of the world's dirtiest fossil fuels, in their traditional lands and territory in Northern Alberta, Canada. Deranger is recognized for her role in interventions at UN Climate Summits; lobbying government officials in Canada, the U.S., the UK and the EU; developing the Tar Sands Healing Walk in the heart of Alberta's tar sands; spring boarding one of the first Internationally recognized Indigenous rights-based divest movements; and working to develop and lead mass mobilizations highlighting the mass inequity of the impacts the fossil fuel industry and climate change on the rights of Indigenous peoples. Deranger's work has resulted in her far reaching reputation for bridging the environmental and Indigenous rights movement together and building out an Indigenous rights based approach to challenging fossil fuel development. Deranger's expertise is often sought out for university lectures and keynote address at events and Conferences the world over. Her experience working within the Environmental Justice and Indigenous Rights field is demonstrated through her work with organizations like the Indigenous Environmental Network (IEN), Rainforest Action Network (RAN), Federation of Saskatchewan Indian Nations (FSIN), and with her home Nation the ACFN.

Tuesday, August 28
9:00 am - 9:30 am

How Can Birth Cohort Studies Contribute to Knowledge and Policies of the World to Reduce Risks of Emerging Contaminants?

Shoji Nakayama, National Institute for Environmental Studies, Centre for Health and Environmental Risk Research, Exposure Dynamics Research Section, Tsukuba-City, Japan

Dr Shoji Nakayama is an MD and holds a PhD in public health. His expertise is in exposure science, especially of children's exposure. He is certified as a Public Health Specialist/Supervisor by Japan Board of Public Health and Social Medicine. He is an associate editor of the Journal of Exposure Science and Environmental Epidemiology.

In 2005, Dr Nakayama was invited to the U.S. Environmental Protection Agency (U.S. EPA) and worked on exposure research on perfluorinated alkyl compounds. In 2009, he moved to EPA's engineering laboratory to help risk management of the emerging contaminants. Then in 2011, Dr Nakayama joined the National Institute for Environmental Studies in Japan. He is a lead exposure scientist for the Japan Environment and Children's Study (JECS), which is a longitudinal birth cohort study involving 100,000 mothers and children. Dr Nakayama collaborates with U.S., EU and Asian researchers to advance and promote children's environmental health research.

Wednesday August 29
8:30 am - 9:00 am

2018 ISES Excellence in Exposure Science Awardee

Petros Koutrakis, Harvard University, T.H. Chan School of Public Health, Boston, MA, U.S.A.

Please see page 41 for Dr. Koutrakis' bio.

Wednesday August 29
9:00 am - 9:30 am

2018 ISEE John Goldsmith Awardee

Mark Nieuwenhuijsen, ISGlobal, Barcelona, Spain

Please see page 44 for Dr. Niewenhuijsen's bio.

(INCLUDING POSTER SESSIONS)

The full list of Authors (including Co-Authors) and the abstracts for both oral and poster presentations can be found in the online program and in the meeting app.

Sunday, August 26, 2018

9:00 am - 12:00 pm	**PC01A: Big Data, Machine Learning Techniques to Investigate Health Effects in Environmental Health Studies**
9:00 am - 12:00 pm	**PC02A: Consumer Exposure Modeling for Human Health Risk Assessment: Advanced Tools**
9:00 am - 12:00 pm	**PC03: Bayesian Methods for Environmental Health Researchers** *Ghassan B Hamra, Department of Epidemiology, Johns Hopkins Bloomberg School of Public Health, United States*
9:00 am - 12:00 pm	**PC04: Application of New Approach Methodologies for Exposure Assessment and Prioritization: Tools for Researchers and Regulators Including use of Quantitative Structure Use Relationships (QSUR)** *John Wambaugh, U.S. Environmental Protection Agency (EPA), United States* *Katherine Phillips, U.S. Environmental Protection Agency (EPA), United States*
9:00 am - 12:00 pm	**PC05: Model-Based Geostatistics and Spatial Epidemiology: A Practical Introduction with R** *Patrick Brown, University of Toronto, Canada*
1:00 pm - 4:00 pm	**PC06: Predicting Microscale Urban Features Using Street-Level Images: An Introduction to Machine Learning** *Mahdi Shooshtari, Canadian Urban Environmental Health Research Consortium (CANUE), Dalla Lana School of Public Health, University of Toronto, Canada* *Evan Seed, Canadian Urban Environmental Health Research Consortium (CANUE), Dalla Lana School of Public Health, University of Toronto, Canada*
1:00 pm - 4:00 pm	**PC01B: Big Data, Machine Learning Techniques to Investigate Health Effects in Environmental Health Studies**
1:00 pm - 4:00 pm	**PC02B: Consumer Exposure Modeling for Human Health Risk Assessment: Advanced Tools**
1:00 pm - 4:00 pm	**PC07: Causal Inference Foundations and Applications in Environmental Health Sciences** *Jay Kaufman, Department of Epidemiology, Biostatistics and Occupational Health, McGill University, Canada* *Alexander Keil, Department of Epidemiology, Gillings School of Global Public Health, University of North Carolina, United States*
1:00 pm - 4:00 pm	**PC08: Advanced Modelling Techniques for Time Series Analysis Using R** *Antonio Gasparrini, Department of Social and Environmental Health Research, London School of Hygiene and Tropical Medicine, United Kingdom* *Ana Maria Vicedo-Cabrera, Department of Social and Environmental Health Research, London School of Hygiene and Tropical Medicine, United Kingdom* *Francesco Sera, Department of Social and Environmental Health Research, London School of Hygiene and Tropical Medicine, United Kingdom*
9:00 am - 3:00 pm	ISEE Board Meeting
9:30 am - 5:00 pm	ISES Board Meeting
4:30 pm - 5:30 pm	ISES Appreciation Reception
5:30 pm – 6:30 pm	**Welcome & Opening Plenary**
6:00 pm - 6:30 pm	**The Role of Occupational Studies in Expanding Our Knowledge of Environmental Carcinogens** *Paul Demers, Cancer Care Ontario, Canada*
6:30 pm – 8:30 pm	**Welcome Reception**
6:30 pm – 7:00 pm	**Performance by Aboriginal Experiences, 'Spirit of Dance'**
7:00 pm – 8:00 pm	**Student Poster Competition**

Monday, August 27, 2018

7:00 am - 8:30 am	**Joint ISES/ISEE SNR Breakfast**
7:00 am - 8:30 am	**Research Funding 101: Multiple Perspectives on the NIH Grant Process NIEHS, Fogarty, NCI & Center for Scientific Review**
7:00 am - 8:30 am	**Learn about Gene-Environment Interactions with Molecular Manipulatives (Open to All Conference Attendees)** *Kathleen Vandiver, MIT Center for Environmental Health Sciences; MIT Superfund Research Program; Massachusetts Institute of Technology, United States*
7:00 am - 8:30 am	**BenMAP-CE User's Symposium Workshop (Open to All Conference Attendees)** *Stefani Penn, Industrial Economics, Inc, United States* *Henry Roman, Industrial Economics, Inc, United States* *Tom Luben, U.S. Environmental Protection Agency (EPA), United States* *Neal Fann, U.S. Environmental Protection Agency (EPA), United States*

8:30 am - 9:30 am	**Plenary** *Chair: Audrey Smargiassi, Université de Montréal, Canada* *Chair: Markey Johnson, Health Canada, Canada*
8:30 am - 9:00 am	**Climate Change: the Greatest Public Health Challenge of Our Time** *Gina McCarthy, Harvard T.H. Chan School of Public Health, United States*
9:00 am - 9:30 am	**WHO Global Strategy on Health, Environment and Climate Change** *Maria Neira, World Health Organization (WHO), Department of Public Health, Environmental and Social Determinants of Health, Switzerland*

9:30 am - 10:30 am	**O01.01A. Chemical Exposures and Fish Consumption** *Chair: Melanie Lemire, Université Laval, Canada* *Chair: Pi-i Lin, Harvard Medical School and Harvard Pilgrim Health Care Institute, United States*
9:30 am - 9:45 am	**O01.01.01. Examining Changes in Persistent Organochlorine Pollutants Following High Consumption of Farmed Atlantic Salmon: Results from an 8-Week Dietary Intervention Study** *Thorhallur Halldórsson, University of Iceland, Iceland*
9:45 am - 10:00 am	**O01.01.02. Shellfish and Fatty Fish Intake and Fecundability in a North American Prospective Cohort Study** *Lauren Wise, Boston University School of Public Health, United States*
10:00 am - 10:15 am	**O01.01.03. Seafood Consumption and Mercury Exposure in Chicago Asian Communities** *Mary Turyk, University of Illinois at Chicago, United States*
10:15 am - 10:30 am	**O01.01.04. Biomonitoring of Mercury and Persistent Organic Pollutants in Michigan Urban Anglers and Association with Fish Consumption** *Wendy Wattigney, Agency for Toxic Substances and Disease Registry, United States*

9:30 am - 10:30 am	**O01.01B. Occupational Exposures and Respiratory Outcomes** *Chair: David Richardson, University of North Carolina at Chapel Hill, United States* *Chair: Michihiro Kamijima, Nagoya City University Graduate School of Medical Sciences, Japan*
9:30 am - 9:45 am	**O01.01.05. Personal and Area Exposure Assessment at a Stainless Steel Fabrication Facility: Evaluation of Inhalable, Thoracic, Time-Resolved PM10, and Lung-Deposited Airborne Metals** *Ashley Newton, Johns Hopkins Bloomberg School of Public Health, United States*
9:45 am - 10:00 am	**O01.01.06. Association between Occupational Exposure to Textile Fibre Dusts and Lung Cancer in a Population-Based Case-Control Study in Montreal: A Preliminary Analysis Comparing Results from Three Analytical Methods** *Mengting Xu, University of Montreal, Canada*
10:00 am - 10:15 am	**O01.01.07. Chronic Obstructive Pulmonary Disease Mortality in the Diesel Exhaust in Miners Study (DEMS)** *Jacqueline Ferguson, University of California, Berkeley, United States*
10:15 am - 10:30 am	**O01.01.08. Environmental and Biological Monitoring of Volatile Organic Chemicals among Nail Technicians** *Diana Ceballos, Harvard T.H. Chan School of Public Health, United States*

9:30 am – 10:30 am **S01.01A. Addressing Complex Local and Global Issues in Environmental Exposure and Health: Addressing the Health of Children and Adolescents**

Chair: Telma Nery, Heart Institute - InCor, Brazil

9:30 am - 9:45 am **S01.01.01. Early Exposure to Environmental Pollutants and Weight Gain in Children, Rio de Janeiro City, Brazil**
Ana Oliveira, Federal University of Rio de Janeiro (UFRJ), Brazil

9:45 am - 10:00 am **S01.01.02. Analyze Health Data of Children and Adolescents in the Municipalities with the Highest Consumption of Pesticides in the State of Sao Paulo – Brazil (2000-2015)**
Telma Nery, Heart Institute - InCor, Brazil

10:00 am - 10:15 am **S01.01.03. Characteristics of Health and Environment in Santa Gertrudes City: Sao Paulo, Brazil**
Paolo Paz de Lima, Collective Health, Member of the Association of Researchers and Researchers for Social Justice - ABRAPPS, Brazil

10:15 am - 10:30 am **S01.01.04. Birth Cohort Study of Environmental Exposure and Childhood Development: Rio De Janeiro, Brazil**
Carmen Asmus, Federal University of Rio de Janeiro, Brazil

9:30 am – 10:30 am **S01.01B. Air Pollution and Physical Activity: Environmental Health Perspective**

Chair: Marko Tainio, University of Cambridge, United Kingdom
Chair: Thiago Herick de Sa, World Health Organization, Switzerland

9:30 am - 9:45 am **S01.01.05. Air Pollution and Physical Activity Epidemiology: Are Long-Term Benefits of Physical Activity on Health Modified by Exposure to Air Pollution?**
Zorana Andersen, University of Copenhagen, Denmark

9:45 am - 10:00 am **S01.01.06. Air Pollution and Physical Activity (APPA): Air Pollution Exposure in Travel Modes**
Juan Orjuela, Imperial College London, United Kingdom

10:00 am - 10:15 am **S01.01.07. Should You Avoid Cycling and Walking in High Pollution Days?**
Marko Tainio, University of Cambridge, United Kingdom

10:15 am - 10:30 am **S01.01.08. Air Pollution, Physical Activity and Health: What Are the Pathways to Healthy Urban Living?**
Mark Nieuwenhuijsen, Barcelona Institute for Global Health (ISGlobal), Spain

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9:30 am – 10:30 am **S01.01C. Air Pollution Exposure and Metabolomics**

Chair: Lina Mu, University at Buffalo, United States

9:30 am - 9:45 am **S01.01.09. Metabolomics Profiling in Response to Air Pollution Levels**
Lina Mu, University at Buffalo, United States

9:45 am - 10:00 am **S01.01.10. Non-Targeted Metabolite Profiling of Dried Blood Spots in a Field-Based Epidemiologic Study of Household Air Pollution**
Maggie Clark, Colorado State University, United States

10:00 am - 10:15 am **S01.01.11. Ambient Air Pollution Exposure Is Changing Metabolomics Profiles: A Link to Disease Development**
Cavin Ward-Caviness, U.S. Environmental Protection Agency (EPA), United States

10:15 am - 10:30 am **S01.01.12. Module Detection in Attributed Networks for the Association with Outcomes**
Rachael Blair, University at Buffalo, United States

9:30 am – 10:30 am **S01.01D. Bronchiolar and Interstitial Lung Disease by Occupational and Environmental Exposure: Their Implication and Future Task to be Solved for Health Protection**

Chair: Domyung Paek, Seoul National University, Korea (the Republic of)

9:30 am - 9:45 am **S01.01.13. Outbreaks of Severe Lung Injury Caused by Agents that Were Deemed Safe: From Air-Sprayed Paints to Humidifier Disinfectants**
Benoit Nemery, KU Leuven, Belgium

9:45 am - 10:00 am **S01.01.14. Bronchiolar and Interstitial Lung Disease by Humidifier Disinfectant Syndrome in Korea**
Jong Han Leem, Inha University, Korea (the Republic of)

10:00 am - 10:15 am **S01.01.15. Health Damage of Humidifier Disinfectant by Big Data Analysis in Korea**
Hae-Kwan Cheong, Sungkyunkwan University, Korea (the Republic of)

10:15 am - 10:30 am **S01.01.16. Characteristics of Exposure to Humidifier Disinfectant (HD) among Patients with Lung Injury**
Dong-Uk Park, Korea National Open University, Korea (the Republic of)

9:30 am – 10:30 am **S01.01E. Climate, Air Pollution, and Environmental Health in Africa – Part 1**
Chair: Kristie Ebi, University of Washington, United States
Chair: Youssef Oulhote, Harvard T. H. Chan School of Public Health, United States

9:30 am - 9:45 am **S01.01.17. Short Term Seasonal Effect of Ambient Air Pollutants and Airborne Fungal Spores on the Lung Function of School Children in Western Cape, South Africa: A Panel Study**
Toyib Olaniyan, University of Cape Town, South Africa

9:45 am - 10:00 am **S01.01.18. Closing Research Gap on Climate Change and Health in Africa**
Adetoun Mustapha, Imperial College London, Nigeria

10:00 am - 10:15 am **S01.01.19. No More Disciplinary Silos in Tackling Climate Change Impact on Health: Lessons from an Ecohealth Research Project in West Africa**
Brama Kone, Centre Suisse de Recherches Scientifiques en Côte d'Ivoire & University Péléforo Gon Coulibaly of Korhogo, Côte d'Ivoire

10:15 am - 10:30 am **S01.01.20. Evaluating the Effectiveness of a Community-Based Adaptation Strategy for Dengue Vector Control in Burkina Faso**
Tarik Benmarhnia, University of California, San Diego, United States

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9:30 am – 10:30 am **S01.01F. Complex Rural Exposures and Health**
Chair: Meghan Davis, Johns Hopkins Bloomberg School of Public Health, United States
Chair: Ana Maria Rule, Johns Hopkins University, United States

9:30 am - 9:45 am **S01.01.21. Assessment of Exposure and Health Outcomes in Rural Settings**
Meghan Davis, Johns Hopkins Bloomberg School of Public Health, United States

9:45 am - 10:00 am **S01.01.22. Object Based Image Analysis (OBIA) Methods for Mapping Poultry Farm Locations**
Beth Feingold, University at Albany, State University of New York, United States

10:00 am - 10:15 am **S01.01.23. Electronic Health Records for Population Health Research in Rural Communities**
Joan Casey, University of California, Berkeley, United States

10:15 am - 10:30 am **S01.01.24. Implementation of a Panel Exposure and Health Study in a Rural Setting**
Meredith McCormack, Johns Hopkins University, United States

9:30 am – 10:30 am **S01.01G. Evaluating High-Throughput New Approach Methods (NAM) for Exposure**
Chair: Kristin Isaacs, U.S. Environmental Protection Agency (EPA), United States

9:30 am - 9:45 am **S01.01.25. Evaluation of High-Throughput Chemical Functional Use Models**
Katherine Phillips, Computational Exposure Division, National Exposure Research Laboratory, U.S. U.S. Environmental Protection Agency (EPA), United States

9:45 am - 10:00 am **S01.01.26. Comparison of High-Throughput Exposure Predictions to Traditional Exposure Assessments under Canada's Chemicals Management Plan**
Angelika Zidek, Health Canada, Canada

10:00 am - 10:15 am **S01.01.27. Evaluating NAMs for Toxicokinetics**
John Wambaugh, National Center for Computational Toxicology, U.S. Environmental Protection Agency (EPA), United States

10:15 am - 10:30 am **S01.01.28. Evaluation of High-Throughput Chemical Exposure Models: Case Study of Matched Environmental and Biological Measurements**
Kristin Isaacs, Human Exposure and Atmospheric Sciences Division, National Exposure Research Laboratory, U.S. Environmental Protection Agency (EPA), United States

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9:30 am – 10:30 am **S01.01H. Harmonization of Biomonitoring Measurements – Approaches Used by Laboratory Networks in Canada, Europe and the United States**
Chair: Julianne Nassif, Association of Public Health Laboratories, United States

9:30 am - 9:45 am **S01.01.29. Harmonization of Biomonitoring Measurements in the Canadian Health Measures Survey: An Overview of Approaches, Challenges, and Successes**
Annie St-Amand, Health Canada, Canada

9:45 am - 10:00 am **S01.01.30. Harmonization of Human Biomonitoring and Untargeted Exposure Analysis in Children's Health**
David Balshaw, National Institutes of Environmental Health Sciences, United States

10:00 am - 10:15 am **S01.01.31. Harmonization of Human Biomonitoring Measurements in the National Biomonitoring Network (United States): Learning from the Experiences of Others**
Julianne Nassif, Association of Public Health Laboratories, United States

10:15 am - 10:30 am **S01.01.32. Harmonization of Human Biomonitoring in Europe: The European Human Biomonitoring Initiative HBM4EU**
Marike Kolossa-Gehring, German Environment Agency (UBA), Germany

9:30 am – 10:30 am **S01.01I. Mobilizing Data for Healthy Environments: Platforms Facilitating Health and Environmental Exposure Linkage**

Chair: Jeffrey Brook, University of Toronto, Canada

9:30 am - 9:45 am **S01.01.33. Enhancing Environmental Data Resources in Cohort Studies: ALSPAC Exemplar (ERICA)**
Andy Boyd, University of Bristol, United Kingdom

9:45 am - 10:00 am **S01.01.34. The Canadian Urban Environmental Health Research Consortium (CANUE)**
Dany Doiron, Research Institute of the McGill University Health Centre, Canada

10:00 am - 10:15 am **S01.01.35. Harmonisation of Air Pollution Exposures in the European ELAPSE Study**
Kees de Hoogh, Swiss Tropical and Public Health Institute, Switzerland

10:15 am - 10:30 am **S01.01.36. U.S. Centers for Disease Control and Prevention's (CDC) National Environmental Public Health Tracking Program**
Fuyuen Yip, U.S. Centers for Disease Control and Prevention (CDC), United States

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9:30 am – 10:30 am **S01.01J. Multi-Response and Multi-Pollutant Models for Environmental Exposure and Health: From Gap-Filling to Decorrelating Structure in Data**

Chair: Hwashin Shin, Health Canada, Canada

9:30 am - 9:45 am **S01.01.37. Identification of Problematic Data Sections and Interpolation of Air Pollution Time-Series**
Dave Riegert, Queen's University, Canada

9:45 am - 10:00 am **S01.01.38. 15 Years of Air Quality (AQ) Objective Analysis Mapping over North America Using Real-Time Observations and Canadian Operational AQ Forecast Models**
Sylvain Ménard, Environment Canada, Canada

10:00 am - 10:15 am **S01.01.39. Geometric and Statistical Methods for Aggregating Predictors in Pollutant Risk Models**
Wesley Burr, Trent University, Canada

10:15 am - 10:30 am **S01.01.40. Correlated Responses in Air Pollution Regression Models**
Glen Takahara, Queen's University, Canada

9:30 am – 10:30 am **S01.01K. Novel Methods for Assessing Complex Exposure Mixtures in Environmental Epidemiology**

Chair: Jessie Buckley, Johns Hopkins Bloomberg School of Public Health, United States
Chair: Anna Pollack, George Mason University, United States

9:30 am - 9:45 am **S01.01.41. Using Bayesian Shared Mean and Mixture Priors to Study Prenatal Endocrine Disrupting Chemical Mixtures and Neurodevelopment**
Ghassan Hamra, Johns Hopkins Bloomberg School of Public Health, United States

9:45 am - 10:00 am **S01.01.42. A Bayesian Approach to Assess Prenatal Exposures to Metal Mixtures and Associations with Latent Patterns of Neurodevelopmental Trajectories**
Shelley Liu, Icahn School of Medicine at Mount Sinai, United States

10:00 am - 10:15 am **S01.01.43. Applying the Bayesian G-Formula to Estimate Impacts of Public Health Actions on Environmental Exposure Mixtures**
Alexander Keil, University of North Carolina at Chapel Hill, United States

10:15 am - 10:30 am **S01.01.44. Characterizing Exposure to Complex Environmental Mixtures with Self-Organizing Maps**
John Pearce, Medical University of South Carolina, United States

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10:30 am – 11:00 am **Poster Viewing & Break**

11:00 am – 12:30 pm **O01.02A. Cancer and the Environment**

Chair: Kurt Straif, International Agency for Research on Cancer, France
Chair: Mary Ward, National Cancer Institute, United States

11:00 am - 11:15 am **O01.02.01. Population Attributable Risk and Projected Population Impact Fractions for Lung Cancer and Outdoor Air Pollution in Canada**
Priyanka Gogna, Queen's University, Canada

11:15 am - 11:30 am **O01.02.02. Outdoor Particulate Matter (PM10) Exposure and Lung Cancer Risk in the EAGLE Study**
Dario Consonni, Fondazione IRCCS Ca' Granda Ospedale Maggiore Policlinico, Italy

11:30 am - 11:45 am **O01.02.03. Ambient NO2 Exposure and Respiratory Cancer Risk in São Paulo, Brazil**
Roel Vermeulen, Utrecht University, The Netherlands

11:45 am - 12:00 pm **O01.02.04. Cancer Incidence in the Agricultural Health Study Farmers: Is the Lung Cancer Deficit Due to Endotoxin?**
Catherine Lerro, National Cancer Institute, United States

12:00 pm - 12:15 pm **O01.02.05. Prostate Cancer Characteristics Are Associated with Overall Environmental Quality**
Jyotsna Jagai, University of Illinois at Chicago, United States

12:15 pm - 12:30 pm **O01.02.06. Public Health Ontario's Environmental Burden of Disease Project**
Susan Greco, Public Health Ontario, Canada

11:00 am – 12:30 pm **O01.02B. Cardiopulmonary Outcomes Associated with Long Term Exposure to Air Pollution**
Chair: Heresh Amini, Harvard T.H. Chan School of Public Health, Harvard University, United States
Chair: Barbara Hoffmann, University of Düsseldorf, Germany

11:00 am - 11:15 am **O01.02.07. Long-Term Exposure to Air Pollution and the Incidence of Chronic Obstructive Pulmonary Disease (COPD) and Asthma: A Population-Based Cohort Study in Ontario, Canada**
Li Bai, Institute for Clinical Evaluative Sciences, Canada

11:15 am - 11:30 am **O01.02.08. Associations between Ambient Air Pollution Exposure, Lung Function and COPD: Results from the UK Biobank Cohort**
Dany Doiron, Research Institute of the McGill University Health Centre, Canada

11:30 am - 11:45 am **O01.02.09. Ambient Air Pollution Exposure and Risk and Progression of Interstitial Lung Abnormalities: The Framingham Heart Study**
Mary Rice, Beth Israel Deaconess Medical Center, United States

11:45 am - 12:00 pm **O01.02.10. Long-Term Exposures to Air Pollution and the Risk of Atrial Fibrillation**
Jaime Hart, Channing Division of Network Medicine, Department of Medicine, Brigham and Women's Hospital and Harvard Medical School, United States

12:00 pm - 12:15 pm **O01.02.11. Associations between Outdoor Fine Particulate Matter Air Pollution and Cardiovascular Disease: Results from the Prospective Urban and Rural Epidemiology Study**
Andrew Larkin, Oregon State University, United States

12:15 pm - 12:30 pm **O01.02.12. Long-Term Exposure to Air Pollution and Incidence of Myocardial Infarction: A Danish Nurse Cohort Study**
Zorana Andersen, University of Copenhagen, Denmark

11:00 am – 12:30 pm **O01.02C. Characterizing Near Road and Point Sources of Air Pollution**
Chair: Gerard Hoek, Utrecht University, The Netherlands
Chair: Alan da Silveira Fleck, Université de Montréal, Canada

11:00 am - 11:15 am **O01.02.13. Estimating Exposures to Unconventional Oil and Gas Flaring Using Satellite Observations**
Meredith Franklin, University of Southern California, United States

11:15 am - 11:30 am **O01.02.14. Novel Air Pollution Exposure Indices for Homes near Industrial Swine and Poultry Operations in North Carolina (USA)**
Virginia Guidry, National Institute of Environmental Health Sciences, United States

11:30 am - 11:45 am **O01.02.15. The Mobile Observations of Ultrafine Particles (MOV-UP) Study: Winter 2018 Sampling**
Elena Austin, University of Washington, United States

11:45 am - 12:00 pm **O01.02.16. Characterizing Urban Particulate Matter Vehicle Emission Spatial Distributions with On-Road Black Carbon and Particle Number Observations**
David Miller, Environmental Defense Fund, United States

12:00 pm - 12:15 pm **O01.02.17. Variations in Roadside Gradients of Nitrogen Dioxide Observed in a Range of Urban and Rural Settings**
Ian Longley, NIWA Ltd, New Zealand

12:15 pm - 12:30 pm **O01.02.18. Errors Associated with the Use of Roadside Monitoring in the Estimation of Acute Traffic Pollutant-Related Health Effects**
Donghai Liang, Emory University, United States

11:00 am – 12:30 pm **O01.02D. Climate and Health**

Chair: Kate Weinberger, Brown University School of Public Health, United States
Chair: Mathilde Pascal, Santé Publique France, France

11:00 am - 11:15 am **O01.02.19. Impacts of Tropical Deforestation and Increased Heat Exposure on Health and Productivity in Rural Areas: The Case of Forest Dwelling Communities in East Kalimantan, Indonesia**
June Spector, University of Washington, United States

11:15 am - 11:30 am **O01.02.20. Disappearing Seas: Assessing Dust and Respiratory Health in a Changing Climate**
Jill Johnston, University of Southern California, United States

11:30 am - 11:45 am **O01.02.21. Climate Change and Health: A Historical Analysis of Vivax Malaria Outbreak in Moscow (Russia) during 1999-2008**
Natalia Shartova, Lomonosov Moscow State University, Russian Federation

11:45 am - 12:00 pm **O01.02.22. Climate Variability, School Calendar Pattern and Pertussis Epidemic**
Yuzhou Zhang, Queensland University of Technology (QUT), Australia

12:00 pm - 12:15 pm **O01.02.23. Impact of Climate Change Policies on Environmental Inequalities in Great Britain**
Heathen Walton, King's College London, United Kingdom

12:15 pm - 12:30 pm **O01.02.24. Ethical Issues in Climate Change and Health: How Can Environmental Health Research Facilitate Transformative Changes?**
Mathilde Pascal, Santé Publique France, France

11:00 am – 12:30 pm **O01.02E. Environmental Exposures and Adult Health Outcomes**

Chair: Carina Gronlund, University of Michigan, United States
Chair: Shelley Harris, University of Toronto, Canada

11:00 am - 11:15 am **O01.02.25. Brain Activity in Farm Workers Occupationally Exposed to Pesticides in Costa Rica**
Ana Maria Mora, Universidad Nacional, Costa Rica

11:15 am - 11:30 am **O01.02.26. Organophosphate Pesticide Exposure, Differential Genome-Wide DNA Methylation, and Biologic Function**
Kimberly Paul, University of California, Los Angeles, United States

11:30 am - 11:45 am **O01.02.27. Epigenetic Effects of Gestational Smoking on Developmental Origin of Lung Function Trajectories from Age 10 to 26 Years**
Wilfried Karmaus, University of Memphis, United States

11:45 am - 12:00 pm **O01.02.28. The Association between Urinary Naphthol Level and Structural Change of the Brain – Brain Cortical Thinning and Ventricular Enlargement: A Cross-Sectional Study**
Woojin Kim, Yonsei University College of Medicine, Korea (the Republic of)

12:00 pm - 12:15 pm **O01.02.29. Mendelian Randomization of Arsenic Metabolism as a Risk Factor for Hypertensive- and Diabetes-Related Traits among Adults in the Hispanic Community Health Study/Study of Latinos (HCHS/SOL) Cohort**
Molly Scannell Bryan, University of Illinois at Chicago, United States

12:15 pm - 12:30 pm **O01.02.30. Neurocognitive Function in Adult Residents of a Mining District in Mexico after Reduction of Manganese Exposure**
Horacio Riojas Rodriguez, National Institute of Public Health, Mexico

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11:00 am – 12:30 pm **O01.02F. Exposures and Health Impacts of Perfluorinated Substances**

Chair: Jessica Reiner, NIST, United States
Chair: Shoji Nakayama, National Institute for Environmental Studies, Japan

11:00 am - 11:15 am **O01.02.31. Urine and Serum Biomarkers of Per- and Polyfluoroalkyl Substances (PFAS) and Fluorinated Alternatives for Human Exposure Assessment**
Antonia Calafat, U.S. Centers for Disease Control and Prevention, United States

11:15 am - 11:30 am **O01.02.32. Setting Bench Mark Dose Limits for Perfluorinated Substances with Epidemiological Data**
Tony Fletcher, Public Health England, United Kingdom

11:30 am - 11:45 am **O01.02.33. Derivation of the Agency for Toxic Substances and Disease Registry's (ATSDR's) Provisional Minimal Risk Levels (MRLs) for PFOA, PFOS, PFHXs, and PFNA**
Melanie Buser, Agency for Toxic Substances and Disease Registry (ATSDR), United States

11:45 am - 12:00 pm **O01.02.34. Epidemiological Risk Assessment for PFOA**
Scott Bartell, University of California, Irvine, United States

12:00 pm - 12:15 pm **O01.02.35. An Updated Meta-Analysis of the Association of Serum PFOA and Birthweight, with an Evaluation of Potential Biases**
Kyle Steenland, Rollins School of Public Health, Emory University, United States

12:15 pm - 12:30 pm **O01.02.36. Serum Per- and Polyfluoroalkyl Substances Levels and Their Predictors in a San Francisco Bay Area Chinese Community**
Kathleen Attfield, California Department of Public Health, United States

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11:00 am - 12:30 pm **O01.02G. Exposures in Contaminated Communities and Children's Health**
Chair: Berna van Wendel de Joode, Universidad Nacional, Costa Rica
Chair: Rachel Tham, University of Melbourne, Australia

11:00 am - 11:15 am **O01.02.37. In Utero Dioxin Exposure and Age at Menarche in the Seveso Second Generation**
Marcella Warner, University of California Berkeley, United States

11:15 am - 11:30 am **O01.02.38. Peripubertal Urinary Arsenic Concentrations and Subsequent Insulin Resistance among Russian Boys**
Jane Burns, Harvard T.H. Chan School of Public Health, United States

11:30 am - 11:45 am **O01.02.39. Association between Maternal Psychosocial Stress during Pregnancy and Gestational Age in Puerto Rico**
Stephanie Eick, University of Georgia, College of Public Health, United States

11:45 am - 12:00 pm **O01.02.40. Relationship between Thyroid Hormone Levels, Radiation Dose and IQ in Children Exposed In Utero by the Chernobyl Accident and Controls**
Liudmila Liutsko, Barcelona Institute for Global Health (ISGlobal), Spain

12:00 pm - 12:15 pm **O01.02.41. Association between Liver Function, Hepatic Fibrosis Index and Urinary Thiodiglycolic Acid in School-Aged Children Living near a Petrochemical Complex**
Po-Chin Huang, National Health Research Institutes, Taiwan

12:15 pm - 12:30 pm **O01.02.42. Prenatal Pyrethroid Exposure and Behavioral Problems in 5-Year Old Children from the Infants' Environmental Health Study (ISA)**
Jorge Ernesto Peñaloza Castañeda, Universidad Nacional, Costa Rica

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11:00 am - 12:30 pm **O01.02H. Neurodevelopmental Outcomes Associated with Perinatal Exposure to Air Pollution**
Chair: Pau-Chung Chen, National Taiwan University, Taiwan
Chair: Lucas Neas, U.S. Environmental Protection Agency (EPA), United States

11:00 am - 11:15 am **O01.02.43. Associations between Ambient Ozone and Fine Particulate Matter Exposures and Autism Spectrum Disorder in Metropolitan Cincinnati, Ohio**
John Kaufman, Association of Schools and Programs of Public Health, United States

11:15 am - 11:30 am **O01.02.44. Prenatal and Infant Traffic Related Air Pollution and Autism Spectrum Disorder: A California State-Wide Study**
Ondine von Ehrenstein, University of California, Los Angeles, United States

11:30 am - 11:45 am **O01.02.45. Prenatal PM2.5 Exposure and Neurodevelopment at 2 Years of Age in a Birth Cohort from Mexico City**
Magali Hurtado-Díaz, National Institute of Public Health, Mexico

11:45 am - 12:00 pm **O01.02.46. Prenatal Exposure to Ambient Air Pollution and Early Childhood Neuro-development: A Longitudinal Birth Cohort Study in an Urban Region of the Southeastern U.S.**
Christine Loftus, University of Washington, United States

12:00 pm - 12:15 pm **O01.02.47. Early Life Exposure to Fine Particulate Matter and Working Memory and Attention**
Ioar Rivas, King's College London, United Kingdom

12:15 pm - 12:30 pm **O01.02.48. Air Pollution, Neighborhood Deprivation, and Autism Spectrum Disorder in the Study to Explore Early Development**
Laura McGuinn, University of North Carolina at Chapel Hill, United States

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11:00 am - 12:30 pm **O01.02I. New Policy Directions in Exposure Assessment & Environmental Epidemiology**
Chair: Raymond Neutra, CA Department of Public Health (Retired), United States
Chair: Rajendra Parajuli, Ottawa University, Canada

11:00 am - 11:15 am **O01.02.49. Incorporating Regulatory Guideline Values in Analysis of Epidemiology Data**
Chris Gennings, Icahn School of Medicine at Mount Sinai, United States

11:15 am - 11:30 am **O01.02.50. Development of Exposure Assessments under Amended TSCA**
Nerija Orentas, U.S. Environmental Protection Agency (EPA), United States

11:30 am - 11:45 am **O01.02.51. Student Science and Environmental Health Literacy on Hopi Lands**
Mary Kay O'Rourke, University of Arizona, United States

11:45 am - 12:00 pm **O01.02.52. Development and Demonstration of the Environmental Policy Simulation Tool for Electrical Grid Interventions (Epstein), Version 2.0**
Jonathan Buonocore, Harvard T.H. Chan School of Public Health, United States

12:00 pm - 12:15 pm **O01.02.53. Towards a European Exposure Science Strategy 2030; Bridging the Science and Regulatory Frameworks in Europe**
Yuri Bruinen de Bruin, European Commission, Italy

12:15 pm - 12:30 pm **O01.02.54. Policy Discussion**

11:00 am - 12:30 pm S01.02A. Advances in Air Pollution Exposure Assessment for Population Health Studies in Low and Middle Income Countries: Insights from India and Beyond
Chair: Cathryn Tonne, ISGlobal, Spain
Chair: Julian Marshall, University of Washington, United States

11:00 am - 11:15 am **S01.02.01. Pure-Air: A Global Assessment of Household and Outdoor Air Pollution and Cardiopulmonary Disease**
Michael Brauer, University of British Columbia, Canada

11:15 am - 11:30 am **S01.02.02. Particle Exposure Assessment in Peri-Urban India: Lessons Learned from the CHAI Project**
Cathryn Tonne, Barcelona Institute for Global Health (ISGlobal), Spain

11:30 am - 11:45 am **S01.02.03. Optimizing Air Pollution Exposure Assessment Methods for Pregnant Women: Experiences from the Rural-Urban TAPHE Cohort in Tamil Nadu, India**
Kalpana Balakrishnan, Sri Ramachandra Medical College & Research Institute, India

11:45 am - 12:00 pm **S01.02.04. Towards a National Scale Spatio-Temporal Model for Ambient PM2.5 in India**
Joel Schwartz, Harvard University, United States

12:00 pm - 12:15 pm **S01.02.05. Spatiotemporal Prediction of Daily Average Ambient PM2.5 Concentrations at 1 Sq. Km. Grids over Delhi, India, from 2010 to 2016 Using Ensemble Models**
Siddhartha Mandal, Center for Chronic Disease Control, India

12:15 pm - 12:30 pm **S01.02.06. Panel Discussion**

11:00 am - 12:30 pm S01.02B. High-Resolution Metabolomics: A Platform Linking the External and Internal Environment
Chair: Roel Vermeulen, Utrecht University, The Netherlands

11:00 am - 11:15 am **S01.02.07. Recent Technical Advancement in High-Resolution Metabolomics**
Dean Jones, Emory University, United States

11:15 am - 11:30 am **S01.02.08. Metabolome Wide Association Study and the Exposome: Linking Exposure to Internal Dose, Biological Response and Disease**
Douglas Walker, Emory University, United States

11:30 am - 11:45 am **S01.02.09. Metabolic Changes Associated with Exposure to Perfluoroalkyl Substances in Women**
Vincent Bessonneau, Silent Spring Institute, United States

11:45 am - 12:00 pm **S01.02.10. High-Resolution Metabolomics Study of Occupational Exposure to Trichloroethylene**
Nathaniel Rothman, National Cancer Institute, National Institutes of Health, United States

12:00 pm - 12:15 pm **S01.02.11. Prospective Study of Untargeted Urinary Metabolomics and Risk of Lung Cancer among Never-Smoking Women in Shanghai, China**
Qing Lan, National Cancer Institute, National Institutes of Health, United States

12:15 pm - 12:30 pm **S01.02.12. Changes in the Blood Metabolome in Relation to 24hr Personal Air Pollution Exposure Measurements: A Panel Study in Four European Countries**
Roel Vermeulen, Utrecht University, The Netherlands

11:00 am - 12:30 pm S01.02C. Investigating Chemical Constituents and Exposure Potential in Recycled Tire Crumb Rubber Infill Used in Playing Fields and Playgrounds: State, Federal, and International Governmental Perspectives
Chair: Annette Guiseppi-Elie, U.S. Environmental Protection Agency (EPA), United States

11:00 am - 11:15 am **S01.02.13. California Synthetic Turf Study**
Randy Maddalena, Lawrence Berkeley National Laboratory, United States

11:15 am - 11:30 am **S01.02.14. Toxicological Research to Assess Bioaccessibility and Biological Effects of Recycled Tire Crumb Rubber Using In Vitro and In Vivo Testing Approaches**
Georgia Roberts, National Toxicology Program, United States

11:30 am - 11:45 am **S01.02.15. Moving from a Human Health Risk Assessment of Playing Sports on Rubber Granule Infill in The Netherlands to a Restiction Proposal for Polyaromic Hydrocarbon Content in Rubber Granules in the European Union**
Wouter ter Burg, The Netherlands National Institute for Public Health and the Environment (RIVM), The Netherlands

11:45 am - 12:00 pm **S01.02.16. European Chemical Agency's Perspective: An Evaluation of the Possible Health Risks of Recycle Rubber Granules Used as Infill in Synthetic Turf Fields**
Andreas Ahrens, European Chemicals Agency, Finland

12:00 pm - 12:15 pm **S01.02.17. Perspective from the United States (U.S.) Federal Research Action Plan (FRAP) on Recycled Tire Crumb Rubber Used on Synthetic Turf Playing Fields and Playgrounds**
Annette Guiseppi-Elie, U.S. Environmental Protection Agency (EPA), United States

12:15 pm - 12:30 pm **S01.02.18. Investigating Chemical Constituents and Exposure Potential in Recycled Tire Crumb Rubber Infill Used in Playing Fields and Playgrounds: State, Federal, and International Governmental Perspectives**
Annette Guiseppi-Elie, U.S. Environmental Protection Agency (EPA), United States

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11:00 am - 12:30 pm S01.02D. Sound Off for Environmental Noise Research: Milestones in Exposure Assessment and Health Evidence
Chair: Maria Foraster, ISGlobal; Universitat Pompeu Fabra (UPF); CIBER Epidemiologia y Salud Publica (CIBEREsp), Spain
Chair: Danielle Vienneau, Swiss Tropical and Public Health Institute, Switzerland

11:00 am - 11:15 am **S01.02.19. Noise Exposure Assessment in Europe: Current and Future Challenges**
John Gulliver, University of Leicester, United Kingdom

11:15 am - 11:30 am **S01.02.20. Noise Exposure Assessment in North America: Past Challenges and Future Opportunities**
Sara Adar, University of Michigan School of Public Health, United States

11:30 am - 11:45 am **S01.02.21. Noise and Health in Pregnancy and Birth Outcomes**
Anna Hansell, University of Leicester, United Kingdom

11:45 am - 12:00 pm **S01.02.22. Noise, Sleep and Health Consequences**
Gunn Marit Aasvang, Norwegian Institute of Public Health, Norway

12:00 pm - 12:15 pm **S01.02.23. Transportation Noise and Cardio-Metabolic Disease**
Hugh W Davies, University of British Columbia, Canada

12:15 pm - 12:30 pm **S01.02.24. Panel Discussion**

12:30 pm - 1:45 pm **ISEE Ethics and Philosophy Committee**
12:30 pm - 1:45 pm **GRC Power Hour, Hosted by ISES Diversity Committee**
12:30 pm - 1:45 pm **MCC Collaborative Research Network**
12:30 pm - 1:45 pm **EHP Associate Editor Meeting**

12:30 pm - 2:15 pm Lunch

1:15 pm - 2:15 pm Student Poster Competition

2:15 pm - 3:45 pm O01.03A. A Closer Look at Exposures to Flame Retardants
Chair: Jonathan Chevrier, McGill University, Canada
Chair: Megan Romano, Geisel School of Medicine at Dartmouth, United States

2:15 pm - 2:30 pm **O01.03.01. Prioritization of Flame Retardants for Human Risk Evaluation Based on Population Levels and Toxicity**
Lisa Melymuk, Masaryk University, Czechia

2:30 pm - 2:45 pm **O01.03.02. A Study of Flame Retardants in Residential Furniture and Impact on Human Exposure and Flammability Control**
Aika Davis, Underwriters Laboratories Inc., United States

2:45 pm - 3:00 pm **O01.03.03. Exposure to Brominated and Organophosphate Ester Flame Retardants in U.S. Childcare Environments: Effect of Removal of Flame-Retarded Nap Mats on Indoor Levels**
Amina Salamova, Indiana University, United States

3:00 pm - 3:15 pm **O01.03.04. Temporal Trends in Serum Polybrominated Diphenyl Ether Concentrations in the Australian Population, 2002-2013**
Lesa Aylward, Summit Toxicology, LLP, United States

3:15 pm - 3:30 pm **O01.03.05. The Association of Urinary Phosphorous-Containing Flame Retardant Metabolites and Self-Reported Personal Care and Household Product Use among Couples Seeking Fertility Treatment**
Mary Ingle, University of Michigan, United States

3:30 pm - 3:45 pm **O01.03.06. Intervention to Reduce Gymnast Exposure to Flame Retardants: A Case Study**
Courtney Carignan, Michigan State University, United States

2:15 pm - 3:45 pm **O01.03B. A Global Look at Lead Exposures**
Chair: Kristin Macey, Health Canada, Canada
Chair: Pat Rasmussen, Health Canada, Canada

2:15 pm - 2:30 pm **O01.03.07. Environmental Justice Analyses May Hide Inequalities in Indigenous People's Exposure to Lead in Mt Isa, Australia**
Nathan Cooper, University of New South Wales, Australia

2:30 pm - 2:45 pm **O01.03.08. Blood Lead Levels in Children Aged 0 to 6 Years in China: A National Survey**
Chong-Huai Yan, Shanghai Jiao Tong University School of Medicine, China

2:45 pm - 3:00 pm **O01.03.09. Three Decades of Lead Poisoning Prevalence in Mexico City Children: 1988 to 2015**
Ivan Pantic, National Institute of Perinatology, Mexico

3:00 pm - 3:15 pm **O01.03.10. Bone Lead Associations with Blood Lead, Kidney Function, and Blood Pressure among U.S. Lead-Exposed Workers in a Surveillance Program**
Vaughn Barry, Emory University Rollins School of Public Health, United States

3:15 pm - 3:30 pm **O01.03.11. Point-Of-Care Analysis of Manganese and Lead in Water**
Ian Papautsky, University of Illinois at Chicago, United States

3:30 pm - 3:45 pm **O01.03.12. Lead Exposure Biosensors from Epigenome-Wide Blood DNA-Methylation in Adults**
Elena Colicino, Icahn School of Medicine at Mount Sinai, United States

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2:15 pm - 3:45 pm **O01.03D. Effects of Heat Waves**
Chair: Blesson Varghese, University of Adelaide, Australia
Chair: Gregory Wellenius, Brown University, United States

2:15 pm - 2:30 pm **O01.03.19. Heat Wave Effects on Mortality and Years of Life Lost in a Dry Region of Iran (Kerman) during 2005-2016**
Narges Khanjani, Kerman University of Medical Sciences, Iran (the Islamic Republic of)

2:30 pm - 2:45 pm **O01.03.20. Heat-Related Mortality Trends and Human Adaptation Response to Climate Warming in Spain: A 30-Year Observational Study by Sex and Cause of Death**
Joan Ballester, Barcelona Institute for Global Health (ISGlobal), Spain

2:45 pm - 3:00 pm **O01.03.21. Forty Years of Heat Waves in France: A Tale of Climate Change and Health**
Mathilde Pascal, Santé Publique France, France

3:00 pm - 3:15 pm **O01.03.22. Quantifying the Mediating Effects of Ozone in the Relation between Heat Waves and Years of Life Lost**
Tarik Benmarhnia, University of California, San Diego, United States

3:15 pm - 3:30 pm **O01.03.23. Assessing the Impact of Cold and Heat Waves on Physical Activity in a Sub-Tropical Urban Population**
Janice Ho, The Chinese University of Hong Kong, Hong Kong

3:30 pm - 3:45 pm **O01.03.24. Reduced Cognitive Function during a Heat Wave among Young Adults in Non-Air Conditioned Buildings**
Jose Guillermo Cedeno-Laurent, Harvard T.H. Chan School of Public Health, United States

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2:15 pm - 3:45 pm **O01.03E. Environmental Exposures and Birth Outcomes**
Chair: Heqing Shen, Institute of Urban Environment, Chinese Academy of Sciences, China
Chair: Tye Arbuckle, Health Canada, Canada

2:15 pm - 2:30 pm **O01.03.25. Association between the Early-Life Exposome and Birth Weight**
Remy Slama, INSERM, France

2:30 pm - 2:45 pm **O01.03.26. Impact of Maternal and Paternal Preconception Urinary Bisphenol A (BPA) and Bisphenol S (BPS) Concentrations on Offspring Birth Size**
Carmen Messerlian, Harvard T.H. Chan School of Public Health, United States

2:45 pm - 3:00 pm **O01.03.27. Associations between Prenatal Toxicant Exposures and DNA Methylation at Birth and in Adolescence**
Jaclyn Goodrich, University of Michigan, United States

3:00 pm - 3:15 pm **O01.03.28. Relationship between Polybrominated Diphenyl Ether (PBDE) Levels in Maternal Serum and Fetal Tissues during Mid-Gestation of Pregnancy and Associations with Placental Biomarkers of Growth and Development**
Julia Varshavsky, University of California, San Francisco, United States

3:15 pm - 3:30 pm **O01.03.29. Prenatal Exposure to Phthalates and Phenols and Infant Anogenital Distance**
Tye Arbuckle, Health Canada, Canada

3:30 pm - 3:45 pm **O01.03.30. Interdisciplinary Research in Assessing Relationships between Environmental Mixtures and Birth Outcomes: What Are the Essential Components for Collaboration?**
Osnat Wine, University of Alberta, Canada

2:15 pm - 3:45 pm **O01.03F. Natural Environment and Health**
Chair: Danielle Vienneau, Swiss Tropical and Public Health Institute, Switzerland
Chair: Peter James, Harvard Medical School & Harvard Pilgrim Health Care Institute, United States

2:15 pm - 2:30 pm **O01.03.31. Shedding Some Light in the Dark - Validity of Using Satellite Measurements to Estimate Light at Night Exposure**
Anke Huss, Utrecht University, The Netherlands

2:30 pm - 2:45 pm **O01.03.32. How Green Is Green? Modeling Urban Greenness Exposure in Environmental Health Research**
Lorien Nesbitt, University of British Columbia, Canada

2:45 pm - 3:00 pm **O01.03.33. Associations of Surrounding Green, Air Pollution and Traffic Noise with General and Mental Health**
Jochem Klompmaker, National Institute for Public Health and the Environment, The Netherlands

3:00 pm - 3:15 pm **O01.03.34. Green Space, Mental Health, Physical Activity and Body Mass Index in a Cohort of Women up to 15 Years Postpartum: A Multilevel Longitudinal Study**
Xiaoqi Feng, University of Wollongong, Australia

3:15 pm - 3:30 pm **O01.03.35. Urban Green Space and the Risk of Dementia: A Population-Based Cohort Study**
Lauren Paul, Public Health Ontario, Canada

3:30 pm - 3:45 pm **O01.03.36. Active Commuting through Natural Environments and Mental Health: Results from the Phenotype Project**
Wilma Zijlema, Barcelona Institute for Global Health, Spain

2:15 pm - 3:45 pm **O01.03G. Occupational Exposure and Worker Health**
Chair: Kyle Steenland, Emory University, United States
Chair: Marie-Elise Parent, INRS-Institut Armand-Frappier, Canada

2:15 pm - 2:30 pm **O01.03.37. Innovations in Applied Decision Theory for Occupational and Environmental Health and Safety**
David Richardson, University of North Carolina at Chapel Hill, United States

2:30 pm - 2:45 pm **O01.03.38. Heat Exposure and Injury Risk in Washington State Outdoor Construction Workers: A Case-Crossover Study Using High Resolution Meteorological Data and Workers' Compensation Injury Claims**
Miriam Calkins, University of Washington, United States

2:45 pm - 3:00 pm **O01.03.39. Circadian Variation of Melatonin and Steroid Hormones and Metabolites in Male Shift Workers**
Manolis Kogevinas, Barcelona Institute for Global Health (ISGlobal), Spain

3:00 pm - 3:15 pm **O01.03.40. Occupational Noise, Job Strain and Salivary Cortisol: A Repeated-Measure Study**
Ta-Yuan Chang, China Medical University, Taiwan

3:15 pm - 3:30 pm **O01.03.41. Hearing Loss in Agricultural Workers Exposed to Pesticides and Noise**
Nattagorn Choochouy, Mahidol University, Thailand

3:30 pm - 3:45 pm **O01.03.42. Association between Occupational Exposures to Irritants and Biomarkers of Oxidative and Nitrosative Stress in the Egea Study**
Miora Andrianjafimasy, INSERM, France

2:15 pm - 3:45 pm **O01.03H. Panel Studies of Air Pollution, Inflammation, COPD, and Lung Function**
Chair: Ling Liu, University of Toronto, Canada
Chair: Oluwafemi Oluwole, University of Saskatchewan, Canada

2:15 pm - 2:30 pm **O01.03.43. Association between Individual Indoor PM2.5 Exposure and Peak Expiratory Flow Rate in Schoolchildren**
Sanghyuk Bae, College of Medicine, Dankook University, Korea (the Republic of)

2:30 pm - 2:45 pm **O01.03.44. Time-Lag Pattern of Short-Term Exposure to Traffic-Related Air Pollution and Changes in Exhaled Nitric Oxide in Asthmatic Children**
Nan Ji, Rutgers University School of Public Health, United States

2:45 pm - 3:00 pm **O01.03.45. Outdoor Air Pollution, Fluorescent Oxidation Products and Persistent Asthma: The EGEA Study**
Anaïs Havet, INSERM, France

3:00 pm - 3:15 pm **O01.03.46. Association of PM2.5 of Outdoor Origin with Biomarkers of Oxidative Stress in COPD Patients**
Stephanie Grady, VA Boston Healthcare System; Channing Division of Network Medicine, Department of Medicine, Brigham and Women's Hospital and Harvard Medical School, United States

3:15 pm - 3:30 pm **O01.03.47. Comparison of Air Pollution and the Inflammatory Response of Local Residents in Urban and Rural Beijing, China -- Results of Airless Project**
Yiqun Han, King's College London, United Kingdom

3:30 pm - 3:45 pm **O01.03.48. Association between Air Pollution Exposure and Inflammation in Chronic Obstructive Pulmonary Disease Patients in Beijing, China**
Yuan Yao, Peking University, China

2:15 pm - 3:45 pm **O01.03I. Social, Economic, and Demographic Disparities in Air Pollution Exposure and Health Outcomes**
Chair: Penelope Quintana, San Diego State University, United States
Chair: Dany Doiron, Research Institute of the McGill University Health Centre, Canada

2:15 pm - 2:30 pm **O01.03.49. A National County-Level Assessment of U.S. Nursing Facility Characteristics Associated with Long-Term Exposure to Traffic Pollution in Older Adults**
Yi Wang, Indiana University, United States

2:30 pm - 2:45 pm **O01.03.50. Associations between Long-Term PM2.5 Exposure and Cardiovascular Outcomes Are Modified by Neighborhood Socioeconomic Effects in an Urban Area of North Carolina**
Anne Weaver, U.S. Environmental Protection Agency (EPA), United States

2:45 pm - 3:00 pm **O01.03.51. Disease Assimilation: The Loss of the Healthy Immigrant Advantage over Time with Exposure to Fine Particulate Matter**
Anders Erickson, University of British Columbia, Canada

3:00 pm - 3:15 pm **O01.03.52. PM2.5 and Mortality: Modification of the Association by Personal and Area Level Indicators of Socioeconomic Status**
Maayan Yitshak-Sade, Harvard T.H. Chan School of Public Health, United States

3:15 pm - 3:30 pm **O01.03.53. Effect Modification of the PM2.5 Association with Birthweight by Local Residential Racial and Economic Segregation**
Kelvin Fong, Harvard T. H. Chan School of Public Health, United States

3:30 pm - 3:45 pm **O01.03.54. Source-Specific Contributions to Fine Particulate Matter Exposure Disparities in the United States**
David Paolella, University of Washington, United States

2:15 pm - 3:45 pm **O01.03J. Transportation System and Health**
Chair: Maryam Shekarrizfard, University of Toronto, Canada
Chair: Ben Armstrong, London School of Hygiene and Tropical Medicine, United Kingdom

2:15 pm - 2:30 pm **O01.03.55. Biking Identification with the Micropem Accelerometer**
Jonathan Thornburg, RTI International, United States

2:30 pm - 2:45 pm **O01.03.56. Crashes when It Splashes: Link between Precipitation Type and Fatal Accidents in the United States**
Shubhayu Saha, Centers for Disease Control and Prevention, United States

2:45 pm - 3:00 pm **O01.03.57. Using Spatially Resolved Pollution Data to Plan Bicycle Infrastructure**
Darby Jack, Columbia University, United States

3:00 pm - 3:15 pm **O01.03.58. Spatial Variation of Injury Risk in a Metropolitan Area, According to Home Location, Transportation Mode, Distance Travelled and Route**
Felix Lamothe, Direction Régionale de Santé Publique de Montréal, Canada

3:15 pm - 3:30 pm **O01.03.59. Impacts of Multi-Modal Commuting on Personal Air and Noise Exposures and Airway Inflammation**
Yisi Liu, University of Washington, United States

3:30 pm - 3:45 pm **O01.03.60. Associations between Children's Physical Activity and Exposures to Air Temperature and Green Space in Mexico City**
Sandy Wong, Icahn School of Medicine at Mount Sinai, United States

2:15 pm – 3:45 pm **O01.03K. Stress, Inflammation, and Cardiopulmonary Outcomes in Scripted and Experimental Air Pollution Exposure Studies**

Chair: Lisa McKenzie, University of Colorado, United States

Chair: Chandresh Ladva, Emory University, United States

2:15 pm - 2:30 pm **O01.03.61. Forced Expiratory Volume in 1 Second Is Not Affected by Exposure to Diesel Exhaust and Cycling Exercise in Individuals with Exercise-Induced Bronchoconstriction**
Sarah Koch, University of British Columbia, Canada

2:30 pm - 2:45 pm **O01.03.62. Particulate Metal Exposures Induce Plasma Metabolome Changes in a Commuter Panel Study**
Chandresh Ladva, Emory University, United States

2:45 pm - 3:00 pm **O01.03.63. Exposure to Black Carbon and Acute Subclinical Health Effects: Results from a Panel Study in Three European Cities**
Evi Dons, Hasselt University, Belgium

3:00 pm - 3:15 pm **O01.03.64. Modification of Ozone-Induced Changes in Lung Function by Moderate Recent Life Stress**
Radhika Dhingra, U.S. Environmental Protection Agency (EPA), United States

3:15 pm - 3:30 pm **O01.03.65. Exposure to Air Pollution - A Novel Staircase-Function Response Mechanism of Stress Restoration**
Miaomiao Liu, Nanjing University, China

3:30 pm - 3:45 pm **O01.03.66. A Crossover Study of In-Vehicle Air Filtration and Acute Changes in Heart Rate Variability and Cognition among Healthy Adults**
Robin Shutt, Health Canada, Canada

2:15 pm – 3:45 pm **S01.03A. Effects of Prenatal Exposure to Environmental Neurotoxicants on Health and Neurodevelopment**

Chair: Deborah Dewey, University of Calgary, Canada

2:15 pm - 2:28 pm **S01.03.01. Tales from Two Cohots**
Deborah Dewey, University of Calgary, Canada

2:28 pm - 2:41 pm **S01.03.02. A Developmental Toxicology Model of Perfluorooctane Sulfonate and Methylmercury Co-Exposure**
Anthony Reardon, University of Alberta, Canada

2:41 pm - 2:54 pm **S01.03.03. Prenatal Bisphenol A Exposure and Brain Structure in Preschool-Aged Children**
Melody Grohs, University of Calgary, Canada

2:54 pm - 3:07 pm **S01.03.04. Prenatal Exposure to Bisphenol A and Bisphenol S and Neurodevelopment in Children at 2 Years of Age**
Jiaying Liu, University of Alberta, Canada

3:07 pm - 3:20 pm **S01.03.05. Environmental Contaminant Exposure during Pregnancy and Executive Function in 2 Year-Old Children**
Kayla Ten Eycke, University of Calgary, Canada

3:20 pm - 3:33 pm **S01.03.06. Prenatal Exposure to Phthalates and Cognitive Outcomes in Early Childhood in the Apron Cohort**
Maede Ejaredar, University of Calgary, Canada

3:33 pm - 3:45 pm **S01.03.07. Exposure to Arsenic and Mercury in Pregnant Women in Gold Mining Areas in Tanzania**
Elias Nyanza, Catholic University of Health and Allied Sciences and University of Calgary, Canada

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2:15 pm – 3:45 pm **S01.03B. Food, Nutrition and Environmental Health among First Nations in Canada**

Chair: Donna Mergler, Université du Québec à Montréal, Canada

Chair: Laurie Chan, University of Ottawa, Canada

2:15 pm - 2:30 pm **S01.03.08. Critical Considerations in Environment and Health for First Nations**
Tonio Sadik, Assembly of First Nations, Canada

2:30 pm - 2:45 pm **S01.03.09. Food, Nutrition and Food Security in First Nations Communities**
Malek Batal, Université de Montréal, Canada

2:45 pm - 3:00 pm **S01.03.10. The Legacy of Mercury Exposure in Grassy Narrows First Nation**
Donna Mergler, Université du Québec à Montréal, Canada

3:00 pm - 3:15 pm **S01.03.11. Research and Monitoring Efforts on First Nations Environmental Health Issues.**
Constantine Tikhonov, Department of Indigenous Services, Government of Canada, Canada

3:15 pm - 3:30 pm **S01.03.12. Total Diet Exposure to Contaminants among First Nations Adults in Canada**
Laurie Chan, University of Ottawa, Canada

3:30 pm - 3:45 pm **S01.03.13. Jeunes, Environnement Et Santé / Youth, Environment and Health (JES!-YEH!) Pilot Project in Four First Nation Communities in Quebec: Exposure Emerging Chemicals, Dietary Profiles and Health-Related Challenges**
Melanie Lemire, Université Laval, Canada

2:15 pm - 3:45 pm **S01.03C. High Resolution Air Pollution Mapping: Translating Data to Action**
Chair: Ananya Roy, Environmental Defense Fund, United States
Chair: Maria Harris, Environmental Defense Fund, United States

2:15 pm - 2:30 pm **S01.03.14. Personal Air Pollution Exposure Tracking: Bringing Data to Users**
Roel Vermeulen, Utrecht University, The Netherlands

2:30 pm - 2:45 pm **S01.03.15. Community Use of Stationary and Mobile Pollution Monitors in Somerville and Metropolitan Boston MA U.S.A.**
Wig Zamore, Somerville Transportation Equity Partnership, United States

2:45 pm - 3:00 pm **S01.03.16. Reducing Exposures to Traffic-Related Air Pollution in Urban Areas: Regional Planning, Neighborhood Design, and Individual Behavior**
Marianne Hatzopoulou, University of Toronto, Canada

3:00 pm - 3:15 pm **S01.03.17. Street-Level Air Pollution, Health Disparities, and Advocacy**
Maria Harris, Environmental Defense Fund, United States

3:15 pm - 3:30 pm **S01.03.18. Rapid-Response Local Monitoring of Toxic Air Pollution after Hurricane Harvey**
Anthony Miller, Entanglement Technologies, United States

3:30 pm - 3:45 pm **S01.03.19. Panel Discussion**

3:45 pm - 4:15 pm **Poster Viewing & Break**

4:15 pm - 5:30 pm **O01.04A. Air Pollution, Asthma and Allergic Disease**
Chair: Elaine Fuertes, Population Health and Occupational Diseases, Imperial College London, United Kingdom
Chair: Eric Lavigne, Health Canada, Canada

4:15 pm - 4:30 pm **O01.04.01. Association of Air Pollution with Incidence of Asthma, Allergic Rhinitis and Eczema: 10-Year Follow-Up of the Toronto Child Health Evaluation Questionnaire (T-CHEQ) Study**
Dave Stieb, Health Canada, Canada

4:30 pm - 4:45 pm **O01.04.02. Meta-Analysis of Associations between Air Pollution and Childhood Eczema, Rhinoconjunctivitis and Asthma in Four European Birth Cohorts**
Elaine Fuertes, Population Health and Occupational Diseases, National Heart and Lung Institute, Imperial College London, United Kingdom

4:45 pm - 5:00 pm **O01.04.03. Effects of Fine Particulate Matter and Its Constituents on Asthmatic and Allergic Symptoms in Preschool Children: A Cross-Sectional Study in Six Cities of China**
Wenming Shi, School of Public Health, China

5:00 pm - 5:15 pm **O01.04.04. Exposure to Traffic-Related Air Pollution and Risk of Development of Childhood Asthma: Results from the Born in Bradford Cohort Study**
Haneen Khreis, Texas A&M Transportation Institute (TTI) and Center for Advancing Research in Transportation Emissions, Energy, and Health (CARTEEH), United States

5:15 pm - 5:30 pm **O01.04.05. Emergency Department Visits among Patients with Eosinophilic Esophagitis and Acute Exposures to Particulate Pollution (PM2.5)**
Melissa Maestas, University of Colorado Boulder, United States

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4:15 pm - 5:30 pm **O01.04B. Application of Machine Learning Methods to Develop Spatiotemporal Models of Air Pollution**
Chair: Kees de Hoogh, Swiss Tropical and Public Health Institute, Switzerland
Chair: Jeremy Sarnat, Emory University, United States

4:15 pm - 4:30 pm **O01.04.06. Generalization of Constrained Mixed-Effect Modeling Framework with Ensemble Learning to Broader Geographic Areas for Predicting Nitrogen Oxides at High Spatio-temporal Resolution**
Rima Habre, University of Southern California, United States

4:30 pm - 4:45 pm **O01.04.07. An Ensemble Machine-Learning Model to Predict Historical PM2.5 Concentrations in China from Satellite Data**
Guannan Geng, Emory University, United States

4:45 pm - 5:00 pm **O01.04.08. Leveraging Google Place of Interest (POI) Data, Crowdsourcing, and Machine Learning to Predict Urban NO2 Concentrations for the Contiguous U.S.**
Tianjun Lu, Virginia Tech, United States

5:00 pm - 5:15 pm **O01.04.09. Developing Advanced PM2.5 Exposure Models in Lima, Peru**
Bryan Vu, Emory University, United States

5:15 pm - 5:30 pm **O01.04.10. Assessment of Shared and Unshared Exposure Measurement Error in Ensemble Learning Estimates of Nitrogen Oxides and Its Implications on Epidemiological Findings in Air Pollution Studies**
Mariam Girguis, University of Southern California, United States

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4:15 pm - 5:30 pm **O01.04C. Neurological and Cognitive Outcomes Associated with Air Pollution**
Chair: Julia Bauer, Boston University School of Public Health, United States
Chair: Tamara Schikowski, IUF-Leibniz Institute of Environmental Medicine, Germany

4:15 pm - 4:30 pm **O01.04.11. Brain Metabolite Levels May Mediate Traffic-Related Air Pollution Associated Generalized Anxiety Symptoms: Findings from the Cincinnati Childhood Allergy and Air Pollution Study**
Kelly Brunst, University of Cincinnati, United States

4:30 pm - 4:45 pm **O01.04.12. Effects of Traffic Related Particulate Matter on Behavior, Inflammation, and Neuronal Tract Integrity in a Developmental Rodent Model**
Ben Nephew, Tufts University Cummings School of Veterinary Medicine, United States

4:45 pm - 5:00 pm **O01.04.13. The Role of Cardiovascular Disease in the Relationship of Chronic Exposure to Air Pollution and Incident Dementia**
Sindana Ilango, University of California, San Diego, United States

5:00 pm - 5:15 pm **O01.04.25. Genetic Variation in Biotransformation Enzymes, Air Pollution Exposures, and Risk of Spina Bifida**
Amy Padula, University of California, San Francisco, United States

5:15 pm - 5:30 pm **O01.04.26. Fine Particulate Matter Air Pollution and Incidence of Cognitive Impairment among the Elderly in China**
Jiaonan Wang, Institute for Environmental Health and Related Product Safety, Chinese Center for Disease Control and Prevention, China

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4:15 pm - 5:30 pm **O01.04D. Novel Approaches in Environmental Epidemiology**
Chair: Francesco Sera, Department of Social and Environmental Health Research, London School of Hygiene and Tropical Medicine, United Kingdom
Chair: David Rojas-Rueda, ISGlobal, Spain

4:15 pm - 4:30 pm **O01.04.15. Case Time Series: A Novel Study Design for Big Data Analyses in Environmental Epidemiology**
Antonio Gasparrini, London School of Hygiene & Tropical Medicine, United Kingdom

4:30 pm - 4:45 pm **O01.04.16. Expose: An R Package for Estimating Individual and Average Joint Effects of Chemical Mixtures, Dose-Response Relationships, and Potential Interactions in Environmental Epidemiology**
Ibon Tamayo, Harvard University, United States

4:45 pm - 5:00 pm **O01.04.17. Influence of the Urban Exposome on Birth Weight**
Mark Nieuwenhuijsen, Barcelona Institute for Global Health (ISGlobal), Spain

5:00 pm - 5:15 pm **O01.04.18. Early Life Metal Exposures and Neurodevelopmental Trajectory Profiles: Assessment Using Parallel Latent Growth Mixture Models**
Shelley Liu, Icahn School of Medicine at Mount Sinai, United States

5:15 pm - 5:30 pm **O01.04.19. A Causal Inference Approach to Understand the Link between Air Pollution Exposure and the Occurrence of Multiple Sclerosis Relapses**
Alice Sommer, Harvard University - Faculty of Arts and Sciences, United States

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4:15 pm - 5:30 pm **O01.04E. Prenatal Metals Exposure**
Chair: Emma Rosen, National Institute of Environmental Health Sciences, United States
Chair: Andres Cardenas, Harvard Medical School, United States

4:15 pm - 4:30 pm **O01.04.20. Prenatal Heavy Metal Exposure and Newborn Leucocyte Telomere Length: A Birth-Cohort Study in Myanmar**
Kyi Wai, University of Tokyo, Japan

4:30 pm - 4:45 pm **O01.04.21. In Utero and Peripubertal Metals Exposure in Relation to Reproductive Hormones and Sexual Maturation in Girls**
Pahriya Ashrap, University of Michigan, Ann Arbor, United States

4:45 pm - 5:00 pm **O01.04.22. Chemical Mixture Exposures during Pregnancy and Birth Outcomes**
Geetika Kalloo, Brown University School of Public Health, United States

5:00 pm - 5:15 pm **O01.04.23. The Relationships between Maternal Urinary Trace Metals and Plasma Immune Biomarkers during Pregnancy**
Tun (Max) Aung, University of Michigan, United States

5:15 pm - 5:30 pm **O01.04.24. Bone Remodeling and Metals Exposure during Pregnancy: Results from Progress Cohort**
Citlalli Osorio-Yáñez, National Institute of Public Health-Mexico, Mexico

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4:15 pm - 5:30 pm **S01.04A. Addressing Complexities Through Partnership and Collaboration in the Arctic**
Chair: Cheryl Khoury, Health Canada, Canada

4:15 pm - 4:30 pm **S01.04.01. Exposure to Perfluoroalkyl Substances and Polybrominated Diphenyl Ethers from Traditionally Harvested Food Animals on St. Lawrence Island, Alaska**
Sam Byrne, St. Lawrence Univeristy, United States

4:30 pm - 4:45 pm **S01.04.02. Overview of Human Health Risk Assessments**
Zoe Gillespie, Health Canada, Canada

4:45 pm - 5:00 pm **S01.04.03. Discovering Chemicals of Emerging Arctic Concern: Application of New Analytical Approaches to Human Biomonitoring**
Pierre Ayotte, Université Laval, Canada

5:00 pm - 5:15 pm **S01.04.04. Human Health in the Arctic: The Arctic Monitoring and Assessment Program**
Jon Oeyvind Odland, NTNU Trondheim Norway, Norway

5:15 pm - 5:30 pm **S01.04.05. Panel Discussion**

4:15 pm - 5:30 pm **S01.04B. Aggregate Exposure and Cumulative Risk Assessments in the EuroMix project**
Chair: Cecile Karrer, Swiss Federal Institute of Technology (ETH), Switzerland
Chair: Natalie von Goetz, ETH Zurich, Swiss Federal Office of Public Health, Switzerland

4:15 pm - 4:30 pm **S01.04.06. Identification of Key Mixtures in European Countries and Assessment of Consequential Exposures**
Amélie Crépet, French Agency for Food, Environmental and Occupational Health & Safety, France

4:30 pm - 4:45 pm **S01.04.07. Verification of Aggregated Exposure to Bisphenols from Diet and Cosmetics - The Human Biomonitoring Study from the EU Project Euromix**
Monica Andreassen, Norwegian Institute of Public Health, Norway

4:45 pm - 5:00 pm **S01.04.08. Aggregate and Cumulative Exposure to Pyrethroids of French Population**
Marie Vanacker, ANSES, French Agency for Food, Environmental and Occupational Health and Safety, France

5:00 pm - 5:15 pm **S01.04.09. Aggregate Exposure and Cumulative Risk Assessment of the Bisphenols BPA, BPS, BPF, and BPAF for the French Population**
Cecile Karrer, Swiss Federal Institute of Technology (ETH), Switzerland

5:15 pm - 5:30 pm **S01.04.10. Taking Account of Variability and Uncertainty in Cumulative Risk Assessment**
Waldo de Boer, Wageningen University & Research, The Netherlands

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4:15 pm - 5:30 pm **S01.04C. Assessing Health and Well-Being Benefits of Exposure to Natural Environments: Methodological Challenges and Opportunities**
Chair: Timothy Buckley, U.S. Environmental Protection Agency (EPA), United States

4:15 pm - 4:30 pm **S01.04.11. Urban Green Spaces and Health - Evidence, Limitations, and Ways Forward**
Matilda van den Bosch, University of British Columbia, Canada

4:30 pm - 4:45 pm **S01.04.12. Does Physical Activity Mediate the Effect of Residential Greenness on Mental Health and Subjective Well-Being? Findings from the Sister Study**
Raquel Silva, U.S. Environmental Protection Agency (EPA), United States

4:45 pm - 5:00 pm **S01.04.13. High-Resolution Measures of Natural Environments and Mental Health Outcomes in the Nurses' Health Studies**
Peter James, Harvard Medical School & Harvard Pilgrim Health Care Institute, United States

5:00 pm - 5:15 pm **S01.04.14. Living Close to Water Is Associated with Reduced Risks of Mortality in Canada's Largest Cities: Results from the Canadian Census Health and Environment Cohort**
Dan Crouse, University of New Brunswick, Canada

5:15 pm - 5:30 pm **S01.04.15. Panel Discussion**

4:15 pm - 5:30 pm **S01.04D. Biomonitoring Data from the Canadian Health Measures Survey in Risk Assessment: A Decade of Progress**
Chair: Lesa Aylward, Summit Toxicology, LLP, United States

4:15 pm - 4:30 pm **S01.04.16. Making Biomonitoring and Exposure Knowledge More Accessible for Risk Assessment**
Annie St-Amand, Health Canada, Canada

4:30 pm - 4:45 pm **S01.04.17. Using Biomonitoring Data from the Canadian Health Measures Survey and Biomonitoring Equivalents to Assess Risk Associated with Essential Nutrients**
Kristin Macey, Health Canada, Canada

4:45 pm - 5:00 pm **S01.04.18. Fluoride Levels in Urine and Tap Water in Canada: Data from the Canadian Health Measures Survey 2012-2015 and Interpretation in a Risk-Based Context**
Lesa Aylward, Summit Toxicology, United States

5:00 pm - 5:15 pm **S01.04.19. Interpretation of Urinary Concentrations of Pyrethroid Metabolites in the Canadian Population in a Risk Context: Associated Factors and Comparison to Biomonitoring Equivalents**
Kim Irwin, Health Canada, Canada

5:15 pm - 5:30 pm **S01.04.20. Screening of Population Level Biomonitoring Data from the Canadian Health Measures Survey in a Risk Based Context**
Annie St-Amand, Health Canada, Canada

4:15 pm - 5:30 pm **S01.04E. Clean Cooking Implementation Science to Understand Complex Determinants of Clean Fuel Technology Adoption**
Chair: Joshua Rosenthal, National Institutes of Health Fogarty International Center, United States
Chair: Kalpana Balakrishnan, Sri Ramachandra Medical College & Research Institute, India

4:15 pm - 4:30 pm **S01.04.21. Introduction: Implementation Science to Reduce Household Air Pollution (HAP) Exposures in Low and Middle-Income Countries (LMICs)**
Joshua Rosenthal, Fogarty International Center, National Institutes of Health, United States

4:30 pm - 4:45 pm **S01.04.22. Economic Experiments to Measure LPG Stove Demand and Impacts on Cooking Behaviors and Exposures in Northern Ghana**
Katherine Dickinson, Colorado School of Public Health, United States

4:45 pm - 5:00 pm **S01.04.23. The Bottled Gas for Better Life Pilot: An Evaluation of the First Microfinance Initiative in Cameroon to Support Households Switch from Solid Fuel to LPG for Cooking**
Daniel Pope, University of Liverpool, United Kingdom

5:00 pm - 5:15 pm **S01.04.24. Understanding Household, Network, and Organizational Drivers of Adoption, Sustained Use, and Maintenance of Clean Cooking Fuels in Rural India**
Gautam Yadama, Boston College, United States

5:15 pm - 5:30 pm **S01.04.25. Enhancing Usage of Clean Fuels among Pregnant Women in India**
Ajay Pillarisetti, University of California, Berkeley, United States

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4:15 pm - 5:30 pm **S01.04F. Climate, Air Pollution, and Environmental Health in Africa - Part 2**
Chair: Kristie Ebi, University of Washington, United States
Chair: Youssef Oulhote, Harvard T. H. Chan School of Public Health, United States

4:15 pm - 4:30 pm **S01.04.26. The Canaries in the Coal Mine of Climate Change Impacts: Understanding the Threats that Climate Change Poses to Respiratory Health of Workers**
Isabella Annesi-Maesano, INSERM & Sorbonne Université, France

4:30 pm - 4:45 pm **S01.04.27. Indoor Air Pollution from Solid Fuel Use and Children's Developmental Status in LMICs: Insights from the Multiple Indicator Cluster Survey**
Youssef Oulhote, Harvard T. H. Chan School of Public Health, United States

4:45 pm - 5:00 pm **S01.04.28. Outdoor Air Pollution in the City of Abidjan (Côte d'Ivoire): From Pollutant Concentrations to Diseases in Hospitals**
Kouame Kouadio, Institut Pasteur of Côte d'Ivoire, Côte d'Ivoire

5:00 pm - 5:15 pm **S01.04.29. A Time Series Analysis of Morbidity and Mortality of Lung and Cardiovascular Diseases in Kampala, Uganda**
Samuel Etajak, Makerere University School of Public Health, Uganda

5:15 pm - 5:30 pm **S01.04.30. Panel Discussion**

4:15 pm - 5:30 pm **S01.04G. Emerging Evidence on Exposures to Ultrafine Particles**
Chair: Kirsten Koehler, Johns Hopkins University, United States

4:15 pm - 4:30 pm **S01.04.31. Personal Exposures to Ultrafine Particles among Asthmatic Kids: Differences between UFP and PM2.5**
Kirsten Koehler, Johns Hopkins University, United States

4:30 pm - 4:45 pm **S01.04.32. Using Real-Time Personal Monitoring and Ecological Momentary Assessment to Study Ultrafine Particles and Children's Health**
Patrick Ryan, Cincinnati Children's Hospital Medical Center, United States

4:45 pm - 5:00 pm **S01.04.33. Ultrafine Particle Exposures in a Population of Former Smokers with COPD**
Meredith McCormack, Johns Hopkins University, United States

5:00 pm - 5:15 pm **S01.04.34. Joint Effects of Long-Term Exposure to Ultrafine Particles and Nitrogen Oxides on Cardiovascular Risk Factors over Six Years among an Environmental Justice Population**
Laura Corlin, Tufts University, United States

5:15 pm - 5:30 pm **S01.04.39. Panel Discussion**

4:15 pm - 5:30 pm **S01.04H. Updates on the CKDu Epidemic and New Directions for Coordinated Research**
Chair: Madeleine Scammell, Boston University School of Public Health, United States
Chair: Katherine James, Colorado School of Public Health, United States
Chair: Bonnie Joubert, National Institute of Environmental Health Sciences (NIEHS), United States

4:15 pm - 4:30 pm **S01.04.35. Longitudinal Study of Workers in El Salvador & Nicaragua: Opportunities for Collaboration**
Madeleine Scammell, Boston University School of Public Health, United States

4:30 pm - 4:45 pm **S01.04.36. Chronic Kidney Disease in a Multiethnic Rural Population in the United States: Translating Research from Tropical Regions**
Katherine James, Colorado School of Public Health, United States

4:45 pm - 5:00 pm **S01.04.37. Chronic Kidney Disease in El Salvador and Mesoamerica: Fostering Collaborations to Respond to the Epidemic**
Ramon Garcia Trabanino, Centro de Hemodialisis, El Salvador

5:00 pm - 5:15 pm **S01.04.38. Shining a Light on Sri Lankan CKDu: Opportunities for International Collaboration**
Keith Levine, RTI International, United States

5:15 pm - 5:30 pm **S01.04.40. Panel Discussion**

5:30 pm - 6:00 pm **ISEE Africa Chapter Meeting**
6:00 pm - 8:00 pm **Women's Networking Event**
8:00 pm - 10:00 pm **ISES Newsletter Editorial Board**

WEATHER, CLIMATE AND DISASTERS 1

P01.0020 **The Research on National Heat Vulnerability Assessment of China**
ZongHao Du, National Institute of Environmental Health, Chinese Center for Disease Control and Prevention, China

P01.0040 **Using Ambient Temperature and Internet Search Query to Predict Seasonal Influenza Outbreaks**
Yuzhou Zhang, Queensland University of Technology, Australia

P01.0050 **Assessing the Impact of Cold and Heat Waves on Physical Activity in a Sub-Tropical Urban Population**
Janice Ho, The Chinese University of Hong Kong, Hong Kong

P01.0060 **Seasonal Variation in Microclimates and the Role of Regional Weather and Environmental Factors**
Rachel Sippy, University of Wisconsin-Madison, United States

P01.0070 **Are Per Capita Carbon Emissions Predictable across Countries?**
Cheng-Kuan (Calvin) Lin, Harvard T.H. Chan School of Public Health, United States

P01.0080 **Air Conditioning and Heat-Related Illness in Detroit, Michigan, USA: A Community-Based Participatory Epidemiologic Analysis**
Jacqueline Cardoza, University of Michigan School of Public Health, United States

P01.0090 **Impact of Extreme Heat on End-Stage Renal Disease Patients in the Northeast U.S. Using Selected Clinical Outcomes**
Richard Remigio, University of Maryland, College Park, United States

P01.0100 **Single-Day Inclement Weather Events is an Adherence Barrier for Treatment among Hemodialysis Patients in Urban Northeastern Cities**
Richard Remigio, University of Maryland, College Park, United States

P01.0110 **Ambient Temperature and Mortality in Australia: An Evaluation of Risk and Attributable Burden for Different Temperature Exposures**
Jian Cheng, School of Public Health and Social Work, Institute of Health and Biomedical Innovation, Australia

P01.0120 **Comparative Assessment of Heat-and-Cold-Related Emergency Department Visits in China and Australia: Population Vulnerability and Attributable Burden**
Jian Cheng, School of Public Health and Social Work, Institute of Health and Biomedical Innovation, Australia

P01.0130 **A Time Series Analysis of Associations between Climate Change and Heat Related Illnesses and Development of Heat Health Warning System in Thailand**
Chuleekorn Tanathitikorn, Institute of Health & Society, Faculty of Medical Sciences, Thailand

P01.0150 **The Role of Temperature and Temperature Variability in Risk of Stroke**
Sebastian Rowland, Columbia University, United States

P01.0160 **Effect Modification of Heat Wave Characteristics and Influence on Variability in Mortality in Northwestern India**
Amruta Nori-Sarma, Yale University, United States

P01.0170 **Putting the Economic Cart before the Healthy Horse: Barriers and Opportunities for Health Co-Benefits in Climate Change Mitigation Policies**
Annabelle Workman, University of Melbourne, Australia

P01.0180 **Proposition of Lags and Variables for a Cold-Health Watch and Warning System in the Province of Quebec**
Bixun Yan, Institut National de la Recherche Scientifique (INRS), Canada

P01.0190 **Impact of Anomalous Temperature on Injury Mortality by Age and Sex in the U.S.A.**
Robbie Parks, Imperial College London, United Kingdom

P01.0210 **Pollen Counts in Four Canadian Cities: Geographical Variation between 2008 and 2012**
Cecilia Sierra-Heredia, Simon Fraser University, Canada

P01.0220 **Spatio-Temporal Analysis of Dengue Cases in Queensland, Australia, 2010-2015**
Rokeya Akter, Queensland University of Technology, Australia

P01.0230 **Kidney Injury within Arid/Semi-Arid Climates: A View Nationally and Within the San Luis Valley, Colorado**
Amber Vaughn, Colorado School of Public Health, United States

P01.0240 **Development and Selection of an Appropriate Model of City Level Dengue Fever Incidence in China Using Autocorrelation, Population, Weather, Climate, Vegetation, and Land Use Predictors**
Megan Clegg, University of Queensland, United States

BUILT ENVIRONMENT, NOISE AND GREENNESS 1

P01.0250 **The Association between Spatial Pattern of Green Space with High Vitality and Hyperthermia Mortality on the Extreme High Temperature**
Ejin Kim, Graduate School of Public Health, Seoul National University, Korea (the Republic of)

P01.0260 **Exploring the Utilitarian and Non-Utilitarian Bicycling Behaviors of North American Women Cyclists**
Huyen Le, Virginia Tech, United States

P01.0280 **Impact of the Built Environment on Active Travel: A Longitudinal Study of 12 U.S. Metropolitan Areas**
Huyen Le, Virginia Tech, United States

P01.0290 **Quantifying Residential Access and Exposure to Greenspace Using High-Resolution Remotely Sensed Data: A Case Study of Metro Vancouver, British Columbia**
Ingrid Jarvis, University of British Columbia, Canada

P01.0291 **Impacts of Multi-Modal Commuting on Personal Air and Noise Exposures and Airway Inflammation**
Yisi Liu, University of Washington, United States

P01.0292 **Assessing Associations between School Facility Condition, Neighborhood Environment, and Respiratory Health in Public Schools: An Application of Ultrahigh Dimensional Variable Selection Method on Big Data**
Yi Lu, University at Albany, State University of New York Upstate Medical University, United States

P01.0300 **Noise Sensitivity and Annoyance in the HERMES Cohort of Swiss Adolescents**
Louise Tangermann, Swiss Tropical and Public Health Institute & University of Basel, Switzerland

P01.0310 **Long-Term Exposure to Wind Turbine Noise and Incidence of Myocardial Infarction: The Danish Nurse Cohort**
Jeanette Jørgensen, University of Copenhagen, Denmark

P01.0311 **Associations of Surrounding Green, Air Pollution and Traffic Noise with General and Mental Health**
Jochem Klompmaker, National Institute for Public Health and the Environment, The Netherlands

P01.0312 **The Association between Long-term Neighborhood Greenness and Lethal Prostate Cancer in a Prospective Cohort Study of Male Health Professionals in the United States**
Hari Iyer, Harvard T. H. Chan School of Public Health, United States

P01.0313 **Associations between Traffic-Related Air Pollution and Cardiovascular Disease Risk Factors Were Stronger in More Walkable Neighborhoods: The Cardiovascular Health in Ambulatory Care Research Team (CANHEART) Cohort**
Nicholas Howell, University of Toronto, Canada

P01.0314 **The Relationship between Long-term Exposure to Neighbourhood Greenness and Air Pollution and Cardiovascular Mortality in Urban Areas in Belgium**
Mariska Bauwelinck, Vrije Universiteit Brussel, Belgium

P01.0315 **Modelled and Perceived Noise Exposure and Psychotropic Medication Use**
Enembe Okokon, National Institute for Health and Welfare, Finland

P01.0316 **Long-Term Residential Exposure to Environmental Noise and Cardiovascular Disease Onset: A Population-Based Cohort Study**
Larisa Yankoty, Université de Montréal,Canada

P01.0317 **Long-Term Transportation Noise Exposure and Incidence of Ischemic Heart Disease and Stroke**
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Cancan Zhou, Xinhua Hospital affiliated to Shanghai Jiao Tong University School of Medicine, Shanghai, China

P01.2000 **Investigating Health-Relevant Air Pollution Concentration Linkages across Multiple Seasons during Indoor Cookstove Campaign in Rural India**
Julian Marshall, University of Washington, United States

P01.2010 **In Search of Preventive Measures for Reducing Lead Exposure in Children Who Live in Lead Smelter and Mining Communities**
Landon MacGillivray, University of British Columbia, Canada

P01.2020 **Predictors of Urinary Phenol and Paraben Concentrations among Pregnant Women in Northern Puerto Rico**
Pahriya Ashrap, University of Michigan, Ann Arbor, United States

P01.2030 **An Effect of Maternal Secondhand Smoke Exposure at Early Pregnancy on Autistic Behaviors at 5 Years of Age**
Hyunjoo Joo, Dankook University College of Medicine, Korea (the Republic of)

P01.2040 **Trace Metal Exposure and Health Effects among Urban Children Living in Areas with Different Degrees of Pollution in Lubumbashi, DR Congo**
Paul Musa Obadia, University of Lubumbashi, Congo (the Democratic Republic of the)

P01.2050 **Spatial and Temporal Variability of Soil Metal Contaminants in the Animas and San Juan Watershed Downstream from Legacy Mining**
Gaurav Jha, New Mexico State University, United States

P01.2060 **Exposure of Inorganic Mercury in the General Population and Ethnic Minorities in New York City and Its Associations with Skin Lightening Practice**
Chi Wen, Icahn School of Medicine at Mount Sinai, United States

P01.2070 **Does Overall Environmental Quality Affect End-Stage Renal Disease Survival?**
Marissa Kosnik, North Carolina State University, United States

P01.2080 **Social Environment Change and Social Health Outcomes**
Yanan Zhang, Wuhan University, China

P01.2100 **Health-Related Needs Assessment of Artisanal Small-Scale Goldminers in Kadoma/Zimbabwe: Paving the Way for Health Improving Interventions**
Jana Becker, Ludwig-Maximilians University Munich, Germany

PRENATAL AND EARLY LIFE EXPOSURES AND EFFECTS 1

P01.2110 **Impact of Mercury Exposure on Health-Related Quality of Life during Pregnancy in Suriname**
Anisma Gokoel, Academic Hospital Paramaribo, Suriname

P01.2120 **Association between Phenols and Parabens with Gestational Age, and the Modifying Effect of Life Events during Pregnancy**
Amira Aker, University of Michigan, Ann Arbor, United States

P01.2121 **Early-Life Infections, Immune Dysregulation, and Childhood Acute Lymphocytic Leukemia in Costa Rica**
Sophia Colombari, Figueroa Universidad Nacional, Costa Rica

P01.2130 **Urinary Concentrations of Bisphenol-F and Their Associations with Environmental Factors of Pregnant Women: The Mother and Kids Environmental Health (MAKE) Study**
Bohye Shin, National Cancer Center Institute, Korea (the Republic of)

P01.2150 **Prenatal Persistent Halogenated EDCs and Gestational Glucose Levels in a Racially Diverse Pregnancy Cohort of Overweight Women**
Suril Mehta, George Washington University, United States

P01.2160 **Congenital Malformations and Trace Metals: A Case-Control Study from Lubumbashi, DR Congo**
Tony Kayembe-Kitenge, University of Lubumbashi, Congo (the Democratic Republic of the)

P01.2170 **Indoor Pesticide Exposure, Birthweight, and Gestational Age: A Cohort Study among Pregnant Women in Beijing, China**
Zeinab Farhat, University at Buffalo, United States

P01.2180 **Maternal Urinary Phthalate Concentrations, Gestational Diabetes, and Glucose Intolerance during Pregnancy**
Rachel Shaffer, University of Washington Seattle School of Public Health, United States

P01.2190 **Vaginal Douching as a Possible Source of 1,4-Dichlorobenzene among Reproductive-Aged Women: National Health and Nutrition Examination Survey 2001-2004**
Ning Ding, University of Michigan, United States

P01.2220 **Mediation of the Association between Prenatal Arsenic Exposure and Infant Birth Outcomes by DNA Methylation of DNMT3A**
Anne Bozack, Columbia University, United States

P01.2230 **Effect of In Utero Arsenic Exposure on Infant Birth Outcomes: Mediation by DNA Methylation of Cord Blood**
Anne Bozack, Columbia University, United States

P01.2240 **Maternal Blood Cadmium Concentrations and Whole Blood DNA Methylation during Pregnancy in the Early Autism Risk Longitudinal Investigation (EARLI)**
Tun (Max) Aung, University of Michigan, United States

P01.2250 **Breastfeeding as a Predictor of Serum Concentrations of Per- and Polyfluorinated Alkyl Substances in Reproductive-Aged Women and Young Children: A Rapid Systematic Review**
Brianna VanNoy, George Washington University, United States

P01.2260 **Associations of Serum Perfluoroalkyl Substance and Vitamin D Biomarker Concentrations in the National Health and Nutrition Examination Survey (NHANES), 2003-2010**
Taylor Etzel, Johns Hopkins Bloomberg School of Public Health, United States

P01.2270 **Association of Prenatal Exposure to Benzophenone-3 with Cognitive Function in 4.5-Month-Old Infants**
Francheska Merced-Nieves, University of Illinois Urbana-Champaign, United States

P01.2280 **Serum-Adipokine Hormones from Birth to Puberty in Children Exposed to Perfluoroalkyl Substances**
Colleen Shelly, Harvard T.H. Chan School of Public Health, United States

P01.2290 **Impact of In Utero and Adolescent Phthalate Exposure on Sexual Maturation Progression**
Amber Cathey, University of Michigan School of Public Health, United States

P01.2300 **Perfluoroalkyl Substances and Birth Outcomes: A Pool Analysis in the Danish National Birth Cohort**
Zeyan Liew, University of California, Los Angeles, United States

P01.2310 **Multi-Sources Exposure to Pesticides during Pregnancy and Risk of Hypospadias and Cryptorchidism: The French National Birth Cohort Elfe**
Noriane Souleymane-Cognez, UnivRennes, INSERM, France

P01.2330 **Gestational Perfluoroalkyl Concentrations and Thyroid Hormone Levels in Faroese Pregnant Women and Neonates: A Prospective Cohort Study**
Christina Xiao, Harvard T.H. Chan School of Public Health, United States

P01.2340 **Association between Serum Anti-Diphtheria Toxoid Antibodies and Drinking Water Arsenic Exposure in a Prospective Birth Cohort in Rural Bangladesh**
Barrett Welch, Oregon State University, United States

P01.2350 **The Paraquat Exposures of Pregnant Women and Neonates in Agricultural Areas in Thailand**
Pajaree Konthonbut, Mahidol University, Thailand

P01.2360 **Parental Occupational Exposure to Potential Endocrine Disrupting Chemicals, Adverse Birth Outcomes, and Effects of Multi-Vitamin Supplements**
Huanhuan Zhang, School of Public Health, Sun Yat-sen University, China

P01.2370 **Prenatal RFR Exposure and Cognitive Development of 5-Year-Old Children**
Heesun Yang, Graduate School of Dankook University, Korea (the Republic of)

P01.2380 **Dietary Exposure to Pesticides in Tannia in Pregnant Surinamese Women**
Firoz Abdoel Wahid, Tulane University, United States

P01.2390 **Autism Spectrum Disorders in Catalonia, Spain: A New Population-Based Case-Cohort Study to Investigate Environmental Factors**
Monica Guxens, Barcelona Institute for Global Health (ISGlobal), Spain

P01.2400 **Urinary Phthalate Metabolites in Relation to Children's Asthmatic and Allergic Symptoms in Shanghai**
Wenming Shi, School of Public Health, Fudan University, China

P01.2401 **Associations of Maternal Pregnancy Urine Estrogen Levels with Phthalate and Phthalate Replacement (1,2-Cyclohexane Dicarboxylic Acid Diisononyl Ester, DiNCH) Metabolites**
Diana Pacyga, Michigan State University, United States

P01.2402 **Associations of Prenatal Exposure to Triclosan and Benzophenone-3 with Visual Recognition Memory in 7.5-Month-Old Infants**
Kelsey Dzwilewski, University of Illinois at Urbana-Champaign, United States

P01.2403 **Associations of In Utero Polybrominated Diphenyl Ethers (PBDEs) and Polychlorinated Biphenyls (PCBs) with the Mid-childhood Gut Microbiome**
Hannah Laue, Harvard T.H. Chan School of Public Health, United States

P01.2404 **Preterm Birth among Infants Exposed to In Utero Ultrafine Particle Emissions from Aircraft Engines near the Los Angeles International Airport**
Sam Wing, University of California Los Angeles, United States

P01.2405 **The Effect of Prenatal Bone Lead Concentrations on Prepulse Inhibition: A Prospective Study of Mexican Children**
Kale Kponee, Harvard T.H. Chan School of Public Health, United States

P01.2406 **Intrauterine Exposure to Polychlorinated Biphenyls (PCBs) and Anogenital Distance in Israeli Newborns**
Eva Siegel, Mailman School of Public Health Columbia University, United States

ADULT HEALTH EFFECTS OF ENVIRONMENTAL EXPOSURES 1

P01.2410 **Association of Cumulative Exposure to Heavy Metal Mixtures with Obesity and Its Comorbidities among U.S. Adults in NHANES 2003-2014**
Xin Wang, University of Michigan, United States

P01.2420 **Assessing the Relation between Plasma PCB Concentrations and Elevated Autistic Behaviour Using Bayesian Predictive Odds Ratios**
Brendan Bernardo, Simon Fraser University, Canada

P01.2430 **Data Synthesize for Semantic Fine-Grained Prediction of Lung Nodule in CT Images**
Zhiqin Liu, Southwest University of Science and Technology, China

P01.2450 **Identifying Geospatial Patterns of Aggressive Breast Cancer Incidence Using North Carolina State as a Model**
Larisa Gearhart-Serna, Duke University, United States

P01.2470 **Possible Risks of High Altitude Exposure on Prostate Diseases**
Diana Alcantara-Zapata, University of Chile, Chile

P01.2480 **Indoor Tanning and the Risk of Developing Non-Cutaneous Cancers: A Systematic Review and Meta-Analysis**
Dylan O'Sullivan, Queen's University, Canada

P01.2490 **Temporal and Spatial Excess Leukemia Deaths Around the Nuclear Power Plant in Kyushu, Japan (1970-2005)**
Yumiko Miyano, Okayama university, Japan

P01.2510 **Associations between Urinary Triclosan and Serum Thyroid Hormone Concentrations**
Julianne Skarha, Brown University, United States

P01.2520 **Metal Exposure as a Mixture and Intellectual Function in Adolescence in Bangladesh**
Elizabeth Gibson, Mailman School of Public Health, Columbia University, United States

P01.2530 **Long-Term Quality-Of-Care Summary Score Predicts the Occurrence of Microvascular and Macrovascular Complications in Type 2 Diabetic Patients**
Pi-I Li, Chi Mei Medical Center, Taiwan

P01.2540 **Association of Lead Exposure on Cognitive Decline due to Mediation and Interaction with Uric Acid**
Vy Nguyen, Harvard T.H. Chan School of Public Health, United States

P01.2550 **Associations between Parabens and Measures of Metabolic Syndrome in the General Canadian Population**
Joanne Kim, McGill University, Canada

P01.2560 **Children's Cognitive Function in Relation to Pre- and Postnatal Exposure to Chlordecone**
Christina Xiao, Harvard T. H. Chan School of Public Health, United States

P01.2570 **Investigating the Association between Blood Lead Levels and Alzheimer's Disease Mortality Using NHANES 1999-2008**
Ellen Wells, Purdue University, United States

P01.2580 **Pesticide and Acute Asthma Attacks in California, Usa in 2005 to 2011: A Bidirectional Symmetric Case-Crossover Study**
Marcela Entwistle, University of California, Merced, United States

P01.2590 **Case-Control Study on Lung Cancer and Residential Radon in South Korea**
Min Heui Yu, Yonsei University Wonju College of Medicine, Korea (the Republic of)

P01.2600 **Five-Year Lung Cancer Mortality Risk Analysis and Topography in Xuan Wei: A Spatio--Temporal Correlation Analysis**
JJinhui Li, University of Hong Kong, Hong Kong

P01.2610 **Serum Concentrations of Polychlorinated Biphenyls and Risk of Uterine Leiomyomata**
Lauren Wise, Boston University School of Public Health, United States

P01.2624 **Sun Avoidance and the Risk of Developing Breast Cancer: A Systematic Review and Meta-Analysis**
Troy Hillier, Queen's University, Canada

BIOMARKERS OF EXPOSURE AND EFFECTS 1

P01.2630 **The Association of Urine and Blood Arsenic Metabolites with Body Mass Index in the Bangladesh Fact Study**
Ahlam Abuawad, Columbia University Mailman School of Public Health, United States

P01.2640 **Cumulative Exposure to Organic Pollutants in French Children Assessed by Hair Analysis**
Alba Iglesias Gonzalez, Luxembourg Institute of Health, Luxembourg

P01.2650 **Human Urinary Biomarkers of Exposure to the Plasticizer Deha**
Alexandra Nehring, Institute for Prevention and Occupational Medicine of the German Social Accident Insurance - Institute of the Ruhr-Universität Bochum (IPA), Germany

P01.2670 **The Precision and Accuracy of Urinary Creatinine Analysis for Correction of Urine Dilution in Biological Monitoring Measurements**
Che-Jung Chang, Emory, United States

P01.2680 **Serum Metabolomics of Children Exposed to Carcinogenic Pollutants from Petrochemical Industries**
Chi-Hsin Chen, National Taiwan University, Taiwan

P01.2690 **Pesticide Urinary Metabolite Levels in Asthmatic Children Residing in Subsidized Housing**
Derek Werthmann, Tulane University School of Public Health and Tropical Medicine, United States

P01.2700 **The Association between Olfactory and Cognitive Function Tests with Aluminum Biomarkers in an Occupationally Exposed Population from Zunyi, China**
Hasan Zainab, Purdue University, United States

P01.2710 **Association of Urinary Phthalate Metabolites and Phenolics with Metabolic Syndrome Related Biomarkers among Reproductive Age Women of Korea**
Inae Lee, Seoul National University, Korea (the Republic of)

P01.2720 **Cadmium and Kidney Function in the U.S. Population: Impact of Sex, Diabetes and Hypertension**
Jessica Madrigal, University of Illinois at Chicago, United States

P01.2740 **Human Urinary Biomarkers of Exposure to the UV Filter Avobenzone**
Kathrin Papadopoulos, Institute for Prevention and Occupational Medicine of the German Social Accident Insurance - Institute of the Ruhr-Universität Bochum (IPA), Germany

P01.2750 **Investigating the Association of a Biomarker of Triphenyl Phosphate Exposure with Metabolic Health in the U.S. Population**
Lariah Edwards, Boston University School of Public Health, United States

P01.2760 **Correlation over Time of Toenail Metals among Participants in the VA Normative Aging Study from 1992 to 2014**
Marc Weisskopf, Harvard T.H. Chan School of Public Health, United States

P01.2810 **Household Exposures, Glutathione S-Transferase Genes and Asthma Risk in Middle-Age**
Xin Dai, University of Melbourne, Australia

P01.2820 **A Profile of Exhaled Volatile Organic Compounds Measured Using PTR-TOF-MS for Diagnosis of Chronic Obstructive Pulmonary Disease**
Xu Yifan, Peking University, China

P01.2830 **MnSOD Polymorphism May Modify the Association between Exposure to Dioxin and Diabetes**
Ya Chang, China Medical University, Taiwan

P01.2840 **Effects of 3-PBA on Complete Blood Count (CBC) and Liver Enzyme in Human: The Second Korean National Environmental Health Survey (KONEHS)**
Yuming Lee, Ewha Womans University College of Medicine,Seoul, Republic of Korea, Korea (the Republic of)

P01.2842 **Persistent Organochlorine Pollutants: Genetic Variations Associated with DDE and PCB153 Blood Levels among Women in France**
Takiy Eddine Berrandou, CESP-INSERM, Paris-Sud University, France

RISK ASSESSMENT AND POLICY 1

P01.2850 **The Consumption of Fluoridated Water during the Development of the Rat Modifies the Emotional State**
Jairo Alvarez, University of Guadalajara, Mexico

P01.2860 **Children's Lead Exposure from Consumption of Backyard Chicken Eggs: Health Risks from a Non-Traditional Source**
Komal Basra, Boston University School of Public Health, United States

P01.2870 **Clinical Indices and Fatal Cases in Hospitalized H7N9 Patients**
Ying Chen, Sun Yat-sen University, China

P01.2880 **The Role of the Gut Microbiome on Mercury Toxicology: Protein-Rich Diet Alters Gut Microbiota Composition and Increases Methylmercury Demethylation**
Galen Guo, University of Ottawa, Canada

P01.2890 **Association between Private Drinking Water Wells and the Incidence of Campylobacteriosis in Maryland: An Ecological Analysis Using Data from the Foodborne Diseases Active Surveillance Network (FoodNet)**
Rianna Murray, University of Maryland, College Park, United States

P01.2900 **Health Impact Assessment and the Relationship with the Environment: An Integrating Review**
Simone Nothaft, Universidade Comunitária da Região de Chapecó, Brazil

P01.2910 **Alternatives Assessments for Hazardous Chemicals in Children's Consumer Products: Can Predictive Toxicology Tools Help?**
Marissa Smith, University of Washington, United States

P01.2930 **Arsenic Bioconcentration in Freshwater Fish Species in a Pristine Lake in Yellowknife, NT**
Claudia Tanamal, University of Ottawa, Canada

P01.2950 **Incorporating Unique Exposure Pathways of the Din, People into a Community-Based Probabilistic Risk Assessment Following the Gold King Mine Spill**
Yoshira Van Horne, University of Arizona, United States

P01.2960 **The Importance of Developing Exposure Factors Handbook in Nigeria**
Nathaniel Wambebe, University of Science and Technology, Beijing, China

P01.2970 **Propensity Score Matching in Environmental Epidemiology: A Systematic Review and Reporting Recommendations**
Mary Willis, Oregon State University, United States

P01.2980 **Phthalate and Organophosphate Plasticizers in Nail Polish: Evaluation of Ingredients and Labels**
Anna Young, Harvard T.H. Chan School of Public Health, United States

P01.2990 **Refine Health Benefit Prior-Evaluation of Emergency Response Measures Under Heavy Pollution Weather**
Qi Zhou, Nanjing University, China

P01.3000 **Affecting Factors of Exposure to Influential Factors Assessment for Humidifier Disinfectant Victims in Korea**
Hyeon-Su Ryu, Daegu Catholic University, Korea (the Republic of)

P01.3010 **Quantifying Environmental Costs for Sustainable Pavement Management**
Filzah Nasir, University of Waterloo, Canada

P01.3011 **Comparisons of Prevalence and Determinants of COPD between Northern and Southern China**
Ning Wang, Queensland University of Technology, Australia

OCCUPATIONAL ISSUES 1

P01.3020 **Biomarker Based Occupational Exposome**
Vy Nguyen, University of Michigan, United States

P01.3030 **The Impact of Heatwaves on Workers' Health and Safety in Australia: A Multi-City Study**
Blesson Varghese, University of Adelaide, Australia

P01.3040 **Night Shift Work and Placental Methylation in the Rhode Island Child Health Study (RICHS)**
Danielle Clarkson-Townsend, Emory University, United States

P01.3050 **Outsourcing Informal Home Workers in Jewelry and Fashion Jewelry Production Present High Prevalence of Preterm Birth**
Flavia Vieira, School of Public Health, Brazil

P01.3060 **A Pilot Project Assessing Exposure of Livestock Workers in the Southwest U.S. to E.Coli O157:H7 and Salmonella**
Rietta Wagoner, University of Arizona, United States

P01.3070 **Volatile Organic Compound Exposure in Colorado Nail Salons**
Aaron Lamplugh, University of Colorado Boulder, United States

P01.3080 **Exposure of Nail Salon Workers to Phthalates and Organophosphate Esters**
Jessica Craig, Boston University, United States

P01.3090 **Occupational Exposure in the Home Environment: An Investigation on Chemical Exposure of Outsourced Informal Working Families Involved in Jewelry and Fashion Jewelry Productive Chain**
Ana Paula Sacone da Silva Ferreira, School of Public Health, University of Sao Paulo, Brazil

P01.3100 **Urinary Metabolites of Organophosphate Esters (OPEs) in Electronic Waste Recycling Workers from the Province of Quebec, Canada**
Marc-André, Verner, Université de Montréal, Canada

P01.3110 **Passive Air Sampling for Gaseous Mercury in Workplace Atmospheres and for Personal Inhalation Exposure Monitoring**
Melanie Snow, University of Toronto, Canada

P01.3120 **Occupational Safety in Academic Research Laboratories: Identifying Upstream Risk Factors**
Katrina Burns, University of Michigan, United States

P01.3130 **Associations between Psychosocial Working Environments and Nurses' Eating Behaviors in Taiwan: A Pilot Study**
Ting-Ti Lin, University of Illinois at Chicago, United States

P01.3140 **Urinary MDA and 8-OHdG Concentrations among Agricultural Workers in South Korea and Influence of Protective Measures**
Jiyun Lee, Yongin University, Korea (the Republic of)

P01.3160 **Artisanal Tanning Industry and Health in Bogota, 2017**
Danyver Carreazo Vasquez, Universidad de Ciencias Aplicadas y Ambientales, Colombia

P01.3170 **Acute Pulmonary Responses among Wildland Firefighters following Exposure to Wildland Fire Smoke**
Chieh-Ming Wu, Ohio State University, United States

P01.3171 **Influence of Genetic Variance on Occupational Exposure to 1,6-Hexamethylene Diisocyanate (HDI) and Its Trimer HDI Isocyanurate**
Laura Taylor, University of North Carolina at Chapel Hill, United States

P01.3172 **Personal and Area Exposure Assessment at a Stainless Steel Fabrication Facility: Evaluation of Inhalable, Thoracic, Time-Resolved PM10, and Lung-Deposited Airborne Metals**
Ashley Newton, Johns Hopkins Bloomberg School of Public Health, United States

P01.3173 **Assessing Diesel Particulate Matter Exposure by a Multi-Metric Approach in Three Different Workplaces in Qu,bec, Canada**
Alan da Silveira Fleck, Université de Montréal, Canada

P01.3174 **Use of Geocoding to Understand Variation in Neighborhood Socioeconomic Status in a Nationwide Occupational Cohort across Time, Space and Demographic Characteristics**
Gabriela Bustamante Callejas, University of Minnesota, United States

Tuesday, August 28, 2018

7:00 am - 8:30 am	**ISES Diversity Committee Presents the Anti-Harassment Policy (Including Breakfast)**
7:00 am - 8:30 am	**NIH Resource Room: Explore Federal Research Funding and Review Opportunities through One-On-One Conversations with NIH Staff**
7:00 am - 8:30 am	**Meet the Editors Event**
7:00 am - 8:30 am	**Meeting of the ISES and ISEE Asia Chapters**
8:30 am - 9:30 am	**Plenary** *Chair: Angelika Zidek, Health Canada, Canada* *Chair: Veronica Vieira, University of California, Irvine, United States*
8:30 am - 9:00 am	**The Health of the Land and Our Culture: Indigenous Rights as Pathways to Healthy Environments** *Eriel Deranger, Indigenous Climate Action, Canada*
9:00 am - 9:30 am	**How Can Birth Cohort Studies Contribute to Knowledge and Policies of the World to Reduce Risks of Emerging Contaminants?** *Shoji Nakayama, National Institute for Environmental Studies, Japan*
9:30 am - 10:45 am	**O02.01A. Air Pollution and Diabetes** *Chair: Yiqun Han, King's College London, United Kingdom* *Chair: Nina Dobbin, Health Canada, Canada*
9:30 am - 9:45 am	**O02.01.01. Inflammation and Acute Traffic-Related Air Pollution Exposures among a Cohort of Youth with Type 1 Diabetes** *Robin Puett, University of Maryland School of Public Health, United States*
9:45 am - 10:00 am	**O02.01.02. A Longitudinal Cohort Study on the Association between Long-Term Exposure to Ambient Fine Particulate Matter (PM2.5) and Diabetes Development** *Xiang Qian Lao, Chinese University of Hong Kong, Hong Kong*
10:00 am - 10:15 am	**O02.01.03. Long-Term Exposure to Ambient PM2.5 and Incidence of Diabetes in China: A Cohort Study** *Fengchao Liang, Fuwai Hospital, Chinese Academy of Medical Sciences, China*
10:15 am - 10:30 am	**O02.01.04. Associations between Traffic-Related Air Pollution and Cardiovascular Disease Risk Factors Were Stronger in More Walkable Neighborhoods: The Cardiovascular Health in Ambulatory Care Research Team (CANHEART)** *Nicholas Howell, University of Toronto, Canada*
10:30 am - 10:45 am	**O02.01.05. Childhood Type 1 Diabetes: An Environment Wide Association Study across England** *Annalisa Sheehan, Imperial College London, United Kingdom*
9:30 am - 10:45 am	**O02.01B. Air Pollution Related Hospitalization, Mortality, and Life Expectancy** *Chair: Hwashin Shin, Health Canada, Canada* *Chair: Sarah Lucht, Heinrich-Heine University Düsseldorf, Germany*
9:30 am - 9:45 am	**O02.01.06. Mortality and Hospitalization Linked to Fine Particulate Matter in Canada: Is There a Trend in Risk between 2001 and 2012?** *Hwashin Shin, Health Canada, Canada*
9:45 am - 10:00 am	**O02.01.07. Exploration on Explanations for Observed Long-Term Temporal Trend of the Short-Term Association between Fine Particulate Matter Concentration and Hospital Admissions in the U.S.** *Chen Chen, Yale University, United States*
10:00 am - 10:15 am	**O02.01.08. A National Study of the Mortality Effects of PM2.5 on All-Cause and Cause-Specific Mortality in the Contiguous U.S.** *Helen Tamura-Wicks, Imperial College London, United Kingdom*
10:15 am - 10:30 am	**O02.01.09. Respiratory and Cardiovascular Diseases Mortality and Long-Term Exposure to Ambient Air Pollution: A 12-Year Cohort Study in Northern China** *Xi Chen, Tianjin Medical University, China*
10:30 am - 10:45 am	**O02.01.10. Estimating the Causal Effects of PM2.5 on Life Expectancy** *Joel Schwartz, Harvard University, United States*

9:30 am – 10:45 am **O02.01C. Methods in Occupational Exposure Assessment**
Chair: Ana Maria Rule, Johns Hopkins University, United States
Chair: Telma Nery, Heart Institute - InCor, Brazil

9:30 am - 9:45 am **O02.01.11. Assessing Diesel Particulate Matter Exposure by a Multi-Metric Approach in Three Different Workplaces in Québec (Canada)**
Alan da Silveira Fleck, Université de Montréal, Canada

9:45 am - 10:00 am **O02.01.12. Estimating Personal Exposures with a Multi-Hazard Sensor Network in a Manufacturing Facility**
Christopher Zuidema, Johns Hopkins University, United States

10:00 am - 10:15 am **O02.01.13. The Application of the Spectrosome Approach to the Evaluation of Occupational Co-Exposures to Multiple Chemical Agents**
Delphine Bosson-Rieutort, University of Montreal Hospital Research Centre, Canada

10:15 am - 10:30 am **O02.01.14. Systematic Evaluation of Bias Associated with a Multiple Imputation Approach for Estimating Missing Exposure Data**
Pamela Dopart, Exponent, United States

10:30 am - 10:45 am **O02.01.15. Assessment of Occupational Exposure to Endocrine Disrupting Agents**
Martie van Tongeren, University of Manchester, United Kingdom

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9:30 am – 10:45 am **O02.01D. Predicting Indoor Particulate Matter Concentrations**
Chair: Keith Van Ryswyk, Health Canada, Canada
Chair: Amanda Wheeler, University of Tasmania, Australia

9:30 am - 9:45 am **O02.01.16. Modelling Indoor PM2.5 and BC in Slum Homes of Mumbai, India**
Abhay Anand, Indian Institute of Technology Bombay, India

9:45 am - 10:00 am **O02.01.17. Factors Associated with Airborne Particulate Matter Concentrations in Peri-Urban Guatemala**
John Weinstein, Boston University School of Medicine, United States

10:00 am - 10:15 am **O02.01.18. Global Estimation of Exposure to PM2.5 from Household Air Pollution**
Matthew Shupler, University of British Columbia, Canada

10:15 am - 10:30 am **O02.01.19. Predicting Indoor Fine Particulate Matter in the Apartments of Pregnant Women in Ulaanbaatar, Mongolia**
Weiran Yuchi, University of British Columbia, Canada

10:30 am - 10:45 am **O02.01.20. Leveraging Real-Time Data to Identify Determinants of Indoor PM2.5 Exposure Disparities at the Community-Level**
MyDzung Chu, Harvard T.H. Chan School of Public Health, United States

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9:30 am – 10:45 am **O02.01E. Understanding Early Life Exposures and Nutritional Health through the Exposome**
Chair: Susan Pinney, University of Cincinnati College of Medicine, United States
Chair: Martine Vrijheid, ISGlobal, Spain

9:30 am - 9:45 am **O02.01.21. Child Molecular Signatures of the Early Life Exposome in HELIX**
Mariona Bustamante, Barcelona Institute for Global Health (ISGlobal), Spain

9:45 am - 10:00 am **O02.01.22. The Early Life Exposome: Associations with Child Lipid Profile**
Leda Chatzi, Keck School of Medicine, University of Southern California, United States

10:00 am - 10:15 am **O02.01.23. An Exposome-Based Approach to Environmental and Nutritional Impacts of Food on Human Health**
Olivier Jolliet, University of Michigan, United States

10:15 am - 10:30 am **O02.01.24. Environmental Exposures and Childhood Obesity: An Exposome Analysis**
Martine Vrijheid, Barcelona Institute for Global Health (ISGlobal), Spain

10:30 am - 10:45 am **O02.01.25. Ethical Considerations Related to Studies of the Exposome**
Susan Pinney, University of Cincinnati College of Medicine, United States

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9:30 am – 10:45 am **S02.01A. Challenges of Assessing Non-Tailpipe Emissions for Urban Air Quality and Health**
Chair: Hanna Boogaard, Health Effects Institute, United States
Chair: Allison Patton, Health Effects Institute, United States

9:30 am - 9:45 am **S02.01.01. Dust in the Wind: The Changing Nature of Traffic-Related Air Pollution**
Greg Evans, University of Toronto, Canada

9:45 am - 10:00 am **S02.01.02. Toxicity of Non-Tailpipe Emission**
Miriam Gerlofs-Nijland, National Institute for Public Health and the Environment (RIVM), The Netherlands

10:00 am - 10:15 am **S02.01.03. Modeling Brake and Tire Wear Emissions in Regulatory Models in the United States**
Darrell Sonntag, U.S. Environmental Protection Agency (EPA), United States

10:15 am - 10:30 am **S02.01.04. Characterization of Non-Tailpipe and Tailpipe Emissions in Boston: Road Work in Progress**
Joy Lawrence, Harvard T.H. Chan School of Public Health, United States

10:30 am - 10:45 am **S02.01.05. Health Effects of Exposure to Non-Tailpipe PM Emissions: A Critical Review**
Gerard Hoek, University Utrecht, The Netherlands

9:30 am - 10:45 am **S02.01B. Contaminant Exposures in Indigenous Communities: Tribal Research Avenues and Health Effects**
Chair: Kathleen Vandiver, MIT Center for Environmental Health Sciences; MIT Superfund Research Program; Massachusetts Institute of Technology, United States
Chair: Esther Erdei, University of New Mexico, United States

9:30 am - 9:45 am **S02.01.06. Contaminant Exposures in Indigenous Populations: A Road to Understanding**
Judith Zelikoff, New York University School of Medicine, United States

9:45 am - 10:00 am **S02.01.07. Contaminant Exposures in Indigenous Communities: Tribal Research Avenues and Health Effects**
Rae O'Leary, Missouri Breaks, United States

10:00 am - 10:15 am **S02.01.08. Cadmium and Mercury Exposure among Dene/Metis Communities of the Northwest Territories, Canada**
Brian Laird, University of Waterloo, Canada

10:15 am - 10:30 am **S02.01.09. Mercury and Other Toxicants from Mine Waste and Immune System Health Effects: The Cheyenne River Sioux Tribe's Concerns**
Esther Erdei, University of New Mexico, United States

10:30 am - 10:45 am **S02.01.10. The Namaus (All Things Fish) Project: Community-Engaged Environmental Health Research in Collaboration with the Narragansett Tribe in Charlestown, RI, U.S.A.**
Marcella Thompson, University of Rhode Island, United States

9:30 am - 10:45 am **S02.01C. Critical Exposure Windows, Selection Biases and Novel Methods: Methodological Complexities in Reproductive Environmental Epidemiology**
Chair: Marc Weisskopf, Harvard T.H .Chan School of Public Health, United States
Chair: Marianthi-Anna Kioumourtzoglou, Columbia University Mailman School of Public Health, United States

9:30 am - 9:45 am **S02.01.11. Potential for Bias when Estimating Critical Windows for Air Pollution in Children's Health**
Ander Wilson, Colorado State University, United States

9:45 am - 10:00 am **S02.01.12. Bias from Conditioning on Live Birth in Pregnancy Cohorts: An Illustration Based on Neurodevelopment in Children after Prenatal Exposure to Organic Pollutants**
Zeyan Liew, Fielding School of Public Health, University of California, Los Angeles, United States

10:00 am - 10:15 am **S02.01.13. Live Birth Bias May Affect Associations between Air Pollution and Autism**
Raanan Raz, The Hebrew University of Jerusalem, Israel

10:15 am - 10:30 am **S02.01.14. Seeing the Invisible: A Novel Epidemiological Approach**
Marc Weisskopf, Harvard T.H. Chan School of Public Health, United States

10:30 am - 10:45 am **S02.01.15. Traffic-Related Air Pollution and Pregnancy Loss**
Marianthi-Anna Kioumourtzoglou, Columbia University Mailman School of Public Health, United States

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9:30 am - 10:45 am **S02.01D. Exposures and Health Effects Related to Unconventional Oil and Gas Development**
Chair: Kristina Whitworth, University of Texas Health School of Public Health, United States
Chair: Marc-André Verner, Université de Montréal, Canada

9:30 am - 9:45 am **S02.01.16. Endocrine Disrupting Activities of Unconventional Oil and Gas Operations**
Christopher Kassotis, Duke University, United States

9:45 am - 10:00 am **S02.01.17. Environmental Monitoring for Unconventional Oil and Gas Development**
Nicole Deziel, Yale School of Public Health, United States

10:00 am - 10:15 am **S02.01.18. Gestational Exposure to Volatile Organic Compounds (VOCs) and Trace Metals in a Region of Intensive Hydraulic Fracturing for Natural Gas Exploitation**
Élyse Caron-Beaudoin, Université de Montréal, Canada

10:15 am - 10:30 am **S02.01.19. Unconventional Gas Development Activity and Severity of Preterm Birth in the Barnett Shale, TX**
Kristina Whitworth, University of Texas Health School of Public Health, United States

10:30 am - 10:45 am **S02.01.20. Congential Heart Defects and Intensity of Upstream Oil and Natural Gas Activities in Early Pregnancy**
Lisa McKenzie, University of Colorado, United States

9:30 am - 10:45 am **S02.01E. Fluoride Exposure and Health Outcomes in North America**
Chair: Christine Till, York University, Canada
Chair: Howard Hu, University of Toronto, United States

9:30 am - 9:45 am **S02.01.21. Community Water Fluoridation and Urinary Fluoride Concentrations in a National Sample of Pregnant Women in Canada**
Christine Till, York University, Canada

9:45 am - 10:00 am **S02.01.22. Fluoride Exposure during Fetal Development and Childhood IQ: The MIREC Study**
Rivka Green, York University, Canada

10:00 am - 10:15 am **S02.01.23. Prenatal Fluoride Exposure and Cognitive Outcomes in Children at 4 and 6-12 Years of Age in Mexico**
Howard Hu, University of Washington, United States

10:15 am - 10:30 am **S02.01.24. Fluoride Exposure and Thyroid Function among Iodine Deficient Adults in Canada**
Ashley Malin, Icahn School of Medicine at Mount Sinai, United States

10:30 am - 10:45 am **S02.01.25. Fluoride Exposure and Dental Enamel Fluorosis**
E. Martinez-Mier, Indiana University School of Dentistry, United States

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9:30 am - 10:45 am **S02.01F. Healthy Climate Solutions: What is the Evidence for Health Benefits of Climate Change Mitigation Strategies?**
Chair: Patrick Kinney, Boston University, United States

9:30 am - 9:45 am **S02.01.26. Introduction and Overview of Health Benefits of Urban Climate Mitigation Strategies**
Patrick Kinney, Boston University, United States

9:45 am - 10:00 am **S02.01.27. Clean Transportation Interventions in Cities**
Mark Nieuwenhuijsen, Barcelona Institute for Global Health (ISGlobal), Spain

10:00 am - 10:15 am **S02.01.28. Healthy Suburbs: A Case Study**
Alistair Woodward, University of Auckland, New Zealand

10:15 am - 10:30 am **S02.01.29. Urban and Transport Planning Related Exposures and Mortality: A Health Impact Assessment Study for Bradford, UK**
Natalie Mueller, Barcelona Institute for Global Health (ISGlobal), Spain

10:30 am - 10:45 am **S02.01.30. Panel Discussion**

9:30 am - 10:45 am **S02.01G. New Approaches for Environmental Health Impact Studies: Assessing Human Health Risks from Chemical and Non-Chemical Stressors**
Chair: Debra Kaden, Ramboll, United States
Chair: James Gilmore, Ministry of Environment Conservation and Parks, Canada

9:30 am - 9:45 am **S02.01.31. Assessment of Human Health Risk Using a Variety of Risk Assessment Approaches**
Elizabeth Miesner, Ramboll, United States

9:45 am - 10:00 am **S02.01.32. Using Health Impact Assessments to Assess Potential Health Impacts of Local Infrastructure Projects: A Case Study**
Anushree Bhatt, Intrinsik Corporation, Canada

10:00 am - 10:15 am **S02.01.33. An Analysis of the Use of Various Health Assessments Tools in the Natural Gas and Oil Development Sector**
Uni Blake, American Petroleum Institute, United States

10:15 am - 10:30 am **S02.01.34. Methods for Modeling Exposures and Health Risks from Combined Chemical and Non-Chemical Stressors**
Jonathan Levy, Boston University School of Public Health, United States

10:30 am - 10:45 am **S02.01.35. The Territorialized Exposome Concept to Characterize Cumulative Risk at the Population Level**
Julien Caudeville, French National Institute for Industrial Environment and Risks (INERIS), France

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9:30 am - 10:45 am **S02.01H. Research-to-Action Gaps: How Can We Implement Successful Programs to Reduce Exposure to Lead and Other Environmental Contaminants in Low and Middle-Income Countries?**
Chair: Katarzyna Kordas, University at Buffalo, United States
Chair: Martha Téllez-Rojo, National Institute of Public Health, Mexico

9:30 am - 9:45 am **S02.01.36. The Challenges of Translating Research into Action for Lead and Other Environmental Contaminants in Low and Middle-Income Countries**
Katarzyna Kordas, University at Buffalo, United States

9:45 am - 10:00 am **S02.01.37. Addressing Environmental Exposures through State and National Programs**
Fuyuen Yip, Environmental Health Tracking Program, Centers for Disease Control and Prevention, United States

10:00 am - 10:15 am **S02.01.38. The Environmental Contaminants Clinic in Montevideo, a History**
Elena Queirolo, "Pereira Rossell" Pediatric Hospital, Uruguay

10:15 am - 10:30 am **S02.01.39. Disconnect between the Research on Lead's Effects, and Efforts to Generate a Lead Awareness and Prevention Program at a National-Level in Mexico**
Martha Téllez-Rojo, National Institute of Public Health, Mexico

10:30 am - 10:45 am **S02.01.40. Panel Discussion**

10:45 am - 11:15 am Poster Viewing & Break

11:15 am - 12:30 pm **O02.02A. Advances in Ambient Air Pollution Modeling - Part 1**
Chair: Bert Brunekreef, Utrecht University, The Netherlands
Chair: Meng Wang, University of Rochester Medical Center, United States

11:15 am - 11:30 am **O02.02.01. A Parsimonious Approach to National Prediction: Criteria Pollutants in the Contiguous U.S., 1979 - 2015**
Sun-Young Kim, National Cancer Institute, Korea (the Republic of)

11:30 am - 11:45 am **O02.02.02. National PM2.5 and NO2 Spatiotemporal Models Integrating Intensive Monitoring Data and Satellite-Derived Land Use Regression in a Universal Kriging Framework in the United States: 1999-2016**
Meng Wang, University of Washington, United States

11:45 am - 12:00 pm **O02.02.03. National PM2.5 and NO2 Exposure Models for China Based on Land Use Regression, Satellite Measurements, and Universal Kriging**
Hao Xu, Tsinghua University, China

12:00 pm - 12:15 pm **O02.02.04. Using Geostatistical Simulation to Inform the Quantity and Placement of New Monitors for a Follow-Up Air Sampling Campaign**
Jesse Berman, University of Minnesota School of Public Health, United States

12:15 pm - 12:30 pm **O02.02.05. Potential Overfitting in a Spatio-Temporal Exposure Model Developed with Few Monitoring Sites**
Jia Xu, University of Washington, United States

11:15 am - 12:30 pm **O02.02B. Ambient Air Pollution and Cardiopulmonary Morbidity and Mortality**
Chair: Sara Adar, University of Michigan School of Public Health, United States
Chair: Barbara Hanley, Oregon State University, United States

11:15 am - 11:30 am **O02.02.06. Understanding the Effects of Ambient Air Pollutants on Morbidity in Colombia: A Multi-City & Multi-Pollutant Analysis**
Laura Rodriguez-Villamizar, Universidad Industrial de Santander, Colombia

11:30 am - 11:45 am **O02.02.07. A Multi-Country Study on Ozone-Related Mortality**
Ana Vicedo-Cabrera, London School of Hygiene and Tropical Medicine Department of Social and Environmental Health Research, United Kingdom

11:45 am - 12:00 pm **O02.02.08. Short-Term Associations between Daily Mortality and Fine Particulate Matter, Nitrogen Dioxide, and the Air Quality Index in Tehran, Iran**
Heresh Amini, Harvard T.H. Chan School of Public Health, United States

12:00 pm - 12:15 pm **O02.02.09. Association between Haemorrhagic Stroke Incidence and Atmospheric Air Pollutants**
Radoslaw Czernych, Medical University of Gdansk, Poland

12:15 pm - 12:30 pm **O02.02.10. The Effect of Asian Dust in Estimating the Mortality Effects of Ambient Particles, with Larger Dataset in Seoul, Korea from 1998 to 2015**
Garam Byun, Korea University, Korea (the Republic of)

11:15 am – 12:30 pm **O02.02C. Chemical Exposures and Interventions Using Systematic Reviews**
Chair: Annette Guiseppi-Elie, U.S. Environmental Protection Agency (EPA), United States
Chair: Theo Vermeire, RIVM, The Netherlands

11:15 am - 11:30 am **O02.02.11. Developing Criteria for Evaluating the Quality of Exposure Measurements in Epidemiological Studies during Systematic Review**
Rebecca Nachman, U.S. Environmental Protection Agency (EPA), United States

11:30 am - 11:45 am **O02.02.12. Systematic Review of Mercury Exposures Worldwide: Findings from the 2018 WHO/UN Global Mercury Assessment**
Nil Basu, McGill University, Canada

11:45 am - 12:00 pm **O02.02.13. Interventions for Reducing Ambient Air Pollution and Their Effects on Health: Final Results from a Cochrane Systematic Review**
Hanna Boogaard, Health Effects Institute, United States

12:00 pm - 12:15 pm **O02.02.14. Exposure to Formaldehyde and Effects on Asthma Outcomes: A Systematic Review and Meta-Analysis**
Juleen Lam, University of California, San Francisco, United States

12:15 pm - 12:30 pm **O02.02.15. Exposure Data Curation Using Dragon Online Flexible Forms**
Kevin Hobbie, ICF, United States

11:15 am – 12:30 pm **O02.02E. Household Environmental Risk Factors and Health**
Chair: Carl Grimes, Hayward Healthy Home Institute, United States
Chair: Satoshi Nakai, Yokohama National University, Japan

11:15 am - 11:30 am **O02.02.21. A Novel Approach to Examining Multiple Indoor Exposures in Early Childhood on the Inflammatory Pathway and Risk of Intermediate Outcomes for Childhood Asthma in the Canadian Healthy Infant Longitudinal Development (CHILD) Birth Cohort**
Tim Takaro, Simon Fraser University, Canada

11:30 am - 11:45 am **O02.02.22. The Home Environment and Caregiver Stress of Children with Asthma in Low Income Rural Households**
Catherine Karr, University of Washington, United States

11:45 am - 12:00 pm **O02.02.23. Longitudinal Residential Exposures and Lung Function Until Age 16**
Edith Milanzi, Utrecht University Institute for Risk Assessment Sciences (IRAS), The Netherlands

12:00 pm - 12:15 pm **O02.02.24. Effects of Short-Term Exposure to Fine and Ultrafine Particles from Indoor Sources on Arterial Stiffness – A Randomized Sham-Controlled Exposure Study of Healthy Volunteers**
Vanessa Soppa, Leibniz Research Institute for Environmental Medicine, Germany

12:15 pm - 12:30 pm **O02.02.25. Ethical Challenges when Evaluating Household Health Risk**
Carl Grimes, Hayward Healthy Home Institute, United States

11:15 am – 12:30 pm **O02.02F. Lead Exposure and Health Effects across the Lifespan**
Chair: Aisha Dickerson, Harvard T.H. Chan School of Public Health, United States
Chair: Sandra Cortes, Pontificia Universidad Católica de Chile-ACCDIS, Chile

11:15 am - 11:30 am **O02.02.26. The Effect of Prenatal Bone Lead Concentrations on Prepulse Inhibition: A Prospective Study of Mexican Children**
Kale Kponee, Harvard T.H. Chan School of Public Health, United States

11:30 am - 11:45 am **O02.02.27. The Influences of Sociodemographic Characteristics and Changes in Blood Lead on the Concentration-Response Relationship between Blood Lead Level and Children's Intelligence Quotient**
Ellen Kirrane, U.S. Environmental Protection Agency (EPA), United States

11:45 am - 12:00 pm **O02.02.28. A Randomized Controlled Trial to Reduce Childhood Lead Exposure and Lead-Associated Neurobehavioral Deficits: The HOME Study**
Joseph Braun, Brown University, United States

12:00 pm - 12:15 pm **O02.02.29. Urinary Lead Concentration and Its Association with the Composition of the Adult Gut Microbiota**
Shoshannah Eggers, University of Wisconsin - Madison, United States

12:15 pm - 12:30 pm **O02.02.30. Amyotrophic Lateral Sclerosis and Exposure to Lead in a Danish Cohort**
Aisha Dickerson, Harvard T.H. Chan School of Public Health, United States

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11:15 am – 12:30 pm **S02.02A. E-Waste: A Growing Global Problem and Next Steps**
Chair: Gwen Collman, National Institute of Environmental Health Sciences (NIEHS), NIH, United States
Chair: Michelle Heacock, National Institute of Environmental Health Sciences (NIEHS), NIH, United States

11:15 am - 11:30 am **S02.02.01. An Overview of the Sources and Hazards of E-Waste Exposure on Human Health**
Brittany Trottier, National Institute of Environmental Health Sciences (NIEHS), United States

11:30 am - 11:45 am **S02.02.02. Biomonitoring of Female Vietnamese Electronic Waste Recyclers for Selected Metals and Organics**
Linda Birnbaum, National Institute of Environmental Health Sciences (NIEHS), NIH, United States

11:45 am - 12:00 pm **S02.02.03. E-Waste Recycling and Exposure Reduction Intervention in the Philippines**
Aimin Chen, University of Cincinnati College of Medicine, United States

12:00 pm - 12:15 pm **S02.02.04. Electronic Waste Recycling at Agbogbloshie, Ghana: A Global Problem, Current Intervention Strategies and Local Solutions**
Julius Fobil, University of Ghana School of Public Health, Ghana

12:15 pm - 12:30 pm **S02.02.05. Panel Discussion**

11:15 am – 12:30 pm **S03.04B. Consensus Modeling of Chemical Exposure**
Chair: John Wambaugh, U.S. Environmental Protection Agency, United States

11:15 am - 11:30 am **S03.04.06. High-Throughput Exposure Modeling: Conclusions of the Expodat Program**
Hyeong-Moo Shin, University of Texas, Arlington, United States

11:30 am - 11:45 am **S03.04.07. Rapid Parameterization of Pathway-Specific Exposure Models**
Kristin Isaacs, U.S. Environmental Protection Agency (EPA), United States

11:45 am - 12:00 pm **S03.04.08. Modeling on Many Scales - Multiscale Modeling of Exposure to Chemicals in Products**
Olivier Jolliet, University of Michigan, United States

12:00 pm - 12:15 pm **S03.04.09. Evaluating Exposure Models**
Jon Arnot, ARC Arnot Research and Consulting Inc., Canada

12:15 pm - 12:30 pm **S03.04.10. Systematic Empirical Evaluation of Models for Risk Prioritization**
John Wambaugh, U.S. Environmental Protection Agency, United States

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11:15 am – 12:30 pm **S02.02C. Monitoring versus Modeling PM 2.5 Concentrations: Does it Matter for Air Pollution Health Effects?**
Chair: Alexandra Schneider, Helmholtz Zentrum München - German Research Center for Environmental Health, Germany
Chair: Robert Devlin, U.S. Environmental Protection Agency (EPA), United States

11:15 am - 11:30 am **S02.02.11. Use of Fine-Resolution AOD-Derived Long-Term PM2.5 Concentrations to Characterize Adverse Health Outcomes**
Joel Schwartz, Harvard University, United States

11:30 am - 11:45 am **S02.02.12. Central versus Local: Long-Term Exposure to PM2.5, Black Carbon, NO2 and O3 in the European Elapse-Project**
Gerard Hoek, University Utrecht, The Netherlands

11:45 am - 12:00 pm **S02.02.13. Using Fused Chemical Transport Models to Estimate Spatially and Temporally Resolved Ambient Air Pollution in Georgia and North Carolina**
Ted Russel, Georgia Institute of Technology, United States

12:00 pm - 12:15 pm **S02.02.14. Mortality Effects of Ambient Fine Particulate Matter Estimated Using Ground-Based versus Remote Sensing Exposure Estimates**
Michael Jerrett, University of California, Los Angeles, United States

12:15 pm - 12:30 pm **S02.02.15. Comparison of Long-Term PM2.5 Concentrations from Ground-Based Monitoring, CMAQ Models and Satellite-Derived AOD to Characterize Adverse Cardiovascular Outcomes**
Laura McGuinn, University of North Carolina at Chapel Hill, United States

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11:15 am – 12:30 pm **S02.02D. Opportunity to Accelerate Knowledge on Complex Developmental Chemical Exposures and Child Health: Environmental Influences on Child Health Outcomes (ECHO)**
Chair: Jessie Buckley, Johns Hopkins Bloomberg School of Public Health, United States
Chair: Tracey Woodruff, University of California, San Francisco, United States

11:15 am - 11:30 am **S02.02.16. Accelerating Research on Chemical Exposures and Child Health Outcomes through ECHO: An Overview**
Jessie Buckley, Johns Hopkins Bloomberg School of Public Health, United States

11:30 am - 11:45 am **S02.02.17. Leveraging Variability across Space and Time to Assess Air Pollution Exposures and Child Health in ECHO**
Heather Volk, Johns Hopkins Bloomberg School of Public Health, United States

11:45 am - 12:00 pm **S02.02.18. Mapping Chemicals across Routes of Exposure and Body Burden: Data Gaps and Opportunities for ECHO**
Deborah Bennett, University of California, Davis, United States

12:00 pm - 12:15 pm **S02.02.19. Prioritizing Chemicals for Biomonitoring in ECHO to Maximize Public Health Impact**
Tracey Woodruff, University of California, San Francisco, United States

12:15 pm - 12:30 pm **S02.02.20. Accessing ECHO Data to Address Innovative Hypotheses**
Jessie Buckley, Johns Hopkins Bloomberg School of Public Health, United States

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11:15 am – 12:30 pm S02.02E. Solutions for Tackling the Link between Complex Exposures and Human Health
Chair: Isabella Annesi-Maesano, INSERM & Sorbonne University, France
Chair: Denis Sarigiannis, Aristotle University of Thessaloniki, Greece

11:15 am - 11:30 am **S02.02.21. Simplexity in Complex Environmental Health Problems Using the Exposome**
Dimosthenis Sarigiannis, Aristotle University of Thessaloniki, Greece

11:30 am - 11:45 am **S02.02.22. Lifelong Exposure of Population Subgroups with PM2.5**
Naixin Li, IER University, Germany

11:45 am - 12:00 pm **S02.02.23. Integrated Use of Agent Based Modelling (ABM) with Wearable Sensors for Personal Exposure Assessment**
Dimitris Chapizanis, Aristotle University of Thessaloniki, Greece

12:00 pm - 12:15 pm **S02.02.24. Unraveling the Complex Etiology of Neurodevelopmental Disorders: Tools, Key Issues and Research Needs to Investigate the Environmental Contribution**
Gemma Calamandrei, Istituto Superiore di Sanità, Italy

12:15 pm - 12:30 pm **S02.02.25. Use of Exposome to Explain the Allergy Epidemics**
Isabella Annesi-Maesano, INSERM & Sorbonne University, France

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11:15 am – 12:30 pm S02.02F. The Complexity of Microbiomes for Exposure Science
Chair: Ellen Mantus, National Academies of Sciences, Engineering, and Medicine, United States
Chair: Katherine Bowman, National Academies of Sciences, Engineering, and Medicine, United States

11:15 am - 11:30 am **S02.02.26. Introductory Remarks**

11:30 am - 11:45 am **S02.02.27. The Built Environment: Why Understanding Microbiology Matters**
Erica Hartmann, Northwestern University, United States

11:45 am - 12:00 pm **S02.02.28. Microbiome Metabolism and Chemical Transformation: How Does the Human Microbiome Change Our Chemical Exposures?**
Andrew Patterson, Penn State University, United States

12:00 pm - 12:15 pm **S02.02.29. The Possible Consequences of Ignoring the Human Microbiome in Health Risk Assessment**
Joseph Rodricks, Ramboll

12:15 pm - 12:30 pm **S02.02.30. Panel Discussion**

11:15 am – 12:30 pm S02.02G. The Fluoridation Decision: Considering the Evidence for Benefits, Possible Risks as Well as Ethical World Views
Chair: Raymond Neutra, CA Department of Public Health (Retired), United States

11:15 am - 11:30 am **S02.02.31. Ethical World Views and Fluoridation Policy**
Raymond Neutra, California Department of Public Health (Retired), United States

11:30 am - 11:45 am **S02.02.32. Evidence about the Benefits of Fluoridation: Caries Prevention Benefits**
E. Martinez-Mier, Indiana University School of Dentistry, United States

11:45 am - 12:00 pm **S02.02.33. Neurotoxic Effects of Fluoride Exposures in North America**
Christine Till, York University, Canada

12:00 pm - 12:15 pm **S02.02.34. Possible Benefits and Adverse Effects of Fluoridation in England, 2018 Public Health England Report**
Tony Fletcher, Public Health England, United Kingdom

12:15 pm - 12:30 pm **S02.02.35. Panel Discussion**

11:15 am – 12:30 pm **S02.02H. Exploring Current Worker Exposure Tools and Their Capability to Support Risk Evaluations of Chemicals under Amended TSCA**
Chair: Judy LaKind, LaKind Associates LLC, United States
Chair: Rosemary Zaleski, ExxonMobil Biomedical Sciences, United States

11:15 am - 11:30 am **S02.02.36. Overview of EPA's Occupational Exposure Tools and Approaches Used in New and Existing Chemical Evaluations under Amended TSCA**
Nhan Nguyen, U.S. Environmental Protection Agency (EPA), United States

11:30 am - 11:45 am **S02.02.37. Worker Use Description and Exposure Assessment**
Rosalie Tibaldi, ExxonMobil Biomedical Sciences, United States

11:45 am - 12:00 pm **S02.02.38. Exposure Assessment Tools from the American Industrial Hygiene Association: A Review with Examples of Their Use**
Thomas Armstrong, TWA8HR Occupational Hygiene Consulting, LLC, United States

12:00 pm - 12:15 pm **S02.02.39. Exposure Data Quality Issues and TSCA Assessments**
Judy LaKind, LaKind Associates LLC, United States

12:15 pm - 12:30 pm **S02.02.40. Panel Discussion**

12:30 pm - 1:45 pm **ISEE Policy Committee Meeting**
12:30 pm - 1:45 pm **Meet the ISEE Ethics and Philosophy Committee!**
12:30 pm - 1:45 pm **Ecological Exposure Working Group Meeting**
12:30 pm - 1:45 pm **OECD Working Party on Exposure Assessment**
12:30 pm - 1:45 pm **ISEE LAC Chapter Meeting**
12:30 pm - 1:45 pm **ISEE Annual Planning Committee Meeting**
12:30 pm - 1:45 pm **ISEE Eastern Mediterranean Chapter Meeting**
12:30 pm - 1:45 pm **ISES Mentorship Office Hours Meeting**

12:30 pm - 2:15 pm **Lunch & Poster Viewing**

2:15 pm – 3:45 pm **O02.03A. Air Pollution and Vegetation**
Chair: Michael Brauer, University of British Columbia, Canada
Chair: Charlotte Roscoe, Imperial College London, United Kingdom

2:15 pm - 2:30 pm **O02.03.01. Associations of PM2.5 and Out-of-Hospital Sudden Unexpected Death across Strata of Greenspace Metrics and Personal Characteristics**
Kristen Rappazzo, U.S. Environmental Protection Agency (EPA), United States

2:30 pm - 2:45 pm **O02.03.02. Associations between Ambient Fine Particulate and Systolic Blood Pressure in Relation to Greenness in the PURSE-HIS Cohort**
Kevin Lane, Boston University School of Public Health, United States

2:45 pm - 3:00 pm **O02.03.03. The Effect of Particulate Air Pollution on Hospitalization and Effect Modification by Green Space**
Seulkee Heo, Yale University, United States

3:00 pm - 3:15 pm **O02.03.04. Relationships between Greenness and Low Birth Weight: Investigating the Interaction and Mediation Effects of Air Pollution**
Jun Wu, University of California, Irvine, United States

3:15 pm - 3:30 pm **O02.03.05. The Relationship between Long-Term Exposure to Neighbourhood Greenness and Air Pollution and Cardiovascular Mortality in Urban Areas in Belgium**
Mariska Bauwelinck, Vrije Universiteit Brussel, Belgium

3:30 pm - 3:45 pm **O02.03.06. Using Mobile Technology to Understand Local Environmental Factors Associated with Symptoms of Asthma and Allergic Rhinitis**
Fay Johnston, University of Tasmania, Australia

2:15 pm – 3:45 pm **O02.03B. Effects of Temperature – Part 1**
Chair: Xerxes Seposo, Kyoto University, Japan
Chair: Tarik Benmarhnia, University of California, San Diego, United States

2:15 pm - 2:30 pm **O02.03.07. Modeling Temperature-Related Mortality Using Nonlinear Autoregressive Models with Exogenous Input**
Cameron Lee, Kent State University, United States

2:30 pm - 2:45 pm **O02.03.08. Multiple Determinants of Vulnerability for Emergency Department Visits for Heat-Related Illness in California 2005-2008 Warm Seasons**
Helene Margolis, University of California, Davis, United States

2:45 pm - 3:00 pm **O02.03.09. The Relationship between Extreme Heat and Cardiovascular Mortality: Assessing Effect Modification by Social Vulnerability Metrics**
Ambarish Vaidyanathan, Centers for Disease Control and Prevention, United States

3:00 pm - 3:15 pm **O02.03.10. Nonparametric Bayesian Multivariate Meta-Regression with Functional Meta-Predictor: An Application in the Temperature-Mortality Study**
Yeonseung Chung, Korea Advanced Institute of Science and Technology, Korea (the Republic of)

3:15 pm - 3:30 pm **O02.03.11. Comparison of Temperature-Mortality Associations Estimated with Point-Based Temperature Observations versus Spatially-Resolved Temperature Estimates**
Kate Weinberger, Brown University School of Public Health, United States

3:30 pm - 3:45 pm **O02.03.12. Is Temperature Linked to Mortality and Hospitalizations in Africa Settings?**
Margarita Triguero-Mas, Barcelona Institute for Global Health (ISGlobal), Spain

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2:15 pm - 3:45 pm **O02.03C. Exposure and Health Effects Related to Waste**
Chair: Martin Tondel, Department of Medical Sciences, Occupational and Environmental Medicine, Uppsala University, Sweden
Chair: Elise Elliott, Yale School of Public Health, United States

2:15 pm - 2:30 pm **O02.03.13. Relationship between Blood Lead Levels and Dietary Essential Mineral Intake in Electronic Waste Workers and a Control, in Ghana**
Sylvia Takyi, University of Ghana, Ghana

2:30 pm - 2:45 pm **O02.03.14. Mercury Exposure: Impact on Birth Outcomes in Suriname**
Renske Wouters, University of Amsterdam, Suriname

2:45 pm - 3:00 pm **O02.03.15. Occupational Exposure to Flame Retardants among Canadian E-Waste Dismantlers**
Victoria Arrandale, Occupational Cancer Research Centre, Canada

3:00 pm - 3:15 pm **O02.03.16. Environmental Exposures and Asthma in Women Living in Rural Costa Rica: Results from the ISA Study**
Brooke Alhanti, North Carolina State University, United States

3:15 pm - 3:30 pm **O02.03.17. Birth Outcomes Associated with Maternal and Fetal Exposure to Metals from Informal Electronic Waste Recycing in Guiyu, China**
Stephani Kim, National Institute of Environmental Health Sciences (NIEHS), United States

3:30 pm - 3:45 pm **O02.03.18. Ethical Aspects in the Assessment of Exposure and Health Effects Related to Waste**
Martin Tondel, Uppsala University Department of Medical Sciences, Sweden

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2:15 pm - 3:45 pm **O02.03D. Exposure Assessment, Susceptibility, and Demographic Factors in Studies of Air Pollution Mediated Mortality**
Chair: Stephanie DeFlorio-Barker, U.S. Environmental Protection Agency (EPA), United States
Chair: Audil Rashid, PMAS Arid Agriculture University, Pakistan

2:15 pm - 2:30 pm **O02.03.19. Refined Estimates of PM2.5 Exposure and Associated Mortality Burden Using Mobile Phone Big Data**
Jiongchao Ding, Nanjing Foreign Language School, China

2:30 pm - 2:45 pm **O02.03.20. A Marginal Estimate of PM2.5 Effects on Mortality Using Propensity Scores and Exposure Randomization by Moving**
Yara Abu Awad, Harvard T.H. Chan School of Public Health, United States

2:45 pm - 3:00 pm **O02.03.21. The Concentration-Response between Long-Term PM2.5 Exposure and Mortality: A Meta-Regression Approach**
Alina Vodonos Zilberg, Harvard T.H. Chan School of Public Health, United States

3:00 pm - 3:15 pm **O02.03.22. Long-Term Exposure to Air Pollution and Mortality among People with and without Diabetes and Asthma or COPD**
Nicole Janssen, National Institute for Public Health and the Environment (RIVM), The Netherlands

3:15 pm - 3:30 pm **O02.03.23. Effect Modification of the Association of Long-Term PM2.5 Exposure and Cause-Specific Mortality: An Analysis of 64 Million U.S. Medicare Beneficiaries**
Bingyu Wang, Northeastern University, United States

3:30 pm - 3:45 pm **O02.03.24. Long-Term Effect of Air Pollution on Mortality in England and Wales 2001-2006: A Change on Change Analysis**
Paul Wilkinson, London School of Hygiene and Tropical Medicine, United Kingdom

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2:15 pm – 3:45 pm **O02.03E. Global Health Equity Issues Related to Pesticide Use**
Chair: Yasushi Honda, University of Tsukuba, Japan
Chair: Firoz Abdoel Wahid, Tulane University School of Public Health and Tropical Medicine, United States

2:15 pm - 2:30 pm **O02.03.25. The Relationship between Urinary Levels of Dialkyl Phosphates and Reproductive and Anthropometric Development of Boys in the Rural Western Cape in South Africa**
Mohamed Dalvie, University of Cape Town, South Africa

2:30 pm - 2:45 pm **O02.03.26. Pesticides in the Urine of Preschool Children from Germany and Their Relevance to Human Health**
Martin Kraft, State Agency for Environment, Nature and Consumer Protection, Germany

2:45 pm - 3:00 pm **O02.03.27. Prospective Association of DDT and DDE Exposure with High Blood Pressure among Adult Women from Mexico**
Lea Cupul-Uicab, Instituto Nacional de Salud Publica, Mexico

3:00 pm - 3:15 pm **O02.03.28. Insecticide Exposure and Wheeze in 5-Year Old Children from the Infants' Environmental Health Study (ISA)**
Berna van Wendel de Joode, Universidad Nacional, Costa Rica

3:15 pm - 3:30 pm **O02.03.29. Pesticides and Lung Health: Pediatric Association between Agricultural Pesticide Use and Respiratory Health in Fresno, California**
Rachel Severson, Colorado State University, United States

3:30 pm - 3:45 pm **O02.03.30. Policy Discussion**

2:15 pm – 3:45 pm **O02.03F. Interventions to Reduce Household Air Pollution from Cooking and Biomass Burning**
Chair: Kofi Amegah, University of Cape Coast, Ghana
Chair: Miriam Diamond, University of Toronto, Canada

2:15 pm - 2:30 pm **O02.03.31. Exposures to PM2.5 Associated with LPG Stove and Fuel Interventions in Four Countries: Pilot Results from the HAPIN Trial**
Michael Johnson, Berkeley Air Monitoring Group, United States

2:30 pm - 2:45 pm **O02.03.32. Initial Household- and Village-Level Impacts of Residential Coal Use Restrictions on Indoor Air Quality in Rural Homes in Beijing, China**
Xiaoying Li, Colorado State University, United States

2:45 pm - 3:00 pm **O02.03.33. Government Policy, Clean Fuel Access, and Persistent Fuel Stacking in Ecuador**
Carlos Gould, Columbia University Mailman School of Public Health, United States

3:00 pm - 3:15 pm **O02.03.34. Exploring Barriers and Practical Solutions for the Uptake and Use of Clean Cooking through Photovoice Methods: The LPG Adoption in Cameroon Evaluation (LACE) Studies**
Daniel Pope, University of Liverpool, United Kingdom

3:15 pm - 3:30 pm **O02.03.35. Effectiveness of Liquefied Petroleum Gas Stove Ownership for Reducing Household Air Pollution Exposure during Pregnancy in Guatemala**
Laura Grajeda, Universidad del Valle de Guatemala, Guatemala

3:30 pm - 3:45 pm **O02.03.36. Indoor Nitrogen Dioxide in Homes with Biomass Cookstoves before and after a Gas Stove Intervention**
Josiah Kephart, Johns Hopkins University, United States

2:15 pm – 3:45 pm **O02.03G. Noise Effects - Part 1**
Chair: Joan Casey, University of California, Berkeley, United States
Chair: Ulrike Gehring, Utrecht University, The Netherlands

2:15 pm - 2:30 pm **O02.03.37. Effect Modification of the Association of Long-Term PM2.5 Exposure and Cause-Specific Mortality: An Analysis of 64 Million U.S. Medicare Beneficiaries**
Daniel Nguyen, Boston University School of Public Health, United States

2:30 pm - 2:45 pm **O02.03.38. Exposure to Road Traffic Noise and Cognitive Development in Primary Schoolchildren**
Maria Foraster, ISGlobal; Universitat Pompeu Fabra (UPF); CIBER Epidemiología y Salud Pública (CIBERESp), Spain

2:45 pm - 3:00 pm **O02.03.39. Road Traffic Noise, Air Pollution, and Risk of Dementia: Results from the Betula Project**
John Andersson, Umeå University, Sweden

3:00 pm - 3:15 pm **O02.03.40. Modeled and Perceived RF-EMF, Noise and Air Pollution and Symptoms in a Population Cohort: Is Perception Key in Predicting Symptoms?**
Marije Reedijk, Utrecht University, The Netherlands

3:15 pm - 3:30 pm **O02.03.41. Modelled and Perceived Noise Exposure and Psychotropic Medication Use**
Enembe Okokon, National Institute for Health and Welfare, Finland

3:30 pm - 3:45 pm **O02.03.42. Long-Term Exposure to Community Noise in Relation to Alzheimer's Disease and Related Dementias**
Sara Adar, University of Michigan School of Public Health, United States

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2:15 pm - 3:45 pm **O02.03H. Phthalate Exposure and Children's Health**
Chair: Cecilia Alcala, Tulane University School of Public Health and Tropical Medicine, United States
Chair: Lesliam Quiros-Alcala, University of Maryland, United States

2:15 pm - 2:30 pm **O02.03.43. Exposure to Endocrine Disrupting Chemicals and Maladaptive Behavior during Adolescence**
Jessica Shoaff, Harvard Medical School, United States

2:30 pm - 2:45 pm **O02.03.44. Prenatal and Childhood Phthalate Exposure and Pubertal Development: A 15-Year Birth Cohort Follow-Up Study**
Julie Wang, National Health Research Institutes, Taiwan

2:45 pm - 3:00 pm **O02.03.45. Associations of Maternal Pregnancy Urine Estrogen Levels with Phthalate and Phthalate Replacement (1,2-Cyclohexane Dicarboxylic Acid Diisononyl Ester, DiNCH) Metabolites**
Diana Pacyga, Michigan State University, United States

3:00 pm - 3:15 pm **O02.03.46. Mixed Phthalate Ester and Phosphate Flame Retardant Exposure and Asthma and Allergies in School Children**
Atsuko Araki, Hokkaido University, Japan

3:15 pm - 3:30 pm **O02.03.47. Prenatal Exposure to Phthalates and Sex Hormone Levels among Adolescent Boys in the CHAMACOS Birth Cohort Study**
Lesliam Quiros-Alcala, University of Maryland, United States

3:30 pm - 3:45 pm **O02.03.48. Early Life Exposure to Phthalates in CHILD: A Multi-City Canadian Birth Cohort**
Garthika Navaranjan, University of Toronto, Canada

2:15 pm - 3:45 pm **O02.03I. Source-Specific Air Pollution Exposures and Health**
Chair: Mariam Girguis, University of Southern California, United States
Chair: Robin Shutt, Health Canada, Canada

2:15 pm - 2:30 pm **O02.03.49. Improved Air Quality Saved Lives: A Mediation on Particulate Matters**
Ana Rappold, U.S. Environmental Protection Agency (EPA), United States

2:30 pm - 2:45 pm **O02.03.50. Health Risk of Living near a Coal Electric Power Plant: A Residential Cohort Study in North-Western Italy**
Fabrizio Minichilli, Environmental Epidemiology Unit, Institute of Clinical Physiology, National Research Council, Italy

2:45 pm - 3:00 pm **O02.03.51. Preterm Birth among Infants Exposed to in Utero Ultrafine Particle Emissions from Aircraft Engines near the Los Angeles International Airport**
Sam Wing, University of California Los Angeles, United States

3:00 pm - 3:15 pm **O02.03.52. Integrative Strategy for Finding Co-Location Patterns between Adverse Birth Outcomes and Industrial Air Pollution**
Charlene Nielsen, University of Alberta, Canada

3:15 pm - 3:30 pm **O02.03.53. Associations of PM2.5 Source Concentrations with Childhood Asthma Emergency Department Visits in the U.S. State of Georgia: A Case-Crossover Study**
Mengjiao Huang, University of Nevada, United States

3:30 pm - 3:45 pm **O02.03.54. Long-Term Exposure to Industrial Air Pollution Emissions and the Incidence of Childhood Asthma: The Use of a Population-Based Birth Cohort and Dispersion Modeling**
Audrey Smargiassi, University of Montreal, Canada

2:15 pm - 3:45 pm **S02.03A. Advances in Assessment of Dermal Exposures and Absorption**
Chair: Adam Griffiths, Health Canada, Canada

2:15 pm - 2:30 pm **S02.03.01. Exploring the Use of Dermal Maximum Flux for Chemical Risk Assessment**
Adam Griffiths, Health Canada, Canada

2:30 pm - 2:45 pm **S02.03.02. Approaches to Assess Dermal Exposure and Absorption within U.S. EPA's Office of Pollution Prevention and Toxics (OPPT)**
Eva Wong, U.S. Environmental Protection Agency (EPA), United States

2:45 pm - 3:00 pm **S02.03.03. Development of a Mechanistic in Silico Multiscale Framework to Assess Dermal Absorption of Chemicals**
Jan Urbanus, Shell Health - Risk Science Team, Belgium

3:00 pm - 3:15 pm **S02.03.04. Evaluation of in Silico Tools for Dermal Absorption Prediction**
Dimitra Eleftheriadou, German Federal Institute for Risk Assessment (BfR), Germany

3:15 pm - 3:30 pm **S02.03.05. New Developments Concerning Measurements of Occupational Dermal Exposures**
Dag Rother, German Federal Institute for Occupational Safety and Health, Germany

3:30 pm - 3:45 pm **S02.03.06. Panel Discussion**

2:15 pm – 3:45 pm **S02.03B. Embracing Complexity: Frontiers in High-Resolution Air Pollution Exposure Assessment**
Chair: Joshua Apte, University of Texas at Austin, United States

2:15 pm - 2:30 pm **S02.03.07. Estimating Human Exposure to Air Pollution in High Rise Cities: The Hong Kong D3D Study**
Benjamin Barratt, King's College London, United Kingdom

2:30 pm - 2:45 pm **S02.03.08. Spatial Patterns of Exposures to Nontraditional Pollutants: Source Resolved Organic Aerosol and Ultrafine Particles**
Albert Presto, Carnegie Mellon University, United States

2:45 pm - 3:00 pm **S02.03.09. A Dense Sensor Network to Characterize Community Exposure to Black Carbon**
Chelsea Preble, University of California, Berkeley, United States

3:00 pm - 3:15 pm **S02.03.10. Mapping Air Pollution with Google Street View Cars: Towards Efficient Mobile Monitoring**
Kyle Messier, University of Texas, United States

3:15 pm - 3:30 pm **S02.03.11. Use of Low-Cost Air Pollution Sensors in the Adult Changes in Thought Air Pollution Study**
Lianne Sheppard, University of Washington, United States

3:30 pm - 3:45 pm **S02.03.12. Panel Discussion**

2:15 pm – 3:45 pm **S02.03C. Fossil fuels, Environmental Epidemiology, and the 2008 UN Declaration on the Rights of Indigenous Peoples (UNDRIP)**
Chair: Cristina O'Callaghan-Gordo, ISGlobal , Spain
Chair: Tim Takaro, Simon Fraser University, Canada
Chair: Manolis Kogevinas, ISGlobal, Spain

2:15 pm - 2:30 pm **S02.03.13. Oil Extraction in the Coastal Basin of the Democratic Republic of the Congo: A Pilot Study**
Benoit Nemery, University of Leuven, Belgium

2:30 pm - 2:45 pm **S02.03.14. Oil Extraction in the Amazon Basin and Levels of Metals among Indigenous Populations**
Cristina O'Callaghan-Gordo, Barcelona Institute for Global Health (ISGlobal), Spain

2:45 pm - 3:00 pm **S02.03.15. Cultural Strength, Connection to Land, Social Justice and the Adani Carmichael Mine: Placing Aboriginal Health and Wellbeing Front and Centre in Mining Decisions in Australia**
Melissa Haswell, Queensland University of Technology, Australia

3:00 pm - 3:15 pm **S02.03.16. Documenting Complex Air Pollution Mixtures and Baseline Health Conditions in Fort McKay, Alberta**
Jeffrey Brook, University of Toronto, Canada

3:15 pm - 3:30 pm **S02.03.17. Tar Sands Operations and Waterborne Exposure and Subsistence Food Supply in Canada**
Eriel Deranger, Indigenous Climate Action, Canada

3:30 pm - 3:45 pm **S02.03.18. Environmental Injustice: Local (Environmental Contamination) and Global (Climate Change) Effects from the Use of Fossil Fuels on Those Who Benefit Least from Their Use**
Adetoun Mustapha, Imperial College London, Nigeria

2:15 pm – 3:45 pm **S02.03D. The European Human Biomonitoring Initiative HBM4EU: Harmonizing Exposure and Health Risk Assessment in Europe to Support Science and Policy**
Chair: Marike Kolossa-Gehring, German Environment Agency (UBA), Germany
Chair: Greet Schoeters, VITO, Belgium

2:15 pm - 2:26 pm **S02.03.19. Integrated Exposure Modeling for Human Biomonitoring Data Assimilation**
Dimosthenis Sarigiannis, Aristotle University of Thessaloniki, Greece

2:26 pm - 2:37 pm **S02.03.20. Complementary Strategies for Suspect and Untargeted Screening of Emerging Substances in Human Matrices**
Jean-Philippe Antignac, National Institute of Agronomic Research (INRA), France

2:37 pm - 2:48 pm **S02.03.21. HBM4EU Mixtures, Human Biomonitoring and Human Health Risk: Methods to Describe Mixture Exposures in the European Population Based on Human Biomonitoring Data**
Erik Lebret, National Institute for Public Health and the Environment (RIVM) / IRAS-UU, The Netherlands

2:48 pm - 3:00 pm **S02.03.22. Communication in HBM4EU and Sustainability Post 2021**
Catherine Ganzleben, European Environment Agency, Denmark

3:00 pm - 3:11 pm **S02.03.23. HBM in Human Risk Assessment and Health Impact Assessment: Translation of Results into Policy**
Jos Bessems, VITO (Flemish Institute for Technological Research), Belgium

3:11 pm - 3:22 pm **S02.03.24. HBM4EU: The European Human Biomonitoring Initiative**
Marike Kolossa-Gehring, German Environment Agency (UBA), Germany

3:22 pm - 3:33 pm **S02.03.25. The Quality Program for Assuring Comparability of Analytical Results in HBM4EU**
Argelia Castaño, Instituto de Salud Carlos III, Spain

3:33 pm - 3:45 pm **S02.03.26. A Framework for the Collection of HBM Data in Europe to Study Spatial and Time Trends of Chemical Exposure in European Citizens**
Greet Schoeters, Flemish Institute for Technological Research (VITO), Belgium

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3:45 pm - 4:15 pm **Poster Viewing & Break**

4:15 pm – 5:30 pm **O02.04A. Air pollution, Pregnancy and Perinatal Health Outcomes**
Chair: Yutong Cai, Imperial College London, United Kingdom
Chair: Kristen Rappazzo, U.S. Environmental Protection Agency (EPA), United States

4:15 pm - 4:30 pm **O02.04.01. Time-Varying Exposure to Fine Particulate Matter and Black Carbon and Outcomes of In Vitro Fertilization**
Audrey Gaskins, Harvard T.H. Chan School of Public Health, United States

4:30 pm - 4:45 pm **O02.04.02. Air Pollution and Preterm Birth: Do Air Pollution Changes over Time Influence Risk in Consecutive Pregnancies among Low-Risk Nulliparous Women?**
Pauline Mendola, National Institutes of Health (NIH) / National Institute of Child Health and Human Development (NICHD), United States

4:45 pm - 5:00 pm **O02.04.03. Prenatal Exposure to CO and NO2 and Reduced Term Birthweight: A Pilot Study Utilizing Hospital-Based Delivery Data for Environmental Health Research in New Delhi, India**
Shakoor Hajat, London School of Hygiene and Tropical Medicine, United Kingdom

5:00 pm - 5:15 pm **O02.04.04. Maternal Exposure to Outdoor Air Pollution and Congenital Limb Deficiencies in National Birth Defects Prevention Study**
Giehae Choi, University of North Carolina at Chapel Hill, United States

5:15 pm - 5:30 pm **O02.04.05. Increased Risk of Infant Mortality Associated with Pre and Postnatal Exposures to PM2.5 in South Korea: A Propensity Score-Matched Analysis**
Eun Mi Jung, Ewha Womans University, Korea (the Republic of)

4:15 pm – 5:30 pm **O02.04B. Greenness Effects – Part 1**
Chair: Tor Oiamo, Ryerson University, Canada
Chair: Jonathan Levy, Boston University School of Public Health, United States

4:15 pm - 4:30 pm **O02.04.06. Green Spaces and Cognitive Decline over 10 Years of Follow-Up in the Whitehall II Cohort**
Cathryn Tonne, Barcelona Institute for Global Health (ISGlobal), Spain

4:30 pm - 4:45 pm **O02.04.07. Area-Level Urban Green Space and Suicide Mortality in Hong Kong**
William Goggins, The Chinese University of Hong Kong, China

4:45 pm - 5:00 pm **O02.04.08. The Association between Medium- and High-Resolution Residential Greenspace Measures and Respiratory Health in Children from an Urban Environment**
J. Michael Wright, U.S. Environmental Protection Agency (EPA), United States

5:00 pm - 5:15 pm **O02.04.09. Perceived Stress and Sleep Quality in an Urban Population: The Potential Role of Neighborhood Greenspace**
Lin Yang, The Hong Kong Polytechnic University, Hong Kong

5:15 pm - 5:30 pm **O02.04.10. Greenness and Depressive Symptoms: Air Pollution, Physical Activity, Walking and BMI as Mediators**
Hyeonjin Song, Korea University, Korea (the Republic of)

4:15 pm – 5:30 pm **O02.04C. Indicators of Cumulative Risks**
Chair: Aolin Wang, University of California, San Francisco, United States
Chair: Uni Blake, American Petroleum Institute, United States

4:15 pm - 4:30 pm **O02.04.11. Effects of Climate Change on Co-Occurrences of Allergenic Pollen and Photochemical Air Pollutants in the United States**
Ting Cai, Rutgers University Environmental and Occupational Health Sciences Institute (EOHSI), United States

4:30 pm - 4:45 pm **O02.04.12. Association between Multiple Environmental Factors with Neurological Diseases in Metro Vancouver, British Columbia, Canada**
Weiran Yuchi, University of British Columbia, Canada

4:45 pm - 5:00 pm **O02.04.13. A Novel Distributed Approach to Characterize Community Characteristics and Environmental Exposures in the Multi-Site Children's Respiratory and Environmental Workgroup (CREW)**
Patrick Ryan, Cincinnati Children's Hospital Medical Center, United States

5:00 pm - 5:15 pm **O02.04.14. The Development of a Cumulative Stressors and Resiliency Index (CSRI) to Examine Environmental Health Risk: A South Carolina Assessment**
Kristen Naney, University of Maryland, United States

5:15 pm - 5:30 pm **O02.04.15. Cumulative Risk and Impacts Modeling on Environmental/Chemical and Social Stressors**
Aolin Wang, University of California, San Francisco, United States

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4:15 pm – 5:30 pm **O02.04D. Integration of Chemical Transport and Dispersion Models to Improve Spatiotemporal Air Pollution Estimates**
Chair: Amanda Giang, University of British Columbia, Canada
Chair: Jeffrey Brook, University of Toronto, Canada

4:15 pm - 4:30 pm **O02.04.16. Combining Satellite Imagery and Numerical Model Simulation Results to Estimate Daily Ambient Air Pollution: An Ensemble Averaging Approach**
Howard Chang, Emory University, United States

4:30 pm - 4:45 pm **O02.04.17. A Hybrid Modeling Framework to Estimate Traffic-Related Exposure in Three Connecticut Cities**
Kristina Wagstrom, University of Connecticut, United States

4:45 pm - 5:00 pm **O02.04.18. Modelling the Intra-Urban Variability of NO2 for Estimating Human Exposure in Guangzhou, China**
Baihuiqian (Vera) He, University of Edinburgh, United Kingdom

5:00 pm - 5:15 pm **O02.04.19. Brown Coal Mine Fire-Related Fine Particulate Matter and Medical Service Utilisation in Australia: A Time Series Analysis**
Yuming Guo, Monash University, Australia

5:15 pm - 5:30 pm **O02.04.20. Estimating Exposure to Air Pollution for Long and Short Term Health Effects Using Coupled Regional and Local Scale Dispersion Models - CMAQ-Urban**
Sean Beevers, King's College London, United Kingdom

4:15 pm – 5:30 pm **O02.04E. Prenatal Pesticide Exposure**
Chair: Ana Maria Mora, Universidad Nacional, Costa Rica
Chair: Lesa Aylward, Summit Toxicology, LLP, United States

4:15 pm - 4:30 pm **O02.04.21. Dietary and Non-Dietary Predictors of Pyrethroid Pesticides in a Cohort of Urban Pregnant Women**
Pam Factor-Litvak, Mailman School of Public Health Columbia University, United States

4:30 pm - 4:45 pm **O02.04.22. Effect of a Longitudinal, Randomized Organic Diet Intervention on 2,4-D, Pyrethroid and Organophosphate Pesticide Exposures among Pregnant Women**
Cynthia Curl, Boise State University, United States

4:45 pm - 5:00 pm **O02.04.23. Maternal Residential Pesticide Use and Risk of Childhood Leukemia in Costa Rica**
Carly Hyland, University of California, Berkeley, United States

5:00 pm - 5:15 pm **O02.04.24. Pyrethroid Metabolites during Pregnancy and Longitudinal Child Behavior in the Cincinnati HOME Study**
Melissa Furlong, University of Arizona, United States

5:15 pm - 5:30 pm **O02.04.25. Insecticide Exposure and Infant Visual Function**
Monica Silver, University of Michigan, United States

4:15 pm - 5:30 pm **O02.04F. Air Pollution, Cognitive Function, and Mental Health**
Chair: Mona Elbarbary, The Univeristy of Sydney, Australia
Chair: Marc Weisskopf, Harvard T.H. Chan School of Public Health, United States

4:15 pm - 4:30 pm **O02.04.31. Mental Health Consequences of Air Pollution: Retrospective Population Based Cohort Survey**
Ioannis Bakolis, King's College London, United Kingdom

4:30 pm - 4:45 pm **O02.04.32. Triggering of Neurodegenerative Hospital Admissions and Emergency Room Visits by Fine Particle Concentrations in Six Urban Centers in New York State: The New York State Accountability Study**
Edwin van Wijngaarden, University of Rochester, United States

4:45 pm - 5:00 pm **O02.04.34. Particulate Air Pollutants and Trajectories of Depressive Symptoms in Older Women**
Andrew Petkus, University of Southern California, United States

5:00 pm - 5:15 pm **O02.04.35. The Association between Air Pollution and Depression: Evidence from the Ginkgo Evaluation of Memory Study**
Anjum Hajat, University of Washington, United States

5:15 pm - 5:30 pm **O02.04.36. Association of Air Pollution with Depressive Symptoms in the Elderly and Effect Modification by Cognitive Performance**
Tamara Schikowski, IUF-Leibniz Institute of Environmental Medicine, Germany

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4:15 pm - 5:30 pm **S02.04A. Children's Exposure to SVOC Mixtures in the Home Environment**
Chair: Kate Hoffman, Duke University, United States
Chair: Heather Stapleton, Duke University, United States

4:15 pm - 4:30 pm **S02.04.01. Associations between Placental Brominated Flame Retardant Levels and Birth Outcomes in a NC Cohort**
Heather Stapleton, Duke University, United States

4:30 pm - 4:45 pm **S02.04.02. Biomarkers of Exposure to Semi-Volatile Organic Compounds (SVOC) among Pregnant Women in Puerto Rico**
John Meeker, University of Michigan, United States

4:45 pm - 5:00 pm **S02.04.03. PFAS Serum Concentrations in Pregnant Women from North Carolina: Predictors and Associations with Birth Weight and Gestational Age at Birth**
Jessica Craig, Boston University, United States

5:00 pm - 5:15 pm **S02.04.04. Using Silicone Wristbands to Assess Children's Exposure to Organophosphate Esters and Brominated Flame Retardants**
Stephanie Hammel, Duke University, United States

5:15 pm - 5:30 pm **S02.04.05. Children's Exposure to SVOCs Mixtures: The TESIE Study**
Kate Hoffman, Duke University, United States

4:15 pm - 5:30 pm **S02.04B. Diving Deep: Mechanisms of Endocrine Disruptors in Pregnancy and Relevant Biomarkers**
Chair: Kelly Ferguson, National Institute of Environmental Health Sciences (NIEHS), United States
Chair: Abee Boyles, National Institute of Environmental Health Sciences (NIEHS), United States

4:15 pm - 4:30 pm **S02.04.06. Longitudinal Associations between Urinary Phthalate Metabolites and Maternal Hormones in the Protect Pregnancy Cohort**
Amber Cathey, University of Michigan School of Public Health, United States

4:30 pm - 4:45 pm **S02.04.07. Association between Exposure to Per- and Polyfluoroalkyl Substances (PFAS) during Pregnancy and Biomarkers of Stress Response in the Maternal-Fetal Unit**
Rachel Morello-Frosch, University of California, Berkeley, United States

4:45 pm - 5:00 pm **S02.04.08. Inflammation Differentiated from Oxidative Stress in Relation to Environmental Phthalate Exposure: Evidence from Human and Animal Studies**
Kelly Ferguson, National Institute of Environmental Health Sciences (NIEHS), United States

5:00 pm - 5:15 pm **S02.04.09. Phthalate Exposure and Placental-Fetal Mechanisms of Endocrine Disruption**
Jennifer Adibi, University of Pittsburgh Graduate School of Public Health, United States

5:15 pm - 5:30 pm **S02.04.10. Bisphenols and Placental Trophoblast Dysfunction**
Almudena Veiga-Lopez, Michigan State University, United States

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4:15 pm - 5:30 pm **S02.04C. Toward a Degree of Willingness to Certify Causality: Weighting Epidemiological and Non-Epidemiological Evidence**
Chair: Beate Ritz, University of California, Los Angeles, United States

4:15 pm - 4:30 pm **S02.04.11. Introduction to the NAS Risk Assessment Document: Using 21st Century Science to Improve Risk-Related Evaluations**
Beate Ritz, University of California, Los Angeles, United States

4:30 pm - 4:45 pm **S02.04.12. Systematic Review and Evidence Integration in the IARC Monographs**
Kurt Straif, International Agency for Research on Cancer, France

4:45 pm - 5:00 pm **S02.04.13. Evidence--Law vs Science**
Dale Hattis, Clark University, United States

5:00 pm - 5:15 pm **S02.04.14. Careful-Causal Reasoning for Human Health: Paradigms, Argumentation and Perspectives from Environmental Epidemiology, Toxicology & Risk Communication**
Erik Lebret, National Institute for Public Health and the Environment (RIVM) / IRAS-UU, The Netherlands

5:15 pm - 5:30 pm **S02.04.15. Lessons from the Law**
Raymond Neutra, California Department of Public Health (Retired), United States

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4:15 pm - 5:30 pm **S02.04D. Exposure Science and Health Impact Assessment in Service to Community Resilience for Fugitive Chemicals**
Chair: Christine Chaisson, The LifeLine Group, United States
Chair: Jaime Madrigano, RAND Corporation, United States

4:15 pm - 4:30 pm **S02.04.16. Addressing a New Species of Trouble: The Health and Social Consequences of Fugitive Chemicals Post-Disasters**
Ramya Chari, RAND Corporation, United States

4:30 pm - 4:45 pm **S02.04.17. The Fugitive Chemical: Predicting Its Release, Concentration into Community Areas and Subsequent Exposure to Recovery Workers**
Juan Osorio, Pratt Institute & Massachusetts Institute of Technology, United States

4:45 pm - 5:00 pm **S02.04.18. How Frontline Communities Can Apply the Tools of Fugitive Chemical Risk Research**
Ryan Chavez, UPROSE, United States

5:00 pm - 5:15 pm **S02.04.19. A Path Forward for Protecting Against Fugitive Chemicals Under Severe Weather: Community-Based Tools, Methods, and Practices for All Communities**
Jalisa Gilmore, New York City Environmental Justice Alliance, United States

5:15 pm - 5:30 pm **S02.04.20. Panel Discussion on Preparing Working Waterfront Communities to Minimize Fugitive Chemical Threats**
Christine Chaisson, The LifeLine Group, United States

4:15 pm - 5:30 pm **S02.04E. Identifying Sources and Health Effects of Phenolic Consumer Product Chemicals: Product Use, Biomonitoring, and Time Trends**
Chair: Robin Dodson, Silent Spring Institute, United States

4:15 pm - 4:30 pm **S02.04.21. Maternal and Infant Exposure to Parabens, Phthalates and Phenols and the Use of Personal Care Products**
Tye Arbuckle, Health Canada, Canada

4:30 pm - 4:45 pm **S02.04.22. Crowdsourced Biomonitoring in a Population of Concerned Consumers Using Detox Me Action Kit**
Robin Dodson, Silent Spring Institute, United States

4:45 pm - 5:00 pm **S02.04.23. German Environmental Specimen Bank (ESB): Time Trends of Paraben Exposure**
Marike Kolossa-Gehring, German Environment Agency (UBA), Germany

5:00 pm - 5:15 pm **S02.04.24. Racial/Ethnic Variations in Personal and Home Product Use in Pregnant Women**
Tamarra James-Todd, Harvard T.H. Chan School of Public Health, United States

5:15 pm - 5:30 pm **S02.04.25. Associations of Prenatal Exposure to Triclosan and Benzophenone-3 with Visual Recognition Memory in 7.5-Month-Old Infants**
Kelsey Dzwilewski, University of Illinois at Urbana-Champaign, United States

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4:15 pm - 5:30 pm **S02.04F. Strengthening Exposure Assessment in Environmental Epidemiology: Problem Identification and Suggestions for Path Forward**
Chair: Judy LaKind, LaKind Associates LLC, United States
Chair: John Nuckols, Colorado State University, United States
Panelist: Manolis Kogevinas, ISGlobal, Spain
Panelist: Peggy Reynolds, Cancer Prevention Institute of California, United States
Panelist: Danielle Vienneau, Swiss Tropical and Public Health Institute, Switzerland

4:15 pm - 4:30 pm **S02.04.26. Lessons Learned from Trying to Set Guidance Values Using Human Studies**
Carol Burns, Burns Epidemiology Consulting, United States

4:30 pm - 4:45 pm **S02.04.27. Integration of Exposure Science and Epidemiology in Environmental Research: Challenges and Strengths in Using Meta-Analyses to Quantify Non-Occupational Pesticide Exposure Intensity**
Nicole Deziel, Yale School of Public Health, United States

4:45 pm - 5:00 pm **S02.04.28. Health Risk Assessment: The Need of Study Design Improvement to Accommodate Individual Susceptibilities**
Josino Moreira, Oswaldo Cruz Foundation, Brazil

5:00 pm - 5:15 pm **S02.04.29. Strengths and Limitations: Integration of Exposure Sciences and Epidemiology in Health Risk Assessment of Environmental Contaminants**
Roel Vermeulen, Utrecht University, The Netherlands

5:15 pm - 5:30 pm **S02.04.30. Panel Discussion**

4:15 pm - 5:30 pm **S02.04G. The Global Burden Estimates of the Impacts of Air Pollution: Methods, Innovative Applications, and WHO Results**
Chair: Michael Brauer, University of British Columbia, Canada
Chair: Francesco Forastiere, Lazio Regional Health Service, Italy

4:15 pm - 4:30 pm **S02.04.31. Assessing the Recent Estimates of the Global Burden of Disease for Ambient Air Pollution: Methodological Changes and Implications for Low- and Middle-Income Countries**
Joseph Spadaro, SERC, Spain

4:30 pm - 4:45 pm **S02.04.32. From Satellites to Burden: New Approaches to Assessing the Global Burden Associated with Ambient Air Pollution**
Gavin Shaddick, University of Exeter, United Kingdom

4:45 pm - 5:00 pm **S02.04.33. Global Mortality and Long-Term Ambient Exposure to Fine Particulate Matter: A New Relative Risk Estimator**
Richard Burnett, Health Canada, Canada

5:00 pm - 5:15 pm **S02.04.34. The World Health Organization (WHO) Global Estimates of the Impact of Air Pollution**
Sophie Gumy, World Health Organization (WHO), Switzerland

5:15 pm - 5:30 pm **S02.04.35. Impact Assessment at Global and Local Level Using the WHO Software AirQ+**
Pierpaolo Mudu, World Health Organization (WHO), Switzerland

5:45 pm - 6:45 pm **ISES General Membership Meeting**
5:45 pm - 6:45 pm **ISEE Annual General Membership Meeting**

7:00 pm - 11:59 pm **Conference Dinner**

WEATHER, CLIMATE AND DISASTERS 2

P02.0010 **The 2008 Recession, Human Mortality and Its Changing Relationship with Daily Temperatures in Europe**
Joan Ballester, Barcelona Institute for Global Health (ISGlobal), Spain

P02.0020 **Does Climate Matter? How Temperature and Precipitation Affect the Relationship between Neighbourhood Walkability and Walking for Transportation**
Justin Thielman, Public Health Ontario, Canada

P02.0030 **Impacts of High Temperature on Adverse Birth Outcomes in Seoul, Korea: Disparities by Individual- and Community-Level Characteristics**
Jiyoung Son, Yale University, United States

P02.0040 **A Systematic Review and Meta-Analysis of the Association between Daily Mean Temperature and Mortality in China**
Qianlai Luo, Center for Environmental and Respiratory Health Research (CERH), University of Oulu, Finland

P02.0050 **Patterns of Environmental Displacement in Indonesia**
Michelle Bell, Yale University, United States

P02.0060 **Vulnerability to the Cardiovascular Effects of Ambient Heat in Six U.S. Cities: Results from the Multi-Ethnic Study of Atherosclerosis (MESA)**
Carina Gronlund, University of Michigan, United States

P02.0070 **Sentinel Practitioners for the Environment and their Role in Connecting up Global Concerns due to Climate Change with Local Actions: How to Spread Awareness and Skills all over the World**
Paolo Lauriola, International Society Doctors for the Enviornment - Italy, Italy

P02.0080 **What can STP Geographies Tell us About the Impact of the Cold Weather Plan for England?**
Peninah Murage, London School of Hygiene and Tropical Medicine, United Kingdom

P02.0090 **Temperature-Related Mortality in Latin America: A Multi-City Multi-Country Study**
Aurelio Tobias, Spanish Council for Scientific Research, Spain

P02.0100 **Temperature and Term Low Birth Weight in California**
Rupa Basu, California Environmental Protection Agency (CalEPA)/OEHHA, United States

P02.0110 **Associations between Ambient Air Temperature, Low Birth Weight and Small for Gestational Age in Term Newborns in Southern Israel**
Raanan Raz, The Hebrew University of Jerusalem, Israel

P02.0120 **From Prey to Hunter: Training Park Workers to Carry Out Tick Collection as an Alternative Approach for Lyme Disease Vector Surveillance**
Karl Forest Berard, Institut National de Sante Publique du Quebec, Canada

P02.0130 **Short-Term Prediction of Extremely Hot Days and Heat-Related Mortality Due to ENSO and Climate Change**
Chu-Chih Chen, National Health Research Institutes, Taiwan

P02.0160 **Associations between Fine Particulate Matter, Extreme Heat Events and Congenital Heart Defects in the National Birth Defects Prevention Study**
Jeanette Stingone, Icahn School of Medicine at Mount Sinai, United States

P02.0170 **The Co-Impacts of Climate Change Policies on Air Quality - Impacts on Health**
Heather Walton, King's College, London, United Kingdom

P02.0180 **The Geographic Distribution of Future Ozone-Related Asthma Exacerbation Emergency Department Visits in the U.S. in a Warming Climate**
Nicholas Nassikas, Brown University, United States

P02.0190 **High Temperature Associations with Preterm Birth and Mediation by Air Pollutants in Detroit, Michigan, 1991-2001**
Carina Gronlund, University of Michigan, United States

P02.0200 **Grassland Phenology and Meteorology Co-Influence Grass Pollen Counts in Victoria, Australia**
Ha Nguyen, University of Technology Sydney, Australia

P02.0210 **Relationship between Temperature and Ischemic Heart Disease in Bogot 2009 - 2014**
Jeimy Corredor Gutiérrez, Universidad Nacional de Colombia, Colombia

P02.0220 **The Influence of Weather on the Health and Welfare Conditions of Pigs in the UK: A Time-Series Analysis**
Shakoor Hajat, London School of Hygiene and Tropical Medicine, United Kingdom

P02.0230 **Using Natural Experiments to Evaluate the Potential Public Health Benefits of the Toronto Cold Weather Program**
Tarik Benmarhnia, University of California, San Diego, United States

P02.0240 **Diurnal Temperature Range and Mortality in Tabriz (the Northwest of Iran)**
Narges Khanjani, Kerman University of Medical Sciences, Iran (the Islamic Republic of)

P02.0250 **Climate Change Impact on Heat-Related Mortality - ISI-MIP Context**
Yasushi Honda, University of Tsukuba, Japan

P02.0270 **Associations of Temperature Variation and Mortality in 47 Japanese Prefectures**
Chaochen Ma, Kyushu University, Japan

P02.0280 **Examining the Association between Temperature and Emergency Room Visits from Mental Health-Related Outcomes in California**
Rupa Basu, California Environmental Protection Agency (CalEPA)/ Office of Environmental Health Hazard Assessment (OEHHA), United States

P02.0300 **Assessing United States County-Level Exposure for Hurricane and Tropical Storm Epidemiological Research**
Brooke Anderson, Colorado State University, United States

P02.0310 **Trends of Age-Specific Mortality with an Underlying or Contributing Cause Attributed to a Weather-Related Cause of Death in Japan, 1995-2015**
Masao Kanamori, Ritsumeikan University, Japan

P02.0320 **Impact of Meteorological Parameters on Suicide Rates: A Case-Crossover Study in Southern Germany**
Alexandra Schneider, Helmholtz Zentrum München - German Research Center for Environmental Health, Germany

P02.0330 **Establishing Appropriate Hot Weather Alerting Criteria for British Columbia, Canada**
Kathleen McLean, B.C. Centre for Disease Control, Canada

P02.0340 **Comparison of Two Wet-Bulb Globe Temperature Estimation Methods for Assessment of Heat-Related Mortality: Evidence from 47 Japanese Prefectures**
Chaochen Ma, University of Tsukuba, Japan

P02.0350 **The Effect of High Summer Temperatures on Emergency Hospital Admissions in Switzerland: A Comparison to Heat-Related Mortality**
Martina Ragettli, Swiss Tropical and Public Health Institute, Switzerland

P02.0360 **Development of Guide Book on Outpatient Treatment and Physical Checkup for Accident Preparedness Substances**
Sunshin Kim, Soonchunhyang University Gumi Hospital, Korea (the Republic of)

P02.0370 **Finding Health-Based Optimal Thresholds in Extreme Weather Watch Warning Systems**
Pierre Masselot, Institut National de la Recherche Scientifique, Canada

P02.0380 **Association between Cardiovascular Mortality and Temperature in Mexican Cities**
Julio Cruz, National Institute of Public Health, Mexico

P02.0390 **Temperature and Fall-Related Hospital Admissions in Hong Kong Sar, China**
Chao Luo, The Chinese University of Hong Kong, Hong Kong

P02.0400 **Short-Term Association between Ambient Temperature and Mental Disorders Hospitalization in an Asian Subtropical City: A Time-Series Study**
Holly Lam, The Chinese University of Hong Kong, Hong Kong

P02.0420 **Estimation of Thermal Comfort Using a WRF-MENEX Model during a Heat Wave in a Complex Urban Area**
Mi-Kyoung Hwang, Department of Atmospheric Sciences, Pusan National University, Korea (the Republic of)

P02.0430 **Cold Temperature and Risk of Death Due to Stroke**
Marianne Bilodeau-Bertrand, University of Montreal Hospital Research Centre, Canada

P02.0431 **The Role of Fulbright Program in Focusing on Canadian and U.S. Environmental Health Issues**
David Goldsmith, Georgetown University, United States

BUILT ENVIRONMENT, NOISE AND GREENNESS 2

P02.0440 **Environmental Noise Pollution and Risk of Hypertension in Pregnancy**
Marianne Bilodeau-Bertrand, University of Montreal Hospital Research Centre, Canada

P02.0450 **The Impact of Rural Residence on Depression in the Ginkgo Evaluation of Memory Study**
Erin Semmens, University of Montana, United States

P02.0470 **The Health Benefits of Bike Sharing Systems can Outweigh the Risks in China, an Old "Kingdom of Bicycles"**
Wenjun Ma, Guangdong Provincial Center for Disease Control and Prevention, China

P02.0480 **Urbanization and Prevalence of Hypertension Based on 2017 American Heart Association Guideline for High Blood Pressure in the PURSE-HIS Cohort**
Mohan Thanikachalam, Tufts University School of Medicine, United States

P02.0490 **Sociodemographic Patterns of Exposure to Civil Aircraft Noise**
Matthew Simon, Boston University School of Public Health, United States

P02.0500 **Noise Pollution and Preventive Measures**
Jeni Saykova, Medical University Sofia, Bulgaria

P02.0510 **Association of Exposure to Traffic-Related Air Pollution and Noise with Ischemic Heart Disease in Elderly People Living in Tokyo Metropolitan Area, Japan**
Haruya Sakai, Japan Automobile Research Institute, Japan

P02.0520 **Physical Activity may Modify the Association between Air Pollution and Brain Structure in the UK Biobank**
Melissa Furlong, University of Arizona, United States

P02.0530 **The Primavera Forest and Reduction of Premature Mortality Owing to Cardiovascular Disease in the Metropolitan Area of Guadalajara**
Arturo Curiel, Universidad de Guadalajara, Mexico

P02.0550 **Urban Greenness and Mental Health Disorders**
Timo Lanki, National Institute for Health and Welfare, Finland

P02.0570 **Analysis of Physical Attributes and Occupant Reported Symptoms for 10,000 U.S. Homes**
Carl Grimes, Hayward Healthy Home Institute, United States

P02.0580 **Epidemiological Study on Long-Term Health Effects of Wind Turbine Noise in Japan**
Tatsuya Ishitake, Kurume University School of Medicine, Japan

P02.0590 **A Combined Emission and Receptor-Based Approach to Modelling Environmental Noise in Toronto, Canada**
Tor Oiamo, Ryerson University, Canada

P02.0610 **The Role of Place as a Modifier of Asthma Associations among Children in Seattle**
Leanne Cusack, U.S. Environmental Protection Agency (EPA), United States

P02.0620 **Urban Green Spaces and Cardiovascular Morbidity**
Mindaugas Malinauskas, Lithuanian University of Health Sciences, Lithuania

P02.0630 **Effect of Environmental Relationship between Fungal Exposure and Asthma in Children**
SungChul Seo, Catholic University of Pusan, Korea (the Republic of)

P02.0640 **Comparison of Heart Rate Variability Measurement Methods in Panels of Older Adults from the Outdoor Physical Activity and Health Study**
Robin Shutt, Health Canada, Canada

P02.0650 **Assessment of Indoor Microbial Exposures**
Meghan Davis, Johns Hopkins Bloomberg School of Public Health, United States

P02.0660 **Relationship between Pollen Allergy (Allergic Rhinitis) and Cryptomeria-Specific Immunoglobulin E during Early Pregnancy: Part of a Nationwide Birth-Cohort Study**
Kazunari Onishi, University of Yamanashi, Japan

P02.0670 **Partitioning the Indoor Microbiome: The Way Forward?**
Hal Levin, Building Ecology Research Group, United States

P02.0680 **How Public Transport Strikes Affect the Health of Our Citizens?**
Margarita Triguero-Mas, Barcelona Institute for Global Health (ISGlobal), Spain

EXPOSURE MEASUREMENT, MODELING AND OTHER METHODOLOGICAL ISSUES 2

P02.0690 **Collecting and Repurposing Survey Data to Support Exposure Assessments**
Heidi Hubbard, ICF International, United States

P02.0700 **Data Infrastructure and Gateway for Environmental Health Research**
Rachael Jones, University of Illinois at Chicago, United States

P02.0710 **Waste Impact on Children's Health: The Exposome Paradigm**
Dimosthenis Sarigiannis, Aristotle University of Thessaloniki, Greece

P02.0720 **Seasonal Variations of Exposure to Agricultural Pesticides in Residents Proximate to Vineyards: Sigxposome Study**
Béatrice Fervers, Centre Léon Bérard, France

P02.0730 **Pesticide Residues in Soil, Water, Indoor Home Surface and Children's Hands**
Noppanun Nankongnab, Mahidol University, Center of Excellence on Environmental Health and Toxicology, Commission on Higher Education, Ministry of Education, Thailand

P02.0740 **Exposure Characterization of a Cyanobacteria Harmful Algal Bloom (CHAB) at Clear Lake, CA: Data Collection Methodology**
Susan Viet, Westat, United States

P02.0750 **Chlorine Tolerance and Inactivation of Citrobacter Species Recovered from Wastewater Treatment Plants**
Mojisola Owoseni, Federal University Lafia, Nigeria

P02.0760 **Urban Mind: Using Smartphone Technologies to Investigate the Impact of Nature on Mental Wellbeing in Real Time**
Ioannis Bakolis, King's College London, United Kingdom

P02.0780 **Polydimethylsiloxane Wristbands as Tools for Estimating Exposure to Semi-Volatile Organic Compounds**
Joseph Okeme, University of Toronto, Canada

P02.0790 **Commuting Exposures to Particulate Air Pollution in Three Canadian Bus Transit Systems: The Urban Transportation Exposure Study**
Keith Van Ryswyk, Health Canada, Canada

P02.0800 **Air Pollutant Exposure Measured with Low-Cost Sensors: Results from a 50-Node Network in Pittsburgh**
Albert Presto, Carnegie Mellon University, United States

P02.0810 **Development of a Novel DNPH Cartridge for Capturing Gaseous Acrolein**
Miyuki Noguchi, Seikei University, Japan

P02.0820 **An Evaluation of a Long-Term Air Sampling Technique Used to Assess Temporal and Spatial Variation to Volatile Organic Compounds from Vapor Intrusion**
Alan Rossner, Clarkson Univeristy, United States

P02.0840 **Determination of Personal and Indoor/Outdoor Concentrations of Nicotine for Passive- or Non-Smoker**
Takashi Amagai, University of Shizuoka, Japan

P02.0850 **A Critical View of Low Cost Sensor System Networks for Air Quality**
Alena Bartonova, NILU Norwegian Institute for Air Research, Norway

P02.0860 **Environmental Influences on Health Outcomes-Integrating Real-Time Exposure Measures from Homes into Longitudinal Cohort Studies: Lessons from the Field**
Katherine Sward, University of Utah, United States

P02.0890 **Spatial and Temporal Characterization of Chemical Emissions Aboard the AC130 Gunship**
Christin Grabinski, Air Force Research Laboratory, United States

P02.0900 **The Effects of Facemasks on Airway Inflammation and Endothelial Dysfunction in Healthy Young Adults: A Double-Blind, Randomized, Controlled Crossover Study**
Tianjia Guan, Peking University, China

P02.0910 **Developing Field Calibration Models for Non-Reference Monitoring Techniques: A Case Study of Light Scattering Laser Photometers**
John Pearce, Medical University of South Carolina, United States

P02.0931 **Mapping Hotspots of Environmental Burdens in the Framework of Cumulative Risk Assessment in Wallonia**
Julien Caudeville, French National Institute for Industrial Environment and Risks (INERIS), France

AIR POLLUTION 2

P02.0940 **Short-Term Air Pollution Exposure, Residential Greenspace, Community Deprivation, and Psychiatric Emergency Visits in Children**
Cole Brokamp, Cincinnati Children's Hospital Medical Center, United States

P02.0950 **Oxidative Potential of Fresh and Aged Particles from Food-Cooking Emissions**
Arthur Chan, University of Toronto, Canada

P02.0960 **Long-Term Trends of Air Pollution in Thailand and Effects on Health**
Will Mueller, Institute of Occupational Medicine, United Kingdom

P02.0970 **The Hematologic Effects Associated with Ambient BTEX Exposure among the Elderly Residents in Nanjing: A Cross-Sectional Study**
Hong Sun, Jiangsu Provincal Center for Disease Prevention and Control, China

P02.0980 **Association of Childhood Adversity and Increased Inflammatory Reactivity to Traffic Air Pollution**
Hector Olvera Alvarez, University of Texas at El Paso, United States

P02.0990 **Effects of Outdoor NOx on Indoor Levels of NOx**
Rachel Golan, Ben-Gurion University of the Negev, Israel

P02.1000 **Exposures to Traffic-Related Air Pollutants are Associated with Changes in Amino Acid Metabolism**
Zhanghua Chen, University of Southern California, United States

P02.1010 **A New Method to Estimate the Health Effect of Mixtures of Ozone, Nitrogen Dioxide, and Fine Particulates in 85 U.S. Counties**
Jia Liu, Johns Hopkins University, United States

P02.1020 **An LPW Estimate of the Effects of Annual Exposure to PM2.5 and Ozone on Hospital Admission Rates of Medicare Participants in the Southeast U.S.A.**
Joel Schwartz, Harvard University, United States

P02.1030 **Air Pollution and the Modification by Spatial Synoptic Classification on Mortality**
Jayeun Kim, Institute of Health and Environment, Seoul National University, Korea (the Republic of)

P02.1040 **Seasonal Analyses of the Association between Prenatal Ambient Air Pollution Exposure and Abnormal Birth Weight in Guangzhou, China**
Qiong Wang, Sun Yat-sen University, China

P02.1050 **The Body Response Time in Air Pollution on the Risk of Arrhythmia Symptom Exacerbation**
Jayeun Kim, Institute of Health and Environment, Seoul National University, Korea (the Republic of)

P02.1060 **Assessment of Personal Exposure to Near-Road PM2.5 Combining Measurements and Modelling Data**
Iván Hernández Paniagua, CENTROMET, Mexico

P02.1070 **A Community Driven Initiative to Investigate the Health Impacts of Exposure to Outdoor Air**
Paleah Moher, CAREX Canada, Simon Fraser University, Canada

P02.1080 **The Association of Traffic-Related Air and Noise Pollution with Maternal Blood Pressure in the HOME Study**
Clara Sears, Brown University, United States

P02.1090 **Air Pollution, Land Use, and Complications of Pregnancy**
Seung-Ah Choe, CHA University, United States

P02.1110 **Air Pollution Exposure and Risk of Spontaneous Abortion in the Nurses' Health Study II**
Audrey Gaskins, Harvard T.H. Chan School of Public Health, United States

P02.1120 **Exploring Association of Long-Term Ultrafine Particle Exposure with IL-1?**
Doug Brugge, Tufts University, United States

P02.1140 **Air Pollution-Related Health and Health Equity Effects of the United States Economy: 1997-2015**
Christopher Tessum, University of Washington, United States

P02.1150 **Cardiovascular Mortality Reductions Related to Improved Air Quality Vary by Socioeconomic Status: A Moderated Mediation Analysis**
Lauren Wyatt, Oak Ridge Institute for Science and Education / U.S. Environmental Protection Agency (EPA), United States

P02.1160 **Source Specific-PM2.5 Associated with Heart Rate Variability in Elderly Adults with Coronary Diseases: A Community-Based Panel Study**
Xi Chen, National Institute of Environmental Health, Chinese Center for Disease Control and Prevention (CDC), China

P02.1170 **Geographically Varied Associations between Hypertensive Disorders in Pregnancy and Particulate Matter in the Contiguous United States, 1999-2004**
Tao Xue, Peking University, China

P02.1180 **Assessing Determinants of Sustained Fuel Transitions.**
John Atkinson, University at Buffalo - SUNY, United States

P02.1190 **Characterizing Personal Fine and Ultrafine Particle Exposures among Inner-City Children with Asthma**
Ehsan Majd, Johns Hopkins University Bloomberg School of Public Health, United States

P02.1200 **Household Air Pollution and Arthritis in Low- and Middle-Income Countries: Evidence from the World Health Organization's Study on Global Ageing and Adult Health**
Shelby Yamamoto, University of Alberta, Canada

P02.1210 **Long-Term Exposure to Ambient PM2.5 and Fasting Blood-Glucose in the Elder Cohort**
Yi Zhang, National Institute of Environmental Health, Chinese Center for Disease Control and Prevention (CDC), China

P02.1220 **Effects on Morbidity and Mortality of Critical Episodes of PM2.5 in the City of Medellin, 2015**
Juan Piñeros Jiménez, Universidad de Antioquia, Colombia

P02.1230 **Identifying Sensitive Windows for Prenatal Particulate Air Pollution Exposure and Relative Leukocyte Telomere Length in Cord Blood**
Maria Jose Rosa, Icahn School of Medicine at Mount Sinai, United States

P02.1240 **Maternal Exposure to Ambient Ozone and Congenital Diseases in Korea**
Kyung-Shin Lee, Environmental Health Center, Korea (the Republic of)

P02.1250 **A Population-Based Study of Traffic-Related and Outdoor Air Pollution during Pregnancy and Autism in Denmark**
Qi Yan, University of California, Los Angeles, United States

P02.1260 **Prenatal and Postnatal Ambient Air Pollution Exposure and Weight Growth Trajectories in Early Childhood**
Anna Rosofsky, Boston University, United States

P02.1270 **Air Pollution Exposure and Biomarkers of Early Effect in Children: The Final Results of the MAPEC_LIFE Project**
Umberto Gelatti, University of Brescia, Italy

P02.1280 **Oxidative Potential and Metals in Ambient Particulate Matter are Associated with Inflammatory and Neural Biomarkers in a Controlled Exposure Study**
Ling Liu, University of Toronto, Canada

P02.1290 **A Structural Approach to Analyzing Urban Population Dust Exposure and Its Effect on Daily Morbidity**
Asfandyar Shahab, Guilin University of Technology, China

P02.1300 **Associations between High Air Pollutant Levels and Cardiovascular Diseases in Taipei, Taiwan**
How-Ran Guo, National Cheng Kung University, Taiwan

P02.1310 **Exposure to Ambient Air Pollution Associated with Increased Risk of Incident Diabetes Mellitus: A Population-Based Cohort Study**
Lauren Paul, Institute for Clinical Evaluative Sciences, Canada

P02.1320 **Association of the Daily Ratio of FEV1 to FVC with the Real-Time Exposure Level to Indoor PM2.5 and CO2 after Controlling for Other Risk Factors in Adult Non-Smoking Refractory Asthmatics in Urban Areas of South Korea: Results from Environmental Health Study with Connectivity and Remote Sensing Technologies**
Sol Yu, National Institute of Environmental Research, Korea (the Republic of)

P02.1330 **Air Pollution Exposures and Risk of High Blood Pressure in Diabetes Mellitus Patients, China: A Retrospective Cohort Study**
Kun Chen, Zhejiang University School of Public Health and the Research Center for Air Pollution and Health, Zhejiang University, China

P02.1331 **Size-Fractionated Particle Number, Length, and Surface Area Concentrations and Daily Mortality in Augsburg, Germany, 2004-2009**
Kai Chen, Helmholtz Zentrum München, Germany

P02.1340 **Implications of Exposure Measurement Error for Interpreting Epidemiological Results for Studies of Exposure to PM, NO2, or SO2: Effect of Error Type on Bias and Coverage Probability**
Jennifer Richmond-Bryant, U.S. Environmental Protection Agency (EPA), United States

P02.1350 **Maternal Exposure to Ozone and PM2.5 and the Prevalence of Orofacial Clefts in Four U.S. States**
Ying Zhou, U.S. Centers for Disease Control and Prevention, United States

P02.1360 **Longitudinal Analysis of Particulate Air Pollutants and Executive Function in Southern California Youth**
Diana Younan, University of Southern California, United States

P02.1380 **Evaluate the Validity of Land Use Regression Models for NO2 Based on Routine and Campaign Monitoring Data from an Urban Area of Japan**
Saori Kashima, Institute of Biomedical and Health Sciences, Hiroshima University, Japan

P02.1390 **Social Susceptibility to Multiple Air Pollutants in Cardiovascular Disease**
Jamie Humphrey, Drexel University, United States

P02.1400 **Air Pollution and Childhood Autism Spectrum Disorder in Taiwan**
How-Ran Guo, National Cheng Kung University, Taiwan

P02.1410 **Ambient Air Pollution and the Risk of Stroke and Atrial Fibrillation: A Population-Based Cohort Study**
Saeha Shin, Public Health Ontario, Canada

P02.1420 **Comparison of Different Hybrid Modeling Methods for the Estimation of Intraurban Air Pollutant Concentrations**
Inbo Oh, University of Ulsan College of Medicine, Korea (the Republic of)

P02.1440 **Land Use Regression Modelling: An Air Pollution Monitor Location Optimization Approach**
Matthew Adams, University of Toronto Mississauga, Canada

P02.1450 **All-Cause Mortality Risks Associated with Long-Term Exposure to Ambient Fine Particulate Matter in the Chinese Healthy Longevity Cohort**
Tiantian Li, National Institute of Environmental Health, Chinese Center for Disease Control and Prevention, China

P02.1460 **Estimating Concentrations of PM2.5 Species with Random Forest Algorithm across Continental United States during 2005 - 2015**
Jianzhao Bi, Emory University, United States

P02.1470 **Spatiotemporal Modeling of Oxidative Potential of Ambient Particulate Matter Using Chemical Transport Model-Derived Emission Sources**
Armistead Russell, Georgia Institute of Technology, United States

P02.1490 **The Contribution of Residential Coal Combustion to the Oxidative Potential of Atmospheric Fine Particulate Matter in Beijing, China**
Xiaoying Li, Colorado State University, United States

P02.1500 **Low Vitamin D Levels Are Associated with Elevated Cardiovascular Responses after a Controlled Diesel Exhaust Exposure in Healthy Human Subjects**
Jaime Mirowsky, State University of New York Upstate Medical University ESF, United States

P02.1510 **Household Energy and Health in India: A Situational Assessment and Stakeholder Mapping**
Bhargav Krishna, Centre for Environmental Health, Public Health Foundation of India, India

P02.1511 **Review of the Acute Effects of the Daily Exposure to Particulate Matter on Lung Function and Lung Inflammation in Healthy Subjects**
Alan da Silveira Fleck, University of Montreal, Canada

P02.1520 **Integrating Spatiotemporal Variability and Modifiable Factors into Air Pollution Estimates**
Naomi Zimmerman, University of British Columbia, Canada

P02.1530 **Ambient Particulate Matter and Cardiovascular Incidence in a Nationwide Cohort in South Korea**
Sun-Young Kim, National Cancer Center, Korea (the Republic of)

P02.1550 **Fine Particulate Matter and Medications Dispensed during and after a Brown Coal Mine Fire: A Time Series Analysis**
Yuming Guo, Monash University, Australia

P02.1580 **A Study on the Key Role of Cadmium Accumulation Induced by PM2.5 Exposure in Renal Injury**
Xingya Kuang, Yangpu Hospital, Tongji University, China

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Steven Prince, U.S. Environmental Protection Agency (EPA), United States

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Chen Chen, Institution/Organization: National Institute of Environmental Health, Chinese Center for Disease Control and Prevention, China

P02.1980 **Effect of Reducing Fine Particle Concentration after Use of Air Purifiers in Hospital: Preliminary Results**
Jongmin Oh, Ewha Womans University of Medicine, Korea (the Republic of)

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Yan Li, Kunming Medical University, China

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Aina Roca Barceló, UK Small Area Health Statistics Unit (SAHSU), MRC-PHE Centre for Environment and Health, School of Public Health, Imperial College London, United Kingdom

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Brittney Baumert, Emory University, United States

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Pornpimol Kongtip, Mahidol University, Thailand

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Chang-Chuan Chan, Institute of Occupational Medicine and Industrial Hygiene, Taiwan

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Sanghamitra Savadatti, New York State Department of Health, United States

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Maria Munoz, Universidad de Chile, Chile

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Md Alfazal Khan, International Centre for Diarrhoeal Disease Research, Bangladesh (ICDDR,B), Bangladesh

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Albino Villarreal, Instituto Nacional de Salud Pública, Mexico

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Rachel Long, Association of Schools and Programs of Public Health, United States

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Suhela Kapoor, TATA Trust & Public Health Foundation of India, India

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Mineshi Sakamoto, National Institute for Minamata Disease, Japan

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Aimin Chen, University of Cincinnati College of Medicine, United States

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Shohreh Farzan, University of Southern California, United States

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Theresa Bastain, University of Southern California, United States

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Rémy Slama, Institute for Advanced Biosciences (IAB), INSERM, CNRS, Université Grenoble Alpes, France

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Wooseok Lee, Seoul National University College of Medicine, Korea (the Republic of)

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Yonghong Li, National Institute of Environmental Health, Chinese Center for Disease Control and Prevention, China

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Jonathan Heiss, Icahn School of Medicine at Mount Sinai, United States

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Elena Righi, University of Modena and Reggio Emilia, Italy

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Emeline Lequy-Flahault, INSERM, France

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Antonio Signes-Pastor, Dartmouth College, United States

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Yukihiro Ohya, National Center for Child Health and Development, Japan

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Byungmi Kim, National Cancer Center Institute, Korea (the Republic of)

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Marian Pavuk, Agency for Toxic Substances and Disease Registry/U.S. Centers for Disease Control and Prevention, United States

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Kyeongmin Kwak, Gachon University Gil Medical Center, Korea (the Republic of)

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Matt Cave, University of Louisville, United States

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Jinsun Kim, National Cancer Center, Korea (the Republic of)

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Denise Lewis, National Cancer Institute, United States

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Isabella Annesi-Maesano, Sorbonne University and INSERM, France

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Chien-Yuan Huang, Chimei Medical Center, Taiwan

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Alejandra Cantoral, National Institute of Public Health, Mexico

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Tony Fletcher, Public Health England, United Kingdom

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Veronica Rodriguez Saldana, McGill University, Canada

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Sungkyoon Kim, Seoul National University, Korea (the Republic of)

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Priya D'Souza, Emory University, United States

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Chisato Mori, Chiba University, Japan

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James Gomes, University of Ottawa, Canada

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Kristen Malecki, University of Wisconsin, Madison, United States

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Ta-Chen Su, National Taiwan University Hospital, Taiwan

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Martine Vrijheid, Barcelona Institute for Global Health (ISGlobal), UPF, CIBERESP, Spain

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Frederik Lessmann, Institute for Occupational and Maritime Medicine (ZfAM), University Medical Centre Hamburg-Eppendorf, Germany

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Lucas Salas, Geisel School of Medicine at Dartmouth, United States

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Ibon Tamayo, Harvard University, United States

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Paul Scheepers, Radboud University Medical Center, The Netherlands

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Patrick Bélanger, National Public Health Institute of Quebec (INSPQ), Canada

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Martine Vrijheid, ISGlobal, Spain

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Shoji Nakayama, National Institute for Environmental Studies, Japan

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Clémence Fillol, Santé Publique France, France

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Brice Appenzeller, Luxembourg Institute of Health, Luxembourg

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Lee Blum, NMS Labs, United States

P02.3390 **A Cross-Over Health Intervention Trial of Children Consuming an Organic Diet**
Konstantinos Makris, Cyprus University of Technology, Cyprus

P02.3410 **The Use of Dried Blood Spots for Mercury Assessment in Population-Based Research**
Andrea Santa-Rios, McGill University, Canada

P02.3420 **The Establishment of Simultaneous Analysis Method for Metabolites of Phthalates and Dinch in Human Urine by UHPLC-MS / MS**
Sungmin Kim, Eulji University, Korea (the Republic of)

P02.3430 **Metabolomics of Childhood Exposure to Perfluorooctanoic Acid: A Cross-Sectional Study**
Joseph Braun, Brown University, United States

P02.3440 **Cross Validation of Biomonitoring Methods for Polycyclic Aromatic Hydrocarbon Metabolites in Human Urine: Results from the Pilot Phase of the HAPIN Trial in Tamil Nadu, India**
Naveen Puttaswamy, Sri Ramachandra Medical College & Research Institute, India

P02.3450 **Age-Period-Cohort Analysis of Blood Lead in the United States, 1976-2016**
Yutaka Aoki, Centers for Disease Control and Prevention, United States

P02.3460 **Environmental Tobacco Smoke Exposure among Children at 7 Years of Age in Japan: Associated Factors and Urinary Cotinine Levels**
Machiko Minatoya, Hokkaido University, Japan

P02.3470 **Decrease in Urinary Biomarkers of Di-2-Ethylhexyl Phthalate (DEHP) Metabolites and Oxidative Stress in Children after Withdrawal from Exposure to 2011 Taiwan's DEHP-Tainted Food Scandal: A 44-Month Follow-Up**
Ming-Tsang Wu, Kaohsiung Medical University Hospital, Kaohsiung Medical University, Taiwan

P02.3480 **Associations between Urinary Organophosphorous Flame Retardant Metabolites and Measures of Adiposity in the U.S. General Population: NHANES 2013-2014**
Lesliam Quiros-Alcala, University of Maryland, United States

P02.3490 **Pb-Adulterated Turmeric: A Growing Problem**
Whitney Cowell, Mount Sinai Icahn School of Medicine, United States

P02.3500 **Urine Collection Methods for Non-Toilet-Trained Children in Biological Monitoring Studies: Validation of a Disposable Diaper for Characterization of Tebuconazole Exposure**
Paul Scheepers, Radboudumc, The Netherlands

P02.3510 **Cardiovascular Biomarker Validation in Dried Blood Spots and Plasma for the Household Air Pollution Intervention Network Trial**
Savannah Gupton, Emory University, United States

P02.3520 **The Value of Population Cohorts and Biobank Resources to Address Environmental Health Issues: The Cartagene Platform**
Nolwenn Noisel, CARTaGENE, CHU Sainte-Justine, Canada

RISK ASSESSMENT AND POLICY 2

P02.3530 **Stochastic Modeling of Exposure to Chemicals in Consumer Products**
Olivier Jolliet, University of Michigan, United States

P02.3550 **Spatiotemporal Augmented Representation of Indoor Air Quality as a Tool for Decision Making**
Nastaran Arfaei, Harvard University, United States

P02.3570 **Effects of High Intensity Local Exposure of a 10 Ghz-Electromagnetic Field on Glial Activity in Rat Brain**
Hiroshi Masuda, Kurume University School of Medicine, Japan

P02.3580 **Estimates of Exposure to Chemical Threat Agent Surrogates in the United States, 2012**
Dulaney Wilson, Medical University of South Carolina, United States

P02.3590 **The Federal Research Action Plan on Recycled Tire Crumb Used on Synthetic Turf Playing Fields and Playgrounds: Tire Crumb Rubber Characterization and Exposure Study Recruitment Strategy and Questionnaire**
Kelsey Benson, U.S. Centers for Disease Control and Prevention/Agency for Toxic Substances and Disease Registry, United States

P02.3610 **Relative Oral Bioavailability of Cobalt and Nickel in Residential Soil and Dust Affected by Metal Grinding Operations**
Caroline Ring, ToxStrategies, Inc., United States

P02.3620 **Emerging Regulatory Issues and Exposure Assessment of Furfuryl Alcohol**
Jamie Schenk, Exponent, Inc., United States

P02.3650 **Fluoride Levels in Mexican Foods and Beverages**
Lynda Luna Villa, National Institute of Public Health, Mexico

P02.3660 **Hexabromocyclododecane Transfer from Flame-Retarded Curtains to Attached Dust**
Takeo Sakurai, National Institute for Environmental Studies, Japan

P02.3670 **Identification of Cells Involved in the Induction of TNF-? Expression by Methylmercury in the Mouse Brain and Its Molecular Mechanisms**
Gi-Wook Hwang, Tohoku University, Japan

P02.3680 **Mapping Soil Heavy Metal Levels in England and Wales for Application in Public Health**
Annalisa Sheehan, Imperial College London, United Kingdom

P02.3710 **Living and Working Conditions of Children and Adolescents Inserted in the Outsourcing Informal and Household Productive Arrangement of Jewelry and Fashion Jewelry in Brazil**
Kelly Polido Kaneshiro Olympio, School of Public Health, Brazil

P02.3720 **On the Estimation and Use of Dermal Permeability Coefficients**
John Kissel, University of Washington, United States

P02.3730 **The Use and Misuse of Bradford Hill in American Tort Law**
Raymond Neutra, California Department of Public Health (Retired), United States

P02.3740 **Non-Linear Model Analysis of the Relationship between Cholinesterase Activities in Rats Exposed to 2, 2-Dichlorovinyl Dimethylphosphate and its Metabolite Concentrations in Urine**
Hirotaka Sato, Nagoya City University, Japan

P02.3750 **Cumulative Risk Assessment Based on Human Biomonitoring Data for Three Anti-Androgenic Phthalates Using the Maximum Cumulative Ratio in Iranian Children**
Maryam Zare Jeddi, Wageningen University and Research, The Netherlands

P02.3770 **Emerging Compounds in Standard Reference Material 2585 Organic Contaminants in House Dust**
Jessica Reiner, National Institute of Standards and Technology (NIST), United States

P02.3780 **Data Quality Evaluation for Epidemiologic Studies Under Amended TSCA**
Francesca Branch, U.S. Environmental Protection Agency (EPA), United States

P02.3790 **Spatial Analysis of Environmental Inequalities with Biomonitoring Data: A Cumulative Risk Assessment**
Florent Occelli, University of Lille, France

P02.3800 **Research, Communication, and Policy Change: PFAS in Food Contact Materials**
Tom Bruton, Green Science Policy Institute, United States

P02.3830 **Evaluation of Potential Health Risk of Non-Intentionally Added Substance (NIAS) Food Contact Material**
Deborah Lander, Chemours Company, United States

P02.3850 **Idiopathic Environmental Intolerance Attributed to Electromagnetic Fields in Magnetic Resonance Imaging Examinees**
Chang-Chih Tsai, Chi-Mei Medical Center, Taiwan

P02.3860 **Concentrations of Pharmaceuticals and Endocrine Disruption Effects in Water Extract Samples in a Concentrated Animal Feeding Operation of Korea**
Kyunghee Ji, Yongin University, Korea (the Republic of)

P02.3880 **Quantifying Impacts of Emission Reductions on Air Pollution Equity and Health Effects in New York City**
Amir Hakami, Carleton University, Canada

P02.3910 **Careful - Causal Reasoning for Human Health in Experimental Toxicology and Epidemiology: A Joint Case Study on PFOA**
Rob Jongeneel, National Institute for Public Health and Environmental Protection, The Netherlands

P02.3920 **The Class Concept: Better Policy and Purchasing for Organohalogens**
Arlene Blum, Green Science Policy Institute, United States

P02.3940 **Active Machine Learning in Systematic Literature Reviews: Bias, Fixes, and Appropriate Use**
Cara Henning, ICF, United States

P02.3950 **High Dimension Biological Analysis of Carbon Nanotube Toxicity**
Spyros Karakitsios, Aristotle University of Thessaloniki, Greece

P02.3960 **Multi-Criteria Assessment of Household Preferences for Reducing Greenhouse Gas Emissions: An Analysis of Household Survey Data from Four European Cities**
Paul Wilkinson, LSHTM, United Kingdom

P02.3970 **Stakeholder Engagement for Decision-Making on Urban Air Pollution Control**
Nelzair Vianna, Oswaldo Cruz Foundation, Brazil

P02.4000 **Evaluation of the Applicability and Reliability of Environmental Exposure Models for Nanomaterials to Regulatory Risk Assessment**
Natasha Chander, Environment and Climate Change Canada, Canada

P02.4010 **Case Studies of Human Integrated Risk Assessment for Phthalates and PFCs in Korea**
Jong-Hyeon Lee, EH R&C Co., Korea (the Republic of)

P02.4020 **Vulnerable Populations and Personal Care Products: The Role of Estimating Exposure to Products Used Primarily by Infants and Young Children**
Sandra Kuchta, Health Canada, Canada

P02.4030 **Canadian Specific Exposure Factors for Certain Personal Care Products**
Leona MacKinnon, Health Canada, Canada

P02.4040 **Health and Security in a Global Digital Transforming Society: Risks and Opportunities**
Yuri Bruinen de Bruin, European Commission, Italy

P02.4050 **Nitrogen Dioxide: From Science to Policy**
Ninon Lyrette, Government of Canada, Canada

P02.4060 **A General Framework to Deal with Uncertainty in Expert Panel Risk Assessment**
Sandrine Fraize-Frontier, ANSES, France

P02.4070 **Reviews in Environmental Health: How Systematic are they?**
Juleen Lam, University of California, San Francisco, United States

OCCUPATIONAL ISSUES 2

P02.4080 **Network on the Coordination and Harmonisation of European Occupational Cohorts (OMEGA-NET)**
Michelle Turner, Barcelona Institute for Global Health (ISGlobal), Spain

P02.4090 **Multicomponent Monitoring for Safety Management of Greasepaints**
Wanseo Kim, Eulji University, Korea (the Republic of)

P02.4120 **Breast Cancer Risk by Occupation in Females and Males in Ontario, Canada: Results from the Occupational Disease Surveillance System (ODSS), 1983-2016**
Jeavana Sritharan, Cancer Care Ontario, Canada

P02.4140 **Occupational Noise Exposure is Associated with Hypertension in China: Results from Project ELEFANT**
Hyang-Min Byun, Newcastle University, United Kingdom

P02.4150 **The Role of School Environments and Occupational Stressors for Michigan Public School Teachers: An Assessment of Stress and Health**
Geila Rajaee, University of Michigan, United States

P02.4170 **The Influence of Vitamin D Receptor, Metallothionein 1A and 2A Gene Polymorphisms on the Lead Toxicity to the Sensory Nervous System in the Chronic Lead- Exposed Workers**
Hung-Yi Chuang, Kaohsiung Medical University, Taiwan

P02.4190 **Exposure to Metal Fume Particulate Matter and Receptor for Advanced Glycation End Products in Shipyard Welders**
Min-Chien Lo, National Defense Medical Center, Taiwan

P02.4200 **Quantification of Trisaminohexyl Isocyanurate (TAHI) as a Biomarker of HDI Isocyanurate Exposure in the Plasma and Urine of Automotive Spray Painters**
Leena Nylander-French, University of North Carolina at Chapel Hill, United States

P02.4210 **Exposure to Metal Fume Particulate Matter and NO in Exhaled Breath in Shipyard Welders**
Kuan-Yu Shen, National Defense Medical Center, Taiwan

P02.4220 **Chemical Exposure Related to Occupational Environment of Woven Fabric Workers, Northern of Thailand**
Kamphon Saeng-Iam, Thammasat University, Thailand

P02.4250 **Reduction in County Population Rates of Sinonasal Cancer Following Improvements in Industrial Hygiene at a Nickel Refinery**
Tom K Grimsrud, Cancer Registry of Norway, Norway

P02.4260 **Carcinogenicity of Styrene**
Nadia Vilahur, International Agency for Research in Cancer, Sweden

P02.4270 **Depression and Related Risk Factors among High Tech Workers in Southern Taiwan**
Chien-Yuan Huang, Chimei Medical Center, Taiwan

Wednesday, August 29, 2018

7:00 am - 8:30 am **Joint ISES/ISEE SNR Breakfast**

7:00 am - 8:30 am **NIH Resource Room, Explore Federal Research Funding and Review Opportunities: One-On-One Conversations with NIH Staff**

8:30 am - 9:30 am **Award Speakers Plenary**
Chair: Judy LaKind, ISES President, LaKind Associates LLC, United States
Chair: Beate Ritz, ISEE President, University of California, Los Angeles, United States

8:30 am - 9:00 am **Keynote by Petros Koutrakis, 2018 ISES Excellence in Exposure Science Awardee**

9:00 am - 9:30 am **Keynote by Mark Nieuwenhuijsen, 2018 ISEE John Goldsmith Awardee**

9:30 am - 10:30 am **O03.01A. Carbon Monoxide and Radon in Residential Buildings**
Chair: Jonathan Thornburg, RTI International, United States
Chair: Anna Hansell, University of Leicester, United Kingdom

9:30 am - 9:45 am **O03.01.01. A Mixed Methods Approach to Radon Health Risk Perception of Ottawa Residents**
Selim Khan, University of Ottawa, Canada

9:45 am - 10:00 am **O03.01.02. Protecting Populations from Radon in Ontario, Canada: Translating Research to Evidence-Based Public Health Practice**
Elaina MacIntyre, Public Health Ontario, Canada

10:00 am - 10:15 am **O03.01.03. Association of Indoor Air Pollutants and Cardiovascular Hemodynamics**
YunShan Chung, National Taiwan University, Taiwan

10:15 am - 10:30 am **O03.01.04. Descriptive Epidemiology of Hospital Admissions Due to Carbon Monoxide Poisoning in England, between 2008 and 2015**
Aina Roca Barceló, UK Small Area Health Statistics Unit, MRC PHE Centre for Environment and Health, Imperial College London, United Kingdom

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9:30 am - 10:30 am **O03.01B. Estimating Exposures and Health Outcomes Associated with Wildfire Smoke**
Chair: Amruta Nori-Sarma, Yale University , United States
Chair: Howard Chang, Emory University, United States

9:30 am - 9:45 am **O03.01.05. A Machine Learning Approach to Estimate Hourly Exposure to Wildfire Smoke for Urban, Rural, and Remote Population**
Jiayun Yao, University of British Columbia, Canada

9:45 am - 10:00 am **O03.01.06. Cardiovascular and Cerebrovascular Emergency Department Events Related to California Wildfires in 2015**
Ana Rappold, U.S. Environmental Protection Agency (EPA), United States

10:00 am - 10:15 am **O03.01.07. A Causal Inference Analysis of the Effect of Wildland Fire Smoke on Ambient Air Pollution Levels and the Associated Health Burden from Wildfire-Contributed PM2.5**
Alexandra Larsen, North Carolina State University, United States

10:15 am - 10:30 am **O03.01.08. The British Columbia Asthma Prediction System (BCAPS): A Surveillance System to Forecast the Public Health Impacts of Wildfire Smoke**
Kathleen McLean, BC Centre for Disease Control, Canada

9:30 am - 10:30 am **O03.01C. Impacts and Evaluation of Arsenic Exposures**
Chair: Ya-Yun Cheng, National Cheng Kung University, Taiwan
Chair: Julie Shu-Li Wang, National Health Research Institutes, Taiwan

9:30 am - 9:45 am **O03.01.09. Preliminary Quantitative Risk Assessment: Arsenic Exposure from Drinking Water on the Hopi Lands**
Jonathan Blohm, University of Arizona, United States

9:45 am - 10:00 am **O03.01.10. An Evaluation of Speciated Plasma Arsenicals as Potential Biomarkers of Arsenic Exposure and Arsenic-Associated Diabetes in Individuals Living in Zimapan and Lagunera, Mexico**
Paige Bommarito, University of North Carolina at Chapel Hill, United States

10:00 am - 10:15 am **O03.01.11. Co-Exposure to Methylmercury and Inorganic Arsenic in Baby Rice Cereals and Rice-Containing Teething Biscuits**
Sarah Rothenberg, Oregon State University, United States

10:15 am - 10:30 am **O03.01.12. The Impact of Arsenic Exposure on Whole Blood DNA Methylation: An Epigenome-Wide Study of Bangladeshi Adults**
Kathryn Demanelis, University of Chicago, United States

9:30 am - 10:30 am **O03.01D. Environmental Disasters and Climatic Events**
Chair: Liudmila Liutsko, ISGlobal, Spain
Chair: Agnes Soares da Silva, PAHO/WHO, United States

9:30 am - 9:45 am **O03.01.13. The Impact of Hurricane Sandy on Pregnancy Complications in Eight Affected Counties of New York State**
Jianpeng Xiao, University at Albany, State University of New York, United States

9:45 am - 10:00 am **O03.01.14. Volatile Organic Compounds and Pulmonary Function in Children: 1, 3, and 5 Years after the Hebei Spirit Oil Spill**
Hae-Kwan Cheong, Sungkyunkwan University School of Medicine, Korea (the Republic of)

10:00 am - 10:15 am **O03.01.15. Tropical Storms and Associated Risk to All-Cause, Accidental, Cardiovascular, and Respiratory Mortality in 78 United States Communities, 1988-2005**
Meilin Yan, Colorado State University, United States

10:15 am - 10:30 am **O03.01.16. Deepwater Horizon Oil Spill Exposures and Neurobehavioral Function in GuLF STUDY Participants**
Arbor Quist, University of North Carolina Chapel Hill, United States

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9:30 am - 10:30 am **S03.01A. Assessing Manganese Exposure in Pediatric Populations across the Globe**
Chair: Erin Haynes, University of Cincinnati, United States

9:30 am - 9:45 am **S03.01.01. Pediatric Manganese Exposure and Neurocognition in Eastern Ohio**
Erin Haynes, University of Cincinnati, United States

9:45 am - 10:00 am **S03.01.02. Manganese in Multiple Biomarkers and Neurodevelopment among Adolescents Residing near Ferro-Alloy Industry**
Birgit Claus Henn, Boston University, United States

10:00 am - 10:15 am **S03.01.03. Prenatal Manganese and Behavioral Problems in 5-Year Old Children from the Infants' Environmental Health (ISA) Study**
Berna van Wendel de Joode, Universidad Nacional, Costa Rica

10:15 am - 10:30 am **S03.01.04. Prenatal and Early Postnatal Dentine Mn, Zn and Pb and Childhood Behavior**
Megan Horton, Icahn School of Medicine at Mount Sinai, United States

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9:30 am - 10:30 am **S03.01B. Environmental Exposures and Breast Cancer across the Life-Course: Interdisciplinary Collaborations to Stimulate New Research Approaches, Improve Exposure Assessment during Critical Windows, and Accelerate the Translation of Research Findings into Disease Prevention**
Chair: Kristen Malecki, University of Wisconsin, Madison, United States
Chair: Abee Boyles, National Institute of Environmental Health Sciences (NIEHS), United States

9:30 am - 9:45 am **S03.01.05. Study Design Considerations when Measuring Exposure Biomarkers of Non-Persistent Endocrine Disruptors in Epidemiologic Studies of Chronic Diseases Including Breast Cancer**
Susan Pinney, University of Cincinnati College of Medicine, United States

9:45 am - 10:00 am **S03.01.06. Using Breast Density as an Intermediate Biomarker of Environmental Influence on Breast Cancer Risk**
Celia Byrne, Uniformed Services University, United States

10:00 am - 10:15 am **S03.01.07. Exploring Environmental Chemicals and Risk of Breast Cancer during the Menopausal Transition**
Susan Neuhausen, Beckman Research Institute of City of Hope, United States

10:15 am - 10:30 am **S03.01.08. Environmental Chemicals and Postpubertal Breast Composition in a Cohort of Girls from Chile: Results from a Pharmacokinetics Study of Zeranol**
Vincent Bessonneau, Silent Spring Institute, United States

9:30 am - 10:30 am **S03.01C. Health Earth: Planetary Health Affects Everyone's Health**
Chair: Wael Al-Delaimy, University of California, San Diego, United States
Chair: Jouni Jaakkola, University of Oulu, Finland

9:30 am - 9:45 am **S03.01.09. The Impact of Climate Change on Displacements of Population**
Wael Al-Delaimy, University of California, San Diego, United States

9:45 am - 10:00 am **S03.01.10. Holistic Effects of Climate Change on the Culture, Wellbeing and Health of the Saami, the Only Indigenous People in Europe**
Jouni Jaakkola, University of Oulu, Finland

10:00 am - 10:15 am **S03.01.11. How Development Choices Could Alter the Capacity of Health Systems**
Kristie Ebi, University of Washington, United States

10:15 am - 10:30 am **S03.01.12. Revisiting the Earth Charter and Our Ethical Obligations to Planetary Health**
Colin Soskolne, Universities of Alberta and Canberra, Canada

9:30 am - 10:30 am **S03.01D. Healthy Schools: Understanding Indoor Environmental Quality, Occupant Health, and Academic Performance**
Chair: Stuart Batterman, University of Michigan, United States
Chair: Sheryl Magzamen, Colorado State University, United States

9:30 am - 9:45 am **S03.01.13. Assess School Environmental Effects on Occupants' Health and Evaluate Environmental Policies' Impacts**
Shao Lin, University at Albany, State University of New York, United States

9:45 am - 10:00 am **S03.01.14. School Operations Reporting and Student Academic Achievement**
Jenny Apriesnig, Michigan Technological University, United States

10:00 am - 10:15 am **S03.01.15. School Environment, Indoor Air Quality, Student Performance and Health**
Meredith McCormack, Johns Hopkins University, United States

10:15 am - 10:30 am **S03.01.16. Environmental Quality, Health and Learning in Conventional and High Performance School Buildings**
Stuart Batterman, University of Michigan, United States

9:30 am - 10:30 am **S03.01E. Multidisciplinary Approaches for Traffic Related Burdens Through Route Specific Exposures and Dose to Noise, Air Pollution and Quality of Life: Making Better Measurements**
Chair: Luc Dekoninck, Ghent University, Belgium
Chair: Steven Chillrud, Columbia University, United States
Chair: Darby Jack, Columbia University, United States

9:30 am - 9:45 am **S03.01.17. Understanding Traffic-Related Air Pollution Exposures through Mobile Monitoring**
Joshua Apte, University of Texas at Austin, United States

9:45 am - 10:00 am **S03.01.18. Wearable Sensors for Geolocation, Physical Activity and Air Pollution: Challenges and Opportunities**
Juan Orjuela, Imperial College London, United Kingdom

10:00 am - 10:15 am **S03.01.19. A High Resolution Spatiotemporal Model for In-Vehicle Black Carbon Exposure: First Application on Epidemiological Cohorts**
Luc Dekoninck, Ghent University, Belgium

10:15 am - 10:30 am **S03.01.20. Merging Mobile Measurements, Traffic Emissions Models, and Land Use Regression Towards Real-Time Estimation of Traffic-Related Air Pollution**
Steve Hankey, Virginia Tech, United States

9:30 am - 10:30 am **S03.01F. NASA Applications for Public Health and Air Quality Models and the Translation of Research into Policy and Other Decision Making**
Chair: Sue Estes, NASA Health & Air Quality, United States

9:30 am - 9:45 am **S03.01.21. NASA Applications for Public Health and Air Quality Models and Decisions Uisng Earth Observation Systems**
John Haynes, National Aeronautics and Space Administration (NASA), United States

9:45 am - 10:00 am **S03.01.22. Searching Panacea for Cholera**
Antarpreet Jutla, West Virginia University, United States

10:00 am - 10:15 am **S03.01.23. Advancing Extreme Heat Epidemiology Using Remotely Sensed Earth Observations: Generating a Long-Term Historical Time-Series of Daily Heat Metrics at the Community-Level**
Ambarish Vaidyanathan, U.S. Centers for Disease Control and Prevention, United States

10:15 am - 10:30 am **S03.01.24. An Operational System for Surveillance and Ecological Forecasting of West Nile Virus Outbreaks**
Michael Wimberly, South Dakota State University, United States

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9:30 am - 10:30 am **S03.01G. Novel Methods for Assessing Exposure to Temperature and Its Health Effects**
Chair: Youn-Hee Lim, Seoul National University , Korea (the Republic of)

9:30 am - 9:45 am **S03.01.25. Does Temperature Variability Modify Heat Impacts on Mortality? A Multi-City Multi-Country Study**
Yuming Guo, Monash University, Australia

9:45 am - 10:00 am **S03.01.26. Information on Exposure History Is Needed to Fully Understand Heat Effects on Elderly Mortality**
Hyun-Joo Bae, Korea Environment Institute, Korea (the Democratic People's Republic of)

10:00 am - 10:15 am **S03.01.27. Local Extreme Point Temperature and Mortality in Korea**
Youn-Hee Lim, Seoul National University, Korea (the Republic of)

10:15 am - 10:30 am **S03.01.28. Temperature Variability and Mortality in Urban and Rural China: An Application of Spatiotemporal Index**
Kejia Hu, Zhejiang University, China

9:30 am - 10:30 am **S03.01H. Science and Action for Safer Materials and Products**
Chair: Elaine Cohen Hubal, U.S. Environmental Protection Agency (EPA), United States

9:30 am - 9:45 am **S03.01.29. Anticipating Impacts of Chemicals and Materials: Science for Context-Based Decisions**
Elaine Cohen Hubal, U.S. Environmental Protection Agency (EPA), United States

9:45 am - 10:00 am **S03.01.30. Policy Drivers for Safer Chemistry: Lessons Learned from a Review of Substitution Policies and Program Support Tools**
Molly Jacobs, University of Massachusetts Lowell, United States

10:00 am - 10:15 am **S03.01.31. Exposure Considerations Under California's Safer Consumer Product Regulations**
Meredith Williams, California Department of Toxic Substances Control, United States

10:15 am - 10:30 am **S03.01.32. New Approaches to Prioritize Chemicals of Concern in Children's Products**
Marissa Smith, University of Washington, United States

9:30 am - 10:30 am **S03.01I. Translating Scientific Evidence about Near Source Traffic Pollution into Policy and Practice**
Chair: Doug Brugge, Tufts University, United States

9:30 am - 9:45 am **S03.01.37. Using Research on Traffic Pollution to Influence Policy and Practice**
Doug Brugge, Tufts University, United States

9:45 am - 10:00 am **S03.01.38. Global Goods Movement, Land-Use and Environmental Justice in Los Angeles, CA**
Jill Johnston, University of Southern California, United States

10:00 am - 10:15 am **S03.01.39. A Health Impact Assessment Study of the Barcelona 'superblock' Model**
Natalie Mueller, Barcelona Institute for Global Health (ISGlobal), Spain

10:15 am - 10:30 am **S03.01.40. Integrating Land Use and Transportation Advocacy with Environmental Health Science in Somerville MA U.S.A.**
Wig Zamore, Somerville Transportation Equity Partnership, United States

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10:30 am - 11:00 am **Poster Viewing & Break**

11:00 am - 12:30 pm **O03.02A. Air Pollution, Atherosclerosis, and Cardiovascular Disease**
Chair: Ana Maria Vicedo-Cabrera, Department of Social and Environmental Health Research, London School of Hygiene and Tropical Medicine, United Kingdom
Chair: Laura Corlin, Tufts University, United States

11:00 am - 11:15 am **O03.02.01. Long-Term Effects of Air Pollution on Ankle-Brachial Index**
Siqi Zhang, Helmholtz Zentrum München, Germany

11:15 am - 11:30 am **O03.02.02. Traffic-Related Air Pollution and Carotid Atherosclerotic Plaque Burden and Progression in London, Ontario, Canada**
Markey Johnson, Health Canada, Canada

11:30 am - 11:45 am **O03.02.03. Air Pollution and Subclinical Atherosclerosis in a Peri-Urban Area in South India (CHAI-Project)**
Cathryn Tonne, Department of Non-communicable Disease Epidemiology, London School of Hygiene and Tropical Medicine, London, United Kingdom

11:45 am - 12:00 pm **O03.02.04. Air Pollution Exposure and Progression of Atherosclerosis in Different Vessel Beds**
Frauke Hennig, Institute for Occupational, Social and Environmental Medicine, Germany

12:00 pm - 12:15 pm **O03.02.05. Residential Ambient Particulate Air Pollution and Blood Pressure in Peri-Urban India**
Ariadna Curto Tirado, Barcelona Institute for Global Health (ISGlobal), Universitat Pompeu Fabra, CIBER Epidemiología y Salud Pública, Spain

12:15 pm - 12:30 pm **O03.02.06. Personal Ozone Exposure, Blood Pressure and Vascular Endothelial Function: A Panel Study Based on Cytokines, DNA Methylation and Metabolomics**
Renjie Chen, Fudan University, China

11:00 am - 12:30 pm O03.02B. Air Pollution, Fetal Growth, and Birth Outcomes
Chair: Narges Khanjani, Kerman University of Medical Sciences, Iran (the Islamic Republic of)
Chair: Cecilia Alcala, Tulane University School of Public Health and Tropical Medicine, United States

11:00 am - 11:15 am **O03.02.07. The Effects of Prenatal Exposure to PM2.5 on Fetal Growth: Evidence from a Birth Cohort Study in China**
Tao Liu, Guangdong Provincial Center for Disease Control and Prevention, China

11:15 am - 11:30 am **O03.02.08. Spatiotemporal Variations of Maternal Exposures to Air Pollution and Risks of Adverse Birth Outcomes in Lanzhou, China**
Lan Jin, Yale University, United States

11:30 am - 11:45 am **O03.02.09. The Effect of Maternal PM2.5 Exposure on the Risk Pre-Term Births: Results from Project ELEFANT**
Liqiong Guo, Tianjin Medical University, China

11:45 am - 12:00 pm **O03.02.10. Exposure-Lag-Response Association between Prenatal Ambient Air Pollution Exposure and Preterm Birth in Guangzhou, China**
Qiong Wang, School of Public Health, Sun Yat-sen University, China

12:00 pm - 12:15 pm **O03.02.11. Exposure to PM2.5 and Risk of Pre-Term Birth: Applying Distributed Lag Non-Linear Models to Disentangle Complex Exposure-Lag-Response**
Andreas Neophytou, University of California, Berkeley, United States

12:15 pm - 12:30 pm **O03.02.12. Characterization of Maternal Mechanisms Relevant to Metal Exposure-Mediated Infant Birth Weight Outcomes in the MIREC Study**
Premkumari Kumarathasan, Health Canada/University of Ottawa, Canada

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11:00 am - 12:30 pm O03.02C. Assessing MicroEnvironmental Air Pollution Exposures and Health
Chair: Yoshira Van Horne, University of Arizona, United States
Chair: Kalpana Balakrishnan, Sri Ramachandra Medical College & Research Institute, India

11:00 am - 11:15 am **O03.02.13. Benefits of Personal Modeling for Air Pollution Exposure Assessment**
David Donaire-Gonzalez, Institute for Risk Assessment Sciences, The Netherlands

11:15 am - 11:30 am **O03.02.14. Field Experience with a Commercial Biometric Shirt for Measuring Minute Ventilation and Potential Inhaled Dose of Air Pollutants**
Steven Chillrud, Columbia University, United States

11:30 am - 11:45 am **O03.02.15. Assessment of Microenvironmental Exposures to Ultrafine Particles among Adolescent Schoolchildren**
Christopher Wolfe, Cincinnati Children's Hospital Medical Center, United States

11:45 am - 12:00 pm **O03.02.16. The Influence of Residential and Workday Population Mobility on Exposure to Air Pollution in the UK**
Stefan Reis, Centre for Ecology & Hydrology, United Kingdom

12:00 pm - 12:15 pm **O03.02.17. Mitigation of Commuter's Air Pollution Exposure Via Personal Choices: Exploring Exposure Metrics**
Nicholas Good, Colorado State University, United States

12:15 pm - 12:30 pm **O03.02.18. Personal Exposures to Ambient Particulate Matter (PM) Versus Ambient PM Concentrations as a Metric for the Relationship of Daily Cardiovascular Mortality with Daily Air Pollution (Phoenix, AZ, 1957-1958)**
William Wilson, Retired from U.S. Environmental Protection Agency (EPA), United States

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11:00 am - 12:30 pm O03.02D. Geographic Location and Cancer
Chair: Francine Laden, Harvard T.H. Chan School of Public Health, United States
Chair: Kate Hoffman, Duke University, United States

11:00 am - 11:15 am **O03.02.19. Arsenic and Bladder Cancer: Very High Mortality Continues >50 Years after First High Exposure**
Taehyun Roh, University of California Berkeley, United States

11:15 am - 11:30 am **O03.02.20. Residential Proximity to Agricultural Herbicides during Pregnancy and Childhood Leukemia in the Danish National Birth Cohort**
Deven Patel, National Cancer Institute, United States

11:30 am - 11:45 am **O03.02.21. Brain Cancer Cluster Investigation Around a Factory Emitting Dichloromethane**
Konstantinos Makris, Cyprus University of Technology, Cyprus

11:45 am - 12:00 pm **O03.02.22. Geographic Location and Its Contribution to Disparities in Ovarian Cancer Survival**
Carolina Villanueva, University of California, Irvine, United States

12:00 pm - 12:15 pm **O03.02.23. Spatiotemporal Patterns of Solar and UV Irradiances in the Contiguous United States**
Ying Zhou, U.S. Centers for Disease Control and Prevention (CDC), United States

12:15 pm - 12:30 pm **O03.02.24. Towards Continuous Domain Models in Spatial Epidemiology**
Garyfallos Konstantinoudis, Institute of Social and Preventive Medicine, Switzerland

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11:00 am - 12:30 pm O03.02E. Health Effects Related to PCBs Exposure
Chair: Marc-André Verner, Université de Montréal, Canada
Chair: Zoe Petropoulos, Boston University School of Public Health, United States

11:00 am - 11:15 am **O03.02.25. Prenatal Exposure to Polychlorinated Biphenyls and Mercury Are Associated with Insulin-Like Growth Factor 1 and Thyroid-Stimulating Hormone in Cord Plasma**
Miyuki Iwai-Shimada, National Institute for Environmental Studies, Japan

11:15 am - 11:30 am **O03.02.26. Intrauterine Exposure to Polychlorinated Biphenyls (PCBs) and Anogenital Distance in Israeli Newborns**
Eva Siegel, Mailman School of Public Health Columbia University, United States

11:30 am - 11:45 am **O03.02.27. Associations of in Utero Polybrominated Diphenyl Ethers (PBDEs) and Polychlorinated Biphenyls (PCBs) with the Mid-Childhood Gut Microbiome**
Hannah Laue, Harvard T.H. Chan School of Public Health, United States

11:45 am - 12:00 pm **O03.02.28. Polychlorinated Biphenyls, Thyroid Hormones, and Neuropsychological Functioning over a 14-Year Period, among Healthy, Older Adults from New York State**
Eva M Tanner, University at Albany, State University of New York, United States

12:00 pm - 12:15 pm **O03.02.29. Environmental Exposures to PCDDs, PCDFs, and PCBs and Mechanism of Steatohepatitis in the Anniston Community Health Survey II**
Matt Cave, University of Louisville, United States

12:15 pm - 12:30 pm **O03.02.30. Organochlorine Pesticides and Polychlorinated Biphenyls (PCBs) in Early Adulthood and Blood Lipids over a 23-Year Follow-Up**
Jose Suarez-Lopez, University of California, San Diego, United States

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11:00 am - 12:30 pm O03.02F. New Advancements in Consumer Exposure Risk Assessment
Chair: Elizabeth Marder, California Environmental Protection Agency (CalEPA), United States
Chair: Satoshi Nakai, Yokohama National University, Japan

11:00 am - 11:15 am **O03.02.31. High-Throughput Exposure Modeling for 8000 Tox21 Chemicals in the Environment and in Consumer Products Based on a Modified USEtox Model**
Olivier Jolliet, University of Michigan, United States

11:15 am - 11:30 am **O03.02.32. Health Risk Assessment of Inhalation Exposure to Long-Chain Aliphatic Hydrocarbons and Aldehydes, TMB, MCH, and MIBK in Indoor Environments**
Kenichi Azuma, Kindai University Faculty of Medicine, Japan

11:30 am - 11:45 am **O03.02.33. Prediction of Composition and Emission Characteristics of Articles in Support of Exposure Assessment**
Cody Addington, Oak Ridge Institute for Science and Education, United States

11:45 am - 12:00 pm **O03.02.34. Determination of Chemical Constituents of Recycled Consumer Products**
Charles Lowe, Oak Ridge Institute for Science and Education, United States

12:00 pm - 12:15 pm **O03.02.35. A Review of Global Legal Regulations on the Permissible Levels of Heavy Metals in Cosmetics with Special Emphasis on Skin Lightening Products**
Bian Liu, Icahn School of Medicine at Mount Sinai, United States

12:15 pm - 12:30 pm **O03.02.36. Estimation of Exposure to Preservatives from Modelling Clays and Slimes Use in Korea**
Ji Young Park, Seoul National University, Korea (the Republic of)

11:00 am - 12:30 pm O03.02G. The Influence of Chemical Exposures on Vulnerable Populations
Chair: Cheryl Khoury, Health Canada, Canada
Chair: Melissa Haswell, Queensland University of Technology, Australia

11:00 am - 11:15 am **O03.02.37. Iron Status and Its Associations with Blood and Plasma Divalent Metals among Children Aged 3 to 19 Years Old from Four First Nation Communities in Quebec**
Emad Tahir, Axe Santé des Populations et Pratiques Optimales en Santé, Centre de Recherche du CHU de Québec- Université Laval, Canada

11:15 am - 11:30 am **O03.02.38. Determinants of Selenoneine Concentration in Red Blood Cells of Inuit from Nunavik (Northern Québec, Canada) and Implications for Selenium Risk Assessment**
Matthew Little, Université Laval, Canada

11:30 am - 11:45 am **O03.02.39. Diffusion Imaging of the Corpus Callous in Inuit Adolescents Chronically Exposed to Methylmercury**
Vincent Migneron-Foisy, Université du Québec à Montréal, Canada

11:45 am - 12:00 pm **O03.02.40. Risk Factors for Developing Anxiety in Inuit Adolescents from Nunavik**
Vickie Lamoureux, Université de Montréal, Canada

12:00 pm - 12:15 pm **O03.02.41. Jeunes, Environnement et Santé; / Youth, Environment and Health (JES!-YEH!) Pilot Project in Four First Nation Communities in Quebec: Exposure to Perfluorononanoic Acid (PFNA) and Associations with Thyroid Hormones**
Élyse Caron-Beaudoin, Université de Montréal School of Public Health, Canada

12:15 pm - 12:30 pm **O03.02.42. Getting It Right for Aboriginal People Gets It Right for Everybody: Reflections from Australia**
Melissa Haswell, Queensland University of Technology, Australia

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11:00 am - 12:30 pm O03.02H. Water Contaminants and Their Effects
Chair: Manolis Kogevinas, ISGlobal, Spain
Chair: Marissa Perry, Climate Change Research Centre, Australia

11:00 am - 11:15 am **O03.02.43. A Simple Probabilistic Modelling Tool to Estimate Children's Blood Lead Levels Resulting from High Variations of Daily Exposure through Drinking Water in Schools and Daycares**
Mathieu Valcke, Institut National de Santé Publique du Québec, Canada

11:15 am - 11:30 am **O03.02.44. Environmental Justice and Drinking Water Quality in U.S. Public Water Supplies**
Laurel Schaider, Silent Spring Institute, United States

11:30 am - 11:45 am **O03.02.45. Estimating Exposure to 1,3-D in Drinking Water Using Groundwater Monitoring Data and PRZM-GW Modeling**
Ian van Wesenbeeck, Corteva Agrisciences, United States

11:30 am - 11:45 am **O03.02.46. Individual and Additive Disinfectant Byproducts in Community Drinking Water Systems and Associations with Colorectal and Bladder Cancer Incidence, Accounting for Population Served**
Alison Krajewski, Oak Ridge Institute for Science and Education (ORISE)/U.S. Environmental Protection Agency (EPA), United States

12:00 pm - 12:15 pm **O03.02.47. Bladder Cancer Burden from Exposure to Trihalomethanes in Drinking Water in the European Union**
David Rojas-Rueda, Barcelona Institute for Global Health (ISGlobal), Spain

12:15 pm - 12:30 pm **O03.02.48. Disinfection By-Products in Public Drinking Water Systems in Newfoundland and Labrador (Canada): A Population-Based Study for Assessment of the Environmental Health Risks**
Atanu Sarkar, Memorial University, Canada

11:00 am - 12:30 pm S03.02A. A Data and Research Platform for Healthy Cities: The Canadian Urban Environmental (CANUE) Health Research Consortium
Chair: Michael Brauer, University of British Columbia, Canada

11:00 am - 11:15 am **S03.02.01. The Canadian Urban Environmental Health Research Consortium (CANUE) - Enabling Collaborative Multi-Factor Environmental Health Research**
Jeffrey Brook, University of Toronto, Canada

11:15 am - 11:30 am **S03.02.02. Developing an Environmental Exposure Data Platform for Urban Health Research**
Evan Seed, University of Toronto, Canada

11:30 am - 11:45 am **S03.02.03. Emerging Methods for Developing and Working with Urban Environmental Exposure Data**
Mahdi Shooshtari, CANUE, Canada

11:45 am - 12:00 pm **S03.02.04. Spatial and Temporal Changes in Urban Environmental Exposures: Practical Examples**
Dany Doiron, Research Institute of the McGill University Health Centre, Canada

12:00 pm - 12:15 pm **S03.02.05. Emerging Evidence on Multi-Factor Associations between Urban Exposures and Health Outcomes: Practical Examples**
Dan Crouse, University of New Brunswick, Canada

12:15 pm - 12:30 pm **S03.02.06. Panel Discussion**

11:00 am - 12:30 pm **S03.02B. Empowering Vital Environmental Health and Exposure Research to Address Disasters and Emerging Threats**

Chair: Aubrey Miller, National Institute of Environmental Health Sciences, United States
Chair: Shoji Nakayama, National Institute for Environmental Studies, Japan

11:00 am - 11:15 am **S03.02.07. Importance of Exposure and Health Disaster Research**
Linda Birnbaum, National Institute of Environmental Health Sciences (NIEHS), United States

11:15 am - 11:30 am **S03.02.08. Applied Epidemiology and Exposure Challenges in Response to the Gulf Oil Spill**
Richard Kwok, National Institute of Environmental Health Sciences (NIEHS), United States

11:30 am - 11:45 am **S03.02.09. Development of the NIH Disaster Research Response (DR2) Program and Ongoing Efforts in the U.S.A.**
Aubrey Miller, National Institute of Environmental Health Sciences, United States

11:45 am - 12:00 pm **S03.02.10. Disaster Response Research Development in Japan**
Shoji Nakayama, National Institute for Environmental Studies, Japan

12:00 pm - 12:15 pm **S03.02.11. Disaster Research Response Development in Canada**
Tom Kosatsky, BC Centre for Disease Control, Canada

12:15 pm - 12:30 pm **S03.02.12. Panel Discussion**

11:00 am - 12:30 pm **S03.02C. Environmental Justice and Women's Health**

Chair: Ami Zota, George Washington University, United States
Chair: Tamarra James-Todd, Harvard T.H. Chan School of Public Health, United States

11:00 am - 11:15 am **S03.02.13. Digital Daily Logs: A Novel Method for Collecting Acute Health Symptoms in an Environmental Justice Neighborhood Adjacent to Active Oil Drilling**
Bhavna Shamasunder, Occidental College, United States

11:15 am - 11:30 am **S03.02.14. The COSECHA Study: Youth Peer-To-Peer Research on Pesticide Exposure in a Farmworker Community**
Kim Harley, University of California Berkeley, United States

11:30 am - 11:45 am **S03.02.15. Community- and Discovery-Driven Exposure Science in the Women Firefighter Biomonitoring Collaborative**
Rachel Morello-Frosch, University of California, Berkeley, United States

11:45 am - 12:00 pm **S03.02.16. Air Pollution and Gynecologic Disease Outcomes: Infertility, Menstrual Irregularity, Uterine Fibroids, and Endometriosis**
Jaime Hart, Harvard T.H. Chan School of Public Health, United States

12:00 pm - 12:15 pm **S03.02.17. Environmental Phthalates Exposure and Measures of Uterine Fibroid Size among a Racially Diverse Population of Premenopausal Women**
Ami Zota, George Washington University, United States

12:15 pm - 12:30 pm **S03.02.18. Urinary Paraben Concentrations and Pregnancy Glucose Levels among Women from a Fertility Clinic**
Tamarra James-Todd, Harvard T.H. Chan School of Public Health, United States

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11:00 am - 12:30 pm **S03.02D. Omics in Environmental Epidemiology for Understanding Current Environmental Health Issues**

Chair: Todd Everson, Emory University, United States
Chair: Carmen Marsit, Emory University, United States

11:00 am - 11:15 am **S03.02.19. Using Molecular -Omics in Environmental Epidemiology to Gain Unique Insights into Environmental Health**
Todd Everson, Emory University, United States

11:15 am - 11:30 am **S03.02.20. Assessing the Influence of in Utero Co-Pollutant Exposures on Transcriptomic Networks and Birth Outcomes**
Maya Deyssenroth, Icahn School of Medicine at Mount Sinai, United States

11:30 am - 11:45 am **S03.02.21. The Epigenome and In-Utero Environmental Exposures**
Mariona Bustamante, Barcelona Institute for Global Health (ISGlobal), Spain

11:45 am - 12:00 pm **S03.02.22. The Exposome and the Developmental Origins of Lifelong Health: Pre-, Peri- and Postnatal Microbiome & Metabolome Development**
Juliette Madan, Geisel School of Medicine at Dartmouth, United States

12:00 pm - 12:15 pm **S03.02.23. Metabolomics, Complex Exposures, and Multi-Omics Integration**
Shuzhao Li, Emory University, United States

12:15 pm - 12:30 pm **S03.02.24. Panel Discussion**

11:00 am - 12:30 pm **S03.02E. Why Is My Sensor Not Working? Making Sense of Sensor Technologies for Environmental Exposure and Health Studies**
Chair: Benjamin Barratt, King's College London, United Kingdom
Chair: Mei Zheng, Peking University, China
Chair: Ellison Carter, Colorado State University, United States

11:00 am - 11:13 am **S03.02.25. Moving Towards an Adaptable Laboratory and Field Testing Protocol for Evaluating Sensor Performance**
Benjamin Barratt, King's College London, United Kingdom

11:13 am - 11:26 am **S03.02.26. Are Low-Cost Sensors Ready for Prime Time? The Case of Mobile Monitoring**
Joshua Apte, University of Texas at Austin, United States

11:26 am - 11:39 am **S03.02.27. Ensuring Trustworthy Data for Communities Engaged in Environmental Sensing**
John Volckens, Colorado State University, United States

11:39 am - 11:52 am **S03.02.28. Strategies for Sensor Deployment to Reduce Bias in Environmental Exposure and Health Studies**
Jill Baumgartner, McGill University, Canada

11:52 am - 12:05 pm **S03.02.29. Sensor Selection and Scaling Up Mobile Monitoring for High-Resolution Mapping of Community Air Quality: Design Considerations in the MOV-UP Airport Ultrafine Particle Study**
Edmund Seto, University of Washington, United States

12:05 pm - 12:18 pm **S03.02.30. A One-Dollar Passive Sensor for Black Carbon Monitoring: Capturing the Blackening**
Julian Marshall, University of Washington, United States

12:18 pm - 12:30 pm **S03.02.31. The Application of Sensors in Air Quality and Health Studies in China**
Mei Zheng, Peking University, China

12:30 pm - 1:45 pm **ISEE European Chapter Members Meeting**
12:30 pm - 1:45 pm **Joint SNRN and Ethics and Philosophy Committee Session. The PhD Student - Supervisor Relationship: Discussion on How Ethical Guidelines Can Be Developed**
12:30 pm - 1:45 pm **JESEE Editorial Board Meeting**
12:30 pm - 1:45 pm **North America Interim Chapter Meeting**
12:30 pm - 1:45 pm **ISEE Africa Chapter Meeting**
12:30 pm - 1:45 pm **ISES Committee Chairs Lunch**
12:30 pm - 1:45 pm **Editorial Board Meeting International Journal of Hygiene and Environmental Health**

12:30 pm - 2:15 pm **Lunch & Poster Viewing**

2:15 pm - 3:45 pm **O03.03A. Advances in Ambient Air Pollution Modeling - Part 2**
Chair: Susannah Ripley, McGill University, Canada
Chair: Allison Patton, Health Effects Institute, United States

2:15 pm - 2:30 pm **O03.03.01. Land-Use Regression Models of Particulate Matter in Temuco, Chile Due to Residential Wood Burning**
Carola Blazquez, Universidad Andres Bello, Chile

2:30 pm - 2:45 pm **O03.03.02. Applying a Kinetic Multi-Layer Model of Surface and Bulk Chemistry in Epithelial Lung Lining Fluid to Estimate Spatial Variations in the Production of Reactive Oxygen Species in Response to PM2.5 Iron and Copper**
Scott Weichenthal, McGill University, Canada

2:45 pm - 3:00 pm **O03.03.03. Using Measurements of Nitrogen Oxides from a Fixed Sited and a Mobile Platform to Develop Spatially- and Temporally-Resolved Land Use Regression Models**
Laura Corlin, Tufts University, United States

3:00 pm - 3:15 pm **O03.03.04. Enhanced Geospatial Modelling of Traffic Related Air Pollution by Deconvoluting on Different Spatial Scales**
Greg Evans, University of Toronto, Canada

3:15 pm - 3:30 pm **O03.03.05. Incorporating Snow and Cloud Fractions in Random Forest to Estimate High Resolution PM2.5 Exposures in New York State**
Jianzhao Bi, Emory University, United States

3:30 pm - 3:45 pm **O03.03.06. Artificial Neural Networks to Mix Datasets from Particulate Matters and O3 in Medellín, Colombia**
Juan Piñeros Jiménez, Universidad de Antioquia, Colombia

2:15 pm - 3:45 pm **O03.03B. Advancing Exposure Methodology through Suspect Screening and Non-target Analysis**

Chair: Colin Soskolne, Universities of Alberta and Canberra, Canada
Chair: Hua Qian, ExxonMobil Biomedical Sciences, Inc., United States

2:15 pm - 2:30 pm **O03.03.07. Suspect Screening Analysis to Identify Chemical Targets in Serum for Exposure Reconstruction**
Barbara Wetmore, U.S. Environmental Protection Agency (EPA), United States

2:30 pm - 2:45 pm **O03.03.08. Environmental Exposure Induced Metabolic Profiling Alterations in a Migration Panel between Los Angeles and Beijing**
Xinghua Qiu, Peking University, China

2:45 pm - 3:00 pm **O03.03.09. New Insights of Human Exposure to Consumer Product Chemicals from Comprehensive Chemical Profiles of Indoor Dust**
Hyeong-Moo Shin, University of Texas, Arlington, United States

3:00 pm - 3:15 pm **O03.03.10. Towards the Development of a Framework for Applying Non-Target Chemical Analysis Data within Exposure and Risk Assessment**
Todd Gouin, TG Environmental Research, United States

3:15 pm - 3:30 pm **O03.03.11. The Pregnancy Chemisome in Relation to Birth Outcomes and Consumer Product Use: Suspect Screening of Industrial Chemicals**
Aolin Wang, University of California, San Francisco, United States

3:30 pm - 3:45 pm **O03.03.12. Ethical Dimensions of Advancing Exposure Methodology through Suspect Screening and Non-Target Analysis**
Colin Soskolne, Universities of Alberta and Canberra, Canada

2:15 pm - 3:45 pm **O03.03C. Air Pollution, Obesity, and Metabolic Disease**

Chair: Rachel Golan, Ben-Gurion University of the Negev, Israel
Chair: Zorana Andersen, University of Copenhagen, Denmark

2:15 pm - 2:30 pm **O03.03.13. Particulate Air Pollution Exposure during Pregnancy and Mitochondrial-Associated Plasma Metabolites in Mothers at 48 Months Postpartum: A Pilot Study**
Megan Niedzwiecki, Icahn School of Medicine at Mount Sinai, United States

2:30 pm - 2:45 pm **O03.03.14. A Pathway to Diabetes? Associations between Air Pollution Exposure and Biomarkers of Inflammation and Metabolism in Nondiabetic Persons.**
Sarah Lucht, Heinrich-Heine University Düsseldorf, Germany

2:45 pm - 3:00 pm **O03.03.15. Ozone Exposure, Glucose Homeostasis and Insulin Resistance in the U.S.A.**
Xiaohui Xu, Texas A&M University, United States

3:00 pm - 3:15 pm **O03.03.16. Exposure to PM2.5 in Mexico City's Metropolitan Area and Its Association with Obesity**
Marcela Tamayo y Ortiz, Instituto Nacional de Salud Pública (INSP), Mexico

3:15 pm - 3:30 pm **O03.03.17. The Impact of Indoor Fine Particles on Body Mass Index, Waist Circumference, and Triglyceride of Korean Housewives Cohort Study: Preliminary Results**
Shinhee Ye, Ewha Womans University, Korea (the Republic of)

3:30 pm - 3:45 pm **O03.03.18. Methylation Marks to Inform Association between Early-Life Air Pollution Exposures and Child Body Mass Index: An Analysis Based on A Priori Selected Pathways**
Solène Cadiou, IAB, Institute for Advanced Biosciences, INSERM-CNRS-University Grenoble-Alpes, France

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2:15 pm - 3:45 pm **O03.03D. Cancer Epidemiology**

Chair: Michelle Turner, Barcelona Institute for Global Health (ISGlobal), Spain
Chair: Vikki Ho, University of Montreal, Canada

2:15 pm - 2:30 pm **O03.03.19. Non-Hodgkin Lymphoma Associated with Organophosphate and Carbamate Insecticides in the North American Pooled Project**
Laura Beane Freeman, National Cancer Institute, United States

2:30 pm - 2:45 pm **O03.03.20. Heterogeneity of the Arsenic-Bladder Cancer Relationship by Tumor p16/Rb Immunophenotype**
Stella Koutros, National Cancer Institute, United States

2:45 pm - 3:00 pm **O03.03.21. Untargeted Metabolomics of Archived Dried Blood Spots Reveals Lipid Modulation at Birth Associated with Pediatric Acute Lymphoblastic Leukemia**
Lauren Petrick, Icahn School of Medicine at Mt. Sinai, United States

3:00 pm - 3:15 pm **O03.03.22. Hematologic Perturbations among Pesticide Applicators Recently Exposed to Permethrin in the Agricultural Health Study**
Joe Shearer, National Cancer Institute, United States

3:15 pm - 3:30 pm **O03.03.23. Sun Avoidance and the Risk of Developing Breast Cancer: A Systematic Review and Meta-Analysis**
Troy Hillier, Queen's University, Canada

3:30 pm - 3:45 pm **O03.03.24. Different Coffee Products and Breast Cancer Risk among Hong Kong Chinese Women**
Ming Yi Lee, The Chinese University of Hong Kong, Hong Kong

2:15 pm - 3:45 pm **O03.03E. Chemical Exposures in Vulnerable Populations**
Chair: Élyse Caron-Beaudoin, Université de Montréal, Canada
Chair: Maryse Bouchard, Université de Montréal, Canada

2:15 pm - 2:30 pm **O03.03.25. Influence of Genetic Variance on Occupational Exposure to 1,6-Hexamethylene Diisocyanate (HDI) and Its Trimer HDI Isocyanurate**
Laura Taylor, University of North Carolina at Chapel Hill, United States

2:30 pm - 2:45 pm **O03.03.26. Association of Heavy Metals with Measures of Pulmonary Function in Youth: Findings from the 2011-2012 National Health and Nutrition Examination Survey (NHANES)**
Jessica Madrigal, University of Illinois at Chicago, United States

2:45 pm - 3:00 pm **O03.03.27. A Bayesian Benchmark Dose Analysis for Manganese in Drinking Water and IQ in Children Based on Pooled Data from Two Studies in Canada**
Maryse Bouchard, Université de Montréal, Canada

3:00 pm - 3:15 pm **O03.03.28. Effects of an Educational Intervention on Organophosphate Pesticides in the Risk Perception and Chlorpyrifos, Diazinon and Parathion Metabolites Levels in Chilean Rural Schoolchildren**
María Teresa Muñoz-Quezada, Universidad Católica del Maule, Chile

3:15 pm - 3:30 pm **O03.03.29. The Nasal Methylome as Biomarker of PM2.5 Exposure in Children**
Andres Cardenas, Harvard Medical School, United States

3:30 pm - 3:45 pm **O03.03.30. Infants' Exposure to Organophosphate Esters (OPES)**
Kate Hoffman, Duke University, United States

2:15 pm - 3:45 pm **O03.03F. Exposures and Health Impacts: Smoking and E-Cigarettes**
Chair: Benjamin Blount, Centers for Disease Control and Prevention, United States
Chair: Peter KaHung Chan, University of Oxford, United Kingdom

2:15 pm - 2:30 pm **O03.03.31. Nicotine and Flavor Emissions from Electronic Cigarettes**
Jonathan Thornburg, RTI International, United States

2:30 pm - 2:45 pm **O03.03.32. Metal Exposure from E-Cigarette Users in Maryland**
Angela Aherrera, Johns Hopkins Bloomberg School of Public Health, United States

2:45 pm - 3:00 pm **O03.03.33. Temporal Stability of Urinary Cadmium in Samples Collected Several Years Apart in a Population of Older Persons**
Jaymie Meliker, Stony Brook University, United States

3:00 pm - 3:15 pm **O03.03.34. Cadmium Exposure, Active Smoking and DNA Methylation Profiles in Human Blood DNA Samples from the Strong Heart Study**
Arce Domingo Relloso, Columbia University Mailman School of Public Health, United States

3:15 pm - 3:30 pm **O03.03.35. Pattern of Prenatal Secondhand Smoke Exposure among Rural Women in Main Tobacco Production Region, China**
Xia Xiao, Kunming Medical University, China

3:30 pm - 3:45 pm **O03.03.36. Polycyclic Aromatic Compounds Identified in Thirdhand Smoke Contaminated House Dust**
Penelope Quintana, San Diego State University, United States

2:15 pm - 3:45 pm **O03.03G. Greenness Effects - Part 2**
Chair: Patrick Kinney, Boston University, United States
Chair: Peng Bi, University of Adelaide, Australia

2:15 pm - 2:30 pm **O03.03.37. Measurement Error in Epidemiological Studies of Allergenic Pollen Due to Heterogeneity in Flowering Phenology**
Daniel Katz, University of Michigan, United States

2:30 pm - 2:45 pm **O03.03.38. Human Reponses to Biophilic Indoor Environment**
Jie Yin, Harvard University, United States

2:45 pm - 3:00 pm **O03.03.39. Built Environment, Microbiota and Asthma at Age 3: Longitudinal Follow-Up in a Canadian Birth Cohort**
Hind Sbihi, University of British Columbia, Canada

3:00 pm - 3:15 pm **O03.03.40. Spatial and Temporal Associations between Allergic Rhinitis, Asthma and the Environment in Toronto, Canada**
Jordan Brubacher, Simon Fraser University, Canada

3:15 pm - 3:30 pm **O03.03.41. Greenness and Adverse Pregnancy Outcomes in Tel-Aviv during 2000-2014**
Keren Agayshay, Bar Ilan University, Israel

3:30 pm - 3:45 pm **O03.03.42. Association between Green Space and Pregnancy Outcomes: A Case-Study in Temuco, Chile. Preliminary Results**
Maria Quinteros Caceres, Universidad de Chile, Chile

2:15 pm - 3:45 pm **O03.03H. Health Outcomes and Biomarkers Associated with Household Cooking and Biomass Burning - Part 1**
Chair: Donghai Liang, Emory University, United States
Chair: Molly Kile, Oregon State University, United States

2:15 pm - 2:30 pm **O03.03.43. Biomonitoring Exposure to Household Air Pollution in Children: Results from a Cook Stove Intervention Study in Kenya**
Zheng Li, U.S. Agency for Toxic Substances and Disease Registry, United States

2:30 pm - 2:45 pm **O03.03.44. Effect of Biomass Fuel Exposure on Pregnancy Outcomes in Rural Bangladesh**
Khandaker Islam, Preventive Medicine, University of Southern California, United States

2:45 pm - 3:00 pm **O03.03.45. Acute Respiratory Symptoms and Risk Factors in Pregnant Women Cooking with Biomass Fuels in Rural Ghana**
Eleanne van Vliet, University of Southern California, United States

3:00 pm - 3:15 pm **O03.03.46. Examining the Relationship between Household Air Pollution and Infant Nasal Carriage**
Daniel Carrion, Columbia University, United States

3:15 pm - 3:30 pm **O03.03.47. Exposure Profiles of Cooking Behaviors, Socioeconomic Status, and Housing Characteristics Are Strongly Associated with Childhood Asthma in Kampala, Uganda**
Eric Coker, University of California, Berkeley, Uganda

3:30 pm - 3:45 pm **O03.03.48. Inflammatory Effects of Short-Term Exposure to Smoke Emissions from Biomass Fuels**
Binaya Kc, University of Nottingham, United Kingdom

2:15 pm - 3:45 pm **S03.03A. Filling in the Gaps: Maximizing Data Linkages to Enhance Environmental Health Studies**
Chair: Rena Jones, National Cancer Institute, United States
Chair: Manolis Kogevinas, ISGlobal, Spain

2:15 pm - 2:30 pm **S03.03.01. Enhancing a Historical U.S. Industrial Emissions Database for Exposure Modeling**
Rena Jones, National Cancer Institute, United States

2:30 pm - 2:45 pm **S03.03.02. Modeling Nitrate Concentrations in Private Wells Using Machine Learning Methods**
Mary Ward, National Cancer Institute, United States

2:45 pm - 3:00 pm **S03.03.03. Investigating Multiple Chemical and Contextual Exposures in the Nurses' Health Studies**
Francine Laden, Harvard T.H. Chan School of Public Health, United States

3:00 pm - 3:15 pm **S03.03.04. Investigating the Role of Environmental Exposures in Prospective Cohorts: The German National Cohort**
Alexandra Schneider, Helmholtz Zentrum München, Germany

3:15 pm - 3:30 pm **S03.03.05. Residential History Construction and Application to Etiologic Studies of Environmental Hazards: Lessons Learned**
Peggy Reynolds, Cancer Prevention Institute of California, United States

3:30 pm - 3:45 pm **S03.03.06. Panel Discussion**

2:15 pm - 3:45 pm **S03.03B. Global Environmental and Occupational Health Hubs: Building Sustainable Research Capacity and Collaboration in Low- and Middle-Income Countries to Address Priority Health Threats**

Chair: Christine Jessup, National Institutes of Health, FIC, DITR, United States
Chair: Andrés Sanchez, International Development Research Centre, Canada
Chair: Gwen Collman, National Institute of Environmental Health (NIEHS), United States

2:15 pm - 2:28 pm **S03.03.07. Neurotoxicant Exposures in Mother/Child Dyads in Suriname: The Caribbean Consortium for Research in Environmental and Occupational Health (CCREOH)**
Firoz Abdoel Wahid, Tulane University School of Public Health and Tropical Medicine, United States

2:28 pm - 2:41 pm **S03.03.08. The Geohealth Program in Peru, with Some Preliminary Results from a Project on Clean Cookstoves**
Magdalena Fandiño Del Rio, Johns Hopkins Bloomberg School of Public Health, United States

2:41 pm - 2:54 pm **S03.03.09. The Michigan-West Africa Geohealth Hub: Environmental Exposures Due to Informal E-Waste Recycling Activities and the Health of Workers**
Julius Fobil, University of Ghana School of Public Health, Ghana

2:54 pm - 3:07 pm **S03.03.10. Eastern African Geohealth Hub: Overall Status and Research Findings from Ethiopia and Uganda**
Abera Kumie, School of Public Health, Addis Ababa University, Ethiopia

3:07 pm - 3:20 pm **S03.03.11. Establishing a Hub for Environmental and Occupational Health Research and Capacity Building in India**
Prabhakaran Dorairaj, Centre for Chronic Disease Control, India

3:20 pm - 3:33 pm **S03.03.12. Geohealth Hub: Improving Agricultural Health in Southeast Asia**
Pornpimol Kongtip, Mahidol University, Thailand

3:33 pm - 3:45 pm **S03.03.13. The Bangladesh Geohealth Hub: Household Air Pollution, Climate Change and Garment Industry Work**
Mohammad Yunus, International Centre for Diarrhoeal Disease Research, Bangladesh (ICDDR,B), Bangladesh

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2:15 pm - 3:45 pm **S03.03C. Milestones in Air Pollution Epidemiology: A Symposium in Honour of Dr. Richard T. Burnett**

Chair: Aaron Cohen, Health Effects Institute, United States

2:15 pm - 2:30 pm **S03.03.14. Milestones in Air Pollution Epidemiology: Introduction to a Symposium in Honour of Dr. Richard T. Burnett**
Aaron Cohen, Health Effects Institute, United States

2:30 pm - 2:45 pm **S03.03.15. Assessing Long-Term Health Effects of Air Pollution with Advanced Spatial Models**
Michael Jerrett, University of California, Los Angeles, United States

2:45 pm - 3:00 pm **S03.03.16. Analyses of Air Pollution and Mortality in the American Cancer Society Cancer Prevention Study-II**
Michelle Turner, Barcelona Institute for Global Health (ISGlobal), Spain

3:00 pm - 3:15 pm **S03.03.17. Reflections on the Canadian CanCHEC Cohort: Where We've Been and Where We Are Going**
Paul Villeneuve, Carleton University, Canada

3:15 pm - 3:30 pm **S03.03.18. Air Pollution Risk Functions and Estimates of Burden of Disease**
C. Arden Pope, Brigham Young University, United States

3:30 pm - 3:45 pm **S03.03.19. Panel Discussion**

2:15 pm - 3:45 pm **S03.03D. The Benefit of Sharing Data for Unravelling the Complex Issue of Combined Exposures to Multiple Chemicals and Their Effects to Humans and the Environment and in Support of Policies in EU and Globally: The European Information Platform for Chemical Monitoring (IPCHEM)**

Chair: Stylianos Kephalopoulos, European Commission, Joint Research Centre, Italy

2:15 pm - 2:28 pm **S03.03.20. IPCHEM Serving EU and International Policies on Chemicals, Environment and Health: Policy Background and Objectives**
Stylianos Kephalopoulos, European Commission, Joint Research Centre, Italy

2:28 pm - 2:41 pm **S03.03.21. The IPCHEM Platform: Main Tools and Functionalities, Data Integration Status, On-Going and Planned Activities, Impact and Recognition**
Stylianos Kephalopoulos, European Commission, Joint Research Centre, Italy

2:41 pm - 2:54 pm **S03.03.22. IPCHEM Supporting the Assessment of Chemical Mixtures**
Jacob Klaveren, The Netherlands National Institute for Public Health and the Environment (RIVM), The Netherlands

2:54 pm - 3:07 pm **S03.03.23. Experiences of the German Environment Agency in Sharing Data Via IPCHEM for Further Improving Human Health and Protecting the Environment**
André Conrad, German Environment Agency (UBA), Germany

3:07 pm - 3:20 pm **S03.03.24. IPCHEM as Reference Platform for the HBM4EU Project: Coordinating and Advancing Human Biomonitoring in Europe to Provide Evidence for Chemical Policy Making**
Catherine Ganzleben, European Environment Agency, Denmark

3:20 pm - 3:33 pm **S03.03.26. The U.S. EPA Activities and Information Systems Used for Chemical Exposure Screening, Modelling and Prioritisation and Risk-Based Decision Making: Needs, Challenges and Opportunities for Data Sharing and Interoperability of Tools on Global Scale Including IPCHEM**
Katherine Phillips, U.S. Environmental Protection Agency (EPA), United States

3:33 pm - 3:45 pm **S03.03.27. Synthesizing Exposure Data for Regulatory Decision Making: The Need for a Centralized Data Warehouse**
Sandra Kuchta, Health Canada, Canada

2:15 pm - 3:45 pm **S03.03E. Transforming Air and Water Quality Research into Concrete Actions**
Chair: Phil Blagden, Health Canada, Canada

2:15 pm - 2:30 pm **S03.03.28. The Role of Health-Based Air Quality Guidelines in Transforming Local Policy Actions**
Klea Katssouyanni, National and Kapodistrian University of Athens, Greece

2:30 pm - 2:45 pm **S03.03.29. Shrinking Space, Expanding Time: Challenges in Applying Air Pollution Research Findings at the Local Level**
Ray Copes, Public Health Ontario/University of Toronto, Canada

2:45 pm - 3:00 pm **S03.03.30. Lead in Drinking Water: The Slips Twixt Lip and Cup**
Ronnie Levin, Harvard T.H. Chan School of Public Health, United States

3:00 pm - 3:15 pm **S03.03.31. Environmental Public Health Tracking: From Data to Action**
Fuyuen Yip, U.S. Centers for Disease Control and Prevention, United States

3:15 pm - 3:30 pm **S03.03.32. U.S. EPA Solutions for Energy, Air, Climate, Health (SEARCH) Center: Lessons Learned**
Michelle Bell, Yale University, United States

3:30 pm - 3:45 pm **S03.03.33. Panel Discussion**

3:45 pm - 4:15 pm **Poster Viewing & Break**

4:15 pm - 5:30 pm **O03.04A. Characterizing Long Term Trends in Air Pollution Using Stationary and Low Cost Monitoring**
Chair: Naomi Zimmerman, University of British Columbia, United States
Chair: Seung-Hyun Cho, RTI International, United States

4:15 pm - 4:30 pm **O03.04.01. Assessment of Temporal and Spatial Trends of Air Pollutants Using Low-Cost Air Quality Sensors in Peñuelas, Puerto Rico**
Stephen Reece, ORISE Participant Hosted by U.S. Environmental Protection Agency (EPA), United States

4:30 pm - 4:45 pm **S03.04.02. REACH Chemical Policy at 10 Years: A European Perspective on Lessons Learned**
Tobias Schripp, Institute of Combustion Technology (DLR), Germany

4:45 pm - 5:00 pm **O03.04.03. Source and Potential Health Risk of Trace Metals in the Urban Atmosphere**
Chien-Cheng Jung, Academia Sinica, Taiwan

5:00 pm - 5:15 pm **O03.04.04. Ozone Chemistry over the Syrian Arab Republic: Impact of the War**
Lyazzat Kulmukanova, Nazarbayev University, Kazakhstan

5:15 pm - 5:30 pm **O03.04.05. Spatial Distribution of Particulate Matter in Winter Nights in Temuco, Chile: A Study of Residential Wood-Burning Impacts Using Mobile Sampling**
Pablo Ruiz-Rudolph, University of Chile, Chile

4:15 pm - 5:30 pm **O03.04B. Health Outcomes Associated with Perinatal Exposure to Air Pollution**
Chair: Carmen Messerlian, Harvard T.H. Chan School of Public Health, United States
Chair: Hind Sbihi, University of British Columbia, Canada

4:15 pm - 4:30 pm **O03.04.06. Prenatal Exposure to PM2.5 and Infant Autonomic Nervous System Reactivity: Effect Modification by Sex and Maternal Total Antioxidant Intake during Pregnancy**
Whitney Cowell, Icahn School of Medicine at Mount Sinai, United States

4:30 pm - 4:45 pm **O03.04.07. Prenatal Air Pollution and Childhood Allergic Diseases: The Potential Modifying Effect of Adherence to Mediterranean Diet**
Leda Chatzi, University of Southern California, United States

4:45 pm - 5:00 pm **O03.04.08. The Associations between Exposure to Fine Particulate Matters during Pregnancy and Early Postnatal Period and Asthma Onset in a Metropolitan Area in Taiwan**
Chau-Ren Jung, China Medical University, Taiwan

5:00 pm - 5:15 pm **O03.04.09. CC16 Levels into Adult Life Are Associated with Nitrogen Dioxide Exposure at Birth**
Paloma Beamer, University of Arizona, United States

5:15 pm - 5:30 pm **O03.04.10. PM10 Exposure and Bronchiolitis from Respiratory Syncytial Virus among Infants**
Dario Consonni, Fondazione IRCCS Ca' Granda Ospedale Maggiore Policlinico, Italy

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4:15 pm - 5:30 pm **O03.04C. Multiple Exposures and Development**
Chair: Martha Téllez-Rojo, National Institute of Public Health, Mexico
Chair: Megan Horton, Icahn School of Medicine at Mount Sinai, United States

4:15 pm - 4:30 pm **O03.04.11. Understanding the Time-Varying Association between Prenatal Metal Exposure Mixtures and Neurodevelopment**
Yuri Levin-Schwartz, Icahn School of Medicine at Mount Sinai, United States

4:30 pm - 4:45 pm **O03.04.12. Prenatal Exposure to Metals Mixtures and Neurobehavioral Outcomes at Age 7 from the Project Viva Birth Cohort**
Victoria Fruh, Boston University, United States

4:45 pm - 5:00 pm **O03.04.13. Assessing the Relation of Chemical and Non-Chemical Stressors with Risk-Taking Behavior among Adolescents Living near the New Bedford Harbor Superfund Site**
Veronica Vieira, University of California, Irvine, United States

5:00 pm - 5:15 pm **O03.04.14. Using Tree-Based Analytic Methods to Investigate Associations of Multiple Exposures with Pubertal Development in Urban Girls**
Jeanette Stingone, Icahn School of Medicine at Mount Sinai, United States

5:15 pm - 5:30 pm **O03.04.15. Multi-Metal Exposure and Children's Cognitive Development in Montevideo, Uruguay**
Julia Ravenscroft, University at Buffalo, United States

4:15 pm - 5:30 pm **O03.04D. Social and Environmental Determinants and Health - Part 1**
Chair: Sokhna Thiam, Institut de Recherche en Santé, de Surveillance Epidémiologique et de Formations (IRESSEF), Senegal
Chair: Adetoun Mustapha, Imperial College London, Nigeria

4:15 pm - 4:30 pm **O03.04.16. Neighborhood Disadvantage and Self-Reported Health**
Timothy Wade, U.S. Environmental Protection Agency (EPA), United States

4:30 pm - 4:45 pm **O03.04.17. Use of Geocoding to Understand Variation in Neighborhood Socioeconomic Status in a Nationwide Occupational Cohort across Time, Space and Demographic Characteristics**
Gabriela Bustamante Callejas, University of Minnesota, United States

4:45 pm - 5:00 pm **O03.04.18. Combined Prenatal Environmental and Social Exposures and Associations with Weight and Adiposity at Birth in the Denver Healthy Start Birth Cohort**
Sheena Martenies, Colorado State University, United States

5:00 pm - 5:15 pm **O03.04.19. Social Determinants of Systemic Inflammation over the Life Course: A Multi-Cohort Study**
Raphaële Castagné, INSERM-Université Toulouse III Paul Sabatier, France

5:15 pm - 5:30 pm **O03.04.20. Modification of Asthma Clinical Trial Results by Environmental and Socioeconomic Exposures**
Jane Clougherty, Drexel University School of Public Health, United States

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4:15 pm - 5:30 pm **O03.04E. Society Presidents' Call for Discussion: Intersection of Epi, Exposure and Decision-Making: Data Quality for Public Health Protection**
Chair: Beate Ritz, University of California, Los Angeles, United States
Chair: Judy LaKind, LaKind Associates LLC, United States
Remy Slama, Inserm, France
Carol Burns, Burns Epidemiology Consulting, United States
Michael Jerrett, University of California, Los Angeles, United States
Angelika Zidek, Health Canada, Canada
Tom Luben, U.S. Environmental Protection Agency (EPA), United States
Mary Mortensen, U.S. Centers for Disease Control and Prevention (CDC), United States
John Balmes, University of California, San Francisco United States

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4:15 pm - 5:30 pm **S03.04A. Chemical Policy in the 21st Century: Comparing Canadian, U.S., European and Asian Approaches**

Chair: Patricia Koman, University of Michigan School of Public Health, United States

4:15 pm - 4:30 pm **S03.04.01. The Perils and Promise of the 2016 Lautenberg Chemical Safety Act: A Critical Appraisal of the U.S. Experience**
Tracey Woodruff, University of California San Francisco, United States

4:30 pm - 4:45 pm **S03.04.02. REACH Chemical Policy at 10 Years: A European Perspective on Lessons Learned**
Vito Buonsante, McMaster University, Canada

4:45 pm - 5:00 pm **S03.04.03. Canadian Chemical Management Plan's Successes and New Directions**
Miriam Diamond, University of Toronto, Canada

5:00 pm - 5:15 pm **S03.04.04. Human Biomonitoring as a Tool to Support Chemicals Regulation**
Catherine Ganzleben, European Environment Agency, Denmark

5:15 pm - 5:30 pm **S03.04.05. New Chemical Safety Policy in Korea to Achieve Public Health Protection: Experience of K-REACH**
Jong Han Leem, Inha University Hospital, Korea (the Democratic People's Republic of)

4:15 pm - 5:30 pm **S02.02B. Exposure and Risk Assessment of Chemicals in Consumer Articles**

Chair: Tatsiana Dudzina, ExxonMobil Biomedical Science Inc., Belgium

4:15 pm - 4:30 pm **S02.02.06. The European Chemical Industry Guidance on REACH Exposure Assessment Strategies for Substances in Articles**
Tatsiana Dudzina, ExxonMobil Biomedical Science Inc., Belgium

4:30 pm - 4:45 pm **S02.02.07. Ranking of Plastic Additives Based on Their Relative Potential for Release from Articles**
Andreas Ahrens, European Chemicals Agency, Finland

4:45 pm - 5:00 pm **S02.02.08. Overview of Approaches to Estimate Consumer Exposure to Articles**
Eva Wong, U.S. Environmental Protection Agency, Office of Pollution Prevention and Toxics, United States

5:00 pm - 5:15 pm **S02.02.09. Evaluation of Polymers Migration Models**
Hua Qian, ExxonMobil Biomedical Sciences, Inc., United States

5:15 pm - 5:30 pm **S02.02.10. Mouthing Exposure Estimation Tool under Canada's Chemicals Management Plan**
Adam Griffiths, Health Canada, Canada

4:15 pm - 5:30 pm **S03.04C. Effects of Long-Term Exposure to Ambient Air Pollution in the Asia-Pacific Region**

Chair: Bin Jalaludin, University of New South Wales, Sydney, Australia

4:15 pm - 4:30 pm **S03.04.11. Long-Term Effects of PM2.5 on Total Mortality in Seoul, Korea**
Hyun-Joo Bae, Korea Environment Institute, Korea (the Democratic People's Republic of)

4:30 pm - 4:45 pm **S03.04.12. Long-Term Exposure to Air Pollution and All-Cause and Cause-Specific Mortality in Okayama, Japan**
Takashi Yorifuji, Graduate School of Environmental and Life Science, Okayama University, Japan

4:45 pm - 5:00 pm **S03.04.13. Long-Term Exposure to PM2.5 Components and Cardiovascular Mortality in a Chinese Cohort**
Haidong Kan, Fudan University, China

5:00 pm - 5:15 pm **S03.04.14. Long-Term Exposure to Low Level Air Pollution in Sydney and Mortality and Hospital Admission Using the '45 and Up' Cohort: Methodological Challenges**
Bin Jalaludin University of New South Wales, Australia

5:15 pm - 5:30 pm **S03.04.15. Lessons Learned from the ESCAPE Project**
Bert Brunekreef, Utrecht University, The Netherlands

4:15 pm - 5:30 pm **S03.04D. Exposure to Pesticides and Heavy Metals in the African Context: Electronic Waste, Artisanal and Small-Scale Mining, and Indoor Residual Spraying**

Chair: Nosiku Munyinda, University of Zambia, Zambia
Chair: Jonathan Chevrier, McGill University, Canada

4:15 pm - 4:30 pm **S03.04.16. Neurodevelopmental Outcomes of Children Exposed to Lead in Selected Locations of Kabwe District in Zambia**
Nosiku Munyinda, University of Zambia, Zambia

4:30 pm - 4:45 pm **S03.04.17. Mercury Exposure Biomarkers and Neurologic Measure Differences between Registered and Unregistered ASGM Miners in Ghana**
Nil Basu, McGill University, Canada

4:45 pm - 5:00 pm **S03.04.18. Agbogbloshie Electronic Waste Recycling Site: A Case of Focal Environmental Contamination**
Julius Fobil, University of Ghana School of Public Health, Ghana

5:00 pm - 5:15 pm **S03.04.19. Exposure to DDT and Pyrethroid Insecticides and Humoral Response to Vaccines among South African Children from an Area Sprayed for Malaria Control**
Jonathan Chevrier, McGill University, Canada

5:15 pm - 5:30 pm **S03.04.20. Panel Discussion**

4:15 pm - 5:30 pm **S03.04E. Exposure, Vulnerability, and Capacity Assessment for Health Risks of Climate Change: Measuring and Communicating the Effectiveness of Interventions and Policy Responses**
Chair: Tim Takaro, Simon Fraser University, Canada

4:15 pm - 4:30 pm **S03.04.21. Climate Change and Health Stress Testing**
Kristie Ebi, University of Washington, United States

4:30 pm - 4:45 pm **S03.04.22. Reducing Morbidity and Mortality Due to Extreme Heat: A Call for Evidence-Based Interventions**
Gregory Wellenius, Brown University, United States

4:45 pm - 5:00 pm **S03.04.23. Early Warning System for Infectious Diseases at the European Center for Disease Prevention and Control (ECDC)**
Jan Semenza, European Centre for Disease Prevention and Control, Sweden

5:00 pm - 5:15 pm **S03.04.24. Title: Assessing Health Vulnerability and Adaptation to Climate Change: Health Canada's Guidance for Public Health Officials**
Peter Berry, Health Canada, Canada

5:15 pm - 5:30 pm **S03.04.25. Climate Change Policy: What Has Happened? What Can We Do?**
Mary Rice, Beth Israel Deaconess Medical Center, United States

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4:15 pm - 5:30 pm **S03.04F. Exposures to Emerging Trace Elements**
Chair: Pat Rasmussen, Health Canada, Canada
Chair: Clare Wiseman, University of Toronto, Canada

4:15 pm - 4:30 pm **S03.04.26. Assessing and Reducing Risks from Mining of Technology Critical Elements**
Michael Parsons, Geological Survey of Canada, Canada

4:30 pm - 4:45 pm **S03.04.27. Using Hair Analysis to Assess the Exposure Level of Rare Earth Elements among Rural Housewives**
Bin Wang, Institute of Reproductive and Child Health, Peking University, China

4:45 pm - 5:00 pm **S03.04.28. Assessing Potential Exposure to Rare Earth Elements in Household Dust Via the Inhalation Exposure Pathway**
Albert Juhasz, University of South Australia, Australia

5:00 pm - 5:15 pm **S03.04.29. Platinum Group Elements, Lanthanoids and Other Metals of Concern in Road Dust and Airborne Particles in Houston, TX**
Ayse Bozlaker, Texas A & M University, United States

5:15 pm - 5:30 pm **S03.04.30. Platinum Group Element Enrichment in Road Dust and Their Human Bioaccessibility**
Clare Wiseman, University of Toronto, Canada

4:15 pm - 5:30 pm **S03.04G. The NIH PRISMS Program: Informatics Systems for Pediatric Asthma Research with Integrated Sensor-Based Exposure, Context and Health Monitoring**
Chair: Rima Habre, University of Southern California, United States
Chair: Michael Dellarco, Johns Hopkins Bloomberg School of Public Health, United States

4:15 pm - 4:30 pm **S03.04.31. Monitoring Particulate, PAH, Allergen and Microbial Exposures in Asthmatic Kids**
Stephen Chillrud, Columbia University, United States

4:30 pm - 4:45 pm **S03.04.32. Clouded-Based Wearable and Stationary Sensors for Monitoring Air Pollution Exposure in Pediatric Asthma Research**
Zhenyu Li, George Washington University, United States

4:45 pm - 5:00 pm **S03.04.33. Development and Evaluation of the TEMU Personal Exposure Monitor for a Rural Children's Asthma Intervention Study**
Edmund Seto, University of Washington, United States

5:00 pm - 5:15 pm **S03.04.34. Scaling Up Data Integration and Analysis of Sensor Data for Pediatric Asthma**
Jose Luis Ambite, University of Southern California, United States

5:15 pm - 5:30 pm	**S03.04.35. Panel Discussion**
4:15 pm - 5:30 pm	**S03.04H. Women at Work: How Exposed Are they?** *Chair: Marie-Elise Parent, INRS-Institut Armand-Frappier, Canada*
4:15 pm - 4:30 pm	**S03.04.36. Sex Differences in Occupational Risks in Ontario Workers** *Paul Demers, Cancer Care Ontario, Canada*
4:30 pm - 4:45 pm	**S03.04.37. Sex Differences in Occupational Physical Activity** *Vikki Ho, University of Montreal, Canada*
4:45 pm - 5:00 pm	**S03.04.38. Occupational Exposures among Women Based on CAREX Canada's Estimates** *Cheryl Peters, Alberta Health Services, Canada*
5:00 pm - 5:15 pm	**S03.04.39. Occupational Exposures among Nail Technicians in Toronto, Canada** *Victoria Arrandale, Cancer Care Ontario, Canada*
5:15 pm - 5:30 pm	**S03.04.40. Women at Work: How Exposed Are They?** *Mieke Koehoorn, University of British Columbia, Canada*
5:45 pm - 7:30 pm	**Technology and Sensor Fair & Chapters and Committees Fair**
7:30 pm - 8:30 pm	**Joint ISES/ISEE SNR Networking Happy Hour**

WEATHER, CLIMATE AND DISASTERS 3

P03.0010 **The Association between Thermal Comfort and Sleep Patterns: Preliminary Results from the Center for Research on Environmental and Social Stressors in Housing across the Life Course (CRESSH) Sleep Sub-Study**
Dayna Johnson, Harvard Medical School, United States

P03.0020 **Future Wildfires and Air Pollution-Related Health Damages**
Henry Roman, Industrial Economics, Inc. (IEc), United States

P03.0030 **The Climate and Health Impacts of Achieving National Target Levels of Liquefied Petroleum Gas (LPG) Adoption in Cameroon: Findings from Policy Modelling According to the Cameroon National LPG Masterplan**
Daniel Pope, University of Liverpool, United Kingdom

P03.0040 **Regional Variations in Future Temperature-Attributable Mortality**
Jae Young Lee, Seoul National University, Korea (the Republic of)

P03.0050 **Awareness, Risk Perception, and Protective Behaviors for Extreme Heat and Climate Change in New York City**
Jaime Madrigano, RAND Corporation, United States

P03.0060 **Increasing Access to Cooling in the Community: A Trial Heat Relief Network for Toronto**
Kelly Sabaliauskas, Toronto Public Health, Canada

P03.0070 **Leveraging Community Partnerships to Advance Disaster Research Response: A Qualitative Analysis**
Erin Haynes, University of Cincinnati, United States

P03.0080 **The Relationship of Climate Variability and Particulate Matter on Birth Weight in Seoul, Republic of Korea**
Jong-Hun Kim, Sungkyunkwan University, Korea (the Republic of)

P03.0090 **The Exposure Science Aspects of the Re-Envisioning of the (U.S.) National Library of Medicine's Toxicology and Environmental Health Resources**
Shao Lin, University at Albany, United States

P03.0110 **Public Health Professionals' Perceptions of Dengue Control in the Face of Climate Change: A National Survey among China CDC Staff**
Peng Bi, University of Adelaide, Australia

P03.0120 **Projected Temperature-Related Years of Life Lost from Stroke Caused by Climate Change**
Guoxing Li, Peking University, China

P03.0130 **Implementation of Real-Time Surveillance Data to Improve the Swedish Heatwave Early Warning System**
Christofer Åström, Umeå University, Sweden

P03.0140 **Spatial and Temporal Characteristics of Vibrio Parahaemolyticus in the Chesapeake Bay**
Benjamin Davis, Johns Hopkins Bloomberg School of Public Health, United States

P03.0150 **Air Quality Related Health Co-Benefits of Mitigating Climate Change in South Korea**
Satbyul Kim, National Institute for Environmental Studies, Japan

P03.0160 **Nationwide Epidemiological Study of Stroke Occurrence and Temperature in China: Association, Susceptibility and Risk Burden**
Tianjia Guan, Chinese Academy of Medical Sciences and Peking Union Medical College, China

P03.0170 **Daily Ambient Temperature Is Associated with Biomarkers of Kidney Injury in Older Americans**
Trenton Honda, Northeastern University, United States

P03.0180 **Sex as Effect Modifier of the Association between Daily Wet-Bulb Temperatures and Kidney Stones Presentations**
Ana Vicedo-Cabrera, London School of Hygiene and Tropical Medicine, United Kingdom

P03.0210 **Health Co-Benefits and Impacts of Transitioning from Fossil-Fuel Based to Cleaner Energy Sources in Higher-Income Countries: What Do We Know?**
Rachel Tham, University of Melbourne, Australia

P03.0220 **Accessing Heat Effects among Migrant and Seasonal Farmworkers: A Multi-State Study**
Kai Zhang, University of Texas Health Science Center at Houston, United States

P03.0230 **National Weather Service Heat Alerts and Emergency Hospital Admissions among the Elderly in 97 U.S. Counties**
Kate Weinberger, Brown University School of Public Health, United States

P03.0240 **Temperature-Related Hospital Outpatients for Cardiovascular and Respiratory Diseases in Seven Major Cities of South Korea**
Honghyok Kim, Korea University, Korea (the Republic of)

P03.0250 **Extreme Weather Conditions and Non-Cancer Mortality among Elders in Taiwan**
Ying-Hsuan Wu, National Taiwan University (NTU) College of Medicine and NTU Hospital, Taiwan

P03.0260 **Suicide and Ambient Temperature: A Multi-City Multi-Country Study**
Yoonhee Kim, University of Tokyo, Japan

BUILT ENVIRONMENT, NOISE AND GREENNESS 3

P03.0280 **Urban Greenness Extracted from Pedestrian Video and Its Relationship with Surrounding Air Temperatures**
Sarah Henderson, BC Centre for Disease Control, Canada

P03.0290 **Built Environment Features Associated with Street Scape Attractiveness in 56 Cities across 28 Countries**
Andrew Larkin, Oregon State University, United States

P03.0310 **Green Spaces and Colon Cancer Risk: A Case-Control in Spain**
Cristina O'Callaghan-Gordo, Barcelona Institute for Global Health (ISGlobal), Spain

P03.0320 **Epigenetics, Built Environment and Atopy**
Hind Sbihi, University of British Columbia, Canada

P03.0330 **Health Impacts of Bike Sharing Systems in Europe**
David Rojas-Rueda, Barcelona Institute for Global Health (ISGlobal) Barcelona, Spain

P03.0340 **Traffic-Related Air Pollution, Noise and Infant Mortality in London**
Mireille Toledano, Imperial College London, United Kingdom

P03.0350 **Assessing the Contribution of Noise to the Association between Traffic-Related Air Pollution and Children's Respiratory Health**
Meredith Franklin, University of Southern California, United States

P03.0360 **Association between Exposure to Noise and Sleep and Mental Health Outcomes in a Nationally-Representative Sample of U.S. Adolescents**
Joan Casey, University of California Berkeley, United States

P03.0370 **Residential Green Space and Mental Health: Analyses of the Cartagene Population Cohort's Data**
Nolwenn Noisel, CARTaGENE, CHU Sainte-Justine, Canada

P03.0390 **Assessment of the Impact of New Subway Stations on Public Transit Mode Share Using a Quasi-Experimental Design (Montreal, Canada)**
Sophie Goudreau, Montreal Public Health, Canada

P03.0400 **Exposure to Green Areas as a Way of Enhancing Health and Resilience in Cities: Metropolitan Area of Guadalajara, Mexico**
Maria Garibay-Chavez, University of Guadalajara, Mexico

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P03.2300 **The Correlation between Pesticide Exposure and Health Effects among Tobacco Farmers, Northern, Thailand**
Saowanee Norkaew, Thammasat University, Thailand

P03.2310 **Estimating of the Costs of Occupational Injuries and Illnesses from Agricultural Work in Thailand**
Densak Yogyorn, Mahidol University, Thailand

P03.2320 **Chronic Diseases in Agricultural Workers with Different Pesticide Exposure in Mauco, Chile**
Sandra Cortes, Pontificia Universidad Catolica de Chile-ACCDIS, Chile

P03.2330 **Mitochondrial DNA Damage in Spermatozoa of Faroese Men Exposed to Organochlorines**
Laura Neumann, George Washington University, United States

P03.2340 **Urinary Inorganic Arsenic Concentration and Type 2 Diabetes Mellitus and Hypertension Development: A Population-Based Analysis in Arica, Chile**
Maria Munoz, Universidad de Chile, Chile

P03.2350 **Effects of Early Life Arsenic Exposure on Renal Function in Adolescents and Young Adults in Rural Bangladesh**
Md Alfazal Khan, International Centre for Diarrhoeal Disease Research, Bangladesh (ICDDR,B), Bangladesh

P03.2360 **Arsenic in Drinking Water Interventions: Systematic Review of Community Based Approaches in Bangladesh**
Ondine von Ehrenstein, University of California Los Angeles, United States

P03.2370 **Geographic Variation and Contributions of Rurality and Area-Level Socioeconomic Circumstances to Incidence of Alzheimer's Disease over 11 Years: Multilevel Discrete-Time Event History Analysis of a Cohort of 261,669 Australians Aged 45 Years and Older**
Thomas Astell-Burt, University of Wollongong, Australia

P03.2400 **Sex/Gender Differences in Cardiovascular Mortality Associated with Environmental Stressors: Systematic Review and Meta-Analysis**
Ute Kraus, Helmholtz Zentrum München, Germany

P03.2410 **Towards a Systematic Review of Environmental Injustice in Canada: National Patterns of Environmental Risks and Benefits**
Amanda Giang, University of British Columbia, Canada

P03.2420 **Different Degrees of Environmental Contamination by Trace Metals from Mining Activities between DR Congo and Zambia in the African Copperbelt**
Célestin Banza Lubaba Nkulu, University of Lubumbashi, Congo (the Democratic Republic of the)

P03.2430 **Effects of Mothers' Language and Culture Backgrounds on Developmental Delays: A Nationwide Study on Children Born to Immigrant Mothers in Taiwan**
How-Ran Guo, National Cheng Kung University, Taiwan

P03.2450 **Prevalence of Asthma-Related Symptoms in Adolescents Living near Industrial Animal Feeding Operations in Eastern North Carolina (U.S.A.)**
Virginia Guidry, National Institute of Environmental Health Sciences, United States

PRENATAL AND EARLY LIFE EXPOSURES AND EFFECTS 3

P03.2470 **Metallome-Wide Association Study of Maternal-Fetus Interface Metabolism Dysfunction in Gestational Diabetes Mellitus**
Heqing Shen, Institute of Urban Environment, Chinese Academy of Sciences, China

P03.2480 **Associations between Maternal Exposure to Bisphenol A or Triclosan and Gestational Hypertension and Preeclampsia: The MIIREC Study**
Louopou Camara, Université de Montréal, Canada

P03.2490 **Prenatal Blood Manganese Levels and Postpartum Depression among Women in Mexico City**
Nia McRae, Icahn School of Medicine at Mount Sinai, United States

P03.2500 **Prenatal Cadmium Exposure Associates with the Expression of Placental Imprinted Genes Overall, and in Sex-Specific Patterns**
Todd Everson, Emory University, United States

P03.2510 **Contribution to the Understanding of Biologic Concentrations of Metals in the Newborns in an Urban Area from Rio De Janeiro, Brazil**
Monica Araujo, Federal University of Rio de Janeiro, Rio de Janeiro, Brazil

P03.2520 **Urinary Measures of Glyphosate and Oxidative Stress in Pregnant Women**
Shahid Parvez, Indiana University Fairbanks School of Public Health, United States

P03.2530 **Increased Risk of Phthalates Exposure for Recurrent Spontaneous Abortion in Reproductive-Aged Women: Taiwan Female Infertility Study (TIFF)**
Po-Chin Huang, National Health Research Institutes, Taiwan

P03.2540 **Pioglitazone Increases the Number of Ultrasonic Vocalization Impaired by Prenatal LPS in Rats, an Effect Not Related with Insulin and Leptin**
Thiago Kirsten, Department of Pathology, School of Veterinary Medicine, University of Sao Paulo and Environmental and Experimental Pathology, Paulista University, Sao Paulo, Brazil

P03.2550 **Contrasting Associations between Exposure to Environmental Marine Pollutants and Reports of Immune System Disorders in Greenlandic Children**
Youssef Oulhote, Harvard T. H. Chan School of Public Health, United States

P03.2570 **Childhood, Adolescence, and Agrochemicals: A Minefield to Inhabit**
Paulo Paz de Lima, ABRAPPS, Brazil

P03.2580 **Household Renovations before and during Pregnancy Are Associated with Preterm Birth and Low Birth Weight in China: A Multicenter, Retrospective, and Observational Study**
Wei Liu, Tsinghua University, China

P03.2590 **Prenatal Exposure to Perfluoroalkyl Substances (PFASs), Polybrominated Diphenyl Ethers (PBDEs) and Polychlorinated Biphenyl 153 (PCB) and Anthropometric Measures in Children**
Delphine Bosson-Rieutort, University of Montreal, Canada

P03.2600 **Surveillance of Arsenic and Lead Exposure in Mother-Child Pair from Arica, Chile 2013-2016**
Macarena Valdes, University of Chile Public Health School, Chile

P03.2610 **Gestational Urinary Bpa Concentrations and Child Adiposity at Age 3 Years: The MIREC Study**
Joseph Braun, Brown University, United States

P03.2620 **Exposure to Polybrominated Diphenyl Ethers (PBDEs) during Childhood and Adiposity Measures at Age 8 Years**
Ann Vuong, University of Cincinnati, United States

P03.2630 **Early-Life Triclosan Exposure and Behavior Problems in 8-Year-Old Children**
Medina Jackson-Browne, Brown University, United States

P03.2640 **An mHealth Platform for Predicting Risk of Pediatric Asthma Exacerbation Using Personal Sensor Monitoring Systems: The Los Angeles Prisms Center**
Rima Habre, University of Southern California, United States

P03.2650 **Analysis of Perfluoroalkyl Substances in Deciduous Teeth**
Akhgar Ghassabian, New York University School of Medicine, United States

P03.2660 **Bisphenol A in Different Compartments for Mother-Fetus Pairs in Taiwan and Health Effects of Newborns**
Mei-Lien Chen, National Yang-Ming University, Taiwan

P03.2670 **The New York University Children's Environmental Health Study (NYU CHES): Design and Objectives**
Linda Kahn, New York University School of Medicine, United States

P03.2680 **Urinary Trace Metals Individually and in Mixtures in Association with Preterm Birth**
Stephani Kim, National Institute of Environmental Health Sciences, United States

P03.2700 **Measures of Maternal Psycho-Social Stress and Biomarkers of Stress Response in the Maternal-Fetal Unit**
Rachel Morello-Frosch, University of California, San Francisco, United States

P03.2710 **The Effects of Maternal Cadmium Exposure and Attention Deficit Hyperactivity Disorder in Children 6 Years of Age**
Woo Sung Kim, Seoul National University College of Medicine, Korea (the Republic of)

P03.2720 **Hormonal Changes at Early Age and Prenatal Exposure to Phthalates and Bisphenol A in a Cohort of Cuernavaca, Morelos, Mexico**
Hernandez Leticia, Instituto Nacional de Salud Publica, Mexico

P03.2730 **Urinary 3-Phenoxybenzoic Acid Concentrations In Utero and in Childhood: Association with BMI Z-Score in 4-Year-Old Children**
Kyung-Shin Lee, Institute of Environmental Medicine, Seoul National University Medical Research Center, Korea (the Republic of)

P03.2750 **Phthalates Exposure Is Positively Associated with Increased Risk of Microalbumin in the General Taiwanese**
Po-Chin Huang, National Health Research Institutes, Taiwan

P03.2760 **Variability of Urinary Phthalate Metabolite, Bisphenol, and Ultraviolet Filter Concentrations across Sensitive Windows of Human Reproduction**
Anna Pollack, George Mason University, United States

P03.2770 **Repeated Measures of Urinary Phthalates, Benzophenones and Bisphenol A in Relation to Incident Pregnancy Loss**
Anna Pollack, George Mason University, United States

P03.2780 **Association between Radiofrequency Exposure during Pregnancy and Birth Outcomes in South Korea: Birth Cohort Study**
Yong-Han Lee, Dankook University, Korea (the Republic of)

P03.2790 **Effects of Prenatal Exposure to Phthalates on Neonatal Birth Weight: SHK Birth Cohort**
Yunhui Zhang, Fudan Universiyt, China

P03.2800 **Lactational Exposure to Phthalates: Preliminary Results from an Italian Cross-Sectional Study**
Elena Righi, University of Modena and Reggio Emilia, Italy

P03.2810 **Relationship of Trimester-Specific Gestational Exposure to High Molecular Weight Phthalates with Neurodevelopment at 48 Months and Differences by Sex**
Libni Torres-Olascoaga, National Institute of Public Health, Mexico

P03.2820 **Risk Factors for Asthma Symptoms in Children: ELSPAC-CZ Study**
Ondrej Mikes, Masaryk University, Czechia

P03.2830 **Risk Factors for Childhood Asthma and Wheeze: Comparisons from an International Study**
Joshua Lawson, University of Saskatchewan, Canada

P03.2840 **Attention Deficit/Hyperactivity Disorder and Urinary Triclosan Levels in Children**
I-Jen Wang, Taipei Hospital, Ministry of Health and Welfare; National Yang-Ming University; China Medical University, Taiwan

P03.2850 **Childhood Nutrient Mixtures and Neurodevelopmental Outcomes among Children in Mexico City**
Ashley Malin, Icahn School of Medicine at Mount Sinai, United States

P03.2860 **Proximity to Floricultural Production and Childhood Neuropsychological Function**
Marnie Hazlehurst, University of Washington, United States

P03.2870 **Verbal and Learning Memory in Schoolchildren Exposed to Manganese in Mexico**
Horacio Riojas Rodriguez, National Institute of Public Health, Mexico

P03.2880 **Associations of Acetylcholinesterase Activity with Depression and Anxiety Symptoms among Adolescents Growing Up near Pesticide Spray Sites**
Jose Suarez-Lopez, University of California San Diego, United States

ADULT HEALTH EFFECTS OF ENVIRONMENTAL EXPOSURES 3

P03.2890 **Investigation of Spatial Clusters of Chronic Cardiopulmonary Diseases in New York City**
Bian Liu, Icahn School of Medicine at Mount Sinai, United States

P03.2900 **Exploring the Utility of World Trade Center Health Program Monitoring Data for Cancer Risk Factor Analysis: Preliminary Findings for Head and Neck Cancer**
Taylor Black, Rutgers, The State University of New Jersey, United States

P03.2910 **An Underground Layer of Friable Asbestos in a Small Municipality in Colombia: Another Asbestos Contaminated Town?**
Marŋa Cely-Garcŋa, Universidad de los Andes, Colombia

P03.2920 **Exploratory Descriptive Analysis: Incidence of Neoplasia and Congenital Malformations in Tremembe City - Sao Paulo - Brazil (1998-2017)**
Paulo Paz de Lima , Collective Health. Member of the Association of Researchers and Researchers for Social Justice - ABRAPPS, Brazil

P03.2930 **Sleep Quality and Duration and the Risk of Breast Cancer in a Population-Based Study**
Xudong Liu, Sun Yat-sen University, China

P03.2940 **Serum Concentrations of Polybrominated Diphenyl Ethers (PBDEs) and Breast Cancer Risk in Young Women: Results from the Ontario Environment and Health Study**
Shelley Harris, Prevention & Cancer Control, Cancer Care Ontario, Canada

P03.2950 **Hexavalent Chromium and Stomach Cancer: A Systematic Review and Meta-Analysis**
Mina Suh, ToxStrategies, Inc., United States

P03.2970 **Airborne Dioxin Exposure and Breast Cancer Risk in a Case-Control Study Nested within the French E3N Prospective Cohort**
Béatrice Fervers, Centre Léon Bérard, France

P03.2980 **DNA Methylation Mediates Effects of Smoking on Gene Expression in Lung Cancer Tissues**
Wen-Chi Pan, National Yang-Ming University, Taiwan

P03.2990 **Polymorphisms of Genes Related to Nucleotide Excision Repair and Cell Cycle Pathways, Arsenic Exposure, and Bladder Cancer**
Ya-Yun Cheng, National Cheng Kung University, Taiwan

P03.3000 **Herbal Medicine Containing Aristolochic Acid and the Risk of Hepatocellular Carcinoma in Patients with Hepatitis C Virus Infection: A Nationwide Population-Based Cohort Study in Taiwan**
Pau-Chung Chen, National Taiwan University, Taiwan

P03.3010 **Residential Proximity to Animal Feeding Operations and Cancer Risk in the Agricultural Health Study**
Jared Fisher, National Cancer Institute, United States

P03.3020 **Residential Position in a Time Zone and Breast Cancer Risk in the United States**
Trang VoPham, Department of Epidemiology, Harvard T.H. Chan School of Public Health & Channing Division of Network Medicine, Department of Medicine, Brigham and Women's Hospital and Harvard Medical School, United States

P03.3030 **Thyroid Cancer Under 19 at the Accident in Fukushima: The Sixth Report - the 2nd and 3rd Round Screening Results**
Toshihide Tsuda, Okayama Univesity, Japan

P03.3040 **Prevalence of Breast Benign Findings in Women Residing in an Area of Chronic Exposure to HCH, DDT and Dioxin**
Nataly de Figueiredo, Federal University of Rio de Janeiro, Brazil

P03.3050 **Gene-Environmental Interaction among Women with Benign Breast Disease in Brazil**
Ilce Silva, Oswaldo Cruz Foundation, Brazil

P03.3070 **Prenatal Exposure to Organophosphate Esters and Cognitive and Behavioral Development**
Kate Hoffman, Duke University, United States

P03.3080 **Gene-Environmental Interaction between Cyp1a1, Cyp1b1, and Cyp2b6 Polymorphisms and Vitamin D on Insulin Resistance: A Panel Study of an Elderly Population**
Yun-Chul Hong, Seoul National University College of Medicine, Korea

P03.3090 **Joint-Associations of Metal Exposure Biomarkers and Systolic Blood Pressure in the United States: Findings from the 1999-2004 National Health and Nutrition Examination Survey (NHANES)**
Matthew Gribble, Emory University, United States

P03.3100 **Contribution of Glutathione and Metallothionein to Acute Toxicity of Cadmium**
Maki Tokumoto, Aichi Gakuin University, Japan

P03.3110 **The Involvement of Glucose Transporter Gene Expression in Cadmium Renal Toxicity**
Masahiko Satoh, Aichi Gakuin University, Japan

P03.3120 **Urinary Isoflavones Levels in Relation to Thyroid Function in Adults from NHANES 2007-2010**
Patricia Janulewicz, Boston University, United States

P03.3130 **Urinary Lignan Levels and Thyroid Function in Adults from NHANES 2007-2010**
Jeffrey Carlson, Boston University School of Public Health, United States

P03.3140 **Association between Antibiotics in Urines and Adult Obesity in Shanghai**
Hexing Wang, Fudan University, China

BIOMARKERS OF EXPOSURE AND EFFECTS 3

P03.3160 **Biomonitoring of Exposure to Great Lakes Contaminants in New York State Burmese Refugees: Recruitment Strategy, Descriptive Characteristics, and Fish Consumption Patterns**
Sanghamitra Savadatti, New York State Department of Health, United States

P03.3170 **Use of High-Resolution Metabolomics to Identify Potential Metabolic Pathways Associated with Traffic-Related Air Pollutants**
Donghai Liang, Emory University, United States

P03.3180 **Blood Lead Concentration in Childhood and Age of Menarche in a Prospective Study of U.S. Girls**
Mary Wolff, Icahn School of Medicine at Mount Sinai, United States

P03.3190 **Global Metabolic Profiling of Dried Blood Spot Samples for Personal Air Pollution Exposure in Population Studies**
Jill Baumgartner, McGill University, Canada

P03.3200 **Biomonitoring of Exposure to Great Lakes Contaminants in New York State Burmese Refugees: Assessing Exposure to Per- and Polyfluoroalkyl Substances (PFAS) and Its Association with Local Fish Consumption**
Ming Liu, New York State Department of Health, United States

P03.3210 **Maternal Diet during Pregnancy and Blood Cadmium Concentrations in a Cohort of British Women**
Katarzyna Kordas, University at Buffalo, United States

P03.3220 **Association between Blood Heavy Metal Concentrations and Metabolic Syndrome Related Biomarkers among Reproductive Age Women of Korea**
Inae Lee, Seoul National University, Korea (the Republic of)

P03.3230 **Temporal Variation of Total Mercury Levels in the Hair of Pregnant Women from the MIREC (Maternal-Infant Research on Environmental Chemicals) Study**
Cheryl Khoury, Health Canada, Canada

P03.3240 **Perfluorinated Alkyl Substances and Association with Response Biomarkers among NHANES 2005-2010 Subjects**
Dina Schreinemachers, U.S. Environmental Protection Agency (EPA), United States

P03.3250 **The Association of Urinary Phosphorous-Containing Flame Retardant Metabolites and Self-Reported Personal Care and Household Product Use among Women from the Puerto Rico Testsite for Exploring Contamination Threats (PROTECT) Study**
Mary Ingle, University of Michigan, United States

P03.3270 **Advancements in Laser-Ablation ICP-MS for Hair as a Biomarker of Past Exposures**
Boris Reiss, University of Arizona, United States

P03.3280 **Trisaminohexyl Isocyanurate (TAHI) Levels in Plasma and Urine in Workers Exposed to 1,6-Hexamethylene Diisocyanate (HDI) Monomer and HDI Isocyanurate**
Leena Nylander-French, University of North Carolina at Chapel Hill, United States

P03.3290 **From Zero to One-Hundred in 15 Years: Urine Samples from the German Environmental Specimen Bank Reveal Omnipresent and Further Increasing Exposures to the Novel Plasticizer Substitute Hexamoll DINCH**
Holger Koch, Institute for Prevention and Occupational Medicine of the German Social Accident Insurance - Institute of the Ruhr-Universität Bochum (IPA), Germany

P03.3300 **Accessing Biobanks to Obtain Human Biomonitoring Data**
Kristin Macey, Health Canada, Canada

P03.3310 **Increasing the Regulatory Impact of Chemical Safety Research by Following a Standard Procedure: A Human Biomonitoring Physiologically Based Kinetic (PBK) Model Case Study**
Maryam Zare Jeddi, Institute of Environmental Health, Tehran University of Medical Sciences, The Netherlands

P03.3320 **Removing Outside Contamination from Individual Hair Strands for Use in Retrospective Exposure Assessments**
Chelsi White, University of Arizona, United States

P03.3330 **Analysis of Urinary Biomarkers for Early-Life Exposure to Organophosphate Pesticides and Pyrethroids**
Xianyu Wang, University of Queensland, Australia

P03.3340 **High Flag Guidance Range Proposal for Urinary Inorganic Arsenic in the Canadian Population**
Marie-Hélène Bourgault, Institut National de Santé Publique du Québec, Canada

P03.3350 **Toxic Metals, PFAS and PCBs in Blood and Urine Specimens Collected from New Jersey Clinical Laboratories and Blood Banks**
Zhihua (Tina) Fan, New Jersey Department of Health (NJDOH), United States

P03.3360 **Unexpected, Ubiquitous Exposure in Brazil to Diisopentyl Phthalate, One of the Most Potent Antiandrogenic Phthalates**
Holger Koch, Institute for Prevention and Occupational Medicine of the German Social Accident Insurance - Institute of the Ruhr-Universität Bochum (IPA), Germany

P03.3370 **Toxicokinetic Modeling of Biomarkers of Exposure to Lambda-Cyhalothrin for Predicting Exposure and Determining Biological Reference Values**
Jonathan Côté, University of Montreal, Canada

P03.3380 **Method Validation for Analysis of Parabens and Antimicrobials in Human Hair**
Hyojong Park, Eulji university, Korea (the Republic of)

P03.3390 **Main Progress of the 3rd Stage Korean National Environmental Health Survey (2015-2017)**
Ji-Young Yoo, National Institute of Environmental Research (NIER), Korea (the Republic of)

P03.3400 **LC-HRMS Biomarker Suspect Screening in Low Dose Studies**
Daniel Bury, Institute for Prevention and Occupational Medicine of the German Social Accident Insurance - Institute of the Ruhr-Universität-Bochum (IPA), Germany

P03.3410 **Determinants of Xenoestrogen Exposure and Implications on Inter- and Intra-Variation of Urinary Biomarkers across Individuals**
Cristina Martin, University of Massachusetts Amherst, United States

P03.3420 **Using the Comparative Toxicogenomics Database to Further Our Understanding of Environmental Exposures on Human Health**
Cynthia Grondin, North Carolina State University, United States

P03.3450 **Exposure to N,N-diethyl-m-toluamide (DEET) in the U.S. Population: 2007-2014**
Maria Ospina, U.S. Centers for Disease Control and Prevention, United States

P03.3460 **Prenatal Fluoride Exposure and Symptoms of Attention Deficit Hyperactivity Disorder (ADHD)**
Morteza Bashash, University of Toronto, Canada

P03.3470 **Proteomic Array Analysis of an Epithelial Cell Model Infected with Cryptosporidium**
Eunice Varughese, U.S. Environmental Protection Agency (EPA), United States

P03.3480 **Distinct Fecal Microbiota and Serum Metabolite Profiles in Male Rat Exposed to Aluminum Oxide and Aluminum Oxide Nanoparticles**
Song Tang, National Institute of Environmental Health, Chinese Center for Disease Control and Prevention, China

P03.3490 **Factors Associated with Hair Nicotine Concentration: A Cross-Sectional Study in Children from Santiago, Chile**
Veronica Iglesias, Universidad de Chile, Chile

P03.3500 **Enhanced Passive Surveillance Methods Using CDC and State Child Blood Lead Surveillance Data**
Tim Dignam, U.S. Centers for Disease Control and Prevention (CDC), United States

P03.3510 **Factors Associated with Low Level of Urinary Inorganic Arsenic Concentration**
Veronica Iglesias, Universidad de Chile, Chile

P03.3520 **Shorter Gestation Is Associated with Renal Biomarkers at 4 Years**
Yuri Levin-Schwartz, Icahn School of Medicine at Mount Sinai, United States

P03.3530 **LCMSMS Method to Analyze Metabolite of N-Methyl-2-Pyrrolidone (NMP) and N-Ethyl-2-Pyrrolidone (NEP) in Human Urine**
Patrick Bélanger, National Public Health Institute of Quebec (INSPQ), Canada

RISK ASSESSMENT AND POLICY 3

P03.3540 **The Exposure Science Aspects of the Re-Envisioning of the (U.S.) National Library of Medicine's Toxicology and Environmental Health Resources**
Pertti Hakkinen, National Institutes of Health, United States

P03.3570 **Differential Inhalation Toxicity Induced by E-Cigarette Aerosol Flavorings in Association with Nicotine**
Seung-Hyun Cho, RTI International, United States

P03.3580 **Cyanobacteria and Cyanotoxins in Sicilian Freshwater Basins (Italy): A Risk Assessment for Drinking Water**
Pietro Zuccarello, University of Catania, Italy

P03.3590 **Regulation of Chemicals in Children's Products: How U.S. and EU Regulations Impact Smaller Markets**
Maya Negev, University of Haifa, Israel

P03.3600 **Comparison of Dermal Exposure across a Diverse Range of Consumer Products Based on Modelling Approaches Commonly Applied to Human Health Risk Assessments under Canada's Chemicals Management Plan**
Cathy Campbell, Government of Canada, Canada

P03.3610 **H2020 Insurance: Health Sector Demo**
Samya Pinheiro, ARIA Technologies, Brazil

P03.3620 **Addressing Traffic Related Air Pollution: Local Public Health Challenges**
Emily Peterson, Vancouver Coastal Health, Canada

P03.3630 **Regional Priorization of Contaminants of Interest in Environmental Health Based on Human Biomonitoring Data**
Michelle Gagné, Institut National de Santé Publique du Québec, Canada

P03.3640 **Multidisciplinary Approaches for the Assessment of Human Exposure to Organic Pollutants in the Indoor Environment**
Tunga Salthammer, Fraunhofer WKI, Germany

P03.3650 **Science and Policy of Fluorinated Surfactants in Firefighting Foam**
Thomas Bruton, Green Science Policy Institute, United States

P03.3660 **How Did Flint MI Happen**
Ronnie Levin, Harvard T.H. Chan School of Public Health, United States

P03.3670 **Ambient Polycyclic Aromatic Hydrocarbons (PAHs) and Human Health Risks in Windsor, Canada and Detroit, U.S.A.**
Xiaohong Xu, University of Windsor, Canada

P03.3680 **Evaluation of Health Symptoms and Air Exposures in Multiple Communities near Oil and Gas Operations in Colorado**
Allie Bamber, Colorado Department of Public Health and Environment, United States

P03.3690 **Collective Intelligence and Skills Mobilization: The Key of the Outbreak in Trois-Rivières**
Caroline Marcoux-Huard, Centre Intégré Universitaire de la Mauricie et du Centre-du-Québec (CIUSSS MCQ), Canada

P03.3700 **Incorporating Lifecycle Emission Information in Promoting Chemical Exposure Screening**
Li Li, University of Toronto Scarborough, Canada

P03.3720 **Genetic Polymorphisms Are Associated with Body Burden of Metals, Persistent Organic Pollutants (POPs) and Omega-3 Fatty Acid Levels among Inuit of Nunavik Region in the Canadian Arctic**
Rajendra Parajuli, Ottawa University, Canada

P03.3740 **Key Exposure Models and Input Parameters Used for Assessing Exposure to Consumer Products Under Canada's Chemicals Management Plan**
Leona MacKinnon, Health Canada, Canada

P03.3750 **Validation of the EAU Pharmaceuticals Workbook: Predicted Vs. Measured Environmental Concentrations**
Alison McLaughlin, Health Canada, Canada

P03.3760 **Evaluation of Potential Health Risk of 6:2 Fluorotelomer Alcohol (FTOH)**
Hien Le, The Chemours Company, United States

P03.3780 **Ecohealth and Medical Geology Approaches as Integrative Methodological Tools to Address Environmental Lead or Arsenic Exposures and Health Issues in Uruguay**
Nelly Mañay, University of the Republic of Uruguay (UDELAR), Uruguay

P03.3790 **Standard Rodent Housing Conditions Produce Significant and Sustained Levels of Particulate Matter**
Ben Nephew, Tufts University Cummings School of Veterinary Medicine, United States

P03.3800 **Nutritional Interventions for Childhood Lead Exposure: The Need for More Consistent Public Health Messaging across the International Community**
Danielle Ramos, ASPPH/U.S. Environmental Protection Agency (EPA), United States

P03.3810 **PFAS in the Drinking Water: A Swedish Register Study of Thyroid Disease**
Eva Andersson, Gothenburg University, Sweden

P03.3820 **More Than a Technical Challenge: The Social Life of Cumulative Risk and Mixtures Toxicity Policy**
Devon Payne-Sturges, University of Maryland School of Public Health, United States

P03.3840 **Data Evaluation Criteria for Exposure Studies**
Nathan Mottl, U.S. Environmental Protection Agency (EPA), United States

P03.3850 **General Factors of the Korean Child-Specific Exposure Factors**
Wonho Yang, Daegu Catholic University, Korea (the Republic of)

P03.3860 **Regulating Chemical Exposures: Using Legal Epidemiology to Determine Enforceable PFAS Standards**
Jennifer Black, Cherokee Nation Assurance, contractor for the Centers for Disease Control and Prevention, United States

P03.3870 **Challenges in the Application of Systematic Review Methods for Environmental Hazard Identification: Lessons Learned and Future Considerations**
Suril Mehta, National Institute of Environmental Health Sciences (NIEHS), United States

P03.3880 **Students' Environmental Risk Perception in University of Catania (South Italy): Results of a Cross-Sectional Study**
Maria Fiore, University of Catania, Italy

P03.3920 **Use of Twitter Data to Improve Zika Virus Surveillance in the United States during the 2016 Epidemic**
Jun Wu, University of California, Irvine, United States

P03.3930 **Green Spaces and Self-Satisfaction and Social Contacts in Adolescents: The Caspian-V Study**
Sanam Hariri, Isfahan University of Medical Sciences, Iran (the Islamic Republic of)

OCCUPATIONAL ISSUES 3

P03.3940 **Lived Experiences of Heat Exposure as an Occupational Safety Hazard in Australia**
Alana Hansen, University of Adelaide, Australia

P03.3950 **Heat Exposure, Volume Status, and Kidney Tubular Injury in Washington Crop Workers**
June Spector, University of Washington, United States

P03.3960 **Prevalence and Risk Factors of Chronic Kidney Disease among Workers in the Brick Making Industry of La Paz Centro, Nicaragua**
Madeleine Scammell, Boston University School of Public Health, United States

P03.3970 **Cancer Risk in Drivers of Heavy Vehicles: Assessment of Exposure to Petroleum Hydrocarbons, Toxic Effects and Prevention Interventions**
Audil Rashid, PMAS Arid Agriculture University, Pakistan

P03.3980 **Occupational Physical Activity and Lung Cancer Risk among Participants of the Alberta's Tomorrow Project**
Yun Zhu, University of Montreal Hospital Research Centre, Canada

P03.3990 **Follow-Up Mortality Study of U.S. Railroad Right of Way Workers Having Many Common Health Hazards**
David Goldsmith, Georgetown University, United States

P03.4000 **Passive Samplers for the Assessment of Occupational Exposure to Flame Retardants among Canadian E-Waste Dismantlers**
Linh Nguyen, University of Toronto, Canada

P03.4010 **Occupational Exposures and Thyroid Disease Risk in Young Adults: Results from Project ELEFANT**
Hyang-Min Byun, Newcastle University, United Kingdom

P03.4030 **Exposure to Metal Fume Particulate Matter and Advance Glycation End Products in Welding Workers: A Longitudinal Study**
Ching-Huang Lai, National Defense Medical Center, Taiwan

P03.4040 **Exposure Neuroepidemiology Study among Occupational Groups with High Exposure to Aviation Emissions**
Faiza Naseem, Applied Mathematics, Govt. Degree College, Satellite Town, Pakistan

P03.4050 **Pulmonary Dysfunction in Indium Tin Oxide Exposed Workers**
Saou-Hsing Liou, National Health Research Institutes, Taiwan

P03.4060 **The Effect on Workers of Indoor Air Quality in Underground Commercial Spaces**
Mi Jung Jang, Seoul Medical Center, Korea (the Republic of)

P03.4070 **The Impact of an Occupational Injury on Developing Psychiatric Disorders in Taiwan**
Weishan Chin, National Health Research Institutes, Zhunan, Taiwan

P03.4080 **Epidemiological Profile of Poisoning in Workplace Compulsory Notifications in the Brazilian Notifiable Diseases Information System from Municipalities of Sao Paulo State**
Ana Paula Sacone da Silva Ferreira, School of Public Health, University of Sao Paulo, Brazil

P03.4110 **Profiling Noise Induced Hearing Loss among Selected Auto-Rickshaw Drivers in Chennai City, India: A Pilot Study**
Krishnendu Mukhopadhyay, Sri Ramachandra Medical College and Research Institute, Chennai, India

P03.4120 **Can Time-Lapse Photography Improve Task-Specific Risk Characterization in Informal Labor Sectors?**
Zoey Laskaris, Univeristy of Michigan School of Public Health, United States

Thursday, August 30, 2018

8:30 am - 10:00 am **O04.01A. Simulation, Scenario, and Policy Modeling of Air Pollution Emissions and Health**
Chair: Marianne Hatzopoulou, University of Toronto, Canada
Chair: Jun Wu, University of California, Irvine, United States

8:30 am - 8:45 am **O04.01.01. A Proof-Of-Concept Approach for Quantifying Multipollutant Health Impacts Using Joint Effects Models within the Open-Source BenMAP-CE Software Program**
Jason Sacks, U.S. Environmental Protection Agency (EPA), United States

8:45 am - 9:00 am **O04.01.02. Regional Assessment of Current and Future States of GHGs Emissions: Impacts of Transportation Policy Scenarios**
Maryam Shekarrizfard, University of Toronto, Canada

9:00 am - 9:15 am **O04.01.03. Estimation of the Effect of Hypothetical Air Pollution Scenarios on Lung Function in the Southern California Children's Health Study: An Application of G-Computation**
Robert Urman, University of Southern California, United States

9:15 am - 9:30 am **O04.01.04. Quantifying Health Benefits of Coal Power Plant Phase-Out in Canada and the U.S.: An Adjoint Sensitivity Analysis**
Amir Hakami, Carleton University, Canada

9:30 am - 9:45 am **O04.01.05. Application of Different Concentration-Response Functions to Estimate the Societal Benefits of Reducing PM2.5 and NOx Emissions**
Amanda Pappin, Statistics Canada, Canada

9:45 am - 10:00 am **O04.01.06. A Model of Ischaemic Heart Disease in the UK that Suggests Reductions in Air Pollution Increase Overall Disease Prevalence**
Paul Wilkinson, London School of Hygiene and Tropical Medicine (LSHTM), United Kingdom

8:30 am - 10:00 am **O04.01B. Climate and Temperature Effects**
Chair: Bin Jalaludin, University of New South Wales, Sydney, Australia
Chair: Martina Ragettli, Swiss Tropical and Public Health Institute, Switzerland

8:30 am - 8:45 am **O04.01.07. An Integrated Approach to the Development of Health-Related Climate Change Indicators for Australia**
Maryam Navi, University of Adelaide, Iran (the Islamic Republic of)

8:45 am - 9:00 am **O04.01.08. Building Vulnerability in a Changing Climate: Using Sensors to Track Environmental Conditions and Health Outcomes during a Heatwave in Low-Income Older Adults**
Augusta Williams, Harvard T.H. Chan School of Public Health, United States

9:00 am - 9:15 am **O04.01.09. Emergency Preparedness in Mi'kmaw Communities in Nova Scotia**
Amber MacLean-Hawes, The Confederacy of Mainland Mi'kmaq, Canada

9:15 am - 9:30 am **O04.01.10. Spatial Patterns of Heat Vulnerability Constituents across Massachusetts**
Leila Heidari, Boston University, United States

9:30 am - 9:45 am **O04.01.11. Air Conditioning and Heat-Related Mortality in U.S. and Japan: A Longitudinal Analysis**
Francesco Sera, London School of Hygiene and Tropical Medicine, United Kingdom

9:45 am - 10:00 am **O04.01.12. Population Adaptation Phenomena Modelled through Functional Regression**
Pierre Masselot, Institut National de la Recherche Scientifique, Canada

8:30 am - 10:00 am **O04.01C. Exposures and Effects in Communities**
Chair: Béatrice Fervers, Centre Léon Bérard, France
Chair: Aina Roca Barceló, Imperial College London, United Kingdom

8:30 am - 8:45 am **O04.01.13. Exposure Measurement Pilot Study for Children and Adults Using Synthetic Turf Fields with Recycled Tire Crumb Rubber Infill**
Elizabeth Irvin-Barnwell, U.S. Centers for Disease Control and Prevention/Agency for Toxic Substances and Disease Registry, United States

8:45 am - 9:00 am **O04.01.14. Air Pollution and Infectious Disease Burdens on Lung Function in the Eastern Caribbean**
Steve Whittaker, Yale School of Public Health, United States

9:00 am - 9:15 am **O04.01.15. Attitude Towards Livestock Farming Does Not Influence Associations between Farm Proximity and Respiratory Health in a Rural Population Study**
Lidwien Smit, Utrecht University, The Netherlands

9:15 am - 9:30 am **O04.01.16. Arsenic, One-Carbon Metabolism and Diabetes-Related Outcomes in the Strong Heart Family Study**
Miranda Spratlen, Columbia University Mailman School of Public Health, United States

9:30 am - 9:45 am **O04.01.17. A Suspected Mesothelioma Cluster in Colombia: What We Know**
Juan Ramos-Bonilla, Universidad de Los Andes, Colombia

9:45 am - 10:00 am **O04.01.18. Describing Roles for a Range of Natural Environments in Adverse Mental Health Outcomes and Neighborhood Social Cohesion across Metro Vancouver, Canada**
Emily Rugel, University of British Columbia, Canada

8:30 am - 10:00 am **O04.01D. Health Outcomes and Biomarkers Associated with Household Cooking and Biomass Burning - Part 2**
Chair: Jill Baumgartner, McGill University, Canada
Chair: Raphael Arku, University of Massachusetts, Amherst, United States

8:30 am - 8:45 am **O04.01.19. Cardiovascular and Respiratory Effects of a Cookstove Intervention in Two Rural Communities in Western Kenya**
Gregory Wellenius, Brown University School of Public Health, United States

8:45 am - 9:00 am **O04.01.20. Indoor Air Pollution and Reduced Lung Function in Biomass Exposed Women: A Cross Sectional Study in Pune District, India**
Rasmila Kawan, Heidelberg Institute of Public Health and International Center for Integrated Mountain Development, Nepal

9:00 am - 9:15 am **O04.01.21. Personal Exposure to Household Air Pollution and Lung Function in Rural Bangladesh: A Population Based Cross-Sectional Study**
Shyfuddin Ahmed, International Centre for Diarrhoeal Disease Research, Bangladesh

9:15 am - 9:30 am **O04.01.22. Assessing Changes in Exposure and Women's Health among Households Using Different Cooking Fuels in Chitwan, Nepal**
Parth Sarathi Mahapatra, International Centre for Integrated Mountain Development, Nepal

9:30 am - 9:45 am **O04.01.23. Fine Particulate Matter Exposure from Wood-Burning Cookstoves in Relation to Augmentation Index and Blood Pressure among Honduran Women**
Sarah Rajkumar, Colorado State University, United States

9:45 am - 10:00 am **O04.01.24. Exposure to Household Air Pollutants (HAP) and Microvascular Function (Reactive Hyperemia Index, RHI) in Rural Bangladesh: A Cross Sectional Study**
Mohammad Shahriar, University of Chicago, United States

8:30 am - 10:00 am **O04.01E. Investigating Exposures to PAHs**
Chair: Paul Scheepers, Radboudumc, The Netherlands
Chair: Zheng Li, U.S. Agency for Toxic Substances and Disease Registry, United States

8:30 am - 8:45 am **O04.01.25. Temporal Trend of Exposures to Polycyclic Aromatic Hydrocarbons and Bisphenol A during 2012-2016: A Comparison between China and the United States**
Yan Lin, University of California Los Angeles, United States

8:45 am - 9:00 am **O04.01.26. Identifying Prenatal PAH Exposure and DNA Methylation Changes in Cord Blood Using a Novel Analytic Approach**
Ya Wang, Columbia University, United States

9:00 am - 9:15 am **O04.01.27. Household-Level Population Estimates and Building Setbacks near Underground Natural Gas Storage Wells in PA, OH, NY, WV, MI, and CA**
Drew Michanowicz, Harvard T. H. Chan School of Public Health, United States

9:15 am - 9:30 am **O04.01.28. Validation of Silicone Wristbands as Passive Samplers for the Assessment of Exposure to Flame Retardants and Polycyclic Aromatic Hydrocarbons**
Marta Venier, Indiana University, United States

9:30 am - 9:45 am **O04.01.29. Critical Review: Human Health Literature Related to Unconventional Oil and Natural Gas Development**
Anna Rosofsky, Health Effects Institute, United States

9:45 am - 10:00 am **O04.01.30. Bioaccessibility of Polycyclic Aromatic Hydrocarbons in Airborne Particulate Matter Assessed by Simulated Lung Fluids: A Panel Study of Different Cities in Northern China**
Suhan Wang, School of Public Health, Sun Yat-sen University, China

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8:30 am - 10:00 am **O04.01F. New Methods and Novel Matrices in Chemical Monitoring**

Chair: Lee Blum, NMS Labs, United States

8:30 am - 8:45 am **O04.01.31. Method Development and Validation of Dried Blood Spots as a Tool for Mercury Exposure Assessment**
Andrea Santa-Rios, McGill University, Canada

8:45 am - 9:00 am **O04.01.32. Calibration and Validation of X-Ray Fluorescence Measurements for Non-Destructive Metal Exposure Assessment of Toenail Clippings from Nigeria**
Aaron Specht, Harvard T.H. Chan School of Public Health, United States

9:00 am - 9:15 am **O04.01.33. Moss Biomonitoring as an Alternative to Assess Exposure to Atmospheric Metals in Environmental Epidemiology: The Example of the Bramm Network and the Constances Cohort**
Emeline Lequy-Flahault, INSERM, France

9:15 am - 9:30 am **O04.01.34. Comparison and Agreement between Venous and Capillary Blood for the Analysis of Trace Elements**
Veronica Rodriguez Saldana, McGill University, Canada

9:30 am - 9:45 am **O04.01.35. Nutrition Transition and Total Nail Selenium in the Peruvian Amazon in the IMAS Study (Investigacion De Migracion, Ambiente, Y Salud)**
Stacy Pettigrew, State University of New York at Albany School of Public Health, United States

9:45 am - 10:00 am **O04.01.36. Silicone Cat Tags Detect Feline Flame Retardant Exposures**
Carolyn Poutasse, Oregon State University, United States

8:30 am - 10:00 am **O04.01G. Noise Effects - Part 2**

Chair: Mireille Toledano, Imperial College London, United Kingdom
Chair: Larisa Yankoty, Université de Montréal, Canada

8:30 am - 8:45 am **O04.01.37. Long-Term Residential Exposure to Environmental Noise and Cardiovascular Disease Onset: A Population-Based Cohort Study**
Larisa Yankoty, Université de Montréal, Canada

8:45 am - 9:00 am **O04.01.38. Time-Varying Aircraft Noise Exposure and Incident Hypertension in the Nurses' Health Study**
Chloe Kim, Boston University School of Public Health, United States

9:00 am - 9:15 am **O04.01.39. Long-Term Exposure to Noise and the Development of Diabetes and Hypertension in Toronto, Canada: A Cohort Study**
Saeha Shin, Public Health Ontario, Canada

9:15 am - 9:30 am **O04.01.40. Long-Term Transportation Noise Exposure and Incidence of Ischemic Heart Disease and Stroke**
Andrei Pyko, Karolinska Institutet, Sweden

9:30 am - 9:45 am **O04.01.41. Short-Term Nighttime Wind Turbine Noise and Cardiovascular Events: A Nationwide Case-Crossover Study from Denmark**
Aslak Harbo Poulsen, Danish Cancer Society Research Center, Denmark

9:45 am - 10:00 am **O04.01.42. Influence of Exposure Definition on the Association between Transportation Noise and Myocardial Infarction Mortality**
Danielle Vienneau, Swiss Tropical and Public Health Institute, Switzerland

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8:30 am - 10:00 am **O04.01H. PFAS and Metabolic Function**

Chair: Dean Baker, University of California, Irvine, United States
Chair: Timothy Buckley, U.S. Environmental Protection Agency (EPA), United States

8:30 am - 8:45 am **O04.01.43. Are Populations with Low Iodine Intakes More Vulnerable to Thyroid-Disrupting Effects of Perfluorinated Alkyl Acids (PFAAs)?**
Anders Glynn, Swedish Unviversity of Agricultural Sciences, Sweden

9:00 am - 9:15 am **O04.01.44. Exposure to Multiple PFASs during Early Pregnancy and Maternal and Neonatal Thyroid Function**
Emma Preston, Harvard T.H. Chan School of Public Health, United States

9:15 am - 9:30 am **O04.01.45. Perfluoroalkyl Substance Mixtures and Gestational Weight Gain among Mothers in the Health Outcomes and Measures of the Environment Study**
Megan Romano, Geisel School of Medicine at Dartmouth, United States

9:30 am - 9:45 am **O04.01.46. Exposure to Perfluoroalkyl Substances and Longitudinal Alterations in Glucose Metabolism among Overweight and Obese Hispanic Children: A Metabolomics Approach**
Tanya Alderete, University of Colorado Boulder, United States

9:45 am - 10:00 am **O04.01.47. Cross-Sectional Associations of Plasma Per- and Polyfluoroalkyl Substances with Lipid Profile among Pre-Diabetic Adults-Report from the Diabetes Prevention Program**
Pi-I Lin, Harvard Medical School and Harvard Pilgrim Health Care Institute, United States

9:45 am - 10:00 am **O04.01.48. Perfluoroalkyl Substances and Growth Outcomes through Puberty: Windows of Exposure Susceptibility**
Dania Valvi, Harvard T.H. Chan School of Public Health, United States

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8:30 am - 10:00 am **S04.01A. Neuroimaging in Studies of Children's Environmental Health**
Chair: Megan Horton, Icahn School of Medicine at Mount Sinai, United States

8:30 am - 8:45 am **S04.01.01. Prenatal Polybrominated Diphenyl Ether Serum Concentrations Are Associated with Intrinsic Functional Network Organization and Executive Functioning in Childhood**
Erik de Water, Icahn School of Medicine at Mount Sinai, United States

8:45 am - 9:00 am **S04.01.02. Understanding the Associations between Prenatal Dentine Manganese Exposure and Neurodevelopment through the Fusion of Multitask MRI Data**
Yuri Levin-Schwartz, Icahn School of Medicine at Mount Sinai, United States

9:00 am - 9:15 am **S04.01.03. Prenatal Polybrominated Diphenyl Ether (PBDE) Concentrations and Functional Connectivity of the Reading Network in a Community Sample of 5 Year-Old Children**
Amy Margolis, Columbia University, United States

9:15 am - 9:30 am **S04.01.04. Growing Up in Cincinnati: The Neuroimaging Effects of Ubiquitous Environmental Exposures**
Kim Cecil, Cincinnati Children's Hospital Medical Center, United States

9:30 am - 9:45 am **S04.01.05. Early Life Environmental Exposures and Brain Structural Alterations in Childhood**
Monica Guxens, Barcelona Institute for Global Health (ISGlobal), Spain

9:45 am - 10:00 am **S04.01.06. Panel Discussion**

8:30 am - 10:00 am **S04.01B. The Impact of Long-Range Wildfire Smoke Plumes on Air Quality and Health**
Chair: Beizhan Yan, Columbia University, United States
Chair: Ana Rappold, U.S. Environmental Protection Agency (EPA), United States

8:30 am - 8:45 am **S04.01.07. Fine Particulate Matter from Wildfires and Risk of Hospital Admissions in the Western United States**
Michelle Bell, Yale University, United States

8:45 am - 9:00 am **S04.01.08. Health Impacts Associated with Fine Particulate Matter and Ozone during a Wildfire: Evidence of Differential Effects Due to Measures of the Social Environment**
Colleen Reid, University of Colorado Boulder, United States

9:00 am - 9:15 am **S04.01.09. Impact of Long-Range Wildfire Smoke Plumes on Air Quality in New York City over the Past 10 Years**
Beizhan Yan, Columbia University, United States

9:15 am - 9:30 am **S04.01.10. Satellite-Based Daily PM2.5 Estimates during Fire Seasons in Colorado**
Guannan Geng, Emory University, United States

9:30 am - 9:45 am **S04.01.11. Forecasting Air Pollution in Australia from the Long-Range Transport of Wildfire Smoke and Prescribed Burns**
Martin Cope, Commonwealth Scientific and Industrial Research Organisation (CSIRO), Australia

9:45 am - 10:00 am **S04.01.12. Characterizing the Level and Distribution of Wildland Fire Smoke Impacts in the U.S. among Susceptible Populations**
Neal Fann, U.S. Environmental Protection Agency (EPA), United States

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10:00 am - 10:30 am **Break**

10:30 am - 12:00 pm **O04.02A. Building Ventilation and Indoor Air Quality: Monitoring, Intervention, Risk Assessment, and Benefits Analysis**
Chair: Zhihua (Tina) Fan, NJ Department of Health, United States
Chair: Carlyn Matz, Health Canada, Canada

10:30 am - 10:45 am **O04.02.01. Continuous Monitoring of PM2.5 in Finnish Office Buildings**
Samy Clinchard, 720 Degrees, Finland

10:45 am - 11:00 am **O04.02.02. Environmental Interventions in Primary Schools and Its Impacts on Indoor Air Quality and Student Health**
Nan Yan, University of Michigan, United States

11:00 am - 11:15 am **O04.02.03. Quantifying the Impact of Energy-Efficient Housing Interventions on Indoor Air Quality and Energy Consumption Using Energy, Airflow, and IAQ Co-Simulation**
Lindsay Underhill, Boston University School of Public Health, United States

11:15 am - 11:30 am **O04.02.04. Energy Savings, Emission Reductions, and Health Co-Benefits of the Green Building Movement**
Piers MacNaughton, Harvard T.H. Chan School of Public Health, United States

11:30 am - 11:45 am **O04.02.05. Variability in Ambient Air Pollution Infiltration and Its Impact on Personal Exposure**
Wenwei Che, The Hong Kong University of Science and Technology, Hong Kong

11:45 am - 12:00 pm **O04.02.06. Tightening Standards for Indoor Levels of PM2.5: A Promising Approach for Reducing PM2.5 Associated Mortalities in Urban China**
Yinping Zhang, Tsinghua University, China

10:30 am - 12:00 pm O04.02B. Effects of Temperature - Part 2
Chair: Tom Kosatsky, B.C. Centre for Disease Control, Canada
Chair: Rita Biel, McGill University, Canada

10:30 am - 10:45 am **O04.02.07. Interactive Effects of Air Pollution and Air Temperature on Preterm Delivery in 24 Major Cities across Canada**
Eric Lavigne, Health Canada, Canada

10:45 am - 11:00 am **O04.02.08. Regional Evidence-Based Extreme Cold Warning Thresholds Using Daily Mortality Data**
Sabit Cakmak, Government of Canada, Canada

11:00 am - 11:15 am **O04.02.09. The Role of Humidity in Associations of High Temperature with Mortality: A Multi-City Multi-Country Study**
Ben Armstrong, London School of Hygiene and Tropical Medicine, United Kingdom

11:15 am - 11:30 am **O04.02.10. Increased Impulsivity in Urban-Dwelling Teens: Role of Ambient Air Temperature and Lack of Neighborhood Greenspace**
Diana Younan, University of Southern California, United States

11:30 am - 11:45 am **O04.02.11. Ambient Temperature and Preterm Birth: A Retrospective Observational Study of 30 Million U.S. Singleton Births**
Shengzhi Sun, Brown University, United States

11:45 am - 12:00 pm **O04.02.12. Evaluation of a Smart Phone Application Providing Citizen Services during Extreme Temperature Events: The Treasure and Extrema Projects**
Klea Katssouyanni, National and Kapodistrian University of Athens/King's College London, Greece

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10:30 am - 12:00 pm O04.02C. Global Trends in Human Biomonitoring
Chair: Liz Boyle, National Academies of Sciences, Engineering, and Medicine, United States
Chair: Brian Curwin, U.S. National Institute for Occupational Safety and Health (NIOSH), United States

10:30 am - 10:45 am **O04.02.13. German Environmental Specimen Bank: Urine Samples from 1999-2017 Document Rapid Increase in Exposure to the Para-Phthalate Plasticizer DEHTP**
Frederik Lessmann, Institute for Occupational and Maritime Medicine (ZfAM), University Medical Centre Hamburg-Eppendorf, Germany

10:45 am - 11:00 am **O04.02.14. Human Exposure to Mercury during the Last Half-Century: Worldwide Trends in Human Blood and Breast Milk Levels and Their Implications on Health**
Brij Sharma, Masaryk University, Czechia

11:00 am - 11:15 am **O04.02.15. Relationship between AHR Genetics and Dioxin Half-Life in Seveso Women**
Jennifer Ames, University of California, Berkeley, United States

11:15 am - 11:30 am **O04.02.16. Persistent Organochlorine Pollutants: Genetic Variations Associated with DDE and PCB153 Blood Levels among Women in France**
Takiy eddine Berrandou, Cancer & Environment Group, Center for Research in Epidemiology and Population Health (CESP), INSERM, University Paris-Sud, University Paris-Saclay, France

11:30 am - 11:45 am **O04.02.17. Biomonitoring-Based Antibiotic Body Burden of Adults in Shanghai**
Hexing Wang, Fudan University, China

11:45 am - 12:00 pm **O04.02.18. Relation of Maternal Serum Concentrations of Persistent Organic Pollutants to Vitamin D in Southern California**
Gayle Windham, California Department of Public Health, United States

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10:30 am – 12:00 pm **O04.02D. Greenness Effects – Part 3**

Chair: Kai Zhang, University of Texas Health Science Center at Houston, United States
Chair: Lorien Nesbitt, University of British Columbia, Canada

10:30 am - 10:45 am **O04.02.19. Health Risk Assessment of Community Riverside Regeneration in Barcelona**
David Rojas-Rueda, Barcelona Institute for Global Health (ISGlobal), Spain

10:45 am - 11:00 am **O04.02.20. Associations between Area-Level Greenness and Infant Mortality Rates in Philadelphia, PA**
Leah Schinasi, Drexel University, United States

11:00 am - 11:15 am **O04.02.21. Greater Residential Tree Cover Is Associated with Reduced Stress-Related Physiological Dysregulation in Residents of Central North Carolina**
Andrey Egorov, U.S. Environmental Protection Agency (EPA), United States

11:15 am - 11:30 am **O04.02.22. Residential Greenness and Breast Cancer Survival after a Breast Cancer Diagnosis**
Peter James, Harvard Pilgrim Health Care Institute and Harvard Medical School, United States

11:30 am - 11:45 am **O04.02.23. Residential Greenness and Mortality in a Prospective Cohort of Oldest-Old Women and Men in China**
John Ji, Duke Kunshan University, China

11:45 am - 12:00 pm **O04.02.24. The Association between Long-Term Neighborhood Greenness and Lethal Prostate Cancer in a Prospective Cohort Study of Male Health Professionals in the United States**
Hari Iyer, Harvard T. H. Chan School of Public Health, United States

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10:30 am – 12:00 pm **O04.02E. Neurodevelopment in Children**

Chair: Machiko Minatoya, Hokkaido University, Japan
Chair: Deborah Dewey, University of Calgary, Canada

10:30 am - 10:45 am **O04.02.25. Postnatal Exposure to Secondhand Smoke Measured with Urinary Cotinine and Neurodevelopment at 36 Months after Considering Outdoor Fine Particle (PM2.5)**
Myeongjee Lee, Ewha Womans University, Korea (the Republic of)

10:45 am - 11:00 am **O04.02.26. Prenatal Exposure to Bisphenol A and Childhood Neurodevelopment in Shandong, China**
Yan Zhang, Department of Environmental Health, School of Public Health, Shanghai Jiao Tong University School of Medicine, Shanghai, China

11:00 am - 11:15 am **O04.02.27. Sensitive Windows of Manganese Exposure and Frontal Cortex Function in Adolescents**
Julia Bauer, Boston University School of Public Health, United States

11:15 am - 11:30 am **O04.02.28. The Association between Prenatal Selenium-Related DNA Methylation Modifications in Placenta and Newborn Neurobehavioral Development: An Epigenome-Wide Study of Two U.S. Birth Cohorts**
Fu-Ying Tian, Emory University, United States

11:30 am - 11:45 am **O04.02.29. Neonatal Vitamin D Status in Relation to Autism Spectrum Disorder and Developmental Delay in the Charge Case-Control Study**
Rebecca Schmidt, University of California Davis, United States

11:45 am - 12:00 pm **O04.02.30. Maternal Thyroid Anomalies and Risk of Autism Spectrum Disorders**
Ran Rotem, Harvard T.H. Chan School of Public Health, United States

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10:30 am – 12:00 pm **O04.02F. New Methods, Models and Tools in Chemical Exposure Estimation**

Chair: Erin Haynes, University of Cincinnati, United States
Chair: Sonja Sax, Ramboll, United States

10:30 am - 10:45 am **O04.02.31. A New Analysis and Visualization Tool to Identify Chemical Exposure Disparities by Demographic Traits**
Vy Nguyen, University of Michigan, United States

10:45 am - 11:00 am **O04.02.32. Using Sheds-S/D Model to Estimate Soil and Dust Ingestion Rates for Adults**
Heidi Hubbard, ICF International, United States

11:00 am - 11:15 am **O04.02.33. Using Geospatial Methods to Quantify the Co-Dispersion of Mercury Sources and Exposures in River Otter (Lontra Canadensis) for Risk Prediction**
Kristin Eccles, University of Ottawa, Canada

11:15 am - 11:30 am **O04.02.34. INLA-SPDE Models to Predict the Spatial Distribution of Beta-Hexachlorocycloexane Haematic Levels in a Heavily Polluted Area**
Matteo Scortichini, Department of Epidemiology of Lazio Regional Health Service, Italy

11:30 am - 11:45 am **O04.02.35. Modeling Exposure Reduction for Personal Level Interventions**
Miranda Loh, Institute of Occupational Medicine, United Kingdom

11:45 am - 12:00 pm **O04.02.36. Ethical Considerations in Modeling and Tools for Measuring Exposure**
Erin Haynes, University of Cincinnati, United States

10:30 am - 12:00 pm O04.02G. PFAS and Other Health Outcomes
Chair: Marike Kolossa-Gehring, German Environment Agency (UBA), Germany
Chair: Scott Bartell, University of California, Irvine, United States

10:30 am - 10:45 am **O04.02.37. Perfluoroalkyl Substances (PFASs) and Liver Inflammation and Fibrosis in Children with Nonalcoholic Fatty Liver Disease (NAFLD)**
Ran Jin, University of Southern California, United States

10:45 am - 11:00 am **O04.02.38. Prenatal Exposure to PFAS and Evaluation of Child Attentional Function at 4-6 Years of Age: The INMA Study, Spain**
Maria-Jose Lopez-Espinosa, FISABIO. CIBERESP, Spain

11:00 am - 11:15 am **O04.02.39. Perfluoroalkyl Substances (PFAS) Blood Levels and Health Outcomes in Residents Following Contamination of the Community Water Supply in Paulsboro, New Jersey**
Judith Graber, Rutgers The State University of New Jersey, United States

11:15 am - 11:30 am **O04.02.40. Breast Cancer Risk and Serum Levels of Per- and Poly-Fluoroalkyl Substances (PFASs): A Case-Control Study Nested in the California Teachers Study**
Peggy Reynolds, Cancer Prevention Institute of California, United States

11:30 am - 11:45 am **O04.02.41. Concentrations of Endocrine Disruptors in Newborn Dried Blood Spots and Child Behavior**
Akhgar Ghassabian, New York University School of Medicine, United States

11:45 am - 12:00 pm **O04.02.42. Concentrations of Endocrine Disrupting Chemicals in Newborn Blood Spots and Early Development, Upstate Kids Study**
Erin Bell, University at Albany, United States

10:30 am - 12:00 pm O04.02H. Air Pollution Accountability and Quasi Experimental Studies
Chair: Chen Chen, Yale University, United States
Chair: Paul Villeneuve, Carleton University, Canada

10:30 am - 10:45 am **O04.02.43. Triggering of ST-Elevation Myocardial Infarction by Particulate Air Pollution Concentrations in Monroe County, New York: Before, During, and After Multiple Air Quality Interventions and Policies - The Rochester Accountability Study**
Meng Wang, University of Rochester Medical Center, United States

10:45 am - 11:00 am **O04.02.44. The Effect of Environmental Policies and Hospital Visit Rate by Asthma in Seoul, Korea: Quasi-Experimental Study**
Hyomi Kim, Korea University, Korea (the Republic of)

11:00 am - 11:15 am **O04.02.45. Does the Association between Cardiovascular Hospital Admissions and Fine Particle Concentrations Change Before, During, and After Implementation of Multiple Environmental Policies? The New York State Accountability Study**
Wangjian Zhang, State University of New York, United States

11:15 am - 11:30 am **O04.02.46. Air Quality Management Policy and Reduced Mortality Rates in Seoul Metropolitan Area: A Quasi-Experimental Study**
Changwoo Han, Seoul National University College of Medicine, Korea (the Republic of)

11:30 am - 11:45 am **O04.02.47. A Quantitative Analysis of Health Risk Perception, Exposure Levels, and WTP/WTA of PM2.5 during the 2014 Nanjing Youth Olympic Games**
Lei Huang, Nanjing University, China

11:45 am - 12:00 pm **O04.02.48. Impact of Improved Air Quality and Genetics on Aging Lungs**
Tamara Schikowski, IUF-Leibniz Research Institute for Environmental Medicine, Germany

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10:30 am - 12:00 pm **O04.02I. Social and Environmental Determinants and Health - Part 2**

Chair: Victoria Arrandale, Occupational Cancer Research Centre, Cancer Care Ontario, Canada
Chair: Anisma Gokoel, Academic Hospital Paramaribo, Suriname

10:30 am - 10:45 am **O04.02.49. Effects of Night-Time Screen-Based Media Device Use on Adolescents' Sleep and Health-Related Quality of Life**
Mireille Toledano, Imperial College London, United Kingdom

10:45 am - 11:00 am **O04.02.50. Correlates of Stress and Depression in Early Pregnancy in a Low-Income Minority Population**
Claudia Toledo-Corral, California State University, United States

11:00 am - 11:15 am **O04.02.51. The Impact of Socio-Environmental Drivers and Japanese Encephalitis in Shaanxi, China, a Bayesian Spatial Analysis**
Xin Qi, Xi'an Jiaotong University, China

11:15 am - 11:30 am **O04.02.52. Exploring Socio-Environmental Determinants of Pediatric Asthma Disparities in South Carolina**
Matthew Bozigar, Medical University of South Carolina, United States

11:30 am - 11:45 am **O04.02.53. Assessing Associations between School Facility Condition, Neighborhood Environment, and Respiratory Health in Public Schools: An Application of Ultrahigh Dimensional Variable Selection Method on Big Data**
Yi Lu, University at Albany, State University of New York Upstate Medical University, United States

11:45 am - 12:00 pm **O04.02.54. Preventing Poorer Health and Shorter Lives**
Adetoun Mustapha, Imperial College London, Nigeria

10:30 am - 12:00 pm **S04.02A. Innovation in Community-Based Assessment of Residential Wood Smoke Exposure, Health and Solutions**

Chair: Ian Longley, NIWA Ltd, New Zealand
Chair: Fay Johnston, University of Tasmania, Australia
Chair: Amanda Wheeler, University of Tasmania, Australia

10:30 am - 10:45 am **S04.02.01. Using Sensors to Distinguish Indoor and Outdoor Source Mechanisms and the Role of Interventions on Particulate Matter Exposure in Smoke-Impacted Homes**
Ian Longley, NIWA Ltd, New Zealand

10:45 am - 11:00 am **S04.02.02. Systematic Identification and Prioritization of Communities Impacted by Residential Woodsmoke in British Columbia, Canada**
Sarah Henderson, B.C. Centre for Disease Control, Canada

11:00 am - 11:15 am **S04.02.03. Mobile Monitoring Capability for Citizen Science Approaches to Smoke Exposure Mapping**
Michael Brauer, University of British Columbia, Canada

11:15 am - 11:30 am **S04.02.04. Using Distributed Air Sampling to Distinguish Spatial Contributions of Woodsmoke from Other Particulate Sources in a Medium-Sized City**
Jane Clougherty, Drexel University Dornsife School of Public Health, United States

11:30 am - 11:45 am **S04.02.05. Informing Interventions through Use of a Dense Monitoring Network for Rural Woodsmoke Impacted Communities**
Curtis Noonan, University of Montana, United States

11:45 am - 12:00 pm **S04.02.06. Global Evidence of Adverse Health Effects Associated with Residential Wood-Burning**
Jennifer Peel, Colorado State University, United States

12:00 pm - 1:00 pm **Closing Remarks & Awards Ceremony**

Chair: Cecilia Alcala, Tulane University School of Public Health and Tropical Medicine, United States
Chair: Frauke Hennig, Institute of Occupational, Social and Environmental Medicine, Germany
Chair: Hind Sbihi, University of British Columbia, Canada
Chair: Julie Shu-Li Wang, National Health Research Institutes, Taiwan

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1:00 pm - 5:30 pm **Optional Excursions**

1:30 pm - 5:00 pm **Ancillary Workshops**

1:30 pm - 5:00 pm **Translating Research on Recycled Tire Crumb Rubber: Opportunities for International Cooperation Workshop (Closed Meeting)**
José Zambrana, U.S. Environmental Protection Agency (EPA), United States
Kent Thomas, U.S. Environmental Protection Agency (EPA), United States
Scott Masten, NTP, National Institute of Environmental Health Sciences (NIEHS), United States
Patty Wong, California Environmental Protection Agency (CalEPA), United States
Randy Maddalena, Lawrence Berkeley National Laboratory (LBNL), United States
Angela Angela Ragin-Wilson, U.S. Centers for Disease Control and Prevention (CDC)/ATSDR, United States
Eric Hooker, U.S. Consumer Product Safety Commission (CPSC), United States
Elizabeth Irvin-Barnwell, U.S. Centers for Disease Control and Prevention (CDC)/ATSDR, United States
Annette Guiseppi-Elie, U.S. Environmental Protection Agency (EPA), United States
Georgia Roberts, National Toxicology Program, United States
Wouter ter Burg, Centre for Safety of Substances and Products, National Institute for Public Health and the Environment, The Netherlands

1:30 pm - 5:00 pm **Introduction to APEX: Estimating Population-Based Air Pollutant Exposure, Dose, and Health Risk Workshop (Open to All Conference Attendees)**
Stephen Graham, U.S. Environmental Protection Agency (EPA), United States
Graham Glen, ICF International, United States

1:30 pm - 5:00 pm **Science and Policy of Organohalogens: Utilizing the Chemical Class Concept, Environmental Epidemiology and Exposure Science to Impact Policy and Reduce the Use of Chemicals of Concern. (Open to All Conference Attendees)**
Linda Birnbaum, National Institute of Environmental Health Sciences (NIEHS), United States
Miriam Diamond, University of Toronto, Canada
Tony Fletcher, Public Health England, United Kingdom
Arlene Blum, University of California, Berkeley, and Green Science Policy Institute, United States
Tom Bruton, Green Science Policy Institute, United States

1:30 pm - 5:00 pm **Human Biomonitoring: Developing a Shared Vision for National Programs Workshop (Open to All Conference Attendees)**
Annie St-Amand, Health Canada, Canada
Shoji Nakayama, National Institute for Environmental Studies, Japan
Antonia Calafat, U.S. Centers for Disease Control and Prevention (CDC), United States
Marike Kolossa-Gehring, German Environment Agency (UBA), Germany
André Conrad, German Environment Agency (UBA), Germany
Clémence Fillol, Santé Publique France, France
Jiyoung Yoo, National Institute of Environmental Research, Korea (the Republic of)

1:30 pm - 5:00 pm **Canadian Urban Environmental Health Research Consortium (CANUE) Strategic Plan Review Workshop (Closed Meeting)**
Eleanor Setton, CANUE Managing Director, University of Victoria, Canda
Jeffrey Brook, University of Toronto, Canada

1:30 pm - 5:00 pm **MIREC Research Platform Workshop; Celebrating 10 Years of Collaborations and Planning for the Future Workshop (Closed Meeting)**
Tye Arbuckle, Health Canada, Canada
Robin Shutt, Health Canada, Canada
William Fraser, University of Sherbrooke & CHU Sainte-Justine Hospital, Montreal, Canada
Nicole Lupien, MIREC Research Platform and MIREC Biobank, CHU Sainte-Justine Hospital, Montreal, Canada

1:30 pm - 5:00 pm **Unleashing the Power of Prevention: Mobilizing the Science of Environmental Health to Prevent Disease Workshop (Open to All Conference Attendees)**
Bruce Lanphear, Simon Fraser University, Canada
Erica Phipps, Canadian Partnership for Children's Health and Environment, Ottawa, Canada

1:30 pm - 5:00 pm **Assessing Air Pollution Exposures in Cohort Studies in the Asia-Pacific Region Workshop (Open to All Conference Attendees)**
Bin Jalaludin, University of New South Wales, Sydney, Australia
Yun-Chul Hong, Seoul National University, Korea (the Republic of)

KAUNAS, LITHUANIA

ISES-ISIAQ 2019 Joint Meeting

The built, natural and social environments: impacts on exposures, health and well-being

This joint meeting aims at understanding the interactions between numerous and complex factors affecting healthy living, focusing on air pollutant exposure in built environment, and enriching the discussions to the effects of natural and social environments.

The topics to be discussed will include, but are not limited to:

- Advancing research/knowledge in an imperfect world: strategies, sampling, statistics
- Sources and emissions
- Concentrations, exposure, hazard, and risk assessment
- Exposure assessment methods, models, simulation
- Health, individuals, biomonitoring, and biological response
- Perception, communication, policy
- Comfort, productivity, community health and wellbeing
- Exposure control strategies, practices

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2B Technologies

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Institute for Exposomic Research

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Cambridge Isotope Laboratories, Inc. isotope.com

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Exhibitors

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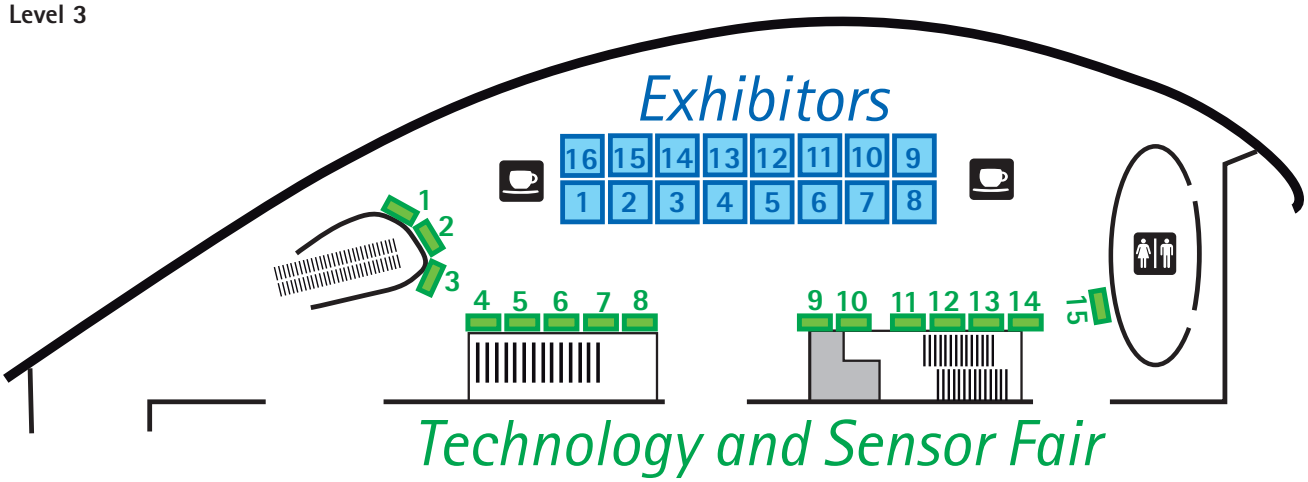
1	Creme Global
2	Icahn School of Medicine at Mount Sinai (ISMMS)
3	Public Health Ontario
4	Access Sensor Technologies
5	American Geophysical Union (AGU)
6	2B Technologies
7	ICF International
8	International Journal of Environmental Research and Public Health (IJERPH)
9	Green Science Policy Institute
10	CANUE: The Canadian Urban Environmental Health Research Consortium
11	ISOTOPE: Cambridge Isotope Laboratories Inc.
12	National Institute of Environmental Health Science (NIEHS)
13	Journal of Exposure Science & Environmental Epidemiology (JESEE) and ISES Membership Information
14	EPIDEMIOLOGY Journal and ISEE Membership Information
15	Environment and Climate Change Canada (ECCC)
16	U.S. Environmental Protection Agency (EPA) Office of Research and Development

Level 3



TECHNOLOGY AND SENSOR FAIR

The Technology and Sensor Fair & Chapters and Committees Fair will be held in the Parliament Foyer on Wednesday August 29 at 5:45 pm.

Booth	Name
1	**Convergence Instruments** Convergence Instruments will demonstrate a Noise Sentry WiFi-connected integrating Sound Level Meters, as well as a new cloud service. This service allows participants to monitor and log sound levels simultaneously at many locations, and send alerts through email.
2	**Entanglement Technologies: AROMA-VOC Chemical Vapor Analyzer** AROMA is a mobile, real-time chemical analyzer that delivers robust, part-per trillion, speciated chemical analysis of volatile organic compounds (VOCs) and cVOCs.
3	**Evidence Partners: DistillerSR Systematic Review and Literature Review Software** DistillerSR is an advanced systematic review software, helping researchers around the world increase the efficiency of their reviews.
4	**Utah Pediatric Research Using Integrated Sensor Monitoring (PRISMS): Informatics Ecosystem** The Utah PRISMS Informatics Ecosystem is a comprehensive suite of standards-based, open-source informatics tools and platforms that is aligned with the goals of modern environmental health and exposomic research by supporting meaningful use of sensor, modeled and biomedical data.
5	**The Los Angeles Pediatric Research Using Integrated Sensor Monitoring (PRISMS): Center Breathe Kit** The Los Angeles PRISMS Center Breathe Kit is an end-to-end secure, wireless informatics platform that integrates and analyzes data from a suite of personal environmental (eg, air pollution) and physiological sensors in real time to enable cutting-edge environmental health studies of pediatric asthma.
6	**The University of Washington Total Exposure Monitoring Unit (TEMU) System for National Institutes of Health (NIH) Pediatric Research Using Integrated Sensor Monitoring (PRISMS) Asthma Research** The University of Washington TEMU monitoring system was developed for the NIH PRISMS program for monitoring environmental exposures and asthma exacerbation in pediatric asthma studies.
7	**SMARTPLANS: Simulation Model to Assess Ramifications of Transportation Plans & Land Use Scenarios** SMARTPLANS is a user friendly software that can be used as a virtual laboratory to evaluate alternate land use and transportation scenarios to promote healthier cities.
8	**Spatiotemporal Augmented Representation of Indoor Air Quality** Spatiotemporal Augmented Representation of Indoor Air Quality was designed as an augmented reality (AR) system that takes real time air quality data from multiple sensors and creates a spatial map of these conditions.
9	**2BTech AQTreks & Community AQ** Bring air quality (AQ) monitoring to your community with CommunityAQ.

10 **U.S. Environmental Protection Agency (EPA):**

Computational Toxicology Dashboard
The Computational Toxicology (CompTox) Dashboard is part of a suite of dashboards developed by U.S. EPA to help evaluate the safety of chemicals. The CompTox Dashboard provides access to a variety of information on over 760,000 chemicals currently in use. More information available at https://comptox.epa.gov.

EnviroAtlas
EnviroAtlas is a web-based tool that combines maps, analysis tools, and interpretive information on ecosystem services. More information available at https://www.epa.gov/enviroatlas.

11 **U.S. Environmental Protection Agency (EPA):**

Air Sensor Toolbox
Air Sensor Toolbox provides information for citizen scientists and others on how to select and use low-cost, portable air sensor technology and understand results from monitoring activities. The information can help the public learn more about air quality in their communities. More information available here https://www.epa.gov/air-sensor-toolbox.

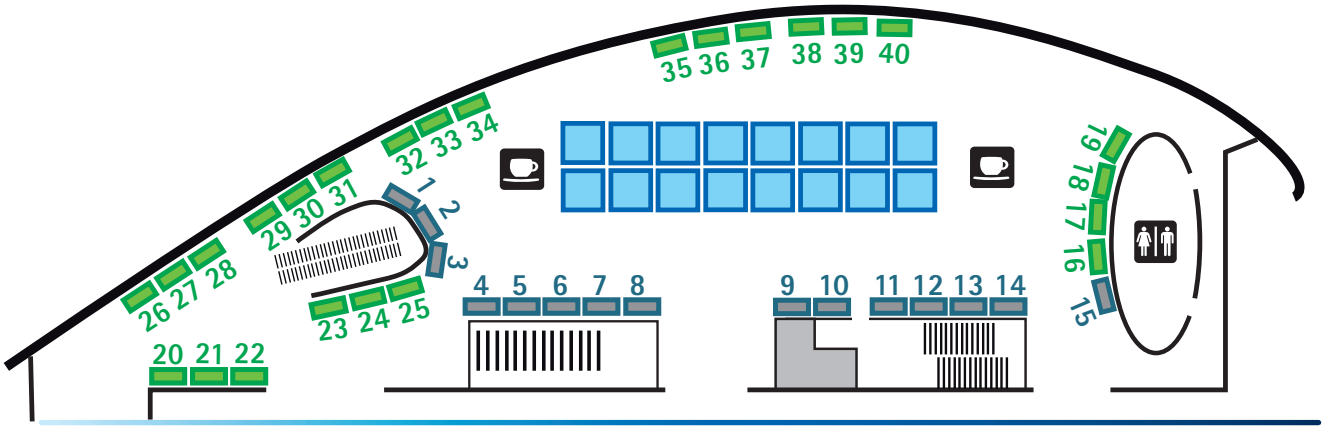
Smoke Sense
U.S. EPA researchers are conducting a citizen science study called Smoke Sense to: Determine the extent to which exposure to wildland fire smoke affects health and productivity, and develop health risk communication strategies that protect public health during smoke days. Individuals who want to contribute to science can participate in the study by using the Smoke Sense app, a publicly available mobile application. More information available at https://www.epa.gov/air-research/smoke-sense-study-citizen-science-project-using-mobile-app.

12 **ConsExpo Web Tool**
ConsExpo Web Tool estimates the consumer exposure to substances in consumer products.

13 **DERBI: Digital Exposure Report-Back Interface**
DERBI is an open source digital tool to help researchers report personal exposure results to study participants.

14 **Health Canada and Statistics Canada: Canadian Health Measures Survey – Human Biomonitoring**
Health Canada and Statistics Canada will demonstrate methods and technologies developed over the past decade to conduct large population based surveys and human biomonitoring of environmental chemicals under the Canadian Health Measures Survey.

15 **AirSENCE: Air SENsor for Chemicals in the Environment**
AirSENCE device can be mounted almost anywhere to give both indoor and outdoor air quality readings. The device consists of a panel of sensors to detect the levels of five common air pollutants: nitrogen oxides, ozone, carbon monoxide, carbon dioxide, and particulate matter. AirSENCE is a smart device that can translate the air quality to give an overall estimate of one's personal environment's air quality.



CHAPTERS AND COMMITTEES FAIR

Representatives for 25 ISES and ISEE chapters and committees will be on hand to showcase their activities and recruit members. Enjoy a complimentary drink and appetizers in the Parliamentary Foyer while learning more about how to get involved in ISES and ISEE.

Booth	Name
16	ISES Awards Committee
17	ISES Ecological Working Group
18	ISES Publications Committee
19	ISES Nominations Committee
20	ISEE Students and New Researchers Network
21	ISES Student and New Researcher Committee
22	ISES Diversity Committee
23	ISES Communication and Outreach Committee
24	ISES General Scientific Meetings Committee
25	ISES Membership Committee
26	ISEE Europe Chapter
27	ISEE Africa Chapter
28	ISEE Capacity Building and Education Committee (CAPE)
29	ISEE Eastern Mediterranean Chapter
30	ISEE Latin American Chapter
31	ISEE Communications Committee
32	ISEE Annual Conference Committee
33	ISEE Ethics and Philosophy Committee
34	ISEE Membership Committee
35	ISES Finance Committee
36	ISES Chapters Committee
37	ISES Canada Chapter
38	ISES Europe Regional Chapter
39	ISES East Asia Chapter
40	ISEE Asia Chapter

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