

Register for Session A: <http://bit.ly/2021EMS-SessionARegistration> (registration required for both sessions)

 Register for Session B: <http://bit.ly/2021EMS-SessionBRegistration> (Zoom login required for both sessions)

9:30-10:30	Session A	Chair: Dave Dillard	Session B	Chair: Jonathan Boreyko
9:30-9:45	Dillard, D.	Reflections on Steering Cracks (and Herding Cats)	Boreyko, J.	Mechanics of Water Harvesting with a Fog Harp
9:45-10:00	Kumar, D.	Durability Analysis of Helical Coil Spring in Vehicle Suspension Systems	Masroor, E.	Understanding the occurrence of 2P wakes in the wake of an oscillating cylinder at low Re
10:00-10:15	Burns, D.	An Efficient Methodology for Predicting the Dynamic Response of Multilayered Continua	Sadagopan, S.	Wall shear stress distributions in an annular lid-driven cavity flow
10:15-10:30	Shirodkar, N.	Characterizing fracture toughness of carbon nanotube and graphene nanoplatelet doped epoxy nanocomposites	Habibi, M.	Effect of Bending Stiffness on Foil Bearings
10:30-11:00	View Posters – http://bit.ly/2021EMS-Posters ; Join Q&A Session – http://bit.ly/2021EMS-PosterSessionQA			
Poster Session On-demand Q&A period	Najmeddine, A.	Physics-based Constitutive Equation for Thermo-Chemical Aging in Elastomers based on Crosslink Density Evolution		
	Gangi, M.	Scaling the Thermal-Structural Response in Fire Resistance Tests		
	Umanzor, M.	Penetration Resistance of Cast Metal-Ceramic Composite Lattice Structures		
11:00-12:00	Session A	Chair: John Domann	Session B	Chair: Nicole Abaid
11:00-11:15	Domann, J	Generalizing Chu's Limit: Fundamental frequency, size, bandwidth restrictions for acoustic systems	Abaid, N.	Eavesdropping like a bat: fusing active and passive sonar for simultaneous localization and mapping
11:15-11:30	Imhof, A.	A One-Dimensional Constitutive Model for Magnetostrictive Materials	Mikel-Stites, M.	Quasi-2D hearing for a 3D world: a better model for hearing in a parasitoid fly
11:30-11:45	Mukherjee, R.	Jumping Ice	Hashimoto, A.	Modeling Lost Person Dynamics for Wilderness Search and Rescue
11:45-12:00	Park, H.	Using Frost to Promote Cassie Ice on Hydrophilic Pillars	Nimmala, B.	A Lagrangian Stochastic Model for Particle Transport
12:00-13:00	Lunch Break			
13:00-14:15	Session A	Chair: Gary Seidel	Session B	Chair: Anne Staples
13:00-13:15	Seidel, G.	Modeling of Strain, Damage, and Hot Spot Detection in Nanocomposite Bonded Energetic Materials via Thermo-Electro-Mechanical Peridynamics	Staples, A.	Coral colony hydrodynamics
13:15-13:30	Shah, K.	Reduced-order Structure-Property Linkage for Multifunctional CNT-Polymer Nanocomposites via Machine Learning	Pulliam, J.	Climbing strategies of cicadas across vertical 'gaps' of low friction
13:30-13:45	Genckal, N.	Multiscale Modeling of Damage Response in Composites Reinforced with CNT Fibers	Kale, S.	Fiber force microscopy: reconstructing forces of cell migration on nanofiber networks
13:45-14:00	Alanbay, B.	Damage and Failure in Blast Loaded Composite Sandwich Structures	Huntington, A.	Contractile Strains of the Rat Vagina
14:00-14:15	Goforth, M.	Exploring the Ideal Bias Conditions for a Magnetolectric Antennas Considering the Impact of Nonuniform Material Properties	Snyder, W.	Reduced order modeling of vaginal tissue inflation
14:30-15:45	Keynote Lecture: The Liviu Librescu Memorial Lecture (Meeting ID: 834 2438 2852 Passcode: 799439)			
	Porfiri, M.	Engineering the Firearm Ecosystem: Research on Media Coverage and Firearm Acquisition in the Aftermath of a Mass Shooting		