

## 2022 AAS/AIAA Astrodynamics Specialist Conference: Presentation Schedule

Date	Start	Paper ID	Title	Presenter Name		Presenter Affiliation
<b>▼ 08/08/2022</b>						
<b>▼ Monday Morning</b>						
<b>▼ Trajectory, Mission, and Maneuver Design and Optimization I (Carolina A)</b>						
08/08/2022	08:00 AM	AAS 22-506	Earth to Moon L2 NRHO Transfers using a Cyclor Approach in the Restricted Three Body Problem	Mario	Innocenti	University of Pisa - Department of Information Engineering
08/08/2022	08:20 AM	AAS 22-545	Orbit Maintenance Burn Details for Spacecraft in a Near Rectilinear Halo Orbit	Diane	Davis	a.i. solutions, Inc.
08/08/2022	08:40 AM	AAS 22-564	GNC Performance Analysis and Robust Trajectory Optimization for NRHO Rendezvous Mission Design	David	Woffinden	NASA Johnson Space Center
08/08/2022	09:00 AM	AAS 22-624	Optimal Control in the Circular Restricted Three-Body Problem Using Integration Constants	Walter	Manuel	Stanford University
08/08/2022	09:20 AM	AAS 22-636	Analysis of the escape strategies from the 1:1 resonance capture based on low-thrust propulsion	Wail	Boumchita	University of Strathclyde
08/08/2022	09:40 AM	AAS 22-612	Accessing the Vicinity of the L1 Libration Point via Low-Energy Transfers Leveraging Quasi-Periodic Orbits	Brian	McCarthy	Purdue University
08/08/2022	10:00 AM		Break			
08/08/2022	10:20 AM	AAS 22-641	Coplanar Circular-to-Circular Orbit Transfer Guidance with Constant Thrust	Siddarth	Kaki	The University of Texas at Austin
08/08/2022	10:40 AM	AAS 22-838	Acceleration-Based Switching Surfaces for Impulsive Trajectory Design in Restricted Three-Body Dynamics	Keziban	Saloglu	Auburn University
08/08/2022	11:00 AM	AAS 22-647	Robust Nonlinear Optimal Control Using Koopman Operator Theory	Erica	Jenson	University of Colorado Boulder
08/08/2022	11:20 AM	AAS 22-660	Robust Trajectory Optimization for Guided Powered Descent and Landing	Grace	Calkins	University of Illinois at Urbana Champaign
<b>▼ Space Domain Awareness I (Carolina C)</b>						
08/08/2022	08:00 AM	AAS 22-736	System Design and Analysis For Cislunar Space Domain Awareness through Distributed Sensors	Gregory	Badura	GTRI
08/08/2022	08:20 AM	AAS 22-540	Tracking Spawning Events in Cislunar Space Using a Label-Partitioned GLMB Filter	Benjamin	Reifler	The University of Texas at Austin
08/08/2022	08:40 AM	AAS 22-640	Preliminary Comparative Assessment of L2 and L3 Surveillance Using Select Cislunar Periodic Orbits	Jacob	Dahlke	Air Force Institute of Technology
08/08/2022	09:00 AM	AAS 22-648	Resident Space Objects Detection and Tracking Based On Artificial Intelligence	Gilberto	Goracci	Tor Vergata and Sapienza Universities of Rome
08/08/2022	09:20 AM	AAS 22-722	Multiple Hypothesis Tracker with Sensor Tasking feedback for Space Object Detection and Tracking	Thibault	Richard	University of Alabama in Huntsville
08/08/2022	09:40 AM	AAS 22-730	Satellite Maneuver Detection by using Covariance based Track Association	Woosang	Park	Texas A&M University
08/08/2022	10:00 AM		Break			

Date	Start	Paper ID	Title	Presenter Name		Presenter Affiliation
08/08/2022	10:20 AM	AAS 22-797	Applications of Artificial Intelligence Methods for Satellite Maneuver Detection and Maneuver Time Estimation	Nicholas	Perovich	MIT Lincoln Laboratory
08/08/2022	10:40 AM	AAS 22-695	Space, The Finite Frontier: Rapidly Computing the Reachability of Electric Propulsion Spacecraft	Prashant	Patel	Institute for Defense Analyses
08/08/2022	11:00 AM	AAS 22-674	How Many Satellites Can We Fit in Low Earth Orbit?: Capacity integrating Risk-based and Intrinsic Methods	Andrea	D'Ambrosio	Massachusetts Institute of Technology
08/08/2022	11:20 AM	AAS 22-658	Analysis of the LEO orbital capacity via probabilistic evolutionary model	Andrea	D'Ambrosio	Massachusetts Institute of Technology
08/08/2022	11:40 AM	AAS 22-531	Adaptive Estimation for Continuous Thrust Maneuver Detection and Tracking	Amit	Bala	Virginia Polytechnic Institute and State University
<b>▼ Relative Motion and Formation Flying I (Carolina D)</b>						
08/08/2022	08:00 AM	AAS 22-723	HelioSwarm: Swarm Design Methods in Eccentric P/2 Lunar Resonant Orbit	Paul	Levinson-Muth	Axient
08/08/2022	08:20 AM	AAS 22-796	Multibody Dynamics on SE(3) <sup>n</sup> with Applications to Optical System Formation	Brennan	McCann	Embry-Riddle Aeronautical University
08/08/2022	08:40 AM	AAS 22-826	Feedback Shape Control of Spacecraft Formations in Cislunar Space	Ian	Down	Texas A&M University
08/08/2022	09:00 AM	AAS 22-577	Reduced-Order Model for Spacecraft Swarm Orbit Design	Shane	Lowe	Stanford University
08/08/2022	09:20 AM	AAS 22-795	Nonlinear Spacecraft Formation Flying using Constrained Differential Dynamic Programming	Tomohiro	Sasaki	Georgia Institute of Technology
08/08/2022	09:40 AM	AAS 22-646	Modeling and Analysis of Spacecraft Formation Flying Under the Effects of J2, Drag and Lift Perturbation Forces	Ayansola	Ogundele	Kratos Defense and Security Solutions Inc.
08/08/2022	10:00 AM		Break			
08/08/2022	10:20 AM	AAS 22-815	Relative Coverage Analysis for Hurricane Monitoring Formations	Atri	Dutta	Wichita State University
08/08/2022	10:40 AM	AAS 22-822	Improving the Relative Navigation Solution for Precision Formation Flying Above the GPS Constellation	Kyle	Rankin	New Mexico State University
08/08/2022	11:00 AM	AAS 22-529	Spacecraft Formation Flying Control Switching Surface Based on Relative Orbital Elements	Greg	Droge	Utah State University
08/08/2022	11:20 AM	AAS 22-507	Relative Motion Models for the Elliptical Restricted Three Body Problem	David	Zuehlke	Embry-Riddle Aeronautical University
<b>▼ Dynamical Systems Theory &amp; Trajectory Design (Carolina E)</b>						
08/08/2022	08:00 AM	AAS 22-738	Cislunar Orbital Transfer Employing Low-Thrust Dynamical Structures	Rolfe	Power	Purdue University
08/08/2022	08:20 AM	AAS 22-705	Towards A Generalizable Simulation Framework To Study Collisions Between Spacecraft And Debris	Simone	Asci	Queen Mary University of London
08/08/2022	08:40 AM	AAS 22-616	Tidal Attributes of Low-energy transfers in the Earth-Moon-Sun System	Stephen	Scheuerle	Purdue University
08/08/2022	09:00 AM	AAS 22-758	Hindsight is 20/20: A Retrospective on Applying Interactive Visualization Techniques to Mission Design & Navigation	Jeffrey	Stuart	Jet Propulsion Laboratory
08/08/2022	09:20 AM	AAS 22-766	Full N-Body Problem in the Geometric Mechanics Framework and its Reduction to Circular Restricted Three-Body Problem	Morad	Nazari	Embry-Riddle Aeronautical University
08/08/2022	09:40 AM	AAS 22-756	Orbital Elements for the Restricted Three-Body Problem	Luke	Peterson	University of Colorado Boulder

Date	Start	Paper ID	Title	Presenter Name		Presenter Affiliation
08/08/2022	10:00 AM		Break			
08/08/2022	10:20 AM	AAS 22-748	Trajectory Design in the Hill Zonal Problem	Nicola	Baresi	University of Surrey
08/08/2022	10:40 AM	AAS 22-548	Three-dimensional Lagrangian Coherent Structures in astrodynamics systems using Differential Algebra	Jack	Tyler	University of Southampton
08/08/2022	11:00 AM	AAS 22-688	Mitigating the impact of Momentum Unloads on Station Keeping around Libration Point orbits	Ariadna	Farres	University of Maryland Baltimore County
08/08/2022	11:20 AM	AAS 22-605	Implementation of the Solar Exclusion Zone Burn Through Maneuvers for DSCOVR to Preserve Fuel for the Gyro-less Spacecraft in a Sun-Earth L1 Lissajous Orbit	Jeremy	Petersen	a.i. solutions
<b>▼ Monday afternoon</b>						
<b>▼ Trajectory, Mission, and Maneuver Design and Optimization II (Carolina A)</b>						
08/08/2022	01:30 PM	AAS 22-559	Optimal Earth-Moon Low-Energy Transfers in Bi-Circular Model Using Differential Evolution	GARIMA	AGGARWAL	Indian Space Research Organization
08/08/2022	01:50 PM	AAS 22-603	A Motion Primitive Approach to Trajectory Design in a Multi-Body System	Thomas	Smith	University of Colorado Boulder
08/08/2022	02:10 PM	AAS 22-583	Designing Spatial Transfers in Multi-Body Systems using Roadmap Generation	Kristen	Bruchko	University of Colorado, Boulder
08/08/2022	02:30 PM	AAS 22-708	Stochastic Sequential Convex Programming for Robust Low-thrust Trajectory Design under Uncertainty	Kenshiro	Oguri	Purdue University
08/08/2022	02:50 PM	AAS 22-569	Concurrent Optimization of Gravity-Assist Low-Thrust Trajectory with Power and Propulsion Subsystem Sizing	Yuri	Shimane	Georgia Institute of Technology
08/08/2022	03:10 PM		Break			
08/08/2022	03:30 PM	AAS 22-698	MULTIPLE GRAVITY ASSIST MISSION PLANNING BY RANDOM KEY ENCODING SCHEME	Jin Haeng	Choi	Yonsei University
08/08/2022	03:50 PM	AAS 22-771	Dynamically Leveraged Automated (N) Multibody Trajectory Optimization (DyLAN)	Ryne	Beeson	Princeton University
08/08/2022	04:10 PM	AAS 22-741	Leveraging Medium-Fidelity Dynamical Models for Transitions into a Higher-Fidelity Model in the Cislunar Region	Beom	Park	Purdue
08/08/2022	04:30 PM	AAS 22-829	A Novel Method for Comparing Interplanetary Trajectories for Early Mission Design	Daniel	Owen	University of Kansas
<b>▼ Machine Learning and Autonomy in Astrodynamics I (Carolina C)</b>						
08/08/2022	01:30 PM	AAS 22-567	Augmenting Periodic Orbit Discovery with Physics-Informed Neural Networks	John	Martin	University of Colorado Boulder
08/08/2022	01:50 PM	AAS 22-754	Orbit Determination with Maneuver Estimation in Cislunar Environment Via Physics Informed Neural Networks	Luca	Ghilardi	University of Arizona
08/08/2022	02:10 PM	AAS 22-809	Development of Methodologies for Modeling and Estimation of Drag Parameters Using Physics-Informed Neural Network	Smriti Nandan	Paul	West Virginia University

Date	Start	Paper ID	Title	Presenter Name		Presenter Affiliation
08/08/2022	02:30 PM	AAS 22-645	Optimizing a Long Short-Term Memory Neural Network to Forecast Solar Radio Flux	Charles	Fry	The University of Kansas
08/08/2022	02:50 PM	AAS 22-820	Performance Enhancements for Autonomous Flight Control Using Hierarchical Ensembles of Autonomous Decision Systems	Peter	Jorgensen	University of South Florida Institute of Applied Engineering
08/08/2022	03:10 PM		Break			
08/08/2022	03:30 PM	AAS 22-666	Autonomous Anomaly Detection Via Unsupervised Machine Learning	Felipe	Giraldo Grueso	The University of Texas at Austin - Oden Institute for Computational Engineering and Sciences
08/08/2022	03:50 PM	AAS 22-671	Autonomous Vision-Based Docking via Reinforcement Learning	Andrea	Scorsoglio	University of Arizona
08/08/2022	04:10 PM	AAS 22-720	Autonomous navigation around Didymos using CNN-based Image Processing	Isto	Fodde	University of Strathclyde
08/08/2022	04:30 PM	AAS 22-750	Embedded Homotopy for Convex Low-Thrust Trajectory Optimization with Operational Constraints	Christian	Hofmann	Politecnico di Milano
<b>▼ Guidance and Control of Launch and Atmospheric Entry Vehicles (Carolina D)</b>						
08/08/2022	01:30 PM	AAS 22-604	Nominal and Emergency Rocket Landing Guidance using Quadratic Programming	Hubert	Ménou	Mines ParisTech / CNES
08/08/2022	01:50 PM	AAS 22-717	Convex Approach to Stochastic Control for Autonomous Rocket Pinpoint Landing	Boris	Benedikter	Sapienza University of Rome
08/08/2022	02:10 PM	AAS 22-764	Estimation of aerodynamic angles and wind components for a launch vehicle	Vincenzo	D'Antuono	Sapienza University of Rome
08/08/2022	02:30 PM	AAS 22-821	Ambiguity Remediation in Space Launch Vehicles with Parameter Uncertainties: A Comparison between Special Euclidean Group and Dual Quaternions	Matthew	Wittal	National Aeronautics and Space Administration
08/08/2022	02:50 PM	AAS 22-848	Attitude Stabilization of Swirl Injection Hybrid Launch Vehicle	Ryan	Kinzie	Embry-Riddle Aeronautical University
08/08/2022	03:10 PM		Break			
08/08/2022	03:30 PM	AAS 22-690	A Robust Optimal Guidance Strategy for Mars Entry}	Anil	Rao	University of Florida
08/08/2022	03:50 PM	AAS 22-783	Reachable Set Computation and Analysis for Hypersonic Atmospheric Re-Entry Vehicles	Jinaykumar	Patel	The University of Texas at Arlington
08/08/2022	04:10 PM	AAS 22-800	Maneuver Design and Flight Control for a Martian Probe Network	Samuel	Albert	University of Colorado Boulder
08/08/2022	04:30 PM	AAS 22-803	Feasibility and Performance Analysis of Magnetohydrodynamic Control for Aerocapture at Neptune	Danny	Nguyen	University of Colorado Boulder
<b>▼ Attitude Dynamics, Determination and Control I (Carolina E)</b>						
08/08/2022	01:30 PM	AAS 22-597	Error-Covariance Reset in the Multiplicative Extended Kalman Filter for Attitude Estimation	John	Crassidis	University at Buffalo, The State University of New York
08/08/2022	01:50 PM	AAS 22-673	An Extended Particle Swarm Optimization Approach for Full Attitude State Estimation from Multiple Sequential Light Intensity Measurements	Stephen	Gagnon	University at Buffalo, The State University of New York
08/08/2022	02:10 PM	AAS 22-724	Adaptive Observers for Angular Velocity Estimation using Rate-Integrating Gyroscopes	Arjun	Ram	The University of Texas at Austin

Date	Start	Paper ID	Title	Presenter Name		Presenter Affiliation
08/08/2022	02:30 PM	AAS 22-512	Equivalence and Calibration of Euler Angles with Less Nonlinear Attitude Parameterizations	Andrew J.	Sinclair	Air Force Research Laboratory
08/08/2022	02:50 PM	AAS 22-755	Onboard Inertia Tensor Estimation Using Constrained Exact Gaussian Particle Flow	John	Helmuth	Texas A&M University
08/08/2022	03:10 PM		Break			
08/08/2022	03:30 PM	AAS 22-541	Constrained Attitude Path Planning via Least Squares MRP-based NURBS Curves	Riccardo	Calaon	University of Colorado Boulder
08/08/2022	03:50 PM	AAS 22-806	Pointing and Image Motion Performance Analysis	Mark	Pittelkau	Aerospace Control Systems, LLC
08/08/2022	04:10 PM	AAS 22-579	Campaign Results for the Adaptive Control Experiment on DSX	Andrew J.	Sinclair	Air Force Research Laboratory
08/08/2022	04:30 PM	AAS 22-625	Modular Dynamic Modeling of Hinged Solar Panel Deployments	Galen	Bascom	University of Colorado, Boulder
<b>▼ 08/09/2022</b>						
<b>▼ Tuesday Morning</b>						
<b>▼ Trajectory, Mission, and Maneuver Design and Optimization III (Carolina A)</b>						
08/09/2022	08:00 AM	AAS 22-544	Global Optimization of The Moon Tour Problem	Ahmed	Ellithy	Iowa State University
08/09/2022	08:20 AM	AAS 22-551	Chance-constraint optimization of interplanetary trajectories with a hybrid multiple-shooting approach	Nicola	Marmo	Sapienza University of Rome
08/09/2022	08:40 AM	AAS 22-656	Minimum-Fuel Trajectory Optimization in the Earth-Moon System Using Adaptive Gaussian Quadrature Collocation	George III	Haman	Vehicle Dynamics and Optimization Laboratory
08/09/2022	09:00 AM	AAS 22-704	Upgrading Different Low-Thrust Gravity Assist Mission Scenarios from Low to High Fidelity	Darcey	Graham	University of Auckland
08/09/2022	09:20 AM	AAS 22-727	Converting Optimal Spacecraft Trajectories: Direct, Many-Impulsive-Maneuver to Indirect, Continuous, Primer Vector Thrust	David	Ottesen	The University of Texas at Austin
08/09/2022	09:40 AM	AAS 22-759	Advances in Koopman Operator Theory for Optimal Control Problems in Space Flight	Christian	Hofmann	Politecnico di Milano
08/09/2022	10:00 AM		Break			
08/09/2022	10:20 AM	AAS 22-782	Comparison of Indirect and Convex-Based Methods for Low-Thrust Minimum-Fuel Trajectory Optimization	Nicholas	Nurre	Auburn University
08/09/2022	10:40 AM	AAS 22-614	A coupled spacecraft system and trajectory optimization framework using GMAT and OpenMDAO	Gage	Harris	Iowa State University
08/09/2022	11:00 AM	AAS 22-835	An adjoint sensitivity method for the sequential low-thrust orbit raising problem	Adrian	Arustei	Wichita State University
08/09/2022	11:20 AM	AAS 22-733	Possible Trajectories to Planet Nine	Allison	Warren Carroll	University of Tennessee Knoxville
08/09/2022	11:40 AM	AAS 22-739	Preliminary analysis of a fuel station strategy for active debris removal missions in low Earth orbit	Adrian	Barea	Universidad Rey Juan Carlos
<b>▼ Spacecraft Guidance, Navigation, and Control I (Carolina C)</b>						
08/09/2022	08:00 AM	AAS 22-516	Active Terrain Relative Navigation for Lunar Landings	Po-Ting	Chen	Jet Propulsion Laboratory

Date	Start	Paper ID	Title	Presenter Name		Presenter Affiliation
08/09/2022	08:20 AM	AAS 22-644	Towards limb-based autonomous navigation and mapping of primitive bodies	Enrico	Zucchelli	The University of Texas at Austin
08/09/2022	08:40 AM	AAS 22-657	INITIAL POLE ESTIMATION OF SMALL BODIES ON APPROACH USING INFRARED IMAGERY	Koundinya	Kuppa	University of Colorado, Boulder
08/09/2022	09:00 AM	AAS 22-592	LiDAR Simulation Considering Target Reflection for Proximity Navigation to Non-Cooperative Target	Yu	Nakajima	JAXA
08/09/2022	09:20 AM	AAS 22-642	Navigation Performance Analysis and Trades for the Lunar GNSS Receiver Experiment (LuGRE)	Lauren	Konitzer	NASA Goddard Space Flight Center
08/09/2022	09:40 AM	AAS 22-746	Invariant Theory as a Tool for Spacecraft Navigation	John	Christian	Georgia Institute of Technology
08/09/2022	10:00 AM		Break			
08/09/2022	10:20 AM	AAS 22-747	LIDAR Odometry for Lunar Terrain Relative Navigation	Carl	De Vries	Georgia Institute of Technology
08/09/2022	10:40 AM	AAS 22-751	Crater Navigation with Extended Feature Models	James	Brouk	Texas A&M University
08/09/2022	11:00 AM	AAS 22-858	Robust Landmark Detection on Small Body Surfaces Using Shadows within Images	Jacopo	Villa	University of Colorado Boulder
08/09/2022	11:20 AM	AAS 22-537	Model Predictive Control in the Three-Body Problem using Invariant Funnel Sets	Jared	Blanchard	Stanford University
08/09/2022	11:40 AM	AAS 22-557	Third Order Repetitive Control: Evaluation of Stability Boundary and Development of Sufficient Conditions	Ayman	Ismail	Columbia University
<b>▼ Orbit Determination and Space Surveillance Tracking I (Carolina D)</b>						
08/09/2022	08:00 AM	AAS 22-560	A Norm-Minimization Algorithm for Solving the Cold-Start Problem with XNAV	Linyi	Hou	University of Illinois at Urbana-Champaign
08/09/2022	08:20 AM	AAS 22-561	Initial Orbit Determination from Sequential Line-Of-Sight Velocity Measurements	Linyi	Hou	University of Illinois at Urbana-Champaign
08/09/2022	08:40 AM	AAS 22-585	Single-pass, Single-station, Doppler-Only Initial Orbit Determination	Anthony	Holincheck	Sceptre Analytics Inc.
08/09/2022	09:00 AM	AAS 22-743	Phase-Independent Spawning Models for Initial Orbit Determination	Benjamin	Reifler	The University of Texas at Austin
08/09/2022	09:20 AM	AAS 22-687	Geometric Initial Orbit Determination from Bearing Measurements	Michela	Mancini	Georgia Institute of Technology
08/09/2022	09:40 AM	AAS 22-767	An Exploration of Angles-Only Initial Orbit Determination in Space-to-Space, Earth-Orbiting Scenarios	Kenneth	Horneman	Emergent Space Technologies, Inc.
08/09/2022	10:00 AM		Break			
08/09/2022	10:20 AM	AAS 22-770	Initial Orbit Determination for the CR3BP Using Particle Swarm Optimization	David	Zuehlke	Embry-Riddle Aeronautical University
08/09/2022	10:40 AM	AAS 22-801	Semi-Analytical Rapid Orbit Determination Approach for Perturbed Two Body Problem	Erin	Cope	The Pennsylvania State University
08/09/2022	11:00 AM	AAS 22-701	On the Theoretical Interpretation of a New Stable Inverse of Discrete Time Systems	Richard	Longman	Columbia University
08/09/2022	11:20 AM	AAS 22-517	Revisiting Universal Variables for Robust, Analytical, Nonsingular Orbit Propagation under Vinti's Potential	Ashley	Biria	The Aerospace Corporation

Date	Start	Paper ID	Title	Presenter Name		Presenter Affiliation
08/09/2022	11:40 AM	AAS 22-518	Using Vinti's Intermediary to Define an Unperturbed Boundary Value Problem with Planetary Oblateness	Ashley	Biria	The Aerospace Corporation
<b>▼ Machine Learning and Autonomy in Astrodynamics II (Carolina E)</b>						
08/09/2022	08:00 AM	AAS 22-563	Reinforcement Learning for Small Body Science Operations	Adam	Herrmann	University of Colorado, Boulder
08/09/2022	08:20 AM	AAS 22-841	Small Body Reconnaissance By Multiple Spacecraft Via Deep Reinforcement Learning	Kento	Tomita	Georgia Institute of Technology
08/09/2022	08:40 AM	AAS 22-576	Online Remote Sensing Tasking Method with Input Uncertainty Awareness	Hao	Peng	Rutgers University
08/09/2022	09:00 AM	AAS 22-552	Multi-step Look-ahead Intelligent Task Planning for Earth Observing Satellite	Rabiul Hasan	Kabir	Rutgers, the State University of New Jersey
08/09/2022	09:20 AM	AAS 22-609	Satellite Constellation Task Planning for Intelligent Remote Sensing: Detach and Joint Mode for Multi-satellite Update	Hao	Peng	Rutgers University
08/09/2022	09:40 AM	AAS 22-652	Game-Theoretic Task Allocation for Multi-Satellite Earth Observation Problems	Andrew	Miller	The University of Texas at Austin
08/09/2022	10:00 AM		Break			
08/09/2022	10:20 AM	AAS 22-765	Applying Monte Carlo Tree Search for Orbit Selection in Multi-Agent Inspection	John	Lathrop	California Institute of Technology
08/09/2022	10:40 AM	AAS 22-638	You Only Crash Once: Improved Object Detection for Real-Time, Sim-to-Real Hazardous Terrain Detection and Classification for Autonomous Planetary Landings	Timothy	Chase	University at Buffalo
08/09/2022	11:00 AM	AAS 22-851	Missing and noisy data recovery for planetary landing by Conditional Generative Adversarial Network	Tatsuwaki	Nakagawa	Georgia Institute of Technology
08/09/2022	11:20 AM	AAS 22-811	Detection and Initial Assessment of Lunar Landing Sites Using Neural Networks	Daniel	Posada	Embry-Riddle Aeronautical University
<b>▼ Tuesday Afternoon</b>						
<b>▼ Special Session: Juno Mission &amp; James Webb Space Telescope (Carolina A)</b>						
08/09/2022	01:30 PM	AAS 22-599	Juno Orbit Determination and Maneuver Operations: Early Orbit Phase Through End of Prime Mission	Matthew	Smith	NASA Jet Propulsion Laboratory
08/09/2022	01:50 PM	AAS 22-595	Design and Implementation of the Juno Eclipse Avoidance Maneuver	Thomas	Pavlak	NASA / Caltech JPL
08/09/2022	02:10 PM	AAS 22-539	ORBIT DETERMINATION PERFORMANCE OF THE JUPITER ECLIPSE AVOIDANCE MANEUVER BY THE JUNO SPACECRAFT	Matthew	Smith	NASA Jet Propulsion Laboratory
08/09/2022	02:30 PM	AAS 22-598	Juno Extended Mission Trajectory Design	Thomas	Pavlak	NASA / Caltech JPL
08/09/2022	02:50 PM	AAS 22-538	ORBIT DETERMINATION PERFORMANCE OF THE GANYMEDE FLYBYS BY THE JUNO SPACECRAFT	Matthew	Smith	NASA Jet Propulsion Laboratory
08/09/2022	03:10 PM		Break			
08/09/2022	03:30 PM	AAS 22-611	Flight Dynamics Planning and Operations Support for the JWST Mission	Karen	Richon	NASA GSFC
08/09/2022	03:50 PM	AAS 22-610	Planning and Execution of the Three Mid-Course Correction Maneuvers for the James Webb Space Telescope	Jeremy	Petersen	a.i. solutions

Date	Start	Paper ID	Title	Presenter Name		Presenter Affiliation
08/09/2022	04:10 PM	AAS 22-607	Orbit Determination for the James Webb Space Telescope during Launch and Early Orbit	Jeffrey L	Small	NASA GSFC
08/09/2022	04:30 PM	AAS 22-635	JWST Real-Time Mid-Course Correction Maneuver Monitoring Contingency Preparation	Antonia	Santacroce	a.i. solutions, Inc.
<b>▼ Asteroid, Earth and Planetary Missions (Carolina C)</b>						
08/09/2022	01:30 PM	AAS 22-677	Preliminary Mission Design Tool For Asteroid Tours	Chloe	Long	University of Colorado Boulder
08/09/2022	01:50 PM	AAS 22-788	Assessing the Viability of Refueling at Asteroids on the Way to Mars	Julian	Treat	Embry Riddle Aeronautical University
08/09/2022	02:10 PM	AAS 22-615	Landing Area Analysis for Ballistic Landing Trajectories on the Secondary of a Binary Asteroid	Isto	Fodde	University of Strathclyde
08/09/2022	02:30 PM	AAS 22-824	Multiple Observation Opportunities for Trans-Neptunian Objects Part 9: Landing Opportunities	Allison	Carroll	University of Tennessee, Knoxville
08/09/2022	02:50 PM	AAS 22-593	Fast Earth-Mars Roundtrip Trajectories to Reduce Health and Safety Risks for Crewed Missions	Noble	Hatten	NASA Goddard Space Flight Center
08/09/2022	03:10 PM		Break			
08/09/2022	03:30 PM	AAS 22-831	Trojan Identification, Exploration, Mapping and Reconnaissance Mission	Dhagash	Kapadia	University of Kansas
08/09/2022	03:50 PM	AAS 22-672	On the long-term hazardous nature of NEOs	Oscar	Fuentes-Muñoz	University of Colorado Boulder
08/09/2022	04:10 PM	AAS 22-718	Use of powered Earth fly-bys to enhance mass retrieval for a two-spacecraft asteroid capture strategy	Livia	Ionescu	University of Glasgow, James Watt School of Engineering
08/09/2022	04:30 PM	AAS 22-589	Robust Control for Coupled Orbit-Attitude Motion of Asteroid Probes	Jinah	Lee	Yonsei university
<b>▼ Relative Motion and Formation Flying II (Carolina D)</b>						
08/09/2022	01:30 PM	AAS 22-511	Calibrated Kalman Filtering in Relative Orbit Estimation	Andrew J.	Sinclair	Air Force Research Laboratory
08/09/2022	01:50 PM	AAS 22-554	Adaptive Neural Network-based Unscented Kalman Filter for Spacecraft Pose Tracking at Rendezvous	Tae Ha	Park	Stanford University
08/09/2022	02:10 PM	AAS 22-575	Distributed Absolute And Relative Estimation of Spacecraft Formations	Kaushik	Prabhu	Texas A&M University
08/09/2022	02:30 PM	AAS 22-726	Simulating a Dynamics-Informed Cislunar RPO Mission Incorporating Orbit Determination	Nathaniel	Kinzly	Ansys
08/09/2022	02:50 PM	AAS 22-558	COVARIANCE-BASED OBSERVABILITY ANALYSIS METHOD FOR ANGLES-ONLY RENDEZVOUS NAVIGATION	Moeko	Hidaka	Japan Aerospace Exploration Agency
08/09/2022	03:10 PM		Break			
08/09/2022	03:30 PM	AAS 22-828	FPGA Hardware Acceleration for Feature-Based Relative Navigation Applications	Ramchander Rao	Bhaskara	Texas A&M University
08/09/2022	03:50 PM	AAS 22-732	Reconstruction of Particle Dispersion Events with Optical Measurements	John	Christian	Georgia Institute of Technology
08/09/2022	04:10 PM	AAS 22-769	Tube-Based Nonlinear Model Predictive Control for Robust Autonomous Proximity and Docking Operations	John	Martinez	New Mexico State University
<b>▼ Machine Learning and Autonomy in Astrodynamics III (Carolina E)</b>						

Date	Start	Paper ID	Title	Presenter Name		Presenter Affiliation
08/09/2022	01:30 PM	AAS 22-775	Satellite Detection in Unresolved Space Imagery for Space Domain Awareness using Neural Networks	Jarred	Jordan	ERAU Space Technologies Laboratory Embry-Riddle Aeronautical University
08/09/2022	01:50 PM	AAS 22-793	Neural Network for predicting unmodelled dynamics in multi-revolution transfers in Cis-lunar Missions	Yrithu	Thulaseedharan Pillay	Wichita State University
08/09/2022	02:10 PM	AAS 22-713	Comparison of Neural Network Based Satellite Pose Estimation Approaches Using Camera and Lidar Images	Hunter	Greenwood	United States Naval Academy
08/09/2022	02:30 PM	AAS 22-813	RGB-D Robotic Pose Estimation For a Servicing Robotic Arm	Jarred	Jordan	ERAU Space Technologies Laboratory Embry-Riddle Aeronautical University
08/09/2022	02:50 PM	AAS 22-734	A Moon Optical Navigation Robotic Facility on Simulated Terrain: MONSTER	Dario	Spiller	Sapienza University of Rome
08/09/2022	03:10 PM		Break			
08/09/2022	03:30 PM	AAS 22-662	AUTONOMOUS RENDEZVOUS AND DOCKING OF SPACECRAFT USING HIERARCHICAL MODEL BASED REINFORCEMENT LEARNING	Anthony	Aborizk	University of Florida
08/09/2022	03:50 PM	AAS 22-633	Instance segmentation for unknown resident space objects inspection missions	Michele	Maestrini	Politecnico di Milano
08/09/2022	04:10 PM	AAS 22-562	Optical 6-DOF Guidance and Navigation of an Asteroid Impactor via Meta-Reinforcement Learning	Lorenzo	Federici	Sapienza University of Rome
08/09/2022	04:30 PM	AAS 22-787	Autonomous Low-Thrust Orbit-Raising Using Long Short-Term Memory Neural Networks	Taylor	George	University of Kansas
<b>▼ 08/10/2022</b>						
<b>▼ Wednesday Morning</b>						
<b>▼ Trajectory, Mission, and Maneuver Design and Optimization IV (Carolina A)</b>						
08/10/2022	08:00 AM	AAS 22-804	Preliminary Mission Design for the Interhemispheric Conjugacy Explorer Concept	Brian	Kaplinger	University of Kansas
08/10/2022	08:20 AM	AAS 22-639	Trajectory Design for a Secondary Payload within a Complex Gravitational Environment: the Khon-1 Spacecraft	Alexander	Hoffman	Purdue University
08/10/2022	08:40 AM	AAS 22-697	Contingency Analysis and Recovery Study for the Korea Pathfinder Lunar Orbiter	Stephen	West	Space Exploration Engineering
08/10/2022	09:00 AM	AAS 22-623	James Webb Space Telescope Trajectory, Communications, and Instrumentation Comprehensive Analysis	Pedro J.	Llanos	Embry-Riddle Aeronautical University
08/10/2022	09:20 AM	AAS 22-725	Analysis of the Approach Direction of the Human Landing System to a South Pole Landing Site Subject to Lighting and Communication Constraints	Laura	Burke	NASA Glenn Research Center
08/10/2022	09:40 AM	AAS 22-709	Minimum-Fuel LEO-to-HEO Orbit Transfer Using Multi-Domain Gaussian Quadrature Collocation	Brittanny	Holden	University of Florida
08/10/2022	10:00 AM		Break			
08/10/2022	10:20 AM	AAS 22-683	Radial Optimal Control Software (ROCS): An Adaptive Solver Based on Radial Basis Functions	Tarek	Elgohary	University of Central Florida

Date	Start	Paper ID	Title	Presenter Name		Presenter Affiliation
08/10/2022	10:40 AM	AAS 22-823	Vectorized Trigonometric Regularization for Optimal Control Problems with Singular Arcs	Yevhenii	Kovryzhenko	Auburn University
08/10/2022	11:00 AM	AAS 22-830	Nonlinearity Index for State-Costate Dynamics of Optimal Control Problems	Patrick	Kelly	Texas A&M University
08/10/2022	11:20 AM	AAS 22-856	Interplanetary Ballistic Multiple Gravity Assist Patched Conics Mission to Neptune	Dhagash	Kapadia	University of Kansas
08/10/2022	11:40 AM	AAS 22-729	Trajectory Design for a Spacecraft Capable of Deploying Probes to the Martian Surface en route to Low Mars Orbit	Anthony	Genova	NASA
<b>▼ Orbit Determination and Space Surveillance Tracking II (Carolina C)</b>						
08/10/2022	08:00 AM	AAS 22-626	Short-arc Optical Data Processing	Gim	Der	DerAstrodynamics
08/10/2022	08:20 AM	AAS 22-629	Transitioning from Extent Estimation to Individual Tracking Following an Orbital Break-up Event	Melissa	Adams	University of Maryland College Park
08/10/2022	08:40 AM	AAS 22-686	Astrodynamics Algorithms for Rapid Space Catalog Building	Gim	Der	DerAstrodynamics
08/10/2022	09:00 AM	AAS 22-630	Long-Term Cislunar Surveillance via Multi-Body Resonant Trajectories	Maaninee	Gupta	Purdue University
08/10/2022	09:20 AM	AAS 22-799	Approximating Admissible Control onto the Cislunar Highways for Detection and Tracking of Spacecraft	David	Schwab	The Pennsylvania State University
08/10/2022	09:40 AM	AAS 22-814	Orbit Determination Using Ground- and Space-Based Measurements for Space Traffic Management	Jacob	Stratford	Vyoma
08/10/2022	10:00 AM		Break			
08/10/2022	10:20 AM	AAS 22-780	Optimized Cislunar Space Domain Awareness using Bi-Circular Restricted Four Body Dynamics	Surabhi	Bhadoria	Purdue University
08/10/2022	10:40 AM	AAS 22-786	Orbit Characterization and Determination Strategies in the CR3BP Framework	Madeline	Mayer	The Pennsylvania State University
08/10/2022	11:00 AM	AAS 22-714	DATA ASSOCIATION FOR MANEUVERING SPACE OBJECTS CONSIDERING DIFFERENT CONTROL DISTANCE METRICS	Guillermo	Escribano	Universidad Carlos III de Madrid
08/10/2022	11:20 AM	AAS 22-659	MULTIDUAL AND DUAL LIE ALGEBRA REPRESENTATIONS OF HIGHER-ORDER KINEMATICS	Daniel	Condurache	Technical University of Iasi
08/10/2022	11:40 AM	AAS 22-753	Utilizing Space-Based Observers to Expand Optical Space Surveillance Detection Capabilities	Alaric	Gregoire	Georgia Institute of Technology
<b>▼ Space Domain Awareness II (Carolina D)</b>						
08/10/2022	08:00 AM	AAS 22-634	Dynamics-Based Uncertainty Propagation with Low-Thrust	Michele	Maestrini	Politecnico di Milano
08/10/2022	08:20 AM	AAS 22-505	Covariance Prediction with a Polynomial Model	Jonathan	Aziz	The Aerospace Corporation
08/10/2022	08:40 AM	AAS 22-817	Covariance based Track Association with Mean and Osculating Modified Keplerian Elements	Woosang	Park	Texas A&M University
08/10/2022	09:00 AM	AAS 22-546	A Modified Weighting Scheme for the Automatic Tasker of Space Surveillance Network	Junling	Wang	Beijing Institute of Technology
08/10/2022	09:20 AM	AAS 22-574	Light Curve Inversion for Reliable Shape Reconstruction of Human-Made Space Objects	Liam	Robinson	Purdue University

Date	Start	Paper ID	Title	Presenter Name		Presenter Affiliation
08/10/2022	09:40 AM	AAS 22-586	Processing Space Fence Radar Cross-Section Data to Produce Size and Mass Estimates	Luis	Baars	Omitron, Inc.
08/10/2022	10:00 AM		Break			
08/10/2022	10:20 AM	AAS 22-649	Real-Time Image Processing Implementation for On-Board Object Detection and Tracking	Marco	Mastrofini	Sapienza University of Rome
08/10/2022	10:40 AM	AAS 22-785	Coordinate choice implications for uncertainty propagation in the CR3BP framework	Roshan Thomas	Eapen	The Pennsylvania State University
08/10/2022	11:00 AM	AAS 22-842	Parallelization Techniques for Quantifying Uncertainty Using Embedded Hardware	Hunter	Quebedeaux	University of Central Florida
08/10/2022	11:20 AM	AAS 22-602	Detecting Space Objects with Binary Wide Field Of View X-Ray Sensing	Andrea	Lopez	University of Colorado Boulder
<b>▼ Relative Motion and Formation Flying III (Carolina E)</b>						
08/10/2022	08:00 AM	AAS 22-565	Low Thrust Trajectory Design Using A Semi-Analytic Approach	Madhusudan	Vijayakumar	Iowa State University
08/10/2022	08:20 AM	AAS 22-581	Closed-form Optimal Solutions for Propulsive-Differential Drag Control of Spacecraft Swarms	Matthew	Hunter	Stanford University
08/10/2022	08:40 AM	AAS 22-650	Nonlinear Dynamics and Control of J2 and Drag Perturbed Spacecraft Formation Flying via SDRE Technique	Ayansola	Ogundele	Kratos Defense and Security Solutions Inc.
08/10/2022	09:00 AM	AAS 22-710	Relative Guidance, Navigation and Control in Multibody Gravitational Regimes	Corinne	Lippe	Johns Hopkins Applied Physics Laboratory
08/10/2022	09:20 AM	AAS 22-802	Computation of Relative Orbital Motion Using Product of Exponentials Mapping	Taylor	Yow	Embry-Riddle Aeronautical University
08/10/2022	09:40 AM	AAS 22-515	Autonomous Phasing Maneuvers in Near Circular Earth Orbits	Davide	Costigliola	Politecnico di Torino
08/10/2022	10:00 AM		Break			
08/10/2022	10:20 AM	AAS 22-664	Astrodynamics-Informed Sparse Kinodynamic Motion Planning for Safe Relative Spacecraft Motion	Taralicin	Deka	University of Colorado Boulder
08/10/2022	10:40 AM	AAS 22-700	Autonomous Rendezvous With Small Temporarily Captured Orbiters	Shota	Takahashi	University of Colorado Boulder
08/10/2022	11:00 AM	AAS 22-691	Fast Approximation of Continuous Thrust Optimal Relative Control in the Three Body Problem	Jackson	Kulik	Cornell University
08/10/2022	11:20 AM	AAS 22-685	Resilience of Orbital Inspections to Partial Loss of Control Authority of the Chaser Satellite	Jean-Baptiste	Bouvier	University of Illinois
<b>▼ Wednesday Afternoon</b>						
<b>▼ Trajectory, Mission, and Maneuver Design and Optimization V (Carolina A)</b>						
08/10/2022	01:30 PM	AAS 22-549	Low-Thrust Transfer Design for the LISA Mission via the Libration Points SEL1 and SEL2	Anne	Galda	Johannes Gutenberg University Mainz
08/10/2022	01:50 PM	AAS 22-594	Application of Tisserand's Criterion and the Lidov-Kozai Effect to STORM's Trajectory Design	Michael	Shoemaker	NASA GSFC
08/10/2022	02:10 PM	AAS 22-601	An Optimized Trajectory for a Two-Stage, Surface to Orbit, Titan Launch Vehicle	David	Smith	HX5, LLC, NASA John Glenn Research Center

Date	Start	Paper ID	Title	Presenter Name		Presenter Affiliation
08/10/2022	02:30 PM	AAS 22-550	Titan Sample Return Mission using V-Infinity Leveraging	Jeffrey	Pekosh	NASA Glenn Research Center
08/10/2022	02:50 PM	AAS 22-816	Mission Design for the Sherpa GEO Pathfinder	Lisa	Policastri	Space Exploration Engineering, LLC
08/10/2022	03:10 PM		Break			
08/10/2022	03:30 PM	AAS 22-839	Near-Term Strategies to Rendezvous with an Interstellar Object	Damon	Landau	Jet Propulsion Laboratory
08/10/2022	03:50 PM	AAS 22-833	Preliminary Trajectory Design Method for Continuous Thrust Synergetic Maneuvers for Planetary Flybys	Ghanghoon	Paik	Pennsylvania State University
<b>▼ Spacecraft Guidance, Navigation, and Control II (Carolina C)</b>						
08/10/2022	01:30 PM	AAS 22-774	Higher-Order Feedback Control Law For Low-Thrust Spacecraft Guidance	Taehyeun	Kim	University of Colorado Boulder
08/10/2022	01:50 PM	AAS 22-553	Rapid Finite Fourier Series Approximations of Sub-Optimal Low-Thrust Space Trajectories	Benjamin	Schimke	Iowa State University
08/10/2022	02:10 PM	AAS 22-582	Stationkeeping of Periodic Orbits Using High-order Target Phase Approach	Nicola	Baresi	University of Surrey
08/10/2022	02:30 PM	AAS 22-844	Sequential linearization-based station keeping with optical navigation for NRHO	Purnanand	Elango	University of Washington
08/10/2022	02:50 PM	AAS 22-805	Near-Optimal Waypoint Selection for Enforcing Trajectory Constraints	Zachary	Rhodes	University of Kansas
08/10/2022	03:10 PM		Break			
08/10/2022	03:30 PM	AAS 22-678	End-to-End Mars Aerocapture Analysis Using Linear Covariance Techniques and Robust Trajectory Optimization	Jack	Joshi	University of Illinois at Urbana-Champaign
08/10/2022	03:50 PM	AAS 22-740	Constrained Reachability Analysis for Mars Planetary Landing with Aerodynamic Forces via Convex Optimization	Kazuya	Echigo	The University of Washington
08/10/2022	04:10 PM	AAS 22-670	Efficient Nonlinear Spacecraft Navigation Using Directional State Transition Tensors	Oliver	Boodram	University of Colorado Boulder
<b>▼ Orbital Dynamics, Perturbations, and Stability (Carolina D)</b>						
08/10/2022	01:30 PM	AAS 22-728	Investigating Solar Radiation Pressure Modeling for Operations in Near Rectilinear Halo Orbit	Clark	Newman	NASA
08/10/2022	01:50 PM	AAS 22-715	A New Model for the Planetary Radiation Pressure Acceleration for Solar Sails	Livio	Carzana	Delft University of Technology
08/10/2022	02:10 PM	AAS 22-606	CubeSat Orbit Insertion Maneuvering Using J2 Perturbation	M. Reza	Emami	University of Toronto
08/10/2022	02:30 PM	AAS 22-692	Time-Varying Perturbation Model Identification in the Neighborhood of CR3BP Periodic Orbits	Matthew	Brownell	The Pennsylvania State University
08/10/2022	02:50 PM	AAS 22-832	On Equinoctial Elements and Rodrigues Parameters	Joseph	Peterson	Texas A&M University
08/10/2022	03:10 PM		Break			
08/10/2022	03:30 PM	AAS 22-752	Orbital Acceleration Using Product of Exponentials	Taylor	Yow	Embry-Riddle Aeronautical University
08/10/2022	03:50 PM	AAS 22-827	Global Lunar Gravity Field Using Local Mascon Models	Sean	McArdle	The University of Texas at Austin
08/10/2022	04:10 PM	AAS 22-527	DYNAMIC MODELING OF SPACECRAFT WITH FLEXIBLE MEMBRANE	Matthew	Brownell	The Pennsylvania State University
<b>▼ Orbit Determination and Space Surveillance Tracking III (Carolina E)</b>						

Date	Start	Paper ID	Title	Presenter Name		Presenter Affiliation
08/10/2022	01:30 PM	AAS 22-519	Uncertainty Propagation and Filtering via the Koopman Operator in Astrodynamics	Simone	Servadio	Massachusetts Institute of Technology
08/10/2022	01:50 PM	AAS 22-737	Optimal Nonlinear Particle Flow using Stein Variational Gradient Descent	Kyle	Craft	Texas A&M University
08/10/2022	02:10 PM	AAS 22-854	A Fourier series representation of satellite aerodynamic torques	Vishal	Ray	CU Boulder
08/10/2022	02:30 PM	AAS 22-855	GEOMETRIC SOLUTION TO PROBABILISTIC ADMISSIBLE REGION (G-PAR) FOR SDA RADAR OBSERVATION	Utkarsh	Mishra	Texas A&M University
08/10/2022	02:50 PM	AAS 22-857	MULTIPLE OBJECT TRACKING WITH SDA RADAR OBSERVATIONS USING G-PAR FOR TRACK INITIATION	Utkarsh	Mishra	Texas A&M University
08/10/2022	03:10 PM		Break			
08/10/2022	03:30 PM	AAS 22-689	Discrete State Estimation Using Bayesian Probability Theory	Christopher	Roscoe	Ten One Aerospace
08/10/2022	03:50 PM	AAS 22-622	Comparisons of Filtering Algorithms for Orbit Determination in Near Rectilinear Halo Orbits	Michael	Thompson	Advanced Space
08/10/2022	04:10 PM	AAS 22-735	Orbit Estimation of Resident Space Objects in Cislunar Space Using Satellite Sensor Formations	Ian	Down	Texas A&M University
<b>▼ 08/11/2022</b>						
<b>▼ Thursday Morning</b>						
<b>▼ Trajectory, Mission, and Maneuver Design and Optimization VI (Carolina A)</b>						
08/11/2022	08:00 AM	AAS 22-679	Designing Multiple Missed Thrust Event Resilient Trajectories using Virtual Swarms	Ari	Rubinsztein	University of Alabama
08/11/2022	08:20 AM	AAS 22-784	Spacecraft Maneuver Design with Non-Gaussian Chance Constraints Using Gaussian Mixtures	Spencer	Boone	University of Colorado Boulder
08/11/2022	08:40 AM	AAS 22-600	State Perturbation Tradespaces in Trajectory Targeting Convergence Analysis	Collin	York	Purdue University
08/11/2022	09:00 AM	AAS 22-613	An hp Mesh Refinement Method using Density Functions for Hypersensitive Optimal Control	Gabriela	Abadia	University of Florida
08/11/2022	09:20 AM	AAS 22-621	Semi-Analytical Optimal Orbit Raising Using Hill's Equations	Aimar	Negrete	Iowa State University
08/11/2022	09:40 AM	AAS 22-631	Fundamental attitude dynamic characteristics of solar sails in low-Earth orbit with active control	Maximilien	Berthet	The University of Tokyo
08/11/2022	10:00 AM		Break			
08/11/2022	10:20 AM	AAS 22-619	MINIMUM-TIME MANEUVERS OF THE JAMES WEBB SPACE TELESCOPE	Timothy	Polyard	Naval Postgraduate School
08/11/2022	10:40 AM	AAS 22-776	Three Years of On-Orbit Angular Momentum Management for the Parker Solar Probe Mission	Kevin	Liu	Johns Hopkins University Applied Physics Lab
08/11/2022	11:00 AM	AAS 22-699	Optimal Lunar Transfer for CubeSat with Electrospray Propulsion	Ivan	Martinez I Cano	University of California, Irvine
<b>▼ Relative Motion and Formation Flying IV (Carolina C)</b>						
08/11/2022	08:00 AM	AAS 22-653	Rapid Discrete Planning for Satellite Constellation Imaging Missions	Greg	Droge	Utah State University

Date	Start	Paper ID	Title	Presenter Name		Presenter Affiliation
08/11/2022	08:20 AM	AAS 22-654	A Two-Layer Constellation Scheduling Approach for Imaging and Communication	Greg	Droge	Utah State University
08/11/2022	08:40 AM	AAS 22-744	Application of Markov Decision Processes to Spacecraft Formation Shape Control	Michael	Mercurio	Ten One Aerospace
08/11/2022	09:00 AM	AAS 22-778	Coevolving Defender Strategies within Adversarial Ground Station Transit Time Games via Competitive Coevolution	Manuel	Indaco	Auburn University
08/11/2022	09:20 AM	AAS 22-812	Modeling and Gamification Framework of Business Competition Between P-LEO Constellations	Rehman	Qureshi	Auburn University
08/11/2022	09:40 AM	AAS 22-825	Maximizing Observation Throughput via Multi-Stage Satellite Constellation Reconfiguration	Hang Woon	Lee	Georgia Institute of Technology
08/11/2022	10:00 AM		Break			
08/11/2022	10:20 AM	AAS 22-707	Feasibility Studies for an Autonomous Cislunar Position, Navigation and Timing Constellation	Dhathri Harsha	Somavarapu	Auburn Univeristy
08/11/2022	10:40 AM	AAS 22-556	LISA Point-Ahead Angle Control for Optimal Tilt-to-Length Noise Estimation	Niklas	Houba	Airbus
08/11/2022	11:00 AM	AAS 22-580	CLING-ERS: Optimizing RPO Ease for Assembly Operations	David	Barnhart	University of Southern California
08/11/2022	11:20 AM	AAS 22-850	Design Considerations for Attitude Consensus Control of Two Flexible Spacecraft	Laqshya	Taneja	University of California, Los Angeles
08/11/2022	11:40 AM	AAS 22-703	Robust Adaptive Control via Nonsingular Terminal Sliding Mode for a Virtual Telescope	Soobin	Jeon	Yonsei University, Korea
<b>▼ Spacecraft Guidance, Navigation, and Control III (Carolina D)</b>						
08/11/2022	08:00 AM	AAS 22-547	Identification of Mass, Stiffness, and Damping Matrices For Structural Models with Rigid Body Modes	Richard	Longman	Columbia University
08/11/2022	08:20 AM	AAS 22-608	Venus Atmospheric Probe and Flyby Relay Spacecraft Cross-Link Tracking Impact on Relative Pointing Accuracy	Bobby G.	Williams	KinetX, Inc.
08/11/2022	08:40 AM	AAS 22-596	Attitude Dynamics of On-orbit Refueling Configurations	Jing	Pei	NASA Langley Research Center
08/11/2022	09:00 AM	AAS 22-761	Minimal Mass Column Theory: A Tensegrity Prism Approach	David	Capps	Texas A&M University
08/11/2022	09:20 AM	AAS 22-536	Minimum-Time Reorientation of Axisymmetric Rigid Spacecraft Using the BBSOC Method	Elisha	Pager	University of Florida
08/11/2022	09:40 AM	AAS 22-810	Trajectory-Planning Attitude Control System for Satellites with Magnetic Attitude Control and One Reaction Wheel	Patrick	McKeen	MIT
08/11/2022	10:00 AM		Break			
08/11/2022	10:20 AM	AAS 22-617	A PRACTICAL INTERPOLATING PRE-FILTER FOR CLOSED-LOOP ATTITUDE GUIDANCE	Joshua	Levitas	Naval Postgraduate School
08/11/2022	10:40 AM	AAS 22-568	Unscented Kalman Filter using Modified Spherical Coordinates for Passive Spacecraft Angles-Only Relative Navigation	Matthew	Givens	University of Colorado Boulder
08/11/2022	11:00 AM	AAS 22-790	Generalized Formalism for Variable-Mass-Property Spacecraft Dynamics Utilizing Rigid Body Motion on Lie Groups	Brennan	McCann	Embry-Riddle Aeronautical University

Date	Start	Paper ID	Title	Presenter Name		Presenter Affiliation
08/11/2022	11:20 AM	AAS 22-651	Modelling of Propellant Slosh Dynamics and its Application in Control Stability Study of Lunar Landing Mission	Nivriti	Priyadarshini	Indian Space Research Organization (ISRO)
08/11/2022	11:40 AM	AAS 22-628	Attitude control for flight phase of quadruped robots in low-gravity environment using reaction wheels and swing legs	Chunyang	Zhou	Beijing Institute of Technology
<b>▼ Orbital Debris and Space Environment (Carolina E)</b>						
08/11/2022	08:00 AM	AAS 22-542	Deriving Event Thresholds and Collision Probability for Automated Conjunction Assessment at Mars and the Moon	Zahi	Tarzi	Jet Propulsion Laboratory
08/11/2022	08:20 AM	AAS 22-571	Comparison of Gaussian processes and Neural Networks for thermospheric density predictions during quiet time and geomagnetic storms	Wang	Yiran	Rutgers University
08/11/2022	08:40 AM	AAS 22-757	A New Analytical Method for Eclipse Entry/Exit Positions Determination Considering a Conical Shadow and an Oblate Earth Surface	Marco	Nugnes	Politecnico di Milano
08/11/2022	09:00 AM	AAS 22-819	Accuracy of Density and Accommodation Coefficient Estimates as a Function of Drag Force and Torque Errors for a Paddlewheel CubeSat	Wyatt	Webb	University of Kansas
08/11/2022	09:20 AM	AAS 22-849	Quantifying the Effect of Uncertainty in the Brightness Measurements of a Lightcurve on the Shape Inversion Diversity	Carolin	Frueh	Purdue University
08/11/2022	09:40 AM	AAS 22-798	Orbital Drag Near Small Bodies Due to Lofted Fines from Surface Activity	Matthew	Wittal	National Aeronautics and Space Administration
08/11/2022	10:00 AM		Break			
08/11/2022	10:20 AM	AAS 22-661	Design and Analysis for Experimental Validation of Touchless Charge Control Testing	James	Walker	University of Colorado-Boulder
08/11/2022	10:40 AM	AAS 22-655	Preliminary Debris Risk Assessment for Mega-Constellations in Low and Medium Earth Orbit Due to Satellite Breakup	Joseph	Canoy	Air Force Institute of Technology: Department of Aeronautics Astronautics