

AAS 2020 Virtual Summer Symposium
Schedule of oral presentations
Monday, June 29, 2020, Timing refers to Eastern Time Zone

10:00 Welcome, Logistics & Announcements
Greta Binford, President, American Arachnological Society

Session 1 Moderator: Michael Brewer

10:15 *Mobilizing data from taxonomic literature: process, tools and applications*
Francisco Andreas Rivera Quiroz, Jeremy Miller

10:30 *Utility of minibarcodes in revisionary systematics*
***Aaron Goodman**, Lauren Esposito

10:45 *Molecular evolution of inhibitor cystine knot toxins in spiders*
***T. Jeffrey Cole**, Michael S. Brewer

11:00 *A transient, diet-driven gut microbiome in the gray house spider *Badumna longinqua**
Susan R. Kennedy, Sophia Tsau, Rosemary Gillespie, Henrik Krehenwinkel

11:15 *Chemical species recognition in an adaptive radiation of a Hawaiian spider*
***Seira A. Adams**, Moritz Gerbault, Stefan Schulz, Rosemary G. Gillespie

11:30 *Testing adaptative radiation in dionychan spiders using morphological and genomic data*
Guilherme H. F. Azevedo, Tierney Bougie, Marshal Hedin, Martín J. Ramírez

11:45 BREAK

Session 2 Moderator: Linda Rayor

12:00 *Strategic sampling and novel analyses suggest new relationships and multiple orb web origins in the spider tree of life*
Robert J. Kallal, Siddharth Kulkarni, Dimitar Dimitrov, Ligia Benavides, Miquel Arnedo, Gonzalo Giribet, Gustavo Hormiga

12:15 *Evaluation of traditional and new taxonomic characters of North American Solifugae in a multilocus phylogenetic context (Solifugae: Eremobatidae)*
***R. Ryan Jones**, Jack O. Brookhart, Patrick Casto, Paula E. Cushing

12:30 *Taxonomic revision of the genus *Ammotrechula* (Solifugae: Ammotrechidae)*
Diana Laura Batista Perales, Paula Cushing, Jack O. Brookhart, Edmundo González Santillán

12:45 *Mitochondrial barcode leads to drastic overestimation of species diversity in an Iberian ant-eating spider: Insights from genomic evidence*
David Ortiz, Stano Pekar, Julia Bilat & Nadir Alvarez

1:00 *Unexpected diversity in the widespread tiger tarantula *Davus pentaloris* (Araneae: Theraphosidae: Theraphosinae)*
***Daniela T. Candia-Ramírez**, Oscar F. Francke

1:15 *The evolution of huntsman spiders (Araneae: Sparassidae): insights into life-history*
***Jacob A. Gorneau**, Linda S. Rayor, Corrie Moreau

1:30 BREAK

Session 3 Moderator: Ingi Agnarsson

- 1:45 *Taxonomic revision of fossil Psilodercidae and Ochyroceratidae spiders (Araneae: Synspermiata), with a new species of Priscacleclercera from Burmese amber*
Ivan L. F. Magalhaes, Andrés O. Porta, Jörg Wunderlich, Daniel N. Proud, Martín J. Ramírez, Abel Pérez-González
- 2:00 *Population genetics and biogeography of montane Atlantic Forest amblypygids*
Gustavo Silva de Miranda
- 2:15 *Phylogeography of the widespread Caribbean spiny orb weaver Gasteracantha cancriformis*
***Lisa Chamberland**, Fabian C. Salgado-Roa, Alma Basco, Amanda Crastz-Flores, Greta J. Binford, and Ingi Agnarsson
- 2:30 *From the Andean Páramos to the tropical rain forest: orb-weaving spider diversity patterns in Southwestern Colombia*
***Bryan Ospina-Jara**, Charlotte Hopfe, Carlos Valderrama, Jimmy Cabra-García
- 2:45 *Phylogenomics of Triaenonychoidea and biogeography of the Gondwanan family Triaenonychidae (Opiliones: Laniatores).*
Shahan Derkarabetian, Caitlin M. Baker, Marshal Hedin, Carlos E. Prieto, Gonzalo Giribet

3:00 – 3:30 BREAK

Session 4 Moderator: Ann Rypstra

- 3:30 *Pervasive and persistent: a survey of symbiotypes in regional populations of Mermessus fradeorum (Linyphiidae)*
Laura C. Rosenwald, Jen A. White
- 3:45 *Pseudoscorpion sociality: nest architecture and microbial symbionts*
Kenneth Chapin, Karly Mae Garrett, Anna Kittle, Anna Dornhaus
- 4:00 *Bite or flight: antipredator responses as a function of web architecture*
***Yi Lin Zhou**, ***Jessica Schmidt**, Andrea Haberkern, Luis Camacho, Leticia Aviles.
- 4:15 *River noise alters orb-weaving spider abundance, web size, and prey capture*
***Dylan Gomes**
- 4:30 *Net-casting spider foraging behavior*
Jay A. Stafstrom
- 4:45 *Transgenerational effects of predator stress on the growth and behavior of Pardosa milvina.*
***Alexander Berry**, Ann L Rypstra

5:00 BREAK

Session 5 Moderator: David Nelsen

- 5:15 *Long term monitoring of canopy associated spider communities by eDNA metabarcoding from leaves*
Sven Weber, Anja Melcher, Rieke Broekmann, Susan Kennedy, Henrik Krehenwinkel
- 5:30 *Is navigation by scene familiarity feasible using scorpion pectines? Computer simulations say yes.*
***Albert Musaelian**, Dr. Douglas D. Gaffin

- 5:45 *Multimodal and multifunctional signaling? – Web reduction courtship behavior in a North American population of the false black widow spider*
***Andreas Fischer**, Xiang Hao Goh, Jamie-Lynne S. Varney, Adam J. Blake, Stephen Takács, Gerhard Gries
- 6:00 *Fitness implications of nonlethal injuries in scorpions: females, but not males pay reproductive costs*
Solimary García-Hernández and Glauco Machado
- 6:15 *Sex differences of self-derived chemical cue use for shelter recognition in the whip spider Phrynus marginemaculatus (Amblypygi: Phryniidae)*
***Patrick Casto**, Verner P. Bingman, Eileen A. Hebets, Daniel D. Wiegmann

6:30 BREAK

Session 6 Moderator: Sara Ceccarelli

- 6:45 *Elemental examination of the whip spider cuticle*
Dragoslav Radosavljevic
- 7:00 *Effect of cadmium and zinc on the activity of antioxidant enzymes of Oxyopes javanus via food chain.*
***Muhammad Xaaceph Khan**, Abida Butt, Farah Kausar
- 7:15 *How spiders make their eyes: Systemic paralogy and function of retinal determination network homologs in arachnids*
***Guilherme Gainett**, Jesús A. Ballesteros, Charlotte R. Kanzler, Jakob T. Zehms, John M. Zern, Shlomi Aharon, Efrat Gavish-Regev, Prashant P. Sharma
- 7:30 *Chronoecology of the diurnal orb-weaving spider, Micrathena gracilis (Aranaeae: Araneidae)*
***Mitchell D. Long**, Dr. Thomas C. Jones, Dr. Darrell Moore
- 7:45 *Links between circadian rhythms, light environments and courtship success in Schizocosa wolf spiders*
Rowan H McGinley, Jason E. Bond, James R. Starrett, Eileen A. Hebets

8:00 Preview of 2021 in Davis

Comments / Questions / Discussion

*indicates participant in student competition for best oral research presentation.