

AGENDA
Multidisciplinary University Research Initiative (MURI) Program Review
System Planning Corporation Capital Conference Center – One Virginia Square
3601 Wilson Boulevard, 6th Floor
Arlington, Virginia 22201
August 8 – 10, 2012

Time	Event
Wednesday, August 8	
0800 – 0830	Registration
0830 - 0900	Welcome Remarks Dr. Robin Staffin, Director, Office of Basic Research, ASD (Research & Engineering) Research Directorate
Autonomy	
0900 - 0920 (ONR)	Grid Cells and Cognitive Maps for Autonomous Systems, MIT
0920 – 0940 (ONR)	Animal Inspired Robust Flight with Outer and Inner Loop Strategies, University of Washington
0940 – 1000 (ONR)	Probably-Stable Vision-Based Control of High-Speed Flight through Forests and Urban Environments, Massachusetts Institute of Technology
1000 – 1030	Break
1030 – 1050 (ARO)	Neuro-Inspired Adaptive Perception and Control for Agile Mobility of Autonomous Vehicles in Uncertain and Hostile Environments, Georgia Institute of Technology
Information Science	
1050 – 1110 (ARO)	An Omnivorous Framework for Translation and Analysis of Low Density Languages, Carnegie Mellon University
Sensing and Imaging	
1110 – 1130 (ONR)	Sound and Electromagnetic Interacting Waves, North Carolina State University
1130 – 1150 (ONR)	Remote Sensing and Data-Assimilative Modeling in the Littorals, University of Washington
1150 – 1330	Lunch
1330 – 1350 (AFOSR)	Mathematical Modeling and Experimental Validation of Ultrafast Nonlinear Light-Matter Coupling Associated with Filamentation in Transparent Media, University of Arizona
1350 – 1410 (AFOSR)	Control Science for Next Generation Sensing, University of Pennsylvania
1410 – 1430 (ONR)	Rich Representation with Exposed Semantics for Deep Visual Reasonings, Carnegie Mellon University
1430 – 1450 (ONR)	Knowledge Representation, Reasoning and Learning for Understanding Scenes and Events, University of California, Los Angeles
1450 – 1520	Break
Network Science	
1520 – 1540 (AFOSR)	Multi-Layers and Multi-Resolution Networks of Interacting Agents in Adversarial Environments, University of Illinois, Urbana-Champaign
1540 – 1600 (AFOSR)	Inferring Structure and Forecasting Dynamics on Evolving Networks, Brantingham, University of California, Los Angeles
1600 – 1620 (ARO)	Measuring, Understanding, and Responding to Covert Social Networks, Harvard University
1620 – 1640	WRAP-UP Dr. Robin Staffin

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Thursday, August 9

0800 – 0830

Registration

0830 – 0840

Welcome

Dr. Robin Staffin, Research Directorate, Director of Basic Sciences

Metamaterials

0840 – 0900 (ONR)

Large-Area 3D Optical Metamaterials with Tunability and Low Loss, University of Pennsylvania

Fluid Mechanics

0900 – 0920 (ONR)

Dynamical Systems Theory and Lagrangian Data Assimilation in 4D Geophysical Fluid Dynamics, Woods Hole Oceanographic Institute

0920 – 0940 (AFOSR)

Fundamental Processes in High-Temperature Hypersonic Flows, University of Minnesota

Atomic Physics

0940 – 1000 (ARO)

Atomtronic: Material and Device Physics of Quantum Gases, University of Maryland, College Park

1000 – 1020

Break

Materials/Chemistry

1020 – 1040 (AFOSR)

Novel Catalytic Mechanisms for the Chemical Reduction of Carbon Dioxide to Energy-Dense Liquids, University of California, San Diego

1040 – 1100 (ARO)

Reconfigurable Matter from Programmable Colloids, University of Michigan

1100 – 1120 (ARO)

An Integrated Multi-Scale Approach for Understanding Ion Transport in Complex Heterogeneous Organic Materials, Colorado School of Mines

1120 – 1250

LUNCH

Electronic Materials

1250 – 1310 (ONR)

Rational Design of Advanced Polymeric Capacitor Films, University of Connecticut

1310 – 1330 (ONR)

Dielectric Enhancements for Innovative Electronics, University of California, Santa Barbara

1330 – 1350 (AFOSR)

Center for Organic Materials for All Optical Switching, Georgia University of Technology

1350 – 1410 (AFOSR)

Quantum Preservation, Simulation & Transfer in Oxide Nanostructures, University of Pittsburgh

1410 – 1430 (AFOSR)

Cryogenic Peltier Cooling, Ohio State University

1430 – 1450

Break

1450 – 1510 (ARO)

Near and Far-Field Interfaces to DNA-Guided Nanostructures from RF to Lightwave: Exploiting the Spectrum, University of California, Irvine

1510 – 1530 (ARO)

Fundamental Study of Defects and their Reduction in Type-II Superlattice Materials, University of Illinois, Urbana-Champaign

1530 – 1550

WRAP-UP

Dr. Robin Staffin

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Friday, August 10

0800 – 0830

Registration

0830 – 0840

Welcome

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Neuroscience

0840 – 0900 (ARO)

Blast Induced Thresholds for Neuronal Networks

David F. Meaney, University of Pennsylvania

Biology

0900 – 0920 (ONR)

Fundamental Research on the Biological Stability of Future Naval Fuels and Implications for the Biocorrosion of Metallic Surfaces, University of Oklahoma

0920 – 0940 (AFOSR)

Bio-enabled Particle Adherents for Interrogated Spectroscopy, Georgia Institute of Technology

0940 – 1000 (ARO)

Prokaryotic Genomic Instability, Indiana University