# ICCVAM Ten-Year Anniversary Symposium

**Celebrating the Advancement of Public Health and Animal Welfare with Sound Science: Envisioning New Directions in Toxicology**

***Tuesday, February 5, 2008***

## Biographical Sketches of Speakers and Panelists

**Samuel Wilson, M.D.,** is Acting Director of the National Institute of Environmental Health Sciences (NIEHS) and the National Toxicology Program. He has been instrumental in developing NIEHS' programs in genetic susceptibility, functional genomics, children's health research, minority institutions' research, and community outreach. Dr. Wilson received his M.D. from Harvard University, and completed postdoctoral training in biochemistry at Dartmouth Medical School and the National Heart Institute of the National Institutes of Health. He joined NIEHS in 1996 as Deputy Director and Chief of the DNA Repair and Nucleic Acid Enzymology Section. Prior to his work at NIEHS, Dr. Wilson was a Research Scientist and later Chief of the Nucleic Acid Enzymology Section in the Laboratory of Biochemistry at the National Cancer Institute. The author of more than 300 research articles, Dr. Wilson is an associate editor of the professional journal *DNA Repair* and is on the editorial board of the *Annual Review of Medicine*; he has also served on the editorial boards of *DNA Repair* and *The Journal of Biological Chemistry*.

**William Stokes, D.V.M., DACLAM,** is Director of NICEATM at the National Institute of Environmental Health Sciences (NIEHS) and Executive Director of ICCVAM, where he directs the scientific evaluation of new chemical and product safety assessment methods that support improved protection of human health and improved animal welfare. Dr. Stokes is an Assistant Surgeon General and Rear Admiral in the U. S. Public Health Service Commissioned Corps, and served as the Chief Veterinary Officer for the U.S. Public Health Service from 2003-07. Dr. Stokes earned his D.V.M. from the Ohio State University and is board certified as a Diplomate in the American College of Laboratory Animal Medicine. He completed a residency in laboratory animal medicine at the U.S. Army Medical Research Institute of Infectious Diseases and served as chief of Veterinary Services at Tripler Army Medical Center. Dr. Stokes transferred to the U.S. Public Health Service Commissioned Corps in 1986 as Animal Program Director for the National Institute of Child Health and Human Development. At NIEHS, he has served as the Animal Program Director, Chief of the Comparative Medicine Branch, and Associate Director for Animal and Alternative Resources. Dr. Stokes is a former Council member of the Institute of Laboratory Animal Research at the National Research Council. He is a recipient of the NIH Directors Award and the Russell and Burch Award from the Humane Society of the United States.

**Marilyn Wind, Ph.D.,** is the Deputy Associate Executive Director in the Directorate for Health Sciences at the Consumer Product Safety Commission (CPSC). She has been at the Commission for 28 years, and has been the principal representative from the CPSC to ICCVAM since ICCVAM's inception. She currently serves as the Chair of ICCVAM. Dr. Wind has a Ph.D. in pharmacology from New York University School of Medicine and did her postdoctoral work in teratology at the National Institute of Dental Research. In addition to being current Chair and past Vice-Chair of ICCVAM, Dr. Wind has served as Chair of the ICCVAM Acute Toxicity Working Group and Co-Chair of the Endocrine Disruptors Working Group. She has also served on the ICCVAM Ocular Toxicity Working Group, the Five-Year Plan Subcommittee, the Immunotoxicity Working Group, and the Reproductive and Developmental Toxicity Working Group. Dr. Wind is the CPSC representative to the National Toxicology Program (NTP) Executive Committee, the CPSC representative to the NTP Center for the Evaluation of Risk to Human Reproduction Core Committee, and the Chairman of the NTP Interagency Committee for Chemical Evaluation and Coordination.

**Andrew Rowan, D. Phil.,** is the Executive Vice-President of Operations at the Humane Society of the United States and Chief Executive Officer, Humane Society of the United States - Humane Society International. Dr. Rowan also serves as an Adjunct Professor at the Cummings School of Veterinary Medicine-Tufts University in Massachusetts. His association with Tufts University dates back to 1985, and positions he has held there include Professor and Chair in the Department of Environmental Studies, and Director of the Center for Animals and Public Policy. His professional honors include the Felix Wankel Prize for Animal Protection Research and the Russell and Burch Award for Promotion of Alternatives. He is a Fellow of the American Association for the Advancement of Science and has served on numerous advisory boards and organization boards of directors. Dr. Rowan has written numerous scientific articles on animal research and research ethics, animal control and human-animal interactions. He is also the founding editor (1987-1996) of *Anthrozoös*, a journal on human-animal-environment interactions.

**Bernard A. Schwetz, D.V.M., Ph.D.,** retired from the U.S. Department of Health and Human Services (HHS) in September 2007, where he had served as Director of the HHS Office for Human Research Protections (OHRP) since February 2003. Dr. Schwetz earned his D.V.M. from the University of Minnesota and his Ph.D. in pharmacology from the University of Iowa. Prior to joining OHRP, Dr. Schwetz held various positions at the Food and Drug Administration (FDA), including Director of the National Center for Toxicological Research, Acting Deputy Commissioner and Senior Advisor for Science, Chair of the agency's Institutional Review Board and Senior Advisor for Science. He served as the Acting Commissioner of the FDA from January 2001 to February 2002. While at FDA, he was also a Distinguished Scientist at the University of Maryland, College Park. Before joining FDA, Dr. Schwetz was the Acting Director of the Environmental Toxicology Program at the National Institute of Environmental Health Sciences, and was the Associate Director of the National Toxicology Program there. A retired Diplomat of the American Board of Toxicology and Honorary Diplomat of the American Veterinary Epidemiology Society, Dr. Schwetz is an elected member of the National Academy of Sciences Institute of Medicine. In addition to numerous other awards during his career, Dr. Schwetz received the U.S. Government's Meritorious Executive Presidential Award, the HHS Secretary's Recognition Award, the Distinguished Service Award of the American College of Toxicology and the Merit Award of the Society of Toxicology.

**Daniel Krewski, Ph.D.,** is Professor of Medicine and of Epidemiology and Community Medicine, and Director of the McLaughlin Centre for Population Health Risk Assessment, at the University of Ottawa. He is involved in a number of activities in the area of population health risk assessment within the new Institute of Population Health. He is also an Adjunct Research Professor of Statistics in the Department of Mathematics and Statistics at Carleton University. Dr. Krewski received his Ph.D. in mathematics and statistics from Carleton University, and his M.H.A. from the University of Ottawa. Prior to joining the University of Ottawa faculty, Dr. Krewski served as Director of Risk Management and as Director of the Bureau of Chemical Hazards with Health Canada. His research interests include epidemiology, biostatistics, risk assessment, and risk management. Dr. Krewski has published more than 400 journal articles and book chapters in the areas of risk assessment, biostatistics, and epidemiology, and is Associate Editor of the journal *Risk Analysis*. He is a Lifetime National Associate of the U.S. National Academy of Sciences, a Fellow of the American Statistical Association, and has served on numerous boards and committees studying epidemiology and public health issues.

**John Bucher, Ph.D., DABT,** is Associate Director of the National Toxicology Program (NTP) at the National Institute of Environmental Health Sciences (NIEHS). In this role, he has administrative oversight for the NTP Toxicology and Carcinogenesis Testing Programs, the NTP Report on Carcinogens, and NIEHS activities associated with ICCVAM. Dr. Bucher holds a doctorate in pharmacology from the University of Iowa. After receiving his Ph.D., he was an NIH Postdoctoral Fellow in the Department of Biochemistry and Center for Environmental Toxicology at Michigan State University. He joined the NTP as a toxicologist in 1983 and since then has played a key role in shaping the program's research and policies. Most recently, he played a major role in developing the *NTP Vision and Roadmap for the 21st Century*, a plan for toxicology research to advance as a predictive science. He previously directed the evaluation of alternatives to the standard 2-year rodent cancer assays, and maintains an interest in the development of improved toxicology methods. He organized one of the first conferences to explore the field of nanotoxicology and has advised congressional staff about this emerging area. Dr. Bucher is an internationally recognized expert in the design and interpretation of cancer bioassays, and has authored a number of important publications examining critical issues in dose selection for toxicology and cancer studies.

**Harold Zenick, Ph.D.,** is Director of the National Health and Environmental Effects Research Laboratory in the Office of Research and Development of the U.S. Environmental Protection Agency (EPA). Dr. Zenick earned a Ph.D. from the University of Missouri (Columbia). He also completed a postdoctoral fellowship in toxicology at the University of Cincinnati. Before coming to EPA, Dr. Zenick spent 13 years in academia with the Department of Environmental Health at the University of Cincinnati Medical School, preceded by an appointment at New Mexico Highlands University. Dr. Zenick serves as EPA's liaison to the National Institute of Environmental Health Sciences, the National Toxicology Program, and the National Center for Environmental Health/Centers for Disease Control Advisory Councils/Boards. The author of over 100 publications, Dr. Zenick has recently played a leading role in several emerging programs at EPA, including efforts to develop better indicators of public heath impact of environmental decisions. His current interests are in integrating human health and ecological risk assessment, strengthening the linkages between environmental and public health agendas and agencies, and applying emerging computational and molecule sciences in improving toxicity testing and risk assessment practices.

**Janet Woodcock, M.D.,** is Deputy Commissioner and Chief Medical Officer of the FDA, and Acting Director of the Center for Drug Evaluation and Research. She oversees scientific and medical regulatory operations for the FDA. Dr. Woodcock received her M.D. from Northwestern Medical School, and completed further training and held teaching appointments at the Pennsylvania State University and the University of California in San Francisco. She joined FDA in 1986 and has held the positions of Director of the Office of Therapeutics Research and Review and Acting Deputy Director for the Center for Biologics Evaluation and Research. From 1994 to 2005, Dr. Woodcock served as Director of the Center for Drug Evaluation and Research before being appointed as Deputy Commissioner for Operations and Chief Operating Officer of the FDA, a position she held until 2007.

**Robert A. Scala, Ph.D.,** is the former Senior Scientific Advisor at Exxon Biomedical Sciences, Inc. While at Exxon, he developed and supervised testing programs, established a state-of-the-art toxicology laboratory and provided advice to worldwide management and operating organizations. He is also an adjunct professor of toxicology at Rutgers University. Dr. Scala earned his Ph.D. in physiology from the University of Rochester School of Medicine & Dentistry. He then joined the Advisory Center on Toxicology, National Academy of Sciences-National Research Council, and later served in various positions at Hazleton Laboratories, including Director of Laboratory Operations. Dr. Scala is a past Secretary and President of the Society of Toxicology, a former President of the American Board of Toxicology, and a Fellow of the Academy of Toxicological Sciences. Dr. Scala's scientific interests include the effects of chemicals on skin and eye, experimental carcinogenesis, pharmacokinetics, and alternatives to animal testing. He serves on numerous boards and panels for government and universities, and reviews books and manuscripts for several journals.

**John Howard, M.D., M.P.H, J.D., LL.M.** is Director of the National Institute for Occupational Safety and Health (NIOSH) in the U.S. Department of Health and Human Services. Dr. Howard received his M.D. from Loyola University of Chicago, his M.P.H from the Harvard School of Public Health, his J.D. from the University of California at Los Angeles, and his Master of Law in Administrative Law from the George Washington University in Washington, D.C. Prior to his appointment as Director of NIOSH, Dr. Howard served as Chief of the Division of Occupational Safety and Health in the California Department of Industrial Relations from 1991 through 2002. Dr. Howard is board-certified in internal medicine and occupational medicine. He is admitted to the practice of medicine and law in the State of California and in the District of Columbia, and he is a member of the U.S. Supreme Court bar. He has written numerous articles on occupational health law and policy.

**Martin Stephens, Ph.D.,** is Vice President for Animal Research Issues at The Humane Society of the United States (HSUS). He directs the HSUS's work on the use of animals in research, testing, and education, with a focus on promoting alternative methods of research that could replace or reduce the use of animals or refine procedures to minimize animal suffering. Dr. Stephens received a Ph.D. in biology in 1984 from the University of Chicago. He joined the HSUS in 1985 after working as a scientific consultant on animal research issues. Dr. Stephens helped lobby for legislation that led to the establishment and strengthening of ICCVAM. He serves on the Management Team of AltTox.org, a website on non-animal methods for toxicity assessment, the Scientific Advisory Panel of the Institute for *In Vitro* Sciences, the Project Team for Altweb: the Alternatives to Animal Testing Website, and the International Council for Animal Protection at the Organization for Economic Cooperation and Development. He served on the committee that drafted the National Research Council's recent report *Toxicity Testing in the 21st Century, A Vision and a Strategy*, and on the Scientific Advisory Committee on Alternative Toxicological Methods, which advises ICCVAM.

**Richard Becker, Ph.D., DABT,** is a Senior Toxicologist with the American Chemistry Council (ACC), and is Senior Director of ACC's Public Health and Science Policy Team. He works as the organization's lead toxicologist in addressing emerging health risk science issues, including biomonitoring, sensitive subpopulations, advanced risk assessment techniques, and alternative test methods. Dr. Becker earned his Ph.D. in pharmacology and toxicology from the University of California, and received postdoctoral training at the University of Toronto and the International Agency for Research on Cancer. Prior to joining ACC, Dr. Becker was a senior scientist with the State of California for more than 10 years. He served as Deputy Director of Scientific Affairs and Director of the California Environmental Protection Agency's Office of Environmental Health Hazard Assessment, and as the Senior Toxicologist in the Department of Toxic Substances Control. He has been toxicology study director for NTP and NCI sponsored toxicity studies and is a Diplomate of the American Board of Toxicology.

**Michael Holsapple, Ph.D.,** is Executive Director of the Health and Environmental Sciences Institute (HESI), the global branch of the International Life Sciences Institute. During his time with HESI, Dr. Holsapple has facilitated the organization's emergence as a recognized global leader in advancing the state-of-the-science of safety and risk assessment. Dr. Holsapple received his Ph.D. in pharmacology and toxicology from Purdue University. After completing postdoctoral training at the Medical College of Virginia/Virginia Commonwealth University (MCV/VCU), he became an Assistant Professor and later an Associate Professor in the Department of Pharmacology and Toxicology at MCV/VCU. He has also worked for the Toxicology, Environmental Research and Consulting Laboratories at the Dow Chemical Company, where his responsibilities included serving as the Technical Leader of both the Immunotoxicology and the Respiratory Toxicology Groups. An author on over one hundred and fifty manuscripts and chapters, Dr. Holsapple is currently an Adjunct Professor in the Department of Pharmacology and Toxicology at Michigan State University. A member of the American College of Toxicology and the Society of Toxicology (SOT), Dr. Holsapple received the SOT Achievement Award in 1992. He also received the SOT Colgate-Palmolive Visiting Professorship in 1996, an award that emphasizes the contributions and importance of *in vitro* toxicology.

**George B. Corcoran, Ph.D., ATS,** is Professor and Chairman of the Department of Pharmaceutical Sciences, College of Pharmacy & Health Sciences, Wayne State University, and Adjunct Professor of Pediatrics, Wayne State University School of Medicine. He currently serves as President of the Society of Toxicology (SOT), and has contributed to Society positions having national and international impact, ranging from the best science for rational safety legislation, to organizational ethics and governance. Dr. Corcoran received his Ph.D. in pharmacology and toxicology from George Washington University and completed postdoctoral training in toxicology at the Baylor College of Medicine. Prior to his Wayne State appointment, Dr. Corcoran served as Assistant Professor of Pharmaceutics at the State University of New York at Buffalo, followed by 9 years at the University of New Mexico in Albuquerque as Associate Professor, Professor, and Director of the Toxicology Graduate Program. Dr. Corcoran has published over 170 original research papers, abstracts and other reports. His research interests focus on cellular injury and cell death, as well as factors governing drug and chemical-induced injuries, including drug metabolism and nutrition. In addition to his work with the SOT, he is a Fellow of the Academy of Toxicological Sciences, a Delegate to the International Congress of Toxicology and a member of the International Union of Toxicology Developing Countries Committee. He is an active Member of the Scientific Advisory Board of the U.S. Environmental Protection Agency and a member of the Executive Board of the Council of Scientific Society Presidents.

**John Bailey, Ph.D.,** is Executive Vice President for Science at the Personal Care Products Council. He is responsible for providing scientific direction and support for the Council and the personal care products industry. This includes direct management of scientific programs, serving as liaison to other trade associations, and representing the U.S. cosmetics interests to public and private stakeholders. Dr. Bailey received his Ph.D. in organic chemistry from George Washington University. He joined the Personal Care Products Council as Director of Cosmetics Chemistry in 2002. Prior to joining the Council, Dr. Bailey worked for the U.S. Food and Drug Administration (FDA) for over 30 years. He served as Director of FDA's Office of Applied Research and Safety Assessment where he was responsible for research into the safety of foods and cosmetics. Prior to that, he served for many years as the director of the Office of Cosmetics and Colors, where he oversaw cosmetic enforcement and compliance activities, policy development, and setting of overall scientific and organizational objectives.

**Thomas Hartung, M.D., Ph.D.,** is Head of the European Centre for the Validation of Alternative Methods (ECVAM) within the Joint Research Centre of the European Union, a position he has held since 2002. He is also an honorary full professor of the University of Konstanz, Germany. Dr. Hartung received his Ph.D. in Biochemical Pharmacology from the University of Konstanz. He received his M.D. with a focus on toxicology from the University of Tübingen, and did a medical internship at the University of Freiburg. He has been associated with the University of Konstanz since 1994, holding the positions of Assistant Professor, Senior Lecturer for Biochemical Pharmacology, Associate Professor, and Member of the University Senate. Prior to joining the University of Konstanz, he specialized in surgery at the hospital of Singen, Germany, and was CEO of the Steinbeis Technology Transfer Center for *In Vitro* Pharmacology and Toxicology. Dr. Hartung's main research interests are inflammation, infectious disease, immune recognition of bacteria, pyrogen testing, and alternatives to animal testing, especially for safety testing of chemicals and cosmetics.

**Hajime Kojima, Ph.D.,** is Director of the Japanese Center for the Validation of Alternative Methods (JaCVAM). Established in 2005, JaCVAM is within the National Center for Biological Safety and Research, part of the Japanese National Institute of Health Sciences. Dr. Kojima has been Director of JaCVAM since 2006. He received his Ph.D. in information science from the University of Nagasaki. He was a researcher with the Japanese National Institute of Genetics, and has spent a large part of his career with the Nippon Menard Cosmetic Co., serving as a Researcher, Chief of the Biochemical Institute, and Assistant Manager and Chief of the Research Laboratories. Since 2003, he has been a Visiting Lecturer at the Fujita Health University School of Medicine. Dr. Kojima is an active member of the Japanese Society of Alternative to Animal Experiments (JSAAE), and won JSAAE paper prizes in 1998, 2000, and 2003, as well as the Golden Presentation Prize at JSAAE's 6th Annual Meeting. He is also a member of the Japanese Society for Contact Dermatitis, the Japanese Society of Toxicology, the Japanese Environmental Mutagen Society, and the Japanese Society for Endocrine Disruptor Research.

**Jodie Kulpa-Eddy, D.V.M.,** is a Staff Veterinarian with the U.S. Department of Agriculture (USDA), Animal and Plant Health Inspection Service, Animal Care, the agency responsible for enforcement of the Animal Welfare Act and the Horse Protection Act. As Staff Veterinarian, she is responsible for developing policy and regulations, and providing guidance on Animal Welfare Act issues related to research facilities. Dr. Kulpa-Eddy received her D.V.M. from the University of Minnesota in 1985. She spent four years in private practice, and has been employed by the USDA since 1989. She has held positions as a Biologics Specialist, inspecting facilities producing animal vaccines, bacterins and diagnostic test kits, and as a Veterinary Medical Officer, inspecting animal dealers, transporters, exhibitors and research facilities, prior to accepting her current position in April 2000. She has served as the USDA representative to ICCVAM since 2001, and in January 2007 was elected to a two-year term as Vice-Chair.