**2019 RASS Student/Postdoc Award Winners**

**John Doull Award**
Rance Nault, Advisor: Timothy R Zacharewski
Michigan State University, East Lansing, MI
Application of toxicogenomics for the risk assessment of the food contaminant acetamide.

**Perry J. Gehring Best Postdoctoral Fellow Abstract Award**
Miao Li, Advisor: Zhoumeng Lin
Kansas State University, Manhattan, KS
Integration of Food Animal Residue Avoidance Databank (FARAD) empirical methods for drug withdrawal interval determination with a mechanistic population-based interactive physiologically-based pharmacokinetic (iPBPK) modeling platform: example for flunixin meglumine administration.

**Perry J. Gehring Best Graduate Student Abstract Award**
Axelle Marchand, Advisor: Pierre S. Haddad
Université de Montréal IRSPUM, Montreal, QC, Canada
Evaluating the Impact of Heat Stress on the Toxicokinetics of Volatile Solvents in Man Using PBPK Modeling.

**Robert J. Rubin Student Travel Award**
Robert Freeborn, Advisor: Cheryl Rockwell
Michigan State University, East Lansing, MI
The synthetic food additive tBHQ impairs host-defense to influenza infection.

**Andersen Clewell Trainee Award**
Wei-Chun Chou, Advisor: Zhoumeng Lin
Kansas State University, Manhattan, KS
Bayesian Evaluation of Physiologically Based Pharmacokinetic (PBPK) Modeling for Perfluorooctanesulfonate (PFOS) to Characterize the Interspecies Uncertainty between Mice, Rats, Monkeys, and Humans

**2018 Best Abstract Award Winners**

**Best Abstract**
**Retrospective and Prospective Case Studies to Accelerate the Pace of Chemical Risk Assessment.**
K. Paul Friedman[1], M. Gagne[2], T. Barton-Maclaren[2], J. Bucher[3], R. Thomas[1], M. Rasenberg[4], and T. Sobanski[4].

[1]US EPA/NCCT, Research Triangle Park, NC; [2]Health Environments and Consumer Safety Branch, Health Canada, Ottawa, ON, Canada; [3]NIEHS/NTP, Research Triangle Park, NC; and

[4]Computational Assessment Unit, European Chemicals Agency, Helsinki, Finland.

**Top 10 Abstracts**

**FDA Assessment of Coronary Heart Disease Risk of Industrially-Produced Trans Fatty Acids in Partially hydrogenated Oils.**
J. Park, K. Koehler, C. Whiteside, E. Anderson, M. Honigfort, and A. Zajac.
US FDA, College Park, MD.

**Evaluating Potential Refinements to Existing Thresholds of Toxicological Concern Values for Environmentally Relevant Compounds.**
M. D. Nelms [1,2], P. Pradeep [1,2], and G. Patlewicz[2].
[1]ORISE, Oak Ridge, TN; and [2]US EPA/NCCT, Durham, NC.

**Use of a PBPK-Quantitative Adverse Outcome Pathway Model to Resolve the Species Specificity of Lung Carcinogens.**
T. Hill III, M. Marikar, and R. Conolly.
US EPA, Research Triangle Park, NC.

**The Extrapolation of a Safe Oral Dose from Lab Animals to Humans Differs by Agency**.
J. A. Brickel.
Burdock Group, Orlando, FL.

**Cancer Risk Assessment for Agrochemicals: Are Non-cancer Endpoints Protective of Tumor Endpoints?**
Z. Yan, Y. Li, and C. Terry.
Corteva Agriscience, Indianapolis, IN.

**A Novel Risk Assessment Model for Incorporating Co-exposures Provides Preliminary Guideline Values for Unregulated Chemicals.**
E. M. Tanner[1], C. Bornehag[2], and C. Gennings[1].
[1]Mount Sinai School of Medicine, New York, NY; and [2]Karlstad University, Karlstad, Sweden

**Adding Context to Tox21/ToxCast Data: Linking In Vitro Assays to Toxicity Outcomes**
L. Karmaus[1], S. M. Bell[1], D. G. Allen[1], W. Casey[2], and N. C. Kleinstreuer[3].
[1]ILS, Research Triangle Park, NC; [2]NIEHS, Research Triangle Park, NC; and [3]NIEHS/NICEATM, Research Triangle Park, NC

**The Utility of Informative Prior in Benchmark Dose Modeling for Animal Reduction.**
K. Shao[1], W. A. Chiu[2], and A. Shapiro[3].
[1]Indiana University, Bloomington, IN; [2]Texas A&M University, College Station, TX; and [3]Independent Consultant, Durham, NC.

**An Integrated Approach to Evaluate Common Mechanisms of Toxicity in Pesticides to Support Cumulative Risk Assessment**

J. Leonard1, M. Nelms[1], E. Craig[2], S. Dobreniecki[2], M. Perron[2], H. Pope-Varsalona[2], A. Lowit[2], and C. Tan[2].
[1]Oak Ridge Institute for Science and Education, Oak Ridge, TN; and [2]US EPA, Washington, DC.

**RASS 2018 Best Published Paper Award Winners**

***RASS 2018 Best Published Paper Advancing the Science of Risk Assessment Award***

Kleinstreuer NC, Hoffmann S, Alépée N, Allen D, Ashikaga T, Casey W, Clouet E, Cluzel M, Desprez B, Gellatly N, Göbel C, Kern PS, Klaric M, Kühnl J, Martinozzi-Teissier S, Mewes K, Miyazawa M, Strickland J, van Vliet E, Zang Q, Petersohn D. **Non-animal methods to predict skin sensitization (II): an assessment of defined approaches.** Crit. Rev. Toxicol. 2018 48:359-374. doi.org/10.1080/10408444.2018.1429386.

***RASS 2018 Best Published Paper Demonstrating an Application of Risk Assessment Award***

Zhang Q, Li J, Middleton A, Bhattacharya S, Conolly RB. **Bridging the Data Gap From *In vitro* Toxicity Testing to Chemical Safety Assessment Through Computational Modeling**. Front. Public Health. 2018 6:261. doi: 10.3389/fpubh.2018.00261.