Swartz Foundation Annual Meeting
July 21-24, 2019 | Janelia Research Campus
AXON/DENDRITE ROOM

Sunday, July 21

Arrival and check-in

6:00 pm	Welcome Reception *(Lobby)*
7:00 pm	Dinner *(Dining Room)*
8:00 pm	Refreshments available at Bob's Pub

Monday, July 22

8:00 am	Breakfast available in the Servery *(service ends at 9:15am)*
9:30 am	**Session 1**
9:30 am	**Nirag Kadakia**, Yale University *Universal front-end adaptation confers robust combinatorial odor coding in natural environments*
10:15 am	**Michael J. Morais**, Princeton University *Extending efficient coding to more diverse families of optimal codes in Bayesian observer models*
11:00 am	**Gaia Tavoni**, University of Pennsylvania *Constructing optimal filters for dynamic statistical inference*
11:45 am	Lunch in the Servery *(service ends at 1pm)*
1:00 pm	**Session 2**
1:00 pm	**Mikhail Genkin**, Cold Spring Harbor Laboratory *Inference of interpretable dynamical models from large-scale neural activity recordings*
1:45 pm	**Sam Lewallen,** Harvard University *Dimensionality and dynamics*
2:30 pm	**Mu Qiao,** California Institute of Technology *Independent discriminant analysis for RNAseq of neurons*
3:15 pm	Break
3:45 pm	**Session 3**
3:45 pm	**Merav Stern,** University of Washington *Inferring neural population spiking rate from wide-field calcium recordings*
4:30 pm	**Chengcheng Huang,** University of Pittsburgh *Circuit models of low dimensional shared variability in cortical networks*
5:15 pm	**Charles Cosnier-Horeau,** Brandeis University *Continuity and related issues in the V1 representation*
6:00 pm	Poster Reception *(Lobby)*
7:00 pm	Dinner *(Dining Room)*
8:00 pm	Refreshments available at Bob's Pub

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Tuesday, July 23

8:00 am	Breakfast available in the Servery *(service ends at 9:15am)*
9:30 am	**Session 4**
9:30 am	**Alex Kuczala,** Salk Institute/UCSD *Eigenvalue spectra of random matrices with block-structured correlations*
10:15 am	**Rainer Engelken,** Columbia University *Dimensionality and entropy of spontaneous and evoked neural rate dynamics*
11:00 am	**Ulises Pereira,** New York University *Memory and chaos in sparsely connected recurrent neuronal networks*
11:45 am	Lunch *(service ends at 1pm)*
12:30 pm	Building Tour *(optional – meet at reception)*
1:30 pm	**Session 5**
1:30 pm	**Leandro Alonso,** Brandeis University *Modeling the differential resilience of neurons and networks to perturbations*
2:15 pm	**Agostina Palmigiano,** Columbia University *Statistics of network responses to perturbations*
3:00 pm	**Sergey Shuvaev,** Cold Spring Harbor Laboratory *Deep reinforcement R-learning in actor-critic model can explain mouse foraging behavior*
3:45 pm	Break
4:15 pm	**Session 6**
4:15 pm	**Bolun Chen,** Brandeis University *Attractor-state itinerancy in neural circuits with synaptic depression*
5:00 pm	**Alessandro Ingrosso,** Columbia University *Training dynamically balanced excitatory-inhibitory networks*
5:45 pm	**Nimrod Shaham,** Harvard University *Continual learning and replay in a sparse forgetful Hopfield model*
6:30 pm	Reception *(Lobby)*
7:30 pm	Dinner *(Dining Room)*
8:30 pm	Refreshments available at Bob's Pub

Wednesday, July 24

8:00 am	Breakfast available in the Servery *(service ends at 9:15am)*
9:30 am	**Session 7**
9:30 am	**Aine Byrne,** New York University *A neural circuit model for learning a beat*
10:15 am	**Madhu Advani,** Harvard University *A new role for sparse expansion in neural networks*
11:00 am	**Jonathan Kadmon,** Stanford University *Improving coding fidelity in neuronal networks by harnessing noise and chaos*
11:45 am	Conclusion / Lunch *(service ends at 1pm)*
12:30 pm	First Shuttle to Dulles Airport
1:30 pm	Second Shuttle to Dulles Airport
2:30 pm	Last shuttle to Dulles Airport

POSTER PRESENTATIONS

Batuhan Baserdem, Cold Spring Harbor Laboratory
Smoothed p article hydrodynamics

Hannah Choi, University of Washington
Data-driven models of the mouse mesoscale connectome: network structure and functionality

Srinivas Gorur Shandilya, Brandeis University
Compensation of size change coexists with sensitivity to perturbations in a model of neuronal regulation

Gabrielle Gutierrez, University of Washington
Nonlinear convergence preserves information

Kyo Iigaya, California Institute of Technology
Distributed neural computations underlying the construction of subjective value

Rich Pang, University of Washington
Excitability-modulated sequences and computation in bioinspired neural networks

Siwei Qiu, Brandeis University
Context-dependent computation by randomly connected attractor networks with synaptic depression

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PARTICIPANTS

Madhu Advani, Harvard University **|** *madvani@fas.harvard.edu*
Leandro Alonso, Brandeis University **|** *lalonso@brandeis.edu*
Batuhan Baserdem, Cold Spring Harbor Laboratory **|** *bbaserde@cshl.edu*
William Bialek, Swartz Foundation **|** *william.bialek@theswartzfoundation.org*
Kenneth Blum, Harvard University **|** *kenneth_blum@harvard.edu*
Aine Byrne, New York University **|** *ab7720@nyu.edu*
Bolun Chen, Brandeis University **|** *bo2lun2chen2@gmail.com*
Hannah Choi, University of Washington **|** *myhannahchoi@gmail.com*
Charles Cosnier-Horeau, Brandeis University **|** *cchoreau@brandeis.edu*
Tatiana Engel, Cold Spring Harbor Laboratory **|** *engel@cshl.edu*
Rainer Engelken, Columbia University **|** *re2365@columbia.edu*
James Fitzgerald, Janelia Research Campus/HHMI **|** *fitzgeraldj@janelia.hhmi.org*
Mikhail Genkin, Cold Spring Harbor Laboratory **|** *mgenkin@cshl.edu*
Srinivas Gorur Shandilya, Brandeis University **|** *srinivasgs@brandeis.edu*
Gabrielle Gutierrez, University of Washington **|** *ellag9@uw.edu*
Ann Hermundstad, Janelia Research Campus/HHMI **|** *hermundstada@janelia.hhmi.org*
Chengcheng Huang, University of Pittsburgh **|** *chengchenghuang11@gmail.com*
Kyo Iigaya, California Institute of Technology **|** *kiigaya@caltech.edu*
Alessandro Ingrosso, Columbia University **|** *ai2367@columbia.edu*
Nirag Kadakia, Yale University **|** *nirag.kadakia@yale.edu*
Jonathan Kadmon, Stanford University **|** *kadmonj@gmail.com*
Joseph Katz, Swartz Foundation **|** *j_katz@yahoo.com*
Alexei Koulakov, Cold Spring Harbor Laboratory **|** *akula@cshl.edu*
Alex Kuczala, Salk Institute and UCSD **|** *akuczala@physics.ucsd.edu*
Sam Lewallen, Harvard University **|** *slewallen@fas.harvard.edu*
Jackson Loper, Columbia University **|** *jl5116@columbia.edu*
Kenneth Miller, Columbia University **|** *ken@neurotheory.columbia.edu*
Paul Miller, Brandeis University **|** *pmiller@brandeis.edu*
Read Montague, Virginia Tech **|** *read@vtc.vt.edu*
Michael Morais, Princeton University **|** *mjmorais@princeton.edu*
John Murray, Yale University School of Medicine **|** *john.murray@yale.edu*
Agostina Palmigiano, Columbia University **|** *ap3676@columbia.edu*
Rich Pang, University of Washington **|** *rpang@uw.edu*
Cengiz Pehlevan, Harvard University **|** *cpehlevan@seas.harvard.edu*
Ulises Pereira, New York University **|** *u.pereira.obilinovic@nyu.edu*
Mu Qiao, California Institute of Technology **|** *muqiao@caltech.edu*
Siwei Qiu, Brandeis University **|** *siweiqiu@brandeis.edu*
Romani Sandro, Janelia Research Campus/HHMI **|** *romanis@janelia.hhmi.org*
Cristina Savin, New York University **|** *cs5360@nyu.edu*

Terrence Sejnowski, Salk Institute for Biological Studies **|** *terry@salk.edu*
Nimrod Shaham, Harvard University **|** *nshaham@fas.harvard.edu*
Tanya Sharpee, Salk Institute **|** *sharpee@snl.salk.edu*
Eric Shea-Brown, University of Washington **|** *etsb@uw.edu*
Sergey Shuvaev, Cold Spring Harbor Laboratory **|** *sshuvaev@cshl.edu*
Haim Sompolinsky, Hebrew University of Jerusalem **|** *haim@fiz.huji.ac.il*
Merav Stern, University of Washington **|** *ms4325@uw.edu*
Jerry Swartz, Swartz Foundation **|** *jerry.swartz@theswartzorganization.com*
Gaia Tavoni, University of Pennsylvania **|** *tavoni@sas.upenn.edu*
Srinivas Turaga, Janelia Research Campus/HHMI **|** *turagas@janelia.hhmi.org*
Xiao-Jing Wang, New York University **|** *xjwang@nyu.edu*