

TUESDAY (29 JAN 19)

	Marshall Room	Auditorium
7:30-8:30	Breakfast	
8:30-8:45	Welcome/Safety	
8:45-9:45	AFLCMC/EZP Kickoff	
9:45-10:00	Break	
10:00-10:45	AFRL	
10:45-11:30	MAMLS	
11:30-12:30	Lunch/Networking	
12:30-1:00	Cuyahoga Community College - Alethea Ganaway - Workforce Development in AM and Employer Partnerships	University of Pittsburgh - Dr. Albert To - Reducing Residual Stress in AM Components Through Support Design and Build Orientation Optimization
1:00-1:30	University of Cincinnati - Botao Zhang, Prof. Sam Anand - CAD-Based Design for Additive Manufacturing (DFAM) and Orientation Optimization Tools	Georgia Institute of Technology - Dr. Christopher Saldana - Non-Destructive Evaluation and Digital Process Qualification/Design for Additive and Hybrid Manufacturing
1:30-2:00	University of Cincinnati - Matthew McConaha, Prof. Sam Anand - Neural Network Based Compensation of STL Geometry Files by Registration to Additively Manufactured Scan Geometry	Missouri University of Science & Technology - Lianyi Chen - In-Situ Characterization of the Dynamics Of LPBF Additive Manufacturing Process by High-Speed X-Ray Imaging and Diffraction
2:00-2:30	University of Tennessee - Knoxville - Mingzhou Jin - Spare Parts Supply Chain Optimization with Additive Manufacturing	Missouri University of Science & Technology - Robert G. Landers - Monitoring and Control for Additive Manufacturing Process Certification
2:30-3:00	Break	Break
3:00-3:30	Auburn University - Jonathan Pegues, Rakish Shrestha, Nima Shamsaei - Durability Assessment of Additive Manufactured Parts: Establishing Specimen Property to Part Performance Relationships	Youngstown State University - Brett Conner - A New Approach to Ceramics Additive Manufacturing: Nanoparticle Jetting™
3:30-4:00	The Ohio State University - Edward D. Herderick, PhD - Industrialization of Metal Powder Bed Fusion	Northwestern University - Jian Cao - ICME Approach for Material and Directed Energy Deposition Process Design: Experiments and Simulations
4:00-4:30	University of Dayton - Dr. Amy Doll, Dr. Dathan Erdahl, Jared Speltz, Hamed Elwarfalli, Dimitri Papazoglou - Automation Additive Manufacturing	The Pennsylvania State University - Jayme Keist - Potential Flaw-Formation Mechanism in Powder Bed Fusion Additive Manufacturing
4:30-5:00	The Pennsylvania State University - Karen A. Thole - Exploiting Additive Manufacturing to Improve Turbine Cooling	
5:30-7:30	Reception - 2610 E. River Rd. Moraine, OH 45439	

WEDNESDAY (30 JAN 19)

	Marshall Room	Auditorium
7:30-8:30	Breakfast	
8:30-9:15	USAF AM Materials - Metals	
9:15-10:00	USAF Design for AM Metals	
10:00-10:15	Break	
10:15-11:00	USAF Bell Crank Case Study	
11:00-11:30	USAF Duct Case Study	
11:30-12:30	Lunch/Networking	
12:30-1:00	Youngstown State University - Brett Conner - Metal Powder Bed Fusion Component Qualification Research for a Bell Crank Family of Parts	University of Louisville - Sundar V. Atre - Microstructure-Property-Processing Relationships For The L-PBF of 420 And 17-4PH Stainless Steels
1:00-1:30	Youngstown State University - Pedro Cortes - Composite Tooling Manufactured via 3D Printing	Wright State University - Joy Gockel - The Effect of Defects on Fatigue Performance and Relationship to Processing Parameters in Additive Manufacturing
1:30-2:00	Youngstown State University - Jason Walker - Additive Manufacturing of Rapid Tooling for Metal Casting – Applications in Maintenance and Sustainment	Colorado School of Mines - Branden Kappes - A Statistical Framework to Qualify the Low Cycle Fatigue Performance of Additively Manufactured Steel Replacement Parts
2:00-2:30	Carnegie Mellon University - Jack Beuth - AM Research in the Carnegie Mellon NextManufacturing Center	Purdue University - Anthony Favaloro, Eduardo Barocio, R. Byron Pipes - Process Simulation of Extrusion Deposition Additive Manufacturing with Fiber Reinforced Polymer Composites
2:30-3:00	Break	Break
3:00-3:30	Youngstown State University - Eric MacDonald - 3D Printed Hybrid Flexible Electronics with Carbon3D	University of Texas at Arlington - Robert T aylor - Process-informed Structural Optimization for Additive Manufacture Using Reduced Order Models
3:30-4:00	Virginia Polytechnic Institute and State University - Christopher B. Williams - Multi- Material/Modality/Scale/Axis: Realizing Multi-Functional Products with Next-Generation AM Processes	University of Cincinnati - Vysakh Venugopal, Matthew McConaha - Multi-Material Lattice Structures with Tailorable Mechanical and Thermal Properties for Additive Manufacturing
4:00-4:30	Colorado School of Mines - Owen Hildreth - Post-Processing: Self-Terminating Support Dissolution Simplifies Support Removal in 3D Printed Metals	Carnegie Mellon University - Jack Beuth - Machine Vision and Traditional Approaches for AM Process Monitoring and Control