Planetary Science Deep Space SmallSat Mission Concepts
Sunday, March 18, 2018

9:00 a.m.  
Introduction

Mars
9:15 a.m.  
Robert Lillis, University of California, Berkeley  
Mars Ion and Sputtering Escape Network (MISEN)

9:30 a.m.  
Anthony Colaprete, NASA Ames Research Center  
Aeolus: A Mission to Study the Thermal and Wind Environment of Mars

9:45 a.m.  
Luca Montabone, Space Science Institute  
Mars Aerosol Tracker (MAT): A CubeSat Mission to Monitor the Dynamics of Atmospheric Dust and Water Ice Clouds on Mars

10:00 a.m.  
Michael Collier, NASA Goddard Space Flight Center  
PRISM: Phobos Regolith Ion Sample Mission

10:15 a.m.  
David Minton, Purdue University  
Chariot to the Moons of Mars

10:30 a.m. Break

Venus
10:45 a.m.  
Valeria Cottini, University of Maryland, College Park  
CUVE: CubeSat UV Experiment: Unveil Venus’ UV Absorber with CubeSat UV Mapping Spectrometer

11:00 a.m.  
Christophe Sotin, Jet Propulsion Laboratory  
Cupid’s Arrow: A Small Satellite to Measure Noble Gases in Venus’ Atmosphere

11:15 a.m.  
Attila Komjathy, Jet Propulsion Laboratory  
SmallSat Mission Concept to Investigate Seismicity on Venus Using Airglow Measurements

11:30 a.m.  
Tibor Kremic, NASA Glenn Research Center  
Seismic and Atmospheric Exploration of Venus (SAEvE)
11:45 a.m. Lunch Break

Outer Planets
1:00 p.m.
Robert Ebert, Southwest Research Institute
JUpiter Magnetosphere ExploR (JUMPER)
1:15 p.m.
Kunio Sayanagi, Hampton University
SNAP: Small Next-Generation Atmospheric Probe

Small Bodies
1:30 p.m.
Benton Clark, Space Science Institute (SSI)
CAESAR: CubeSat Asteroid Encounters for Science and Reconnaissance
1:45 p.m.
Jeffrey Plescia, Johns Hopkins University
APEX: Asteroid Probe Experiment
2:00 p.m.
Tilak Hewagama, University of Maryland, College Park
Primitive Object Volatile Explorer (PrOVE): Waypoints and Opportunistic Deep Space Missions to Comets

2:15 p.m. Break

Moon
2:30 p.m.
Suzanne Romaine, Smithsonian Astrophysical Observatory
CubeSat X-ray Telescope (CubeX) for Elemental Abundance Mapping of Airless Bodies, and X-Ray Pulsar Navigation
2:45 p.m.
Charles Hibbitts, Johns Hopkins University
Lunar Water Assessment, Transportation, and Resource Mission (Lunar WATER Mission)
3:00 p.m.
Noah Edward Petro, NASA Goddard Space Flight Center
Mini Lunar Volatiles (MiLUV) Mission: Using a LIDAR Spectrometer to Map Lunar Volatiles
3:15 p.m.
Timothy Stubbs, NASA Goddard Space Flight Center
Bi-Sat Observations of the Lunar Atmosphere Above Swirls (BOLAS): Tethered SmallSat Investigation of Hydration and Space Weathering Processes at the Moon
3:30 p.m.
David Draper, NASA Johnson Space Center
Innovative Strategies for Lunar Surface Exploration

Mars 2
3:45 p.m.
Michael Malin, Malin Space Science Systems
Mars Micro Orbiter (MMO)