Dear Colleagues,

If you are in the DC area July 15 there is a special Planetary Society Europa event planned. It is "on the Hill" in Rayburn 2318, starting at 3 pm. A flyer is posted on the OPAG home page under Europa studies. It looks like fun, and a nice opportunity to meet the congressional representatives that have been so supportive!

I would also like to bring to your attention several sessions planned for the GSA conference that will be of interest to many of us. Descriptions are below, abstract deadline is July 29th.

Our July 23-24 OPAG meeting is almost here - I look forward to seeing many of you there!

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The G.K. Gilbert Award session on the topic of 'Geophysics across the Outer Solar System'

Exploration of our Solar System over the past decades has revealed the pervasive importance of a myriad of geophysical processes on the icy bodies beyond the asteroid belt. Understanding the relative importance of large impacts, orbital dynamics, and internal processes for tectonics and other surface modifications is key to untangling the evolution of these objects where water ice is a major, and in many cases dominant, constituent. Besides revealing evidence of these processes, spacecraft data have enabled the rigorous modeling of these icy bodies' internal structures, convection in their icy mantles, viscous relaxation of impact crater topography, water-rich volcanism, and cratering mechanics into ice by providing critical topographic and morphological constraints. These discoveries have also provided evidence for surface processes distinctive to the low-gravity, icy bodies in the outer Solar System. To celebrate and further understand these discoveries, this session will explore the origin, structure, evolution, and bombardment history of outer planet satellites and Pluto.

The session is in honor of Prof. William McKinnon, the 2014 G.K. Gilbert awardee.

Conveners: Devon Burr and Debra Buczkowski

Ice throughout the Solar System

Ice is ubiquitous throughout the solar system: it has been found in unexpected places, may be preserved for billions of years, and can behave like rock at outer solar system temperatures. We propose an interdisciplinary session on the science of ice in any form (not just water ice), on Earth or in any part of the solar system, including laboratory analyses, terrestrial field work, geomorphology, and planetary and telescopic data analysis. Submissions may include, but are not limited to, research into terrestrial permafrost and Arctic and Antarctic ice sheets, the Martian permafrost and polar caps, ice within the permanently shadowed regions of Mercury and the Moon, ice in planetary rings and plumes, outer solar system bodies including Europa, Enceladus, Triton, Titan and Pluto, and small bodies including comets and ice-rich asteroids such as Ceres..

Conveners: Robert Pappalardo and Louise Prockter

From the Inside Out: Ceres to Pluto and Satellites in Between

The icy bodies of the outer solar system, including satellites of the gas giants, Kuiper belt objects (KBOs), and now Ceres, have a range of features and tectonic histories preserved on their surfaces. Some icy bodies, such as Iapetus and Callisto, are old and heavily cratered, while others, such as Europa and Enceladus, are young and show signs of ongoing activity. Most of the icy bodies have surfaces that exist between these two extremes, showing evidence for both tectonic activity and extensive cratering. Comparing field and remote sensing data from different bodies, similarities and fundamental differences between surface material properties and geologic formation mechanisms can be identified. For this session, we invite submissions relating to the following icy body topics: surface processes, impact

cratering, structure and tectonics, geologic evolution, planetary analogs of icy surfaces, and modeling of interior processes and thermal evolution.

Conveners: Alex Patthoff and Emily Martin

Dynamic Planetary Geology Revealed by Long-Term Observations

A decade of Cassini observations in the Saturn system and 17 years of continuous Mars imaging by the spacecraft sent there have enabled a new kind of planetary science, with before-and-after images revealing processes that are actively modifying geological features. At Mars, documented dynamic processes range from stochastic (formation of new impact craters) to steady (sand migration) to seasonal (freezing and sublimation of high-latitude ices) to long-term (global redistribution of dust via storm activity that varies from one year to the next). Slope flows occur in a range of sizes, cadences, and geologic settings, some consistent with liquid water at or near the surface today. Changing seasons on Saturn's moon Titan have led to both changing and unchanging lake levels, as well as surface darkening and brightening following large-scale convective storms. Geomorphic patterns such as the hemispherical dichotomy in Titan's lake distribution and the presence of scale-dependent overlapping equatorial dune field patterns reflect time-variability on even longer timescales, associated with variations in Saturn's orbital parameters. Jupiter's moon Io is continually resurfaced, and active plumes have now been found on icy satellites orbiting 3 of the 4 giant planets. Earth-based observations and archival mission data remain key tools for long-term observations of these solar system bodies. In addition, the Rosetta spacecraft arrives this year at comet 67P/Churyumov–Gerasimenko and will look for signs of activity there. We encourage submission of work on observations and/or modeling of time-variable features on bodies from the nearby Moon to the far outer solar system. "Unsuccessful" change detection surveys that provide new limits on the rates of planetary activity are also welcome.

Conveners: Colin Dundas, Alex Hayes, and James Wray