Larry Young, Ph.D.

is Director of the Center for Translational Social Neuroscience and of the Silvio O. Conte Center for Oxytocin and Social Cognition at Emory University in Atlanta. He is also William P. Timmie Professor in the Department of Psychiatry and Behavioral Sciences at the Emory University School of Medicine and chief of the Division of Behavioral Neuroscience and Psychiatric Disorders at Yerkes National Primate Research Center. Dr. Young received his undergraduate degree in biochemistry at the University of Georgia and earned his Ph.D. in the Department of Zoology at the University of Texas in Austin. Dr. Young has published over 140 peer reviewed publications, including in top tier journals such as Science, Nature, Nature Neuroscience, Nature Genetics and Nature Reviews Drug Discovery.

Dr. Young’s research seeks to understand how the brain functions to regulate social relationships. His research has revealed that brain chemicals such as oxytocin and vasopressin regulate the neural processing of social information and promote the formation of social bonds by acting in specific neural pathways. By understanding how the chemistry of the brain promotes the formation of social relationships, Dr. Young hopes to develop novel treatments for the social deficits in psychiatric disorders such as autism.

Retreat Schedule

9:30 - 10:00 a.m. Breakfast & Registration

10:00 - 10:50 a.m. Walt Wilczynski, Ph.D. - Director, Neuroscience Institute
Introductory Remarks

Andrea Scarantino, Ph.D. - Philosophy
Update on the B&B Program

10:30 - 11:00 a.m. Charuni Gunaratne - Neuroscience
Advisor: Paul Katz, Ph.D.
“Evolution of swimming in sea slugs: Three neural circuits, one behavior.”

11:00 - 11:30 a.m. Reema Jayakar - Psychology
Advisor: Erin Tone, Ph.D.
“Hippocampus size and verbal memory in adult survivors of pediatric brain tumor.”

11:30 - 12:00 p.m. Stephen Estes - Biology
Advisor: Vincent Rehder, Ph.D.
“The interdependence of nitric oxide (NO), electrical activity and growth cone motility: Insights from a combined electrophysiology and calcium imaging approach.”

12:00 - 1:15 p.m. Lunch (provided)

Poster Titles

31. Title: The influence of attention to facial feedback on self-performance ratings in social anxiety.
Authors: Natasha Mehta, Page Anderson & Erin Tone

32. Title: A single subject case series of the effects of Hatha yoga for generalized anxiety disorder.
Authors: Jessica Morgan, Erin Tully, Aki Masuda, Lindsey Cohen & Page Anderson

33. Title: Physical activity and managing stress: individual differences matter.
Authors: Nicole Wilner & Erin Tone

34. Title: Imagery vividness and false memories for imagined events.
Shanna E. A. Hegerty

35. Title: Do children with ASD share sounds?
Authors: Ashleigh Kellerman, Anita Hasni, Katharine Suma, Roger Bakeman & Lauren Adamson

Authors: Natasha Ludwig, Diana Robins, Lauren Adamson & Deborah Fein

37. Title: A study of ontology learning based on text and image retrieval in medical documents.
Authors: Sanghoon Lee & Saeid Belkasim

38. Title: Event-Related potential effects of visual sequential learning are related to receptive vocabulary ability.
Authors: Marjorie Freggens, Jerome Daltrozzo, Joanne Deocampo & Chris Conway

39. Title: An event-related potential effect of auditory sequential learning related to syntactic processing of natural language.
Authors: Sonia Singh, Jerome Daltrozzo, Joanne Deocampo & Chris Conway

40. Primary caregiver education is correlated with sequence learning ability in children: ERP.
Authors: Michelle Pinns, Sanjay Pardasani, Joanne Deocampo & Chris Conway

41. Meta gene set variant enrichment analysis of miR-137 predicted and validated targets reveals schizophrenia vulnerable pathways.
Authors: Carrie Wright, Nora Perrone-Bizzozero & Jessica Turner
21. Title: The role of the mesolimbic dopamine system in modulating the memory of social defeat in Syrian hamsters.
Authors: Cloe Gray, Alisa Norvelle, Tony Larkin & Kim Huhman

22. Title: Do sex differences in the neuronal activity of arginine vasopressin containing neurons mediate sex differences in the expression of aggressive behavior in Syrian hamsters?
Authors: Joseph Terranova, Ansa Riaz, Nathan Hardcastle, Tony Larkin & Elliott Albers

23. Title: Pubertal development of PSA-NCAM immunoreactivity in the medial amygdala of the male Syrian hamster.
Authors: Martin Job, Tyler Flot, Parsa Behnia, Tristan Johnson & Bradley Cooke.

24. Title: Age differences in BDNF gene expression after cocaine self-administration or cue-induced reinstatement of cocaine-seeking in male rats.
Authors: Alexandria White, Chen Li, Bonnie Williams & Kyle Frantz

25. Title: Sex differences in astrocyte activity within the periaqueductal gray: A role in pain and analgesia.
Authors: Lori Eidson, Hillary Doyle, Laura Butkovich & Anne Murphy

26. Title: Periaqueductal gray TNF modulates morphine tolerance development.
Authors: Lori Eidson & Anne Murphy

27. Title: Role of microglia in developmental neuronal cell death.
Authors: J. Alex Strahan, William Walker II & Nancy Forger

28. Title: Neonatal inflammatory pain increases food intake and body mass and diminishes eating-associated hippocampal activation of the synaptic plasticity marker Arc in adult female rats with poor hippocampal-dependent memory.
Authors: Yoko Henderson, A. Vazdarjanova, Anne Murphy & Marise Parent

29. Title: The role of neuronal DNA methyltransferases in energy regulation and obesity development.
Authors: Emily C. Bruggeman and Bingzhong Xue

30. Title: Role of peroxisome proliferator-activated receptor γ in appetite control.
Authors: John Garretson, Brett Teubner, Vitaly Ryu & Timothy Bartness

1:15 - 1:45 p.m. Will Barnett - Neuroscience
Advisor: Gennady Cymbalyuk, Ph.D.
“Mechanisms controlling temporal characteristics of neuronal activity.”

1:45 - 2:15 p.m. Jin Zhang - Chemistry
Advisor: Marcus Germann, Ph.D.
“Insight into the modulation of Shaw2 Kv channels by general anesthetics: Structural and functional studies of S4-S5 linker and S6 C-terminal peptides in micelles by NMR.”

2:15 - 2:45 p.m. Max Oginsky - Biology
Advisor: Chun Jiang , Ph.D.
“Compensatory neuroadaptations in a mouse model for a neurodevelopmental disease: plasticity for survival.”

3:00 - 4:00 p.m. Larry Young, Ph.D.
“The neurobiology of social relationships: Implications for novel treatments for autism spectrum disorder”

4:00 - 6:00 p.m. Poster Session - Wine & Cheese Reception

Retreat Organizers:
Anne Murphy
Liz Weaver

Special Thanks:
Hannah Shin
1. Title: Calcium-sensing receptor can weakly induce calcium oscillation in prostate cancer cells as monomer or heterodimer.
   Authors: Jie Feng, Chen Zhang, Yusheng Jiang, Xiaojun Xu, Zhiren Liu, Edward Brown & Jenny Yang

2. Title: Early detection of liver metastasis using dual weighted Protein MRI contrast agent.
   Authors: Shenghui Xue, Hua Yang, Jingjuan Qiao, Fan Pu, Robert Long, Khan Hekmatarya, Hans Grossniklaus, Zhi-Ren Liu & Jenny Yang

3. Title: Spontaneous musical improvisations and rehearsed performances.
   Authors: Kristen Quinn, Justin Squirek, Jenine Ampudia, Martin Norgaard & Mukesh Dhamala

4. Title: Creating under pressure: Effects of divided attention on the improvised output of skilled jazz musicians.
   Authors: Martin Norgaard, Samantha Emerson, Kim Braunsroth & James Fidlon

5. Title: Does serotonin modulate processing of courtship vocalizations in the inferior colliculus of the mouse?
   Authors: Jessica Hanson, Zita Erbhorw-Beckson & Laura Hurley

6. Title: Hormonal correlates of exploratory and play behavior in domestic dogs.
   Authors: Alejandra Rossi, Rosemary Stewart, Casey Flynn, Gregory Demas & Colin Allen

7. Title: Reproductive choices, hormones, and behavior in bluebanded goby (Lythrypnus dalli) social groups.
   Authors: Tessa Solomon-Lane, Megan Williams, Ali Martinelli, Alma Thomas, Polina Shvidkaya, Lock Rogers & Matthew Grober

8. Title: Social regulation of sexual development: a field-based analysis.
   Authors: Polina Shvidkaya, Tessa Solomon-Lane, Alma Thomas, Megan Williams, Andrew Rhyne, Lock Rogers & Matthew Grober

9. Title: Ink from longfin inshore squid, Doryteuthis pealeii, as a chemical and visual defense against two predatory fishes summer flounder, Paralichthys dentatus, and sea catfish, Ariopsis felis.
   Authors: Mihika Tottempudi, Tiffany Love-Chezem, Lanna Wolfe & Charles Derby

10. Title: Dopamine enabled homeostats act to maintain conductance ratios.
    Authors: Anna Parker, Wulf-Dieter Krenz, Edmund Rodgers & Deborah Baro