2025 RASS Student/Postdoc Award Winners

John Doull Risk Assessment Endowment Graduate Student Award
Katie Clark, Advisor: Fiona Harrison
Vanderbilt University, Nashville, TN
Chronic Low-Level Manganese Exposure in Drinking Water Alters Brain Relaxometry Profiles: A Potential Biomarker for Environmental Metal Exposure

Perry J. Gehring Best Graduate Student Abstract Award
Sarah Miller, Advisor: Julia Rager
UNC Chapel Hill, Chapel Hill, NC
Characterizing Individual and Mixtures-Based Chemical Contributions to Wildfire Smoke Toxicity Through *In Vitro* Transcriptomic Screening

Perry J. Gehring Best Postdoctoral Abstract Award
Jessie Chapel, Advisor: Julia Rager
UNC Chapel Hill, Chapel Hill, NC
Interpretable Machine Learning to Understand Wildfire Toxicity: Bridging Chemicals, - Omics, and Health Outcomes via Symbolic Regression with Novel Feature Scoring Robert J. Rubin Student Travel Award

Andersen-Clewell Trainee Award
Kun Mi, Advisor: Zhoumeng Lin
University of Florida, Gainesville, FL
Physiologically Based Pharmacokinetic Modeling for Oxytetracycline and Chlortetracycline to Predict Residue Depletion and Determine Withdrawal Intervals in Swine

Robert J. Rubin Student Travel Award
Christine Kim, Advisors: Lauren Aleksunes and Luigi Brunetti
Rutgers University, New Brunswick, NJ
Selective Receptor Modulation During Melatonin Renoprotection Against Vancomycin Toxicity

2025 Best Abstract Award Winners

Best Abstract

S.A. Marchitti and L.A. Bailey, Gradient. Evaluation of US EPA's Proposed Rule for the Occupational use of Carbon Tetrachloride and Proposal for a Revised Occupational Exposure Value. Abstract 4237. Poster 751. Risk Assessment II.

Remaining Top 10 Best Abstracts

D. Proctor and C. Thompson. ToxStrategies LLC. Why Oral Cavity Tumors Should Not be the Basis of the Hexavalent Chromium Oral Cancer Slope Factor—Weight of Evidence Review. Abstract 3136. Poster D249. Regulatory/Policy.

G. Nielsen, N. Moody, S. J. Baird, W. Heiger-Bernays, and C. M. Smith. Massachusetts Department of Environmental Protection. Development of Toxicity and Drinking Water Values for Perfluoroheptanoic Acid (PFHpA) Using Health Effects Data and Read Across Methods. Abstract 3951. Poster J439. PFAS II.

S. Hoffmann et al. SEH consulting + services. Next Generation Risk Assessment (NGRA) of skin sensitization: major sources of uncertainty and how to assess them, exemplified with an in chemico test method. Abstract 3849. Poster F325. Skin Sensitization.

R. Reiss et al. Exponent. Data-Derived Extrapolation Factors for Interspecies Extrapolation of Organophosphate Pesticide Pharmacodynamic Factors. Abstract 4727. Poster K568. NAMS: In Vitro II.

K. P. Cross. Instem. AI Applications in Predictive Toxicology Supporting Drug Safety Assessments. Abstract 4043. Poster J537. Computational Toxicology II.

D. Wikoff et al. ToxStrategies, LLC. Biological plausibility assessment of acetaminophen and occurrence of developmental neurological outcomes in humans. Abstract 4768. Poster L614. Risk Assessment III.

S. Tripathi et al. Bayer Crop Science. Employing NAMs as Primary Cell-Based Assays and Reverse Dosimetry with High-Throughput Toxicokinetics for Improved Endocrine Disruption Screening. Abstract 3929. Poster H412. Endocrine Toxicology.

T. Greene, R. Gentry, and H. Bartow. Ramboll. Application of a novel framework for integrating evidence to assess hazards and risk: an example with formaldehyde. Abstract 4834. Poster N688. NAMS: General.

N. Tahir et al. Leiden Academic Centre for Drug Research, Universiteit Leiden. Human population toxicodynamics variability assessment using high throughput transcriptomics in peripheral blood mononuclear cells. Abstract 4785. Poster L632. Systems Biology and Translational Toxicology.

Best Published Paper in 2024 Award Winners

Best Published Paper Advancing the Science of Risk Assessment

Cable S, Baltazar MT, Bunglawala F, Carmichael PL, Contreas L, Dent MP, Houghton J, Kukic P, Malcomber S, Nicol B, Przybylak KR, Punt A, Reynolds G, Reynolds J, Scott S, Tang D, Middleton AM. Advancing systemic toxicity risk assessment: Evaluation of a NAM-based toolbox approach. Toxicol Sci. 2025 Mar 1;204(1):79-95. doi: 10.1093/toxsci/kfae159.

Best Published Paper Demonstrating the Application of Risk Assessment

Ford LC, Lin HC, Tsai HD, Zhou YH, Wright FA, Sedykh A, Shah RR, Chiu WA, Rusyn I. Hazard and risk characterization of 56 structurally diverse PFAS using a targeted battery of broad coverage assays using six human cell types. Toxicology. 2024 Mar;503:153763. doi: 10.1016/j.tox.2024.153763.