

the Catalyst



Official publication of the Philadelphia Section, ACS
<http://philadelphia.sites.acs.org/>

October 2010
Volume 95, No. 8



October Speaker

Dr. William J. Simonsick, Jr.

HIGHLIGHTS

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ADVANCE NOTICE

NOVEMBER MEETING

Thursday, November 18, 2010

Ulliyot Public Affairs Lecture

Sally Solomon, University of Colorado at Boulder and NOAA

A Tale for Our Times: Something for Everyone About Climate Change and the Reasons for Climate Gridlock

Chemical Heritage Foundation, Philadelphia

See the NOVEMBER issue of *the Catalyst* for details,
call the Section Office at (215) 382-1589 or email PhilaACS@aol.com.



2010 Eastern Analytical
Symposium and Exposition
Garden State Exhibit Center
Somerset, New Jersey

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the Catalyst

ACS Philadelphia Section
Founded April 15, 1899

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Published monthly except July, August and December by the Philadelphia Section of the American Chemical Society. All views expressed are those of the editors and contributors and do not necessarily represent the official position of the Philadelphia Section of the American Chemical Society. Editorial matters should be sent to the attention of the Editor-in-Chief c/o the Philadelphia Section ACS, Department of Chemistry, University of Pennsylvania, 231 South 34th Street, Philadelphia, PA 19104-6323 or philcatalyst@aol.com.

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**From
The
Chair**



Judith Summers-Gates

There is a finally a feeling of “Fall” in the air! I have to confess that this is my favorite time of the year (allergies notwithstanding) not only because of the welcome change in the weather, but for all of the activities that take place in the final months of the calendar.

Octoberfest came a bit early this year when we held our September meeting at Yards Brewery and got some first-hand insights into the brewer’s art...you know what Ben Franklin had to say about beer....

Were you able to join us when our Section’s WCC was part of an excellent networking event on September 28th? Women in science from multiple organizations took part in the dynamic annual meeting held at the University of the Sciences.

And speaking of networking.....thanks go out to John Northrop for establishing a new LinkedIn group for PHI Local Section members to use as an additional tool to help with job searches in these still tough economic times. Take advantage of this new platform and ramp up the level of member communication and interactions between our formal meetings. We will be celebrating National Chemistry Week from October 17th to the 23rd – this year’s theme is “Chemistry Behind the Scenes.” Are you a teacher? The parent/grandparent of a young person?

Then you should definitely check out the NCW Poster Contest! Get the young people in your life to submit entries based on this year’s theme and get them inspired about chemistry. Share what makes chemistry important to YOU. Swamp my snail mail box with NCW posters!!

The October meeting will take place at the University of the Sciences on the 21st and it will feature a presentation from Dr. William Simonsick, Jr. of our Mass Spec Discussion Group....A lot has been happening in the mass spec arena and this is just a little taste.

Closing out the month, our Graduate School Forum is set for October 25th at Villanova.

Have a safe/Happy Halloween! Now if I can only figure out what costumes my dogs are going to wear this year...

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**Be sure that your email address
with the National Office is current
Email them at service@acs.org**

**You will need your membership number to submit changes
or**

**Log onto the ACS web site, www.acs.org, and click on
“Edit my Profile”
under the welcome line**

The Philadelphia Section, American Chemical Society

October Meeting

Dr. William J. Simonsick, Jr.
DuPont Chemical Company

Modern Mass Spectrometry in the Materials World

Auditorium
McNeil Science and Technology Center (STC)
University of the Sciences in Philadelphia
45th Street and Woodland Avenue
Philadelphia, PA 19104-4495

Thursday, October 21, 2010

7:00 PM

Dinner at 6:00 PM
STC Atrium

Dinner cost: \$20; Students with ID: \$10

RESERVATIONS should be made by calling Mrs. Harper at the Section Office, (215) 382-1589, or emailing PhilaACS@aol.com by 5:00 PM Thursday, October 14. Cancellations, if necessary, cannot be accepted after Tuesday, October 19. **UNCANCELLED RESERVATIONS WILL BE BILLED.**

DIRECTIONS and PARKING: <http://www.usp.edu/visiting/default.aspx>

The Board of Directors will meet at 4:00 PM in Wilson Hall 201.

SPEAKER'S ABSTRACT AND BIOGRAPHY

Dr. William J. Simonsick, Jr.

DuPont Chemicals and

Fluoroproducts

DuPont Experimental Station

Modern Mass Spectrometry in the Materials World

Abstract: Mass spectrometry (MS) plays an important role in the characterization of polymeric materials because of its sensitivity, specificity, and rapid analysis times. Polymers possessing molecular weight distributions under 10K daltons are an important class of materials that are commonly used as precursors to more complex polymeric architectures such as block-, comb- or graft-copolymers. Moreover, low-molecular-weight polymers can be formulated with a small amount of organic solvent to prepare environmentally compliant high performance automotive coatings or employed in the construction of nano-materials. MS has earned respect and gained prominence in the area of macromolecular characterization due to soft ionization methods in which molecular weight data are preserved. For polymers with molecular weights under 10K daltons the elucidation of the chain composition and distribution are now routinely ac-

complished. Soft ionization methods, CO₂ laser desorption or electrospray ionization, afford both the chain length distribution and the chemical composition at every chain length including end groups. Gel permeation chromatography can be coupled to MS through an electrospray ionization interface to size separate and simplify the compounds entering the mass spectrometer. This hyphenated approach yields accurate molecular weight information for different polymer architectures. Tandem MS studies performed on polymer molecular ions provide information about the specific sequence and functionality location. Applications of hyphenated and advanced MS techniques to polyesters, acrylics and polyethers will be presented.

Biography: Dr. William J. Simonsick, Jr. is a principal investigator with the Chemicals and Fluorochemicals business of DuPont. Bill received his PhD in analytical/environmental chemistry in 1985 from Indiana University, Bloomington, IN, and his BS from Seton Hall University, South Orange, NJ in 1981. His current research interests include environmentally friendly refrigerants,

polymer characterization using soft ionization techniques in mass spectrometry and pyrolysis methods. Bill has also coupled powerful separation techniques (supercritical fluid extraction/chromatography, gel permeation chromatography) with mass spectrometry for polymer characterization. Bill holds one patent and has over 130 peer-reviewed publications in these areas.

NEWS ATOMS

Anne DeMasi is named manager, hazard communications at Chemtura Corporation.

Deaths

Oliver Ludwig, III, associate professor of chemistry, July 18th at 74. After an NSF post-doctoral fellowship that took him to Cambridge University, he became assistant professor of chemistry at Notre Dame in 1963. He joined the Villanova chemistry faculty in 1968 where he served as associate professor of chemistry. Ludwig was adviser to the Sigma Nu fraternity, edited its twice-a-year newsletter, and held a beef roast for its members every Memorial Day for 33 years. In 2007 he received the Philadelphia Section's award for excellence in undergraduate teaching in chemical science. — *Alan Warren*



CHEMICAL CONSULTANTS NETWORK

WEDNESDAY, OCTOBER 13, 2010

Visit the CCN web page at www.chemconsultants.org

Date & Location: Wednesday, October 13, at the Cynwyd Club, Bala Cynwyd, PA

Time: Networking, 5:30 PM; Dinner, 6:30 PM; Talk and Business Session, 7:30 PM

Topic: *Creativity in Chemistry: What Worked and What Didn't ... For Me*

Speaker: **Mike Bigwood**

Abstract: The first part of the presentation will focus on the elements that I believe do foster creativity in general (education, diversity, thinking out of the box, pet peeves and sheer luck). I will also discuss those elements that I believe do not help (demanding creativity without the tools, scheduling discovery). I will then discuss creativity as it pertains more specifically to the field of the chemical sciences.

Biography: Michael Bigwood, PhD, VP and CTO of Polymer Phases, Inc. has 8 years of industrial research, 5 years of research management and 15 years of technical consulting experience relating to the design and development of polymeric materials. Dr. Bigwood led the product and applications development effort of the world's largest ion exchange resins manufacturer. In that function, he was also involved in the business planning process. This combination of business experience and scientific skills allows him to propose solutions to problems that are not only technically sound but also economically viable and consistent with corporate capabilities and business objectives.

Location: The Cynwyd Club, 332 Trevor Lane, Bala Cynwyd, PA 19004. [MAP](#)

Reservation: To make or cancel a dinner reservation, e-mail CCNReservations@aol.com or call the ACS office at 215-382-1589 (leave message if necessary). Fee, including food and beverages (wine, beer & sodas), is \$25 if reserved by Thursday, October 7th, \$35 afterwards. Late reservations and walk-ins subject to availability. Payment is due at the door. No-shows will be invoiced. Please state any special food requirements. There is no charge for talk only; registration is suggested using contact information above.

FROM THE FALL 2010 COUNCIL MEETING

Council met in Boston on August 25th. Slightly over 14,000 people attended the Fall meeting.

The meeting was relatively unexciting. Council voted to allow electronic voting in Council meetings (using ‘clickers’) as being valid for Recorded Votes, as each clicker is linked to a Councilor in each meeting.

A prior-announced Petition on President-Elect Eligibility was withdrawn; the Petition required that nominees or candi-

dates for President-Elect come from an academic background every other election, and that only those from non-academic backgrounds would be eligible in the alternate years. I was in favor of this petition, because an “off-cycle” write-in candidate in 2009 drew votes away from a Philadelphia candidate, while garner-

ing only a minority vote (19%).

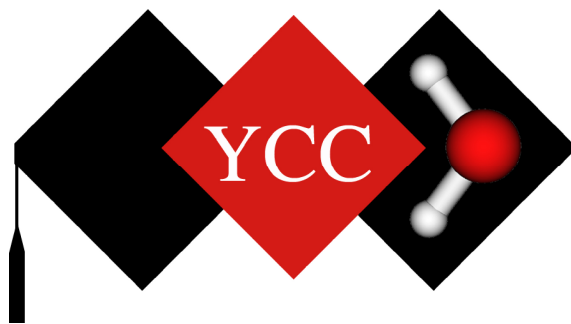
A special discussion item was a proposal to move Council meetings from Wednesdays to Tuesdays. A majority were not in favor of this change, and a decision by the Board of Directors will be made by Spring 2011.



☉ *Section Councilors at the ACS fall national meeting in Boston with current ACS President, Joe Francisco, l to r: Judith Currano, Kathleen Shaginaw, Deborah Cook, Tony Addison, Katie Hunt and Joe Francisco (Sharon Haynie photo).*

It was not all work at the ACS fall meeting, l to r: Cheryl Martin, Anne DeMasi, Sharon Haynie, Inez Haynie Dodson, Barbara Addison, Tony Addison, and Donald Dodson. ☺





Philadelphia Young Chemists Committee Monthly Social

at the

Philadelphia Field House

1150 Filbert Street

Philadelphia, PA 19107

215-629-1520

www.fieldhousephilly.com

2nd Thursday of each month from 5:30 PM -7:00 PM

Entertainment and drink specials available

Come out to socialize and network with other Philadelphia area chemists at the Younger Chemists Committee (YCC) monthly social. Each month we will be meeting at the Field House in Center City. There will be food and drink specials as well as access to the game room (when available). The Field House is conveniently located within the PA Convention Center and public transportation is just a few steps away. The Broad Street Line is directly below the Field House and the Market East Station is in walking distance. The Field House is also accessible from Filbert Street, across from the Reading Terminal Market.

Hope to see you there!

The Philadelphia Section of the YCC

www.PhilaYCC.org

For parking information, including discounted lot information visit:

www.fieldhousephilly.com/parking.php

PENNSYLVANIA GOVERNMENT AND LEGISLATIVE AFFAIRS COMMITTEE

The ACS has endorsed several pieces of legislation awaiting legislative action in Harrisburg. The following two memos refer to two: Science in Motion and the PA. MESA (Math, Engineering and Science Achievement) Initiative.

Pennsylvania Math, Engineering and Science Achievement (MESA) Initiative

The Pennsylvania Government and Legislative Affairs Committee of the American Chemical Society supports legislation currently before the Pennsylvania Senate¹ and House² to create the Pennsylvania Math, Engineering and Science Achievement (MESA) Initiative. The Pennsylvania MESA Initiative will provide a structured, K through 12, pre-college program designed to prepare students statewide for careers in mathematics, engineering, science, and technology.

The MESA Initiative is intended to 1) increase the number of scientists, engineers, mathematicians, and related technical professionals, and 2) serve as a driving force encouraging and assisting minorities and women in achieving success in these fields. MESA will accomplish its goals by partnering school systems, colleges and universities, industry and business, government, community organizations, and families. These partnerships will provide students with programs and enriching activities in Science, Technology, Engineering and Mathematics (STEM). Through MESA's activities, participating students receive the educational enrichment experiences and practical help they need to prepare for university-level studies in a variety of fields.

MESA, one of the country's most innovative and successful programs³, works with educationally disadvantaged students to help these students achieve their full STEM potential. MESA was first established in 1970 in California and California MESA is a founding member of MESA USA, a partnership of MESA programs from eight states⁴. MESA USA provides an opportunity for its members to share and expand successful strategies. It also allows the MESA programs to share resources and provide industry sponsors with the highest return on their investment.

An important component of the Initiative is the establishment of a statewide MESA commission to oversee STEM education in Pennsylvania. The MESA Commission will:

¹ SB 1375

² HB 2460

³ *Innovations in American Government*, a project of the Kennedy School of Government, Harvard University and the Ford Foundation; *Presidential Award for Excellence in Science, Mathematics and Engineering Mentoring*.

⁴ Arizona MESA, California MESA (<http://www.ucop.edu/mesa/>), Colorado MESA, Maryland MESA (<http://www.jhuapl.edu/mesa/home/default.asp>), New Mexico MESA, Oregon MESA (<http://www.mesa.pdx.edu/mission.html>), Utah MESA, Washington MESA.

Oversee the program and assess its efficacy, its utilization of resources, teacher effectiveness, the influence of MESA on STEM based employment within the five MESA regions and Student STEM aptitudes;

Be responsible for fiscal planning and developing an annual budget aligned with the year's goals;

Report to the General Assembly annually on efforts to improve STEM education and outcomes in the MESA regions with an analysis of the quality, scale and effectiveness of implemented programs.

MESA utilizes a common co-curricular academic enrichment model that includes academic planning, community service, family involvement, academic enrichment, hands-on experiments, career counseling, field trips, competitions and workshops.

MESA will provide an education process that enables all Pennsylvania students to achieve and contribute to their full potential. The MESA Initiative's goals are to:

Increase the exposure, motivation and achievement of all Pennsylvania students in the STEM disciplines;

Help build regional capacity to compete in the global technical market by training groups with historically low participation rates in post-secondary education;

Create a statewide infrastructure to enable educationally disadvantaged groups to become competitive and apply their skills in STEM-based fields in the global market and in their own communities.

The Pennsylvania MESA Initiative is a giant step advancing STEM education and helping underrepresented minorities in grades K-12 to complete job training programs, to graduate from 2- and 4-year colleges and universities and to complete graduate programs in the physical and life sciences, applied technologies, engineering and mathematics. Our future economic strength is dependent on tomorrow's innovations. To ensure Pennsylvania's competitiveness, we must draw on every segment of our society to educate the best scientists, engineers, technicians and mathematicians.

Science Technology Partnership Program: Science In Motion

Supporters of the **Science In Motion** Program applauded when legislation establishing the **Science Technology Partnership Program** passed both the Pennsylvania Senate⁵ and House of Representatives⁶ last March. These bills are awaiting resolution and hopefully will become law in the fall.

Science In Motion (SIM) began at Juniata College in 1987 with National Science Foundation (NSF) support for ten years. When NSF support came to an end in 1997 the Pennsylvania legislature began funding SIM as a model basic education/higher educational partnership for science education. With growing teacher and legislative interest over the next few years, the number of basic education/higher education science and technology partnership sites in Pennsylvania expanded to 12 sites⁷ that now serve over 200 school districts in Pennsylvania at no cost to the school districts.

Science In Motion addresses the obstacles facing good science education by adhering to innovative precepts:

Laboratory science equipment is shared in a *cost-effective* rotation system that serves many school districts, eliminating unnecessary duplication of the same expensive equipment in each school.

Laboratory activities and procedures are delivered directly to the classroom with up-to-date equipment and freshly prepared supplies. An experienced mobile educator sets up the entire laboratory and stays to support the teacher.

The system is flexible and teachers are free to choose from a list of SIM experiments and equipment to align laboratory activities with their curricula.

Unlike fee for service organizations, SIM costs the school districts nothing. SIM levels the playing field by providing resources to teachers and students regardless of the wealth of their school district and provides services to schools who couldn't afford to pay even a modest sum for service. SIM helps to ensure the graduation of a well-trained workforce during times of economic hardship such as we are currently experiencing.

The twelve Science In Motion sites are currently supported by a \$2.23 M appropriation. The cost for similar resources and training if implemented individually by each of the schools in these programs is estimated at \$25 M. The SIM program provides a 4-fold per subject reduction in costs.

To ensure Pennsylvania's competitiveness, we must cultivate great scientists, engineers, and technicians to create tomorrow's innovations to keep our economy strong. This vital program helps provide students, teachers, and schools with resources that will enable them to provide for scientific and engineering laboratories and augment the science curriculum – important outcomes that will help improve STEM education in Pennsylvania.

⁵ **SB 766** - An Act amending the Public School Code, establishing the Science Technology Partnership Program; and providing for State grants. **Final passage, March 9, 2010 (49-0)** (Dinniman - N/V)

⁶ **HB 713** - An Act establishing the Science Technology Partnership Program and the Science Education Innovation Grants Program; and providing for State grants. **Final passage, March 22, 2010 (196-0)** (Godshall, Harhart, Oliver, Deweese - LVE)

⁷ 1. [Gannon University](#), 2. [Westminster College](#), 3. [Clarion University](#), 4. [University of Pittsburgh at Bradford](#), 5. [Juniata College](#), 6. [Susquehanna University](#), 7. [Gettysburg College](#), 8. [Wilkes University](#), 9. [Cedar Crest College](#), 10. [Ursinus College](#), 11. [Drexel University](#), 12. [Elizabethtown College](#).

October Historical Events In Chemistry
by Leopold May
The Catholic University of America
Washington, DC

- October 1, 1867 100 years ago in 1910, Wilder D. Bancroft served as President of the American Chemical Society. He made the first systematic study of oxidation cells, and did research on heterogeneous equilibria, emulsions, and theory of dyeing. In 1896, he founded the *Journal of Physical Chemistry* and served as Editor until 1932.
- October 7, 1885 125 years ago, Niels Bohr was born. In 1913, he proposed the "solar system" model of atom based upon Planck's quantum law and received the Nobel Prize in Physics in 1922 for his services in the investigation of the structure of atoms and of the radiation emanating from them.
- October 8, 1917 Rodney R. Porter, who was born on this date, researched the structure of antibodies. In 1972, he shared the [Nobel Prize in Physiology or Medicine](#) with [Gerald M. Edelman](#) for their discoveries concerning the chemical structure of antibodies.
- October 14, 1840 Friederich W.G. Kohlrausch, was a researcher on electrical conductivity, dilution of strong electrolytes and conductivity (Kohlrausch's equation). He was born on this day.
- October 18, 1799 Christian F. Schönbein was born on this date. He discovered ozone in 1840 and collodion in 1846 and did research on hydrogen peroxide and gun-cotton or cellulose nitrate.
- October 20, 1891 75 years ago in 1935, James Chadwick received the Nobel Prize (1935) for the discovery of the neutron, which he discovered in 1932.
- October 21, 1660 350 years ago on this date, Georg E. Stahl was born. He was a researcher on oxidation and reduction and prepared glacial acetic acid. Johann J. Becher and he were responsible for the theory of phlogiston.
- October 23,
Any Year [Mole Day](#), 6.02 AM. through 6:02 PM (Mole time); Mole Moment: 50.453 s after 6.42 PM.

THE PHILADELPHIA TEACHER RESIDENCY PROGRAM

The Philadelphia Teacher Residency Program (PTR) is a teacher preparation program to retool science, technology, engineering and math (STEM) professionals to teach math and science in Philadelphia schools. For a full school year, program participants (Residents) will learn in a teaching internship at the elbow of veteran teach-

ers in high school classrooms. At the same time, they will take coursework at the University of Pennsylvania Graduate School of Education to earn both a Master's Degree as well as Pennsylvania teacher certification. Contingent upon the availability of funds, Residents receive tuition supplement and a living stipend to support their full-time training.

For more information, contact Liz Palmer, Recruiting Manager, Philadelphia Teacher Residency Program, Philadelphia Education Fund, 7 Benjamin Franklin Parkway, Philadelphia, PA 19103; telephone (215) 665-1400 ext. 3335 or go to <http://www.philaedfund.org/programs/advancing-education/philadelphia-teacher-residency>

www.emdchemicals.com/analytics

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October 7, 2010

Careers in Intellectual Property

Learn what you need to know to build a career in the field of intellectual property!
Robert Koch, Attorney at Law with Milbank Tweed Hadley McCloy LLP.



October 14, 2010

US Immigration Updates for Foreign Born Scientists

What foreign-born scientists should know to legally work and gain permanent residence in the US!
Kelly McCown, Attorney at Law with McCown and Evans LLP.



October 21, 2010

Sparking Discovery – Chemists in the Community

Learn how chemists are giving back to their communities and how you can too!
Al Hazari, Ph.D., University of Tennessee, Knoxville.



October 28, 2010

Programs and Funding Opportunities for Manufacturers and Small Chemical Businesses – Part II

Learn about U.S. government resources that help small chemical businesses be more competitive in the marketplace!
Ben Vickery, Senior Industrial Specialist, National Institute of Standards and Technology.

Connect with subject matter experts and global thought leaders in chemical sciences, management, and business on relevant professional issues every Thursday from 2-3 PM ET. After a short presentation, the remainder of the hour belongs to you for live Q&A!



ACS
Chemistry for Life™

Guidelines for Student Affiliate Chapters to Request Funds to attend National ACS Meetings

Undergraduate students from ACS Student Affiliate Chapters in the Philadelphia Section are encouraged to consider attending National Meetings of the American Chemical Society. In this regard, a limited amount of funding will be provided to chapters requesting sponsorship based on the following general guidelines.

General Guidelines

- 1) First consideration will be given to student(s) who wish to attend a National Meeting of the American Chemical Society (ACS) to give a presentation (oral or poster). Students attending for other purposes, i.e., to receive an award or attend a specific workshop, etc., are also eligible to apply for support.
- 2) The student(s) must have requested support from their College or University (including department and/or advisor) to assist in defraying the travel costs. Please attach a copy of the correspondence.
- 3) The student(s) should have a clear idea of the benefits of attending the conference. Please attach a short paragraph from each student indicating which sessions, including workshops, etc., the student plans to attend and why these sessions will help them obtain their professional goals.

All applications must include an itemized list of the projected costs of the trip, i.e, registration, air-fare, train or car expenses, hotel, etc., and indicate which of these costs (if any) are being provided by other sources.

An application for travel support can be made at any time to the Philadelphia Section, but for full consideration, the application must be received by the section office by January 31st for the Spring meeting and May 31st for the Fall meeting.

The Philadelphia Section will evaluate all applications received by the deadline and vote at the February meeting for the Spring ACS meeting applications and at the June meeting for the Fall ACS meeting applications. The amount of funding available may be influenced by the number of applications for a particular meeting and the costs of attending that meeting, i.e., where it is being held.

The successful applicant must submit a brief report highlighting the conference experience to the Philadelphia Section at the completion of the trip. The original receipts should also be submitted to the section office for reimbursement.

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BOOK REVIEW

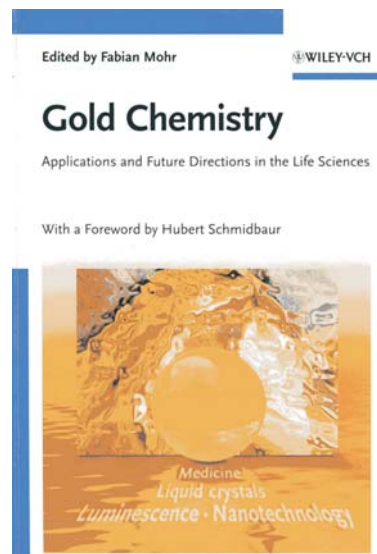
Gold Chemistry, edited by Fabian Mohr. 424 pages, 6 3/4 by 9 3/4 inches, case bound, Wiley-VCH, Weinheim, Germany, 2009. ISBN 978-3-527-32086-8, \$215.

Although gold has been known to man for over three millennia, serious study of its chemistry has taken place only in the last 30 years. Eighteen scientists contributed the chapters that comprise this book.

The authors discuss many aspects of gold chemistry including complexes with nitrogen, pentafluorophenyl gold complexes, theoretical

chemistry of gold, luminescence and photophysics of gold complexes, gold compounds in medicine, nanoscience of gold, and liquid crystals based on gold compounds.

The surface of this field has only been scratched and all of the authors recognize the need for further research in this infant but burgeoning area of gold chemistry.—*Alan Warren*



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Philadelphia Section ACS Group on LinkedIn

As many members of ACS are already aware, the website LinkedIn (<http://www.linkedin-in.com>) is an excellent networking site dedicated to keeping working professionals in touch with one another. As a result, and in an effort to assist in any way that we can, the Philadelphia Section of the ACS has established a group open for all to join. Within this group, discussions can be facilitated as well as the opportunity for new jobs and internships to be posted.

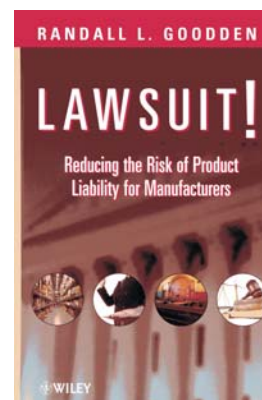
If you already have a profile in LinkedIn, feel free to go to the Groups Section and search for “American Chemical Society - Philadelphia Section.” Send a message to the group administrator to become a member. If you are not already on LinkedIn, we highly recommend that you join. Establishing an account is free and easy to set up. For additional information or assistance, please feel free to contact J.P. Northrop, Liaison Committee, at john.northrop@anton-paar.com

To join, please click on the following link:

<http://www.linkedin.com/groups?mostPopular=&gid=3366988>

BOOK REVIEW

Lawsuit! Reducing the Risk of Product Liability for Manufacturers
by Randall L. Goodden. 376 pages, 6 ¼ by 9 ½ inches,
casebound, John Wiley & Sons, Hoboken NJ, 2009; ISBN
0470177977, \$80.



The US may well be the birthplace of product liability and judging by the claims reported in the media, the topic continues to be a thriving business. Once personal injury or property damage is proven, the next step is to determine negligence, in which case punitive damage awards can really rock the boat. In the introductory chapter the author mentions certain areas of the US that seem to have plaintiff-friendly rulings. He describes causes of injury, proof of causation, recalls, contributory negligence, and product liability as it is handled in other countries around the globe.

Two chapters bear on the introduction of new products and the need for product design reviews, product safety reviews, hazard analysis, and other preventive methods. Then follow chapters on product testing, warnings and instructions, product warranties, product marketing, and documents such as contracts, purchase orders, and agreements. Document management and record retention are important as are the duty to warn and recalls.

The handling of claims and incident investigations are addressed and the final chapter discusses litigation and trial procedures. Every step of the way the author provides case studies to underscore the importance of the points he is making. This book brings advice for all manufacturers. Government product safety organizations serve a purpose, and industry must implement their guidelines and standards. This handbook will also help the corporate world to examine risk-reduction procedures.—Alan Warren

DIRECTORY OF SERVICES

SEARCHING FOR THAT SPECIAL JOB?

There are many companies and organizations searching for chemical and biochemical personnel to fill important jobs in their organizations.

- Companies for laboratory and management positions
- Universities & Colleges for teaching positions and laboratory personnel
- Hospitals for technical and research personnel

There are several web sites that may help you search for these open positions.

- www.mboservices.net
- <http://membership.acs.org/p/philadelphia/jobs/>

ELEMENTAL ANALYSIS

◆ C,H,N,O,S,P ◆ Halogens
◆ Ash ◆ Metals ◆ TOC ◆ TOX
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For more information please contact:

Dr. Eduard Casillas, Program Director

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2010 CALENDAR OF EVENTS

Date	Event	Locations
Monday, October 11	Mass Spectrometry Discussion Group of the Delaware Valley: Dr. Hanno Steen, Harvard University: <i>Qualitative Proteomics</i>	Villanova University Villanova, PA http://science.widener.edu/svb/msdg/
Wednesday, October 13	Chemical Consultants Network: Mike Bigwood, Polymer Phases: <i>Creativity in Chemistry: What Worked and What Didn't ... For Me</i>	Cynwyd Club Bala Cynwyd, PA www.chemconsultants.org
Thursday, October 14	Joseph Priestley Society: John J. Baldwin, Cofounder, Vitae Pharmaceuticals: <i>The Changing Face of Pharmaceutical Research</i>	Chemical Heritage Foundation Philadelphia, PA www.chemheritage.org
Thursday, October 21	Dr. William J. Simonsick, Jr. DuPont: <i>Modern Mass Spectrometry in the Materials World</i>	University of the Sciences in Philadelphia Philadelphia, PA
Monday October 25	Graduate School Forum	Villanova University Villanova, PA
Thursday, October 28	Philadelphia Organic Chemists Club: Award Symposium: Dr. Marisa Koslowski, University of Pennsylvania	University of Pennsylvania Philadelphia, PA http://www.pocclub.org/
Saturday, November 6	Women Chemists Committee: P.A.G.E.S. TM (Philadelphia Area Girls Enjoying Science TM)	Chestnut Hill College Philadelphia, PA
Wednesday, November 10	Madeleine Joullié Lecture: Mohammad Movasaghi, MIT	University of Pennsylvania Philadelphia, PA
Thursday, November 18	Ulyot Public Affairs Lecture: Susan Solomon, University of Colorado at Boulder and NOAA: <i>A Tale for our Times: Something for Everyone About Climate Change and the Reasons for Climate Gridlock</i>	Chemical Heritage Foundation Philadelphia, PA
Saturday, December 11	Herb Bassow Memorial Chemical Demonstrations and Hands-on Activities	Immaculata University Immaculata, PA

ELECTRONIC ELECTIONS – 2010

In the next two weeks, you should receive a postcard with instructions on how to participate in this year elections for the Philadelphia Section leaders. The statement and biographies are already posted on the website: <http://philadelphia.sites.acs.org/elections.htm>.

Voting will be at <http://www.surveymonkey.com> from October 15 to October 29, 2010. If you are unable to access a computer, you may vote by paper ballot if you request one by October 14, 2010 from Elisabeth Harper at the Philadelphia Section office.

Click here for information about the Career Workshop Sponsored by the Princeton Section of the American Chemical Society, Thursday October 14, 2010