May 13th, 2024

8:00-9:00 Breakfast and networking

9:15                 Welcome and Introductory Remarks
**Consuelo Walss-Bass and Thomas Meyer, Directors,** UTHealth Houston Brain Collection

**Session I: Deciphering gene network alterations at the single cell level**

Moderator:      **Consuelo Walss-Bass UTHealth Houston**

9:15-9:45     Lea Zillich *Heidelberg University*

*Cell type-specific multi-omics analysis of cocaine use disorder in the human caudate nucleus*

9:45-10:00   Emily Mendez UTHealh Houston

Single cell RNA sequencing in opioid use disorder Hypothalamus and Thalamus

10:00-10:15   Mbemba Jabbi *UT Austin*

 *Transcriptomics of human insula, cingulate, and blood cellular components in mood disorders*

10:15-10:45 Panel with speakers (Q&A grouped and merged into a panel)

10:45-11:00 Coffee Break

**Session II: Leveraging Human Postmortem Brain and Psychological Autopsies to Understanding the Brain-Behavior Interplay**

Moderator:        **Thomas Meyer UTHealth Houston**

11:00-11:15     Janitza Montalvo-Ortiz *Yale University*

*Elucidating the gene regulatory mechanisms linking trauma exposure with psychiatric disorders*

11:15-11:30     Chris Gurguis *UTHealth Houston*

*Personality factors associated with manner of death: A psychological autopsy study*

11:30-11:45     Will Chen *University of Texas at Arlington*

 *Spatial Determinants of Health: Opioid Overdose and Mental Health Outcomes in Harris County, TX*

11:45-12:15 Panel with speakers (Q&A grouped and merged into a panel)

12:15-1:15 Lunch Break & networking

**Session III: Using Patient-Derived Brain Models to Personalize Addiction Therapy**

Moderator:       Consuelo Walss-Bass UTHealth Houston

1:15-1:30       Agenor Limon *University of Texas Medical Branch*

*Characterization of human synaptic GABAA receptors sensitivity in Alcohol Use Disorder*

1:30-1:45         Laura Stertz *UTHealth Houston*

*Human Postmortem Cell models of Substance Use Disorders*

1:45-2:00        Jamie Tran *UTHealth Houston*

 *Elucidating mechanisms of alcohol-induced vascular alterations*

2:00-2:30 Panel with speakers (Q&A grouped and merged into a panel)

2:30-2:45 Coffee Break

**Session IV: Molecular Correlates of Psychiatric Comorbidity**

Moderator: **Thomas Meyer UTHealth Houston**

2:45–2:55     Gabriel Fries *UTHealth Houston*

*Exploring brain methylomic and transcriptomic signatures of suicide death in bipolar disorder*

2:55-3:05 Christian Coarfa Baylor College of Medicine

 Opioid Use Disorder and Risk for Suicide

3:05 –3:15     Edison Leung *UTHealth Houston*

*Alcohol and Opioid Use Disorders Affect Shared and Unique Pathways*

3:15-3:25         Bruno Kluwwe-Schiavon *UTHealth Houston*

 *Deciphering the Molecular Basis of Aging in Substance Use Disorder*

3:25-3:55 Panel with speakers (Q&A grouped and merged into a panel)

3:55          Closing Remarks