

# RIT College of Science Grant Awards (2020)

## Grant Awards

12/18/20	The Role of Vorticity and Fuel Moisture on the Near-Field Plume Structure and Ember Dynamics	Kremens, Robert
12/16/20	Nearby Young Stars and Disk Detective Citizen Science	Kastner, Joel
11/30/20	Development of an On-Chip Integrated Spectrometer for Far-IR Astrophysics	Zemcov, Michael
11/24/20	Option Year AB - LASS Research in Sensor and System Modeling	Messinger, David
11/11/20	DIRSIG Development Support to Arete Surface Zone Modeling Tool (SZT)	Goodenough, Adam
11/05/20	DataCell: A Solar Cell Integrated Retroreflector Phase 2	Hubbard, Seth
10/27/20	CANDELS-Herschel Environmental Spectroscopic Survey: Part II	Kartalpe, Jeyhan
10/22/20	The Nature of X-rays From Young Stellar Object in the Orion Nebula Cluster	Kastner, Joel
10/15/20	Sample Analysis for Separation and Polymer Identifications of Microplastic Particles from Water, Sediment and Atmospheric Matrices	Eddingsaas, Nathan
10/12/20	High-Resolution Vineyard Nutrient Management	van Aardt, Jan
09/15/20	Collaborative Research: SOAR/SAM Multi-Object Spectrograph (SAMOS)	Kremens, Robert
08/25/20	MISE (The Mid-IR Sky Explorer)	Zemcov, Michael
08/21/20	Enhanced 3D Sub-Canopy Mapping via Airborne/Spaceborne Full-Waveform LiDAR	van Aardt, Jan
08/20/20	Object-based aggregation of fuel structures, physics-based fire behavior, and self-organizing smoke plumes for improved fuel, fire, and smoke management on military lands	Kremens, Robert
08/19/20	NANOGrav Physics Frontiers Center	Lam, Michael
08/19/20	Phase 4, Task 4: CLIN 8 DIRSIG Development Support	Brown, Scott
08/18/20	What is the Origin and Subsequent Evolution of Starbursts at $z \sim 2$	Kartalpe, Jeyhan
08/17/20	DIRSIG Riverstrike Support	Salvaggio, Philip
08/13/20	MRI: Acquisition of a Computing System for Large Simulation Data Sets for Multimessenger Astrophysics	Campanelli, Manuela
08/13/20	The Construction of a Pulsar Interstellar Medium Array Detector	Lam, Michael
08/13/20	BCSER: Collaborative Research: Professional Development for Emerging Education Researchers: PEER Field Schools	Franklin, Scott

08/13/20	Beyond Gaia: Expanding the dynamical map of the Milky Way with asteroseismic distances	Chakrabarti, Sukanya
08/12/20	Proposal Title REU Site: Interdisciplinary Problem-Solving in Human Dominated Wetland Ecosystems	McCalley, Carmody
08/12/20	Collaborative Proposal: MODULUS: Decoding the Rules of Phase Separation In Bacterial Chromatin	Das, Moumita
08/03/20	Graduate and Undergraduate Research Fellowships in Astrophysical Sciences and Technology	Robinson, Andrew
07/29/20	Restore-L Technical Consultation Support	Montanaro, Matthew
07/28/20	Biorheology of the Vitreous Gel	Das, Moumita
07/20/20	Adaptable Interfaces for M&S Tools	Brown, Scott
07/20/20	Collaborative Research: Supermassive Binary Black Hole Mergers: Accretion Dynamics and Electromagnetic Output	Campanelli, Manuela
07/14/20	Toward a Uniform and Complete Keck Spectroscopic Archive for the COSMOS Legacy Field	Kartalpe, Jeyhan
07/06/20	Sonic Wafering of III-V substrates for High-Efficiency Cells: A path to <\$0.50/W	Hubbard, Seth
07/01/20	CAREER: Computational Model of Perceived Color and Appearance in Augmented Reality	Murdoch, Michael
06/25/20	Modeling light echoes from hot dust and the broad-line region in Active Galactic Nuclei	Robinson, Andrew
06/10/20	A new tool to monitor the resilience of mangroves to sea-level rise	van Aardt, Jan
05/19/20	Phase 2: Ultrafast Laser for 3D fabrication of waveguide lasers	Qiao, Jie
05/08/20	Supermassive Black Holes Approaching Merger: Accretion Dynamics, Jets and EM Signals	Campanelli, Manuela
04/23/20	SSI SBIR AF192-026	Ientilucci, Emmett
04/10/20	CANDELS-Herschel Environmental Spectroscopic Survey	Kartalpe, Jeyhan
04/10/20	Low-Cost End-to-end Spectral Imaging System for Historical Document Discovery	Messinger, David
04/06/20	WoU-MMA: Inference about gravitational- wave sources and source populations	O'Shaughnessy, Richard
04/03/20	Collaborative research: Frameworks: The Einstein Toolkit ecosystem: Enabling fundamental research in the era of multi-messenger astrophysics	Zlochower, Yosef
03/20/20	Development and Assessment of Virtual Reality Paradigms for Gaze Contingent Visual Rehabilitation	Diaz, Gabriel
03/10/20	Games, Decisions, Risk, and Reliability (Yearlong program at the Statistical and Applied Mathematical Sciences Institute)	Fokoue, Ernest
03/02/20	REU Site: Multimessenger Astrophysics	Faber, Joshua
02/25/20	Ultrafast laser-based polishing/forming of glass materials	Qiao, Jie
02/21/20	Mechanical Draft Cooling Tower Water Vapor Plume Volume Estimation	Salvaggio, Carl
02/21/20	Mathematical Modeling of 2-D, Upper, and Lower Eyelid Driven Contact Lens Motion & Computer Simulation of the Resulting Toric Contact Lens Re-centering Dynamics	Ross, David

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02/18/20	Binary black hole waveforms for LISA using numerical relativity	Zlochower, Yosef
02/17/20	RIT Life Science Initiative: Genomics Research Lab Cluster	Buckley, Larry
02/05/20	Collaborative Research: Developing a quantitative three-dimensional understanding of cardiac arrhythmias	Hoffman, Matthew
01/28/20	Program Officer at NSF	Ninkov, Zoran
01/28/20	Impacts of Microplastic Pollution on Benthic Ecosystem Functions and Services	Tyler, Christy
01/23/20	L'Ralph Instrument Calibration Support	Montanaro, Matthew
01/02/20	NSF REU Site: Extremal Graph Theory and Dynamical Systems	Narayan, Darren

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