

**Berkeley Statistical Mechanics Meeting
Friday, Jan. 13, 2017 – Poster Session I**

#	Name	Institution	Title of poster
1	Albaugh, Alex	UC Berkeley	Novel Methods for Polarizable Classical Molecular Dynamics Simulations
2	Bacanu, Alexandru	MIT	Spectral Decomposition of Entropy Production in Active Gels
3	Bakalar, Matthew	UC Berkeley	Size-dependent protein segregation at membrane interfaces
4	Bolmatov, Dima	Brookhaven National Laboratory	Phonon-mediated passive transport in lipid membranes
5	Braun, Efreem	UC Berkeley	An Explanation of the Flying Ice Cube Effect: How Simple Velocity Rescaling and the Berendsen Thermostat Lead to the Violation of the Equipartition Theorem
6	Brown, Aidan	Simon Fraser University	Distributing dissipation to maximize steady-state flux
7	Dasbiswas, Kinjal	University of Chicago	Topological boundary modes in soft active matter
8	Del Junco, Clara	University of Chicago	Dissipation, diffusion, and phase separation out of equilibrium
9	Fan, Zhaochuan	University of Utah	Pressure Induced B1-B33-B2 Phase Transitions in Lead Selenide
10	Fox, Nathan	University of Utah	A Machine Learning assisted investigation of the physics of defects in 2D Materials.
11	Frechette, Layne	UC Berkeley	Nonequilibrium Shape Transformations of Etched Nanocrystals
12	Gingrich, Todd	MIT	The thermodynamic cost of reliability
13	Haberstroh, John	UC Berkeley	Optical gap dynamics of bacteriochlorophyll bound to protein complexes: an exploration across multiple time scales
14	Hu, Yuan-Chao	City University of Hong Kong	Density Scaling of Glassy Dynamics and Dynamic Heterogeneities in Glass-forming Liquids
15	Hudson, Alex	UC Berkeley	Non-equilibrium behavior of glass-forming liquids subjected to cooling
16	Johnson, Margaret	Johns Hopkins University	Quantifying how cytoplasmic proteins can exploit membrane recruitment to trigger assembly
17	Mallory, Stewart	Columbia University	Activity-assisted self-assembly of colloidal particles

18	Nguyen, Vu	University of Utah	Molecular Simulation of Covalent Organic Framework Formation
19	Nguyen, Michael	University of Chicago	Design Principles for Non-Equilibrium Self-Assembly
20	Obliger, Amael	MIT	Transport of Alkane Mixtures in Kerogen's Subnanoporosity
21	Paulose, Jayson	UC Berkeley	The structure of populations under long-range dispersal
22	Poon, Geoffrey	UC Santa Barbara	Accelerated nucleation due to trace additives
23	Preisler, Zdenek	Lawrence Berkeley National Laboratory	Estimating probability weights of deterministic many-body systems in their steady states
24	Remsing, Richard	Temple University	Chemical Dynamics of Aqueous Solutions Confined between Metal Oxide Sheets
25	Rosnik, Andreana	UC Berkeley	Protein organization in thylakoid membrane stacks: possible scenarios for phase coexistence and criticality
26	Rotskoff, Grant	UC Berkeley	A minimal model of equilibrium encapsulation and nanoshell assembly
27	Son, Sungmin	UC Berkeley	Protein crowding is a barrier to membrane fusion
28	Strong, Steven	University of Colorado Boulder	The Dynamics of Water in Porous 2d Crystals
29	Tempkin, Jeremy	University of Chicago	Trajectory stratification of stochastic dynamics
30	Tubman, Norm	UC Berkeley	Chemical bonding through quantum entanglement
31	Vahey, Michael	UC Berkeley	Measuring phenotypic variability and plasticity in influenza A virus using multispectral viral strains
32	Willard, Adam	MIT	Molecular Disorder Drives Charge Separation at Donor-Acceptor Interfaces
33	Wood, Brandon	UC Berkeley	Modeling Chain Configurations of Conjugated Polymers as a Function of Charge Concentration
34	Zhang, Zhongmin	University of Virginia	Modeling the influence of monomer properties on early-stage step-growth copolymerizations
35	Maibaum, Lutz	University of Washington	Local density fluctuations predict photoisomerization quantum yield of azobenzene-modified DNA

Berkeley Statistical Mechanics Meeting
Saturday, Jan. 14, 2017 – Poster Session II

#	Name	Institution	Title of poster
1	Belsare, Saurabh	UC Berkeley	Studying Solvation of Small Biomolecules via Molecular Dynamics Using a Polarizable Force Field
2	Blunt, Nick	UC Berkeley	The density matrix quantum Monte Carlo method
3	Chu-Jon, Carlos	University of Utah	Molecular Dynamics of ZIF-8 Formation
4	Cox, Steve	UC Berkeley	Theoretical developments of bulk and interfacial ion solvation
5	David, Philippe	University of Utah	Directionally Dependent Nucleation in CdS Nanorods Under Shockwave Compression
6	Demerdash, Omar	UC Berkeley	Theory and Implementation of Approximate Models of Polarization by Truncation of the Many-Body Expansion
7	Ding, Feizhi	California Institute of Technology	“Embedded Mean-Field Theory for Treating Ground and Excited States in Complex Chemical Systems”
8	Felberg, Lisa	UC Berkeley	PB-SAM, a novel solution to the Poisson-Boltzmann equation for applications in coarse-grain dynamics
9	Fusco, Diana	UC Berkeley	Cooperation boosts adaptation in expanding populations
10	Ge, Hao	Peking University	Self-consistent nonequilibrium thermodynamics of internal kinetics in chemical reaction systems.
11	Gokhale, Shreyas	MIT	Synchronization and survival of connected bacterial populations
12	Kamat, Kartik	UC Santa Barbara	Diabat Interpolation for Polymorph Free Energy Differences
13	Karnes, John	UC Santa Cruz	Local Ordering in Chloroform and Carbon Tetrachloride.
14	Katira, Shachi	UC Berkeley	Pre-transition effects in trajectory space
15	Kim, Jeongmin	California Institute of Technology	Understanding Ion Diffusion in Polymer Electrolytes at High Salt Concentration: Interplay between Ion Pairing and Viscosity
16	Klymko, Katie	UC Berkeley	Towards an understanding of typical and atypical growth trajectories
17	Kundu, Joyjit	Lawrence Berkeley National Laboratory	Selective gas capture via kinetic trapping

18	Lee, Sebastian	California Institute of Technology	Towards Black Box Projection-based Embedding
19	Ludwig, Nicholas	University of Chicago	Densely charged liquids: routes to answers for new, outstanding questions
20	Magdau, Ioan-Bogdan	California Institute of Technology	2D THz-THz-Raman Spectroscopy from MD: Bromoform
21	Marzen, Sarah	MIT	Weak universality in sensory tradeoffs
22	Ray, Ushnish	California Institute of Technology	Importance Sampling Large Deviations in Nonequilibrium Steady States
23	Rosa, Jorge L.	California Institute of Technology	Path-accelerated molecular dynamics: Parallelizing molecular dynamics in time using path integrals
24	Sasmal, Sukanya	UC Berkeley	Effect of a Paramagnetic Spin Label on Amyloid-beta Structural Ensemble
25	Satish, Pratima	UC Berkeley	Field theory for ligand alignment on nanoparticles: Prospects for self-assembly driven by phase transitions
26	Savoie, Brett	California Institute of Technology	Connectivity and Percolation Phenomena in Polymer Electrolytes
27	Schreck, Carl	UC Berkeley	Growth-induced forces generate cooperative evolutionary dynamics in crowded microbial populations
28	Shushkov, Philip	California Institute of Technology	Passing through a needle's eye - the rotaxane deslipping mechanism
29	Tao, Xuecheng	California Institute of Technology	An isomorphic classical model for non-adiabatic quantum dynamics
30	Thiede, Erik	University of Chicago	Estimating Dynamical Information Using Diffusion Maps
31	Welborn, Matt	California Institute of Technology	Path-based orbital localization for even-handed electronic structure embedding
32	Zhang, Bin	MIT	Understanding sequence-structure-function relationships of the human genome
33	Zimmer, Matthew	California Institute of Technology	Rapidly predicting characteristics of protein cotranslational folding using homology modeling
34	Edison, John	Lawrence Berkeley National Laboratory	Stabilizing the Hexagonal Close Packed Structure of Hard Spheres with Polymers: Phase diagram, Structure, and Dynamics