

ANNUAL REPORT: 2020-2021
May 1, 2020 to April 30, 2021

I. Officers/Committees:

<u>Officers</u>	<u>2020-2021</u>	<u>2021-2022</u>
President:	Ronald Tjalkens	Mirella Meyer-Ficca
Vice President:	Mirella Meyer-Ficca	Alicia Bolt
Vice President-Elect:	Alicia Bolt	Aikseng Ooi
Secretary-Treasurer	Karen Cooper	Karen Cooper
Past President:	Ting Wang	Ronald Tjalkens
Councilors:	Melanie Doyle-Eisele Kristofer Fritz	Kristofer Fritz Jed Lampe
PDA Representative:	Sebastian Medina	Sebastian Medina
Junior Student Representative:	Angela Cruz-Hernandez	Kendra Prutton, Christopher Pohl
Senior Student Representative:	Sumira Phatak	Angela Cruz-Hernandez

Committees: If applicable.

II. 2020 Membership total: 137

III. Key Outcomes in 2020-2021:

- A.
- B.

IV. Activities:

A. **38th Annual MWSOT Regional Chapter Meeting**

The meeting was hosted by Utah State University’s Department of Animal, Dairy and Veterinary Sciences and School of Veterinary Medicine. It was held virtually via zoom due to the COVID-19 pandemic on September 18, 2020. The theme for the conference was “*Epigenetics and Toxicology: The Organism-Environment Interface and Its Role in Health.*” This conference started with opening remarks from Dr. Dirk Vanderwall, followed by the three scientific sessions dedicated to special topics within the broader meeting theme. Each topic session comprised a keynote lecture followed by short talks selected from abstracts.



Session I: “Environmental Epigenetic – The Interplay between Genes and Environment”

Keynote speaker: Dr. Randy Jirtle (North Carolina State University)

Session II: “The Obesogen Effect – Diet, Environmental Pollutants & Epigenetic Health Consequences”

Keynote speaker: Dr. Bruce Blumberg (University of California, Irvine)

Session III: “Environmental Pollutants and Transgenerational Consequences”

Keynote speaker: Dr. Michael Skinner (Washington State University)

In addition, a “Brown Bag” lunch discussion for trainees and students was held on the topic “*Toxicology Professionals – Occupational Areas & Opportunities*” during the lunch hour.

The meeting concluded with an online get-together and happy hour.

After the conclusion of the meeting, the following **Trainee Awards** for best presentations were given: (There were a total of 6 oral student/postdoc presenters and 20 total posters presented.)

Awardees:

- The Yost Outstanding Graduate Student Award: Angela Cruz-Hernandez
- Outstanding Oral Presentation Awards:
 - Postdoc: Richard Cheng-An Chang
 - Graduate Student: Angela Cruz-Hernandez (1st), Sierra Moorefield (2nd), Daphne Rodriguez (3rd)
 - Undergraduate Student: Sierra Lopez
- Outstanding Poster Presentation Award:
 - Postdoc: Brian Booker
 - Graduate Student: Keegan Rogers (1st), Mark Simmers (1st), Lindsay Volk (2nd), Hannah Work (2nd), Savannah Rocha (3rd)
 - Undergraduate Student: Jiakia Pen

Toxicology Lectures and Student Lectures:

- Tong Zhou PhD, Faculty, University of Nevada, Reno School of Medicine. “Epigenetic insight into the effect of arsenite on tsRNA biogenesis”
- Georg Wondrak PhD, Faculty, University of Arizona, College of Pharmacy and UA Cancer Center. “GLO1 (Glyoxalase 1) Modulation of Cellular Carbonyl Stress: Between Cutaneous Cosmetic Exposure and Melanomagenesis”
- Speaker: Joseph Jilek, PhD, Post-Doctoral Fellow, University of Arizona, Department of Pharmacology & Toxicology. “Human Renal Xenobiotic Transporter Expression is Altered in Progression of Non-Alcoholic Fatty Liver Disease as revealed by Quantitative Targeted Proteomics”
- Speaker: Richard Cheng-An Chang, PhD, Post-Doctoral Fellow, University of California Irvine, Department of Developmental and Cell Biology. “Cannabidiol Promotes Adipogenesis of Human and Mouse Mesenchymal Stem Cells via PPAR γ by Inducing Lipogenesis but Not Lipolysis”

- Student Platform: Angela Cruz-Hernandez, Graduate student, CU Anschutz Medical Campus, School of Pharmacy and Pharmaceutical Sciences. “Investigating the Role of Mast Cell Activation by Nitrogen Mustard in Lung Toxicity”
- Student Platform: Daphne Rodriguez, Graduate student, Utah State University. “Consumption of the Total Western Diet Promotes Colitis and Inflammation-Associated Colorectal Cancer in Mice”

- Student Platform: Sierra Moorefield, Graduate student, North Carolina State University, Center for Human Health and the Environment and Department of Biological Sciences. “Programming Liver Disease from Developmental Exposure to Cadmium”
- Student Platform: Sierra Lopez, Undergraduate student, Utah State University, Department of Animal, Dairy, and Veterinary Sciences. “Possible mechanisms behind impaired glucose metabolism in niacin- deficient mice”

B. 2021 SOT Virtual Annual Meeting Activities (e.g. courses, scientific sessions, or virtual receptions):
N/A

C. Other Educational Activities Conducted (e.g., webinars, in person meetings):

D. Communication Activities:

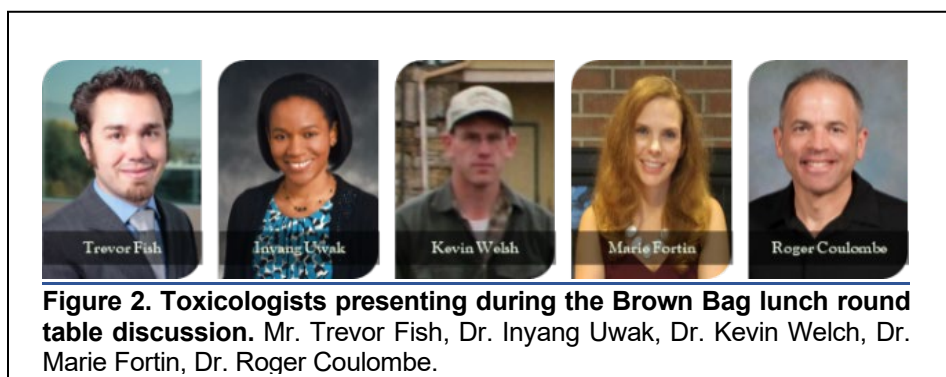
1. Newsletter publication frequency:
2. New or Significant Announcements/blogs:
3. Highlight of Website enhancements:

E. Mentoring activities:

F. Activities supporting undergraduate students:

Undergraduate/Graduate Toxicology Outreach Program

This special program intended to give career development guidance to undergraduate and graduate students in toxicology. Five speakers representing different career paths in the fields of toxicology participated in the “brown bag” round-table style discussions:



- Mr. Trevor Fish (Industry, MS level; Nelson Laboratories)
- Dr. Inyang Uwak (academic scholar, public health; Texas A & M University)
- Dr. Kevin Welch (USDA Poisonous Plant Research Laboratories)
- Dr. Marie Fortin (Industry, administrative level, Jazz Pharmaceuticals)
- Dr. Roger Coulombe (academic faculty, Utah State University)

Funding support

The student presentation awards were sponsored by funds from the SOT (RC and Strategic initiative Funding mechanism). Undergraduate awards were funded through the SOT FUTURE mechanism. Online platform support was provided by Utah State University.

Plans for the upcoming year:

The 39th annual meeting of the MWSOT regional chapter will be held in a virtual format on Thursday, September 23rd, 2021, 12:30-4:30 PM, hosted by University of New Mexico. The meeting will provide a

keynote lecture, 5-minute trainee data talks and networking opportunities for trainees and MWSOT members. The theme of the meeting and keynote speakers are TBD at the current time.

V. Feedback and Ideas:

- A. In what ways is your group fostering and maintaining an inclusive environment?
- B. How might SOT better support your group's activities (perhaps something the Society should be doing that we currently do not do, or do not do effectively, that would be of importance/benefit to the members of your component group?):
Note: If funding is listed, please provide detail on the membership need that the funding would support.
- C. What is one thing that the Society is currently doing that impacts your component group that should be changed (e.g., stopped, modified, etc.)?
- D. What changes do your component group anticipate making in the way in which it operates in the coming year?