

# NEWS AND VIEWS



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January 2015

## Announcements

### ASMS Sanibel Conference Security and Forensic Applications of Mass Spectrometry

January 22 - 25, 2015

Hilton Clearwater Beach  
Clearwater Beach, Florida

#### Organizers

Jose Almirall, *Florida International  
University*

Glen Jackson, *West Virginia University*

[www.asms.org/conferences/sanibel-conference](http://www.asms.org/conferences/sanibel-conference)  
See announcement to follow for more details.



### 63rd ASMS Annual Conference

May 31 - June 4, 2015

St. Louis, MO

<http://www.asms.org/conferences/annual-conference/annual-conference-homepage>

**January 5, 2015** - Online Housing opens

**January 5, 2015** - Conference and short course registration opens

**February 6, 2015** - Abstract submission deadline

**March 3, 2015** - Abstract withdrawal deadline

**April 30, 2015** - Advance conference and short course registration deadline



### ASMS Asilomar Conference Native Mass Spectrometry-based Structural Biology

October 16 - 20, 2015

Asilomar Conference Center  
Pacific Grove, California

#### Organizers

Albert Heck, *Utrecht University*

Joseph Loo, *University of California, Los Angeles*



### ASMS Fall Workshop Lipids and Lipidomics

November 5 - 6, 2015

Catamaran Resort  
San Diego, California

#### Organizers

Xianlin Han, *Sanford-Burnham Medical Research Institute*

Gavin E. Reid, *University of Melbourne*



## Awards

**Ronald A. Hites**, Distinguished Professor in the Department of Chemistry at *Indiana University*, has been elected a fellow of the Society of Environmental Toxicology and Chemistry (SETAC). Hites was one of 20 inaugural fellows, and has a long history with SETAC. He was the winner of the prestigious SETAC Founders Award in 1993, and a member of the SETAC Board of Directors from 1997 to 2000. Hites' election as a SETAC Fellow is in recognition of his distinguished and productive career as an environmental chemist.



## Mass Spectrometry on Comet 67P/Churyumov-Gerasimenko

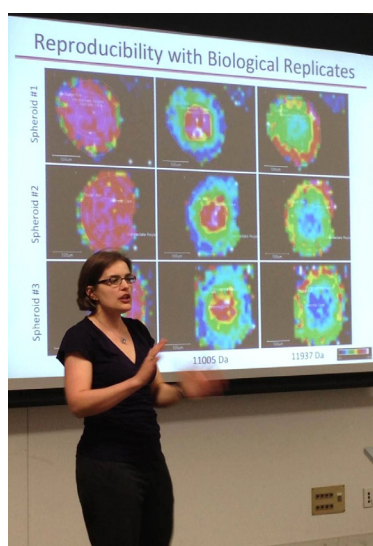
On November 12<sup>th</sup>, 2014, after 10 years and travelling more than 6.4 billion kilometers, the European Space Agency's Rosetta spacecraft successfully delivered a lander named Philae to the surface of the comet 67P/Churyumov-Gerasimenko. One of nine experimental systems on board the lander is a miniaturized GC/MS system called Ptolemy MODULUS 'Methods Of Determining and Understanding Light elements from Unequivocal Stable isotope compositions', that incorporates a specially designed quadrupole ion trap mass spectrometer to measure isotope ratios of H, C, N, and O in their various forms within material sampled from the comet subsurface, surface, and near-surface atmosphere. The instrument was constructed with the involvement of **Raymond E. March**, Professor Emeritus in the Department of Chemistry at Trent University in Peterborough, Ontario, Canada, and **John F.J. Todd**, Emeritus Professor of Mass Spectroscopy at the University of Kent in the United Kingdom.

Details of the Ptolemy instrument can be found at <http://sci.esa.int/rosetta/31445-instruments/?fbodylongid=896>

An excellent perspective written by Professors March and Todd on the development of Ptolemy MODULUS, entitled "An Ion Trap too Far? The Rosetta Mission to Characterize a Comet.", can be found in chapter nine of 'Quadrupole Ion Trap Mass Spectrometry', 2nd Edition, 2005 John Wiley & Sons, Inc.

## ASMS Speaker Program Report

The Washington-Baltimore Mass Spectrometry Discussion Group received support from the ASMS Local Area Speaker Program to fund a visit on May 12, 2014 from Assistant Professor **Amanda B. Hummon**, the Walther Cancer Assistant Professor at the University of Notre Dame. In the seminar given during her visit, Professor Hummon described her research applying imaging mass spectrometry to three-dimensional cell cultures. The Hummon laboratory has adapted MALDI imaging protocols to examine the spatial distributions of endogenous and exogenous molecules in 3D cultures systems. In particular, they have explored the distribution of proteins and lipids in colon carcinoma spheroids. Another major focus for the Hummon lab is the application of imaging mass spectrometry and 3D cell cultures to evaluate drug penetration and metabolism. The Hummon lab treats spheroids with different drug cocktails in a microfluidic device developed by Dana Spence's laboratory at Michigan State University. This novel 3D cell culture-based approach promises a higher-throughput drug-testing platform that is more cost-effective than similar studies with animal models.



*Amanda Hummon presenting her research during the Washington-Baltimore Mass Spectrometry Discussion Group meeting*

If you have suggestions for future tutorial video projects, or other Educational content for the website, please contact the Member-at-Large for Education, or a member of the Education committee (<http://www.asms.org/about/asms-leadership/committees/education>)

## Related Events

ASMS is pleased to offer announcements for other non-profit organizations. Please email details including website to [cindi@asms.org](mailto:cindi@asms.org).

### February 5 – 8, 2015

#### 20th Lorne Proteomics Symposium

Lorne, Victoria, Australia

<http://www.australasianproteomics.org/lorne-proteomics-symposium-2015/>

### March 15 – 18, 2015

#### US HUPO Annual Conference: Next Generation Proteomics

Tempe, AZ

<http://www.ushupo.org/Conference2/GeneralInformation/tabid/63/Default.org>

### March 28 – April 1, 2015

#### Mass Spectrometry Applications to the Clinical Laboratory

San Diego, CA

<https://www.msaccl.org/>

## Mass Spectrometry Tutorial Videos

As a resource to the community, and to provide information for those interested in learning more about fundamental and applied aspects of mass spectrometry, ASMS is compiling a library of introductory tutorial videos. To date, four videos have been created and posted to the ASMS website (<http://www.asms.org/about/about-mass-spectrometry>). These are:

- ‘**The First Fifty Years of Mass Spectrometry: Building a Foundation**’, presented by Michael L. Gross (Washington University, St. Louis) as a plenary lecture during the 2013 ASMS Annual Conference in Minneapolis.
- ‘**The Basics of Mass Spectrometry: Mass Analyzers**’, presented by Richard Vachet (University of Massachusetts Amherst)
- ‘**The Basics of Mass Spectrometry: Tandem Mass Spectrometry, or MS/MS**’, presented by Scott A. McLuckey (Purdue University).
- ‘**Imaging Mass Spectrometry: An Overview**’, presented by Michelle Rezyer (Vanderbilt University)