Tri-Institutional PhD Program
Chemical Biology

15th Annual Tri-Institutional Chemical Biology Symposium

POSTER SESSION

1:00 PM - 3:00 PM, Wednesday, September 4, 2019

Lower Level Greenberg Building (CRC Lobby), The Rockefeller University

All <u>even numbered</u> posters will be presented during session 1 (1-2 pm) and <u>odd numbered</u> posters will be presented during session 2 (2-3 pm).

Poster #	Presenter Name	Poster Title
1	Ayala Carl*	Mechanically Regulated Structural States of F-actin
2	Ashley Chui*	Protein disorder is required for CARD8 activation and Val-boroPro-mediated pyroptosis
3	Tandrila Das*	Functional analysis of S-palmitoylated IFITM3 antiviral activity and regulation
4	Emma Garst*	Reconstitution of S-palmitoylated IFITM3 for antiviral mechanism studies
5	Jake Hebert*	HLTF is a novel E3 ubiquitin ligase for histone H3 and regulator of H3K9Me3
6	Mizuho Horioka*	Uveal Melanoma Oncogene CYSLTR2 Encodes a Constitutively Active GPCR Highly Biased Toward Gq Signaling that Weakly Recruits β-Arrestins
7	Qian Hou*	Evolving EMCV IRES into acyclovir-controlled eukaryotic translational switch using mRNA display
8	Mehtap Isik*	Evaluating computational physicochemical property prediction methods with SAMPL6 blind challenges
9	Alexis Jaramillo Cartagena*	Structural and Functional Investigations Crl, an Unconventional Bacterial Transcription Activator
10	Natalie Jones*	Using Resistance Analysis to Develop Chemical Probes for the AAA Protein Katanin
11	Jonghan Lee*	A CAR T cell that synthesizes small molecules and overcomes cancer resistance mechanism
12	Rachel Leicher*	Single-molecule investigation of nucleosome engagement by histone methyltransferase PRC2
13	Jacob Litke*	Highly efficient expression of circular RNA aptamers in cells using autocatalytic transcripts
14	Fangyu Liu*	Structural identification of a hotspot on CFTR for potentiation
15	Igor Maksimovic*	Developing a chemical toolbox to investigate ribose glycation of histones
16	Jordan Mattheisen*	Probing GPCR Allosteric Pockets Using Genetic Code Expansion and Bioorthogonal Chemistry
17	Elizabeth Orth*	CARD8 inflammasome activation is dependent on cellular protein synthesis and degradation.
18	Wola Osunsade*	Characterization of Human Linker Histone Variants
19	Rudolf Pisa*	Analyzing Resistance to Design Selective Chemical Inhibitors for AAA Proteins
20	Nick Prescott*	dCas9-mediated isolation of the Hepatitis B Virus minichromosome of covalently closed circular (ccc)DNA
21	Sahana Rao*	N-end rule mediated degradation activates the Nlrp1b inflammasome

22	Zheng Ser*	Optimized Cross-Linking Mass Spectrometry for in situ Interaction Proteomics
23	Taku Tsukidate*	Nuclear Receptor Chemical Reporter Enables Domain-specific Analysis of Ligands in Mammalian Cells
24	Eva Forea	Backbone amide nitrogen atoms are key determinants of inter-anion discrimination in CLCs
25	Ruchi Gupta	Proximity Based Site Specific Antibody Conjugation for in vitro Breast Cancer Detection and Bone Cancer Therapy
26	Mohit Gupta	Selective allosteric inhibitors of MEK5 as potential anti-cancer agents
27	Vanessa Gutzeit	A Family of Photoswitchable Metabotropic Glutamate Receptors for High-Efficiency Optical Interrogation of Specific Receptor Populations in vivo
28	Jun Young (Nick) Hong	Synthesis and Evaluation of SIRT2 Inhibitors
29	Michael Li	Towards Structure-Activity Relationships and Mechanism of Action in the Inhibition of Serine Hydrolase Enzymes in M. tuberculosis
30	Alexander Minikes	Cancer cell dependency on GPx4 is dictated by the Hippo-YAP signaling axis.
31	Martin Reynders	PHOTACs Enable Optical Control of Protein Degradation
32	Jordana Thibado	Inter-domain interactions and allosteric modulation of metabotropic glutamate receptors
33	Christian Baca†	Probing the Conformational Preferences of Alpha-Synuclein's Broken Helix State
34	Chen Chen*	An Optical Nanosensor for Intercellular pH Reveals Basification of Lysosomes upon the Suppression of Lactate Dehydrogenase A
35	Gabriella Chua†	Acidic Microenvironments of γ-Secretase: Fact or Fiction?
36	Ilana Kotliar*	Visualizing GPCR-RAMP Interactions by Proximity Ligation Assay
37	Alexander Payne†	Computational Probing of Structural Determinants for Deficient Rhodopsin Dimerization in Retinitis Pigmentosa
38	Adam Rosenzweig†	Metagenome derived structure prediction and synthesis of p-aminobenzoic acid containing non-ribosomal polypeptides
39	Dominic Rufa*	Predicting Drug-Like Molecule Binding Affinities with Alchemical Free Energy Calculations
40	Kristen Vogt†	Drug Fragments as Therapeutics and Tools for Deeper Learning
41	Linzhi Ye*	Screening for human gut microbial metabolites that affect intestinal barrier function
42	Dianne Hernandez	Epoxysuccinate-Based Clickable and Tagless Activity-Based Probes of Human Cathepsin B
43	Rameen Shah	Investigating Clustered Regularly Interspaced Short Palindromic Repeats (CRISPR) in NJ/NY Ground Soil
44	Syeda Tabassum	Development of Fumarate-Based Inhibitory Probes of Human Cathepsin B With Enhanced Stability and Selectivity
45	Azka Asim	Computational Reactive Sites of Curcumin in Gaseous State and its role in Alzheimer's Disease by forming Aluminum (III) Curcumin Complex Using Quantum Mechanics and Semi-empirical Methods.

46	Estefania Azevedo	A Role of Drd2 Hippocampal Neurons in Context- Dependent Food Intake
47	Suhasini Joshi	Chaperome-mediated neuroinflammatory pathways in the pathogenesis of Parkinson's Disease
48	SeCheol Oh	Structural basis for permeation and selectivity in the non-canonical human lysosomal K+ channel TMEM175
49	Sahil Sharma	Inhibition of hyperglycosylated Grp94 as a novel mode of action for anticancer agents
50	Yao Xu	Total Synthesis of the Bacterial Diisonitrile Chalkophore SF2768

Indicates a TPCB Student; †Indicates a TPCB First-year Student

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