Tuesday, March 18, 2014
POSTER SESSION: EUROPA AND ENCELADUS:
ACTIVE WORLDS GIVING VENT
6:00 p.m.  Town Center Exhibit Area

Retherford K. D.  Roth L.  Saur J.  Gladstone G. R.  Nimmo F.  et al.  POSTER LOCATION #572
Europa’s Water Vapor Plumes: Discovery with HST and Plans for JUICE-UVS Observations  [#1639]
Discovery of water vapor plumes on Europa obtained with HST, and updated plans for JUICE Ultraviolet Spectrograph (UVS) observations.

Roth L.  Retherford K. D.  Saur J.  Strobel D. F.  Feldman P. D.  et al.  POSTER LOCATION #573
Europa’s UV Aurora: Following Up on the Discovery of the South Polar Water Vapor Plumes, with HST/STIS  [#1488]
We report our discovery of water vapor plumes near the south pole of Jupiter’s moon Europa with HST/STIS and present new STIS observations from 2014.

CO2 Venting and Ice Formation on Enceladus’ Surface  [#1286]
The CO2 frost on Enceladus’ surface is suggested to come from venting pockets of subsurface gas. This presentation traces the life cycle of such a gas pocket.

Abramov O.  Spencer J. R.  POSTER LOCATION #575
New Models of Endogenic Heat from Enceladus’ South Polar Fractures  [#2878]
New thermal models, coupled with new observations from the Cassini CIRS and ISS instruments, further constrain tiger stripe vent temperatures and widths.

Schenk P.  POSTER LOCATION #576
The Colors of Enceladus: From Plumes and Particles to Active Fractures  [#2618]
A coat of many colors you wear / Yet a Haiku explains not / The wonders that lies beneath.

Buratti B. J.  Dalba P. A.  Hicks M. D.  Chang J. P.  POSTER LOCATION #577
Enceladus: Surface Texture and Roughness as Clues to What Lies Beneath  [#2038]
Surface texture and roughness provide clues for locating regions of activity on icy bodies.

INMS Measurements of Enceladus Plume Density  [#2845]
We show density profiles for six passes of the Cassini INMS through the Enceladus plumes. Mass-dependent effects complicate direct extraction of water density.

Sekine Y.  Shibuya T.  Postberg F.  Hsu H.-W.  Suzuki K.  et al.  POSTER LOCATION #579
Experimental Evidence for High-Temperature Water–Rock Interactions in a Chondritic Core of Enceladus  [#1714]
Our experiments together with the discovery of silica nanoparticles in E-ring suggest the presence of recent hydrothermal activity at ≥100°C in Enceladus.

Zolotov M. Yu.  Postberg F.  POSTER LOCATION #580
Can Nano-Phase Silica Originate from Chondritic Fluids? The Application to Enceladus’ SiO2 Particles  [#2496]
Cooing of chondritic fluids may not cause precipitation of silica.