

# CHEMunicator

## November, 2012

### Newsletter of the Rochester Section of the ACS

#### 50-Year Members of the American Chemical Society:



Dr. **Derek David Chapman** was born in Lincoln, England in 1932. After his schooling there, he entered the University of Nottingham in 1950, receiving his B.Sc. in 1953 and PhD. in 1956, working on alkaloid synthesis. He then undertook post-doctoral work at the University of Rochester from 1956 to 1959 on an exchange visitor visa, carrying out research on the structure of the antibiotic fumagillin with Prof. Stan Tarbell. Returning to the U.K. he continued with post-doctoral research on germicides at the University of Hull during 1959 and 1960, and then became a Lecturer at a technical college near London during 1960 and 1961.

Prof. Tarbell then recalled him to Rochester to take over the supervision of some of his graduate students during his sabbatical absence until 1962. In that year he joined the Gelatin Laboratory of the Kodak Research Laboratories headed by Dr. Jack Gates, then moved to the Sensitizing Dye Laboratory from 1966 to 1976, working on general dye chemistry, including the Instant Photography project. Further work included the Diconix continuous ink jet printing process, fast acting hardeners, laser and thermal dye transfer, dyes associated with writable CD and for alternate imaging systems, including digital printing. Derek retired in 2000. Besides numerous publications, he has 120 patents.

He lives in Chili with his wife Janice, whom he married in 1958. They have two daughters. He is active in the Friends of the University of Nottingham organization and enjoys gardening, golf and bridge.

Norman Allentoff

**Dr. James Griepenburg** grew up in Tenafly, NJ; a suburb of New York City on the Hudson. During high school his interest in chemistry blossomed due to an excellent teacher, Warren Baecht. Jim went on to Rutgers University to major in chemistry. He then completed a Ph.D. in

Physical Organic Chemistry under Bill Saunders at the University of Rochester. His graduate work was interrupted by two years in the Army; one year of which was in Vietnam as a chemist. There he worked on helicopter oil analysis for wear metals (oil was changed frequently, so if wear metals showed up, it usually indicated severe wear and the need for an engine rebuild). Jim returned to Rochester to finish his thesis.

Jim worked for Bausch and Lomb, Taylor Instruments, Amtex (a Division of Xerox), Rochester Products, Delco Products, and others. He also taught at Marshall High School, Eisenhower College, Rochester Institute of Technology, the University of Rochester, and SUNY Brockport. Most of his work involved atomic and molecular spectroscopy and industrial analytical chemistry. His work in the Army on helicopters really turned him on to this field.

Jim married Vivian Carpenter from Inlet, NY; they met at Strong Memorial Hospital where she was a nurse and he was a graduate student at the University of Rochester. Jim and Vivian have a daughter in Brooklyn and a son in the Bronx. Jim and Vivian live in Pittsford, NY.

Jim is fully retired now and is still well-read in chemistry and science. Jim's hobbies include photography and bridge (he and Lew Allen were Kodak Champs one year).

Ken Schlecht



**Philip T. S. Lau** was born in 1935 in Kuala Lumpur, the son of a Malaysian tin miner; Phil Lau was the oldest of 10 children. In high school he showed promise in science and math and played championship badminton. His college education began in the U.S. on a Trustee Scholarship at Alfred University in NY. He earned a B.S. in Chemistry in 1959 at Alfred, then a Ph.D. in Organic Chemistry in 1963 at Syracuse University studying Mannich reactions. His postdoctoral work at the University of California - Berkeley with D. S. Noyce involved anchimeric neighboring group displacement reactions. He also became a U.S. citizen in 1963.

Impressed both by Kodak's reputation and a visit there, Phil joined the Kodak Research Labs in 1963 as a research chemist in the Color Organic Chemistry Lab. In focusing on color coupler synthesis, he applied his Berkeley experience to design Development Inhibitor Anchimeric Releasing (DIAR) couplers to provide sharper color images. Similar chemistry was also useful in instant color imaging. He was responsible for many significant inventions and ad-

vances in color imaging chemistry, leading to his promotion to Research Associate (1969) and to Senior Research Associate (1979). Also, in 1979, KRL Research Director Jack Thomas appointed him to the prestigious Scientific Committee, which in 1987 became the Kodak Research Scientific Council that Phil chaired from 1989 to 1991. In recognition of his scientific contributions and 57 patented inventions, he was inducted in 1988 into Kodak's Distinguished Inventors' Gallery. Throughout his career, Phil actively promoted scientific excellence, creativity, and team-work. He initiated and helped organize the Organic Chemistry Technical Council and invited top-notch professors to lecture and consult at KRL.

Gaining high recognition as a scientist and inventor, Phil published over 50 research publications and inventions, presenting his work at several national and international conferences. He was elected by his peers to serve in various scientific and technical conferences, leading to his chairing the 1989 Gordon Research Conference in Organic Reactions and Processes. Many friends in Rochester feted him at his retirement party in May 1998.

Phil also took initiative in working to better his community. In 1967 he helped revive the dormant Greece Committee for Civic Improvement and took a pivotal role in convincing the Monroe County Park Commission to purchase 350 acres along the Erie Canal to create the much needed Greece Canal County Park. The committee next tackled a study of town traffic conditions, particularly for Ridge Road West. Phil went on to serve on the Greece School Board in 1970-1980, a time when a controversial integration of inner city students into suburban schools was introduced. He also was active in the Rochester Section ACS Education Committee.

Married in 1959, Phil and his wife Harriet live in Greece adjoining the park. They raised 2 sons and a daughter and have 7 grandchildren. Harriet taught biology in several city high schools. A clay tennis court in back of their home is a favorite attraction for games with many friends, and Phil is proud to show off his plantings of Himalayan pine, Chinese Redwood, Ginkgo, rhododendrons, and azaleas, among others. In addition to tennis, golf, and world travels, the Laus share an interest in painting watercolors. In the near future they plan to move to a gated community south of Orlando. Reflecting on his productive work earlier with local politician friends, Phil is disturbed by the more recent trends toward gridlock, self-promotion, and special interests influence in the political world.

J. Dolf Bass



**Harry James Price:** In 1941, when Harry Price was born in Reading, PA, Harry James was a well-known trumpeter and big band leader. So it's not surprising that Harry's dad, a draftsman for an engineering firm who loved to play trumpet in dance bands, might choose that name for his son. Harry's talent was more in singing, starting in a church boys' choir in 6<sup>th</sup> grade and continuing on in his high school chorus, glee club, and octet, then with the University of Rochester Yellow Jackets, and church choirs ever since. He still sings in the Irondequoit Chorale and in "On a Positive Note", a ten-member *a cappella* group. A junior high interest in science and an inspiring high school chemistry teacher led to his attaining a B.S. in Chemistry at University of Rochester (1963) under Prof. Wiig and a Ph.D. in Inorganic Chemistry at Stanford University (1966) with Prof. Taube, studying electron transfer between cobalt and chromium complexes. In his senior year at U of R, Harry won an ACS membership as a chemistry prize.

In December 1966, Kodak Research Labs hired Harry to start in Dick Henn's Photographic Chemistry Lab in the Photographic Research Division. In a succession of KRL labs, he worked on titanium and other metal complex developers, studied the mechanism of sensitizing dye adsorption on silver halide using computer modeling, sought a replacement for EDTA in Ektachrome bleach, and found an effective catalyst for a persulfate bleach process. He was awarded some 15 patents and presented his research at Society for Photographic Research and Engineering conferences. In 1993-7 he did support work on black and white photographic processing in a classified government program at Kodak's Hawk Eye Plant. They also sent him to help the Secret Service forensic lab in DC develop improvements in fingerprint detection. One enhancement used physical development to provide a silver image and another used a formazan dye image. Harry retired from KRL in 2001.

Harry met Marki when they were in grade school in Reading, before her family moved to Idaho. They kept in touch through the years and were married in Boise in 1964. They raised 3 sons and a daughter in Webster and Harry served on Boy Scout committees. Andy is now an engineer, Katy a flutist and middle school band teacher, Rick an optometrist, and Dan a computer/IT employee at Dox Electronics. The Prices are long-term members of Summerville Presbyterian Church, where Harry has served as elder and deacon. They have seven grandchildren. Harry moved his parents to Bay Winde a few years ago, but after a recent fall, his father is now in a local nursing home where Harry can visit him frequently.

J. Dolf Bass

**John Stout** was born in Dansville, NY and earned a B.S. in Industrial Chemistry at the Rochester Institute of Technology in 1962. He joined the Kodak Research Laboratories, first as a co-op and later an analytical chemist. In 23 years doing analytical research John did applied development support for other research chemists (mostly pertaining to conventional photography), analytical methods development involving radioisotopes, electroanalytical chemistry (including polarography, voltammetry, chronopotentiometry, coulometry, stripping analysis, electrode fabrication and potentiostat design and fabrication), electron spin resonance spectroscopy, aqueous and nonaqueous titrimetry, ion-selective electrode design and fabrication for clinical analyzers and chromatography (HPLC, TLC, and GC).

In 1980 he joined the Industrial Laboratory and directed their electroanalytical group doing methods development characterizing other manufacturers' materials, field reports, and non-standard analytical support work, all in photoprocessing solutions using titrimetry, spectroscopy and chromatography. That work continued in the Chemicals Quality Services Division. He then did literature searches and project technical direction. He became methods editor and then photoprocessing development support technical leader. He had over 40 publications in the Kodak literature. He retired as a Technical Associate for Development in CQS.

John has been married to Alice Ryan Stout, also from Dansville, for 52 years and counting. They have four children and eight grandchildren. One son is a PhD Analytical Chemist, another

with an MS in Trauma Nursing is a Colonel in the US Army Nurse Corps. One daughter has an MS in Nursing and is at Strong Memorial Hospital and the other has a BS in Interior Design and is currently head of Human Resources at Sam's Club in Greece.

John and Alice are Retired Life Members of the Greece Volunteer Ambulance Service. While active members, they were EMTs for seventeen years serving as dispatchers, drivers and medics.

Lew Allen

**David Michael Sturmer** was born on July 27, 1940 in Norfolk Va. where his father was a contractor with the US Navy. The family moved a lot and as a result David attended 3 different kindergartens before the family settled in Eastern Oregon, where he graduated from High School. David attended Oregon State University in Portland where he majored in Chemistry with a Biochemistry elective. After graduation he went to Graduate School at Stanford University where he worked with Prof. Elliot Marvel on the synthesis of 3,3,1 bicyclononane, resulting in a Ph.D. degree in 1966. He spent 1966-7 as a Post-doctoral Fellow at Yale University, working with Professor Ken Wiberg on the synthesis of bicyclopentane; he also did some theoretical calculations on the highly strained system.

In 1964, he married Jane; they have two sons, Patrick and Kevin, and are now grandparents. He joined the Eastman Kodak Research Laboratories where he worked first at the Sensitizing Dye Synthesis Laboratory of the Emulsion Research Division. He introduced the use of Molecular Orbital calculations. This allowed not only the prediction of the absorption wavelength of dyes (which was already possible through Valence Bond methodology) but also the oxidation and reduction potentials of dyes. This allowed the prediction of whether they would act as electron or hole traps. The latter is of great importance to predicting the utility of the dyes in reversal or negative-positive photographic systems. He later joined the Silver Halide Photochemistry Laboratory where he continued to work on dyes as well on the photo-bleaching of dyes.

For 14 months in 1982-3, David was the Director of Emulsion Research at Kodak Research Laboratories at Harrow, England. He returned to Rochester and shortly thereafter headed the Photo-Theory Group, first within the Emulsion Research Division and later within the Chemistry Division (later part of the Corporate Research Laboratory) where he was promoted to Senior Laboratory Head.

In retirement, David continued his interest in Jazz; he was part of a Jazz Band of which he is now the manager. Jane, who is an accomplished accordion player, combines her hobby with exploring her Irish roots by performing Irish tunes. David also explores his Swiss-German roots; he visited his "ancestral" land and is in contact with a number of relatives.

When asked what he would do differently if he had to start over, he replied that he had been fortunate through his life's journey that every time he faced a "fork in the road", he seems to have made a choice that proved beneficial to him. In his words: "For me, it was always very clear, since sophomore/junior in high school, that I wanted to study chemistry and be a chemist. And because I've enjoyed so much all my tasks as a chemist, I think it's a great career choice for others as well."

Dan Daniels

**John Wheeler** was born (1925) and grew up in Hubbardston, Massachusetts. He attended nearby Worcester Polytechnic Institute and received his Bachelors degree and then his Masters in Chemical Engineering from there. John was stationed at Ft. Mead, Maryland and twice scheduled for combat. One of those times he was on a transport ship going through the Panama Canal and came down with dysentery; he was left behind. John's military service qualified

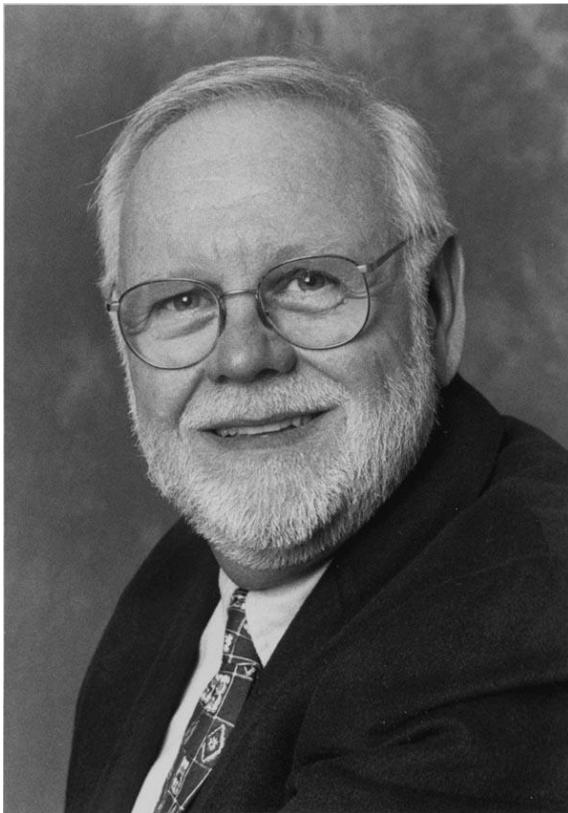
him for the GI Bill for his first graduate year at Worcester; his graduate assistantship funded the second year.

After graduation he joined Diamond Alkali at its Painesville, OH facility (where soda ash, caustic soda, sodium bicarbonate, HCl, and chlorinated products were produced). In 1951 he moved to Eastman Kodak Company where he was the Supervisor for Fire Explosion Hazards of Chemical Plants. He traveled frequently to Kodak facilities in Tennessee and Texas. He supervised a lab that looked at process safety; these ultimately became ASTM standards. John was also involved in testing for traces of radioactivity from atom bomb tests that could negatively impact photographic film and paper. Testing stations were located around the US. John considers himself a trouble-shooter at work, which he enjoyed very much. John retired from Kodak in 1983.

In 1976 John and his family fell in love with Wells Beach, Maine while on a vacation trip. They purchased a cottage “back from the water”, before this became a popular vacation destination; this provided them with many enjoyable times. After retirement they purchased a home in Rochester, Maine so as to be closer (about 25 miles) to their cottage. They very much enjoyed the Unitarian Church there. After living there for 12 years, a stroke forced them back to the Rochester, NY area (Webster).

John first met his wife Virginia in 1940 when she was 14; they were childhood sweethearts who married in June 1949. Virginia is a retired commercial artist who had a private exhibition at the Artisan Works (on Blossom Rd. near Winton) in 2008. They have 4 children and many grandchildren. As an example of John’s problem solving skills, he diagnosed his own short-term memory loss. My interview with him, however, would indicate he is as sharp as a tack!

Ken Schlecht



**Paul L. Valint, Jr.** was born in Buffalo, NY in February, 1941. He graduated from St. Joseph's Collegiate Institute where he fell in love with chemistry. He received his B.S. in Chemistry from the University of Buffalo (1961), followed by M.S. (1964) and Ph.D. (1966) degrees in Organic Chemistry at Seton Hall University under the direction of Professor Robert T. Conley. Dr. Valint then accepted a postdoctoral fellowship at the University of Maryland (1966-67) with the noted polymer chemist, William J. Bailey, who later became President of the American Chemical Society.

Paul's industrial research career spanned 34 years at Exxon Research & Engineering in New Jersey (1967-1988) and Bausch & Lomb in Rochester (1988-2001) where he retired as Senior Research Fellow in Global Scientific Affairs in their Vision Care Division. He established a Surface Science Department and Core Technology Unit to provide Bausch & Lomb with world class surface science capability to conduct research on new concepts of surface modification for biocompatibility and polymer science characterization. Technical contributions at Exxon include agricultural chemicals such as commercialization of the insecticide *Curacron* (licensed to Ciba-Geigy), process development for the extraction of uranium from wet process phosphoric acid and the synthesis of new classes of water soluble polymers based on the concept of intermolecular association of polymers through hydrophobic functionality. The application of these polymers was directed towards use in enhanced oil recovery, drilling fluids and water treating. Dr. Valint's technical contributions are manifested by the award of 75 U.S. patents and over 130 publications and presentations.

Dr. Valint has served in leadership roles in the American Chemical Society Division of Polymeric Materials: Science and Engineering (PMSE) including President (2003). He was elected Fellow by PMSE in 2002. He also served as President of the Surfaces in Biomaterials Foundation (1999).

Since his retirement in 2001, Paul Valint has provided consultation services in surface and polymer chemistry in the biomaterials field to a number of companies with products in ophthalmic, orthopaedic, cardiovascular and biosensor areas. He has also served as an expert witness in legal matters.

He has also maintained a close association with the University of Buffalo, The State University of New York. In 2000, he was the recipient of the Clifford C. Furnas Memorial Award from this Institution for distinguished achievement in the fields of Chemistry and Chemical Technology. In 2001, he was designated Research Professor in the Chemistry Department where he derives great satisfaction in mentoring graduate students. He also fondly recalls serving as a role model for younger Bausch & Lomb colleagues who entered Ph.D. Chemistry programs. This has been a source of pride for him.

Paul Valint has long had a passion as a fly fisherman which has taken him all over the United States and overseas locales such as New Zealand, Argentina (Tierra del Fuego region) and Belize (where he caught a 150 lb. tarpon !). He also has strong interests in jazz and model railroading. For the last several years, he has been an active member of the Osher Life Long Learning Institute at RIT.

Paul Valint and his wife, Linda, have been married for 46 years and live in Pittsford, NY. Their family consists of two children (Paul III and Jennifer) and six grandchildren.

Max M. Boudakian



## **2012 Harrison Howe Award, Lecture, and Symposium:**

The 2012 Harrison Howe Award was presented during the NERM 2012 meeting to Prof. **Xiaoliang Sunney Xie** of Harvard University in recognition of his major contributions to the emergence of the field of single-molecule biophysical chemistry and its application to Biology, as well as to the development of coherent Raman scattering microscopy. Xiaoliang Sunney Xie received a B.S. from Peking University in 1984, and a Ph.D. from the University of California at San Diego in 1990. This was followed by a short postdoctoral experience at the University of Chicago. In 1992 he joined Pacific Northwest National Laboratory, where he later became Chief Scientist. In 1999 he was appointed Professor of Chemistry at Harvard University where he is now Mallinckrodt Professor of Chemistry and Chemical Biology. His honors include the E. O. Lawrence Award in Chemistry, the Leibinger Innovation Prize, the NIH Director's Pioneer Award, and the Sackler Prize for Physical Sciences. Xie is a fellow of the American Academy of Arts and Sciences and a member of the National Academy of Sciences.

Xie's group is working at the interface of several disciplines, striving to develop new physical and chemical tools to solve compelling biological problems. Recently they have developed a new DNA sequencing method that offers potentially low cost and fast turnaround time for genome analysis. They are exploring single cell genomics, which allows the determination of the genome of an individual cell. His team also pioneered the development of coherent Raman scattering microscopy. With a wealth of physical and chemical tools, Xie's group is excited to make both scientific and technological contributions to life science as it is becoming a data-rich quantitative science.

The Keynote Lecture on "The Quest for Non Linear Coherent Optical Imaging or Biology and Medicine" was presented at 1 p.m. on Tuesday, October 2, 2012. This was followed by a symposium of invited talks that included:

Prof. Edward Brown III (University of Rochester) "Studying the Tumor Extracellular Matrix with Second Harmonic Generation".

Prof. Haw Yang (Princeton University), "Measuring Nanoscale Local Temperatures".

Prof. Peng Chen (Cornell University), "Spatiotemporal Catalytic Dynamics on Single Nanocatalysts".

At 7:30 pm the Award Presentation and Public Lecture – "Life at the Single Molecular Level" took place which was followed by a Dessert Reception.

## COUNCILOR REPORT

### 244<sup>th</sup> ACS NATIONAL MEETING PHILADELPHIA, PA, AUGUST 19-23, 2012

The following is a summary from the 2012 fall ACS National Meeting. As your Councilor, I always want to make sure that you are aware of the business taking place in the national level. For your information, your Rochester Councilors serve on the following National ACS

Committees:

- D. Richard Cobb – Nominations and Elections
- Rich Hartmann – International Activities Committee

### ACTIONS OF THE COUNCIL:

#### **Election Results:**

- The Committee on Nominations and Elections presented to the Council the following slate of candidates for membership on the **Committee on Committees** beginning in 2013: Spiro D. Alexandratos, G. Bryan Balazs, Christopher J. Bannochie, Arindam Bose, Dawn A. Brooks, Michelle V. Buchanan, Alan B. Cooper, Judith Currano, Warren D. Hull, Jr., David J. Lohse, Christopher J. Masi, Ingrid Montes, Jason E. Ritchie, and Ralph A. Wheeler. By electronic ballot, the Council elected G. Bryan Balazs, Dawn A. Brooks, Michelle V. Buchanan, Alan B. Cooper, and Ingrid Montes for the 2013-2015 term; and Spiro D. Alexandratos and Judith Currano for the remainder of a two-year (2013-2014) term.
- The Committee on Nominations and Elections presented to the Council the following slate of candidates for membership on the **Council Policy Committee** beginning in 2013: Frank D. Blum, Mary K. Carroll, Joseph A. Heppert, Martha G. Hollomon, Lee H. Latimer, Willem R. Leenstra, Carolyn Ribes, and Ellen B. Stechel. By electronic ballot, the Council elected Frank D. Blum, Mary K. Carroll, Lee H. Latimer, and Carolyn Ribes for the 2013-2015 term.
- The Council Policy Committee presented to the Council the following slate of candidates for membership on the **Committee on Nominations and Elections** beginning in 2013: Cherlynlavaughn Bradley, Dwight W. Chasar, Catherine E. Costello, Milagros Delgado, Kevin J. Edgar, Carol B. Libby, Les W. McQuire, Donivan R. Porterfield, Robert A. Pribush, and Steven W. Yates. By electronic ballot, the Council elected Cherlynlavaughn Bradley, Milagros Delgado, Carol B. Libby, Les W. McQuire and Donivan R. Porterfield for the 2013-2015 term.

### Candidates for President-Elect and Board of Directors

#### Candidates for President-Elect, 2013 (academic)

- Dr. Thomas J. Barton, Distinguished Professor, Iowa State University, Ames, IA
- Dr. Luis A. Echegoyen, Robert A. Welch Professor, University of Texas at El Paso, El Paso, TX

#### Candidates for Directors-at-Large, 2013-2015

- Ms. Carol A. Duane, President, D&D Consultants of Mentor, Mentor, OH
- Ms. Valerie J. Kuck, Retired, Lucent Technologies (Bell Labs), Murray Hill, NJ
- Ms. Helen (Bonnie) A. Lawlor, Executive Director, National Federation of Advanced Information Services (NFAIS), Philadelphia, PA
- Dr. Ingrid Montes, Professor, University of Puerto Rico, Rio Piedras Campus, San Juan, PR

**Candidates for District I Director, 2013-2015) (This is our District)**

**Dr. Thomas R. Gilbert**, Associate Professor, Northeastern University, Boston, MA

**Dr. Neil D. Jespersen**, Professor of Chemistry, St. John's University, Queens, NY

**Candidates for District V Director, 2013-2015**

Dr. John E. Adams, Curators' Teaching Professor of Chemistry, University of Missouri, Columbia, MO

Dr. Peter K. Dorhout, Dean, College of Arts & Sciences, Kansas State University, Manhattan, KS

**Petitions (For Action):**

- The Council received two amendments (petitions) to the ACS Constitution and Bylaws for action: The Petition on Candidate Comment in C&EN and the Petition on International Chemical Sciences Chapters Funds. The Council VOTED **NOT** to approve the Petition on Candidate Comment in C&EN which sought to restrict candidates for election to the Board of Directors from publishing comments in C&EN from May through the balloting period.
- The Council also VOTED **NOT** to approve (64% to 36% via clicker vote) the Petition on International Chemical Sciences Chapters Funds. This petition sought to clarify that the Board of Directors may grant funds to international chapters for specific purposes.

**(For Consideration):**

- The Council also received one amendment (petition) to the ACS Constitution and Bylaws for consideration (not action): Petition to Amend National Election Procedures. The Petition to Amend National Election Procedures seeks to shorten the campaign period for candidates for President-Elect and to charge the Committee on Nominations and Elections (N&E) with proposing two candidates for President-Elect. Currently, N&E proposes four *nominees* from which Council selects two *candidates*. Under the petition, Council would no longer vote on a list of nominees. The process of petition candidates would not change. The Petition to Amend National Election Procedures will be on the Council agenda for action at the 2013 spring meeting.

**Committee Review:**

- As part of a regular performance review, the Council VOTED to continue the Joint Board-Council Committees on Chemists with Disabilities and on Professional Training. Continuation of these two committees also requires Board of Directors concurrence.

**New Committee Supported:**

- The Council VOTED to establish a Joint Board-Council Committee on Senior Chemists whose mission is to enrich the educational, technical, and cultural lives of the ACS Membership by ministering to and employing the talents of senior ACS members by: sharing with ACS members of all ages a rich variety of personal experiences and expertise gained over many years of professional service; fostering interest and participation in the science of chemistry through community outreach (especially in K-12); acting as science advisors/ambassadors for the purpose of cultural exchange at home and abroad; providing senior ACS members with challenging, diverse, and enjoyable professional experiences that enable them to contribute to the cultural experiences of their communities; and recommending policies that address issues of interest to senior chemists. The committee is aimed primarily at members over 60 years of age. The Board of Directors must vote on whether to establish the committee.

**Meeting Registration Report:**

- As of close of business August 22, 2012, the ACS fall national meeting had attracted 13,320 registrants, including 7,817 regular attendees and 3,177 students.

#### **Membership Activity:**

- One of the Society's long-time concerns has been the decline in the number of domestic Regular Members, that is, members paying full dues. The impact of this decline has been offset, as we have reached record membership levels, by increases in the number of international Regular Members, and the 2009 addition of Student Member Undergraduates. While the number of regular domestic members paying less than full dues has decreased from 33,000 to 29,000 in the last 5 years, this is still significantly more than the number of student members added.
- The Committee on Economic and Professional Affairs (CEPA) has unveiled 6 new 4-hour workshops, as the ACS Career Pathways series. CEPA trained more than 40 volunteer facilitators and the workshops are now available for regional meetings and local sections.

#### **Realignment of Electoral Districts:**

- The Council VOTED 58% to 42% (via clicker vote) to shift two local sections in District II (Hampton Roads and Western Maryland) to District III. (The 2 local sections had agreed to the shift.) The Bylaws mandate rough equality in district populations. The shift meets the specified criteria for redistricting as required by the Bylaws and brings the districts within permissible range. During the discussion, Councilors asked the Committee on Nominations and Elections to conduct a comprehensive review of the optimal alignment of local sections within districts.

#### **Special Discussion Item:**

- A special discussion item was put on the Council agenda for this meeting. ACS President Bassam Shakhshiri presented and moderated a discussion on "What major efforts should ACS pursue to help alleviate water and other global challenges?" Members of the ACS feel a responsibility as scientists and citizens to help address global challenges facing society in the 21<sup>st</sup> Century to help sustain Earth and its people. These challenges include increasing population growth, limited natural resources, malnutrition, disease, climate change, violence and war, and the denial of basic human rights, including the right to benefit from scientific and technological progress. This discussion focused primarily on the crisis of available water suitable for drinking, agriculture and industry. Following the presentation, more than 30 Councilors engaged in a discussion of this global challenge and others and offered numerous suggestions. Councilors are invited to continue discussion of this topic within the ACS Network Councilor Group (<https://communities.acs.org/groups/councilor-group>) at <https://communities.acs.org/message/11677>.

#### **Resolution to Honor the Memory of Glenn T. Seaborg in the Centennial Year of His Birth**

- The Council passed a resolution to honor the 100<sup>th</sup> anniversary of the birth of Glenn T. Seaborg, Chemistry Nobel Laureate and past ACS President.

#### **Update on ACS vs. Leadscope Litigation:**

- The Chair of the Board gave an update on the ACS vs. Leadscope litigation. As of this meeting, there was still no opinion announced by the Ohio Supreme Court on ACS's appeal in this case, despite the fact that oral arguments were presented nearly a year ago. We have no information on when an opinion might be delivered.

### **ACTIONS OF THE BOARD OF DIRECTORS**

#### **The Board's Committees and Working Groups:**

- The Board of Directors received reports from its committees on Grants and Awards (G&A), Executive Compensation, and Budget and Finance (B&F); and from its working group on Society Program Portfolio Management.
- On the recommendation of the Committee on Grants and Awards, the Board VOTED to approve Society nominations for the Perkin Medal and the National Science Board Public Service Award. The Perkin Medal is the highest honor in American industrial chemistry, and the National Science Board Public Service Award honors individuals and groups that have made substantial contributions increasing public understanding of science and engineering in the US.
- The Board received a briefing and approved a recommendation from its Committee on Executive Compensation. The compensation of the Society's executive staff receives regular review from the Board.
- On the recommendation of the Committee on Budget and Finance (B&F), the Board VOTED to approve an advance member registration fee of \$370 for national meetings held in 2013. The Board also considered program funding requests, and on the recommendation of B&F VOTED to reauthorize funding for inclusion in the 2013 proposed budget the *ACS Science Coaches* program and the *ACS Global Research Experiences, Exchanges, and Training Program (GREET)*.
- The Board of Directors considered two other recommendations from the Committee on Budget and Finance and VOTED that an in-depth review of the expectations for the financial goals for National Meetings be performed, and that a financial plan for the long-term viability of the *ACS Presentations on Demand* program (formerly known as Electronic Dissemination of Meeting Content) be developed and shared with B&F at its 2013 spring meeting.
- The working group on Society Program Portfolio Management briefed the Board on its activities. The working group is charged with recommending a process for portfolio management of Society programs in the divisions of Membership and Scientific Advancement, Education, the Office of Public Affairs and pilot programs.

#### **The Executive Director/CEO Report:**

- The Executive Director/CEO updated the Board on: security threats faced by the Society's information technology systems and the measures in place to protect against them; a recommendation from the 2011 Financial Planning Conference that ACS identify additional revenue sources; and the activities of CAS (Chemical Abstracts Service), the ACS Publications Division, and the Society's General Counsel. The General Counsel report included an update on the ACS vs. Leadscope litigation. As a follow-up to the Publications report, the Board VOTED to approve several journal editor re-appointments.

#### **Strategic Assessment of ACS Information Services Divisions:**

- As a result of the 2011 Financial Planning Conference, the ACS Board of Directors requested that the ACS Executive Director and Chief Executive Officer carry out a strategic assessment of the ACS Information Services Divisions. As a practical matter, these studies have been conducted approximately every 3 years to ensure that our information services divisions, CAS and ACS Publications are fulfilling ACS's strategic goals. The study was conducted over a period of 9 months, with the ACS Board of Directors and the Governing Board for Publishing discussing the study at key milestones along the way. The study affirmed the robust operating performance of CAS and ACS Publications, from both mission and financial viewpoints. It commended the increasing collaboration between the divisions and their global presence, and identified areas of synergy where additional opportunities for innovation and growth should be explored.

#### **Presidential Symposia at Philadelphia:**

- ACS President Bassam Z. Shakhshiri hosted several well attended symposia under the presidential theme, "Advancing Chemistry and Communicating Chemistry": a plenary lecture on "Chemistry and Climate Change" delivered by Nobel Laureate Mario Molina; the 25<sup>th</sup> anniversary of National Chemistry Week; "Communicating Controversial Science" honoring Rudy Baum on the occasion of his retirement as Editor-in-Chief of C&EN; and "150 Years of Chemistry at Land Grant Institutions: The Past as a Prelude to the Future," honoring the sesquicentennial of the Morrill Land Grant Act.

### **Other Society Business:**

- The Board also:
  - received reports from the Presidential Succession on their current and planned activities for the remainder of 2012 and 2013;
  - approved the appointment of Dr. Jerauld Skotnicki as the Coordinating Editor, ACS Presentations on Demand; and
  - welcomed and received reports from international guests representing the Canadian Society for Chemistry, the German Chemical Society, the Chemical Society of Japan, and the Royal Society of Chemistry.
- The Board held a well-attended open session that featured a special forum titled “What are the ‘real world’ ethics issues faced by students and practitioners of chemistry?” Members attending this standing-room only session offered personal observations about ethical issues they have observed or been challenged by and possible options to address them.
- The ACS Leaderships Institute will be held in Dallas, Texas, January 25-27, 2013, for new committee, local section, and division chairs, and other volunteer governance members.
- In order to increase the available time for abstract submission for the ACS National Meetings, the Committee on Meetings and Expositions will be studying the feasibility of eliminating the print version on-site program books with a target of the 2013 fall national meeting in Indianapolis.
- The 25<sup>th</sup> anniversary of National Chemistry Week will be celebrated October 21-27 with the theme, “Nanotechnology – The Smallest BIG Idea in Science!” All local sections are encouraged to participate in NCW and plan an event that will recognize their coordinators.
- The 10<sup>th</sup> anniversary of Chemists Celebrate Earth Day will be celebrated in 2013. All local sections are encouraged to participate.

### **ADDITIONAL INFORMATION:**

The following is a list of URLs and email addresses presented on slides at the Council meeting. You will find the information noted on these sites helpful.

[www.acs.org/ChemistryAmbassadors](http://www.acs.org/ChemistryAmbassadors) - Information on the Chemistry Ambassadors program

[www.facebook.com/ChemistryAmbassadors](http://www.facebook.com/ChemistryAmbassadors) - Chemistry Ambassadors group on Facebook

[www.acs.org/getinvolved](http://www.acs.org/getinvolved) - Details regarding Innovative Project Grants through the Committee on Local Section Activities

[www.acs.org/climatescience](http://www.acs.org/climatescience) - Information on the ACS Climate Science Toolkit

[outreach@acs.org](mailto:outreach@acs.org) – Contact email for information on the Coins for Cleaner Water initiative

[www.acs.org/bulletin5](http://www.acs.org/bulletin5) - The ACS governing documents including certification information on unit bylaws

[bylaws@acs.org](mailto:bylaws@acs.org) – Contact email for submitting petitions and other questions regarding the governing documents

[www.acs.org/ei](http://www.acs.org/ei) - Information on the ACS Entrepreneurial Initiative

[careers@acs.org](mailto:careers@acs.org) – Email address for forwarding revisions on the Academic Professional Guidelines

[www.acs.org/cpc](http://www.acs.org/cpc) - Information on the Council Policy Committee including the Councilor Handbook and Strategy Café Toolkit

[www.acs.org/councilreports](http://www.acs.org/councilreports) - Location for committee reports following the Council meeting

As always, I am honored to serve the Rochester Membership as your Councilor. Please feel free to contact me with any questions, comments, ideas, etc. I can be reached at:

[DCOBB4@rochester.rr.com](mailto:DCOBB4@rochester.rr.com) (email)                      865-9291 (telephone)

D. Richard Cobb, Councilor

# NERM 2012 Science Teacher Workshop

Sunday, September 30, 2012, 1:00 pm to 5:00 pm

Elizabeth Burns and Deborah Janes served as co-chairs for this Workshop during NERM 2012.



Beth Burns



Deb Janes

This science outreach program provided several areas of training and development to local science teachers. At the end of the workshop, each participant received a certificate from the American Chemical Society acknowledging 4 hours of professional development.

The following people volunteered as presenters at the workshop:

Candace Schneggenburger (Palmyra-Macedon High School), "Open CESAME! Top 10 Reasons to Attend a Summer CESAME Workshop."

Marie LoRe, PhD. and Eileen Malloy Desormeaux (Pittsford Sutherland High School), "Utilizing The Strategies Of Cognitive Psychology To Enhance The Teaching Of The Classification Of Matter In Chemistry"

Elizabeth Burns, Donna Himmelberg, Eugene Gordon and Andrew Johnson (Fairport High School), "Take a Ride on the Vomit Comet – Taking a Student Designed Experiment Aboard NASA's Zero Gravity Plane"

Sherri Rukes (Polymer Ambassadors), "Hands-on workshop with Polymers"

Robert Ponto, (PGO Glass), "Glass Blowing Demonstration"

Kristina Lantzky, PhD. (St. John Fisher College), "POGIL Workshop in Chemistry"

Bernard Ricca, PhD. (St. John Fisher College), "Inquiry in Physics"

Kermin Martinez-Hernandez, PhD. (St. John Fisher College), "Using Nano-Outreach Activities to Spark Interest in STEM"

Nahyr Rovira-Figueroa, PhD. (St. John Fisher College), "Using External Representations as a Research Tool"

Jeannette Brown (Historian and Blogger of African American Women Chemists) and Allene Johnson (Retired Teacher), "How to use the book *African American Women Chemists* to teach chemistry and history"

Bassam Shakhashiri, PhD. (2012 President of the American Chemical Society), "Exhortations for Good Teaching and Chemistry Demonstrations"

Please visit [www.rochesteracs.org](http://www.rochesteracs.org) for pictures from this event.

## Awards Dinner October 1, 2012 at NERM 2012

(Pictures by James Reynolds)

This year our awards dinner was part of the Northeast Regional Meeting of the American Chemical Society (ACS). We were very fortunate this year to have Professor Bassam Z. Shkhashiri (2012 President of ACS) be our guest speaker and give out the awards. As guest speaker, Shkhashiri discussed **"ENLIGHTENMENT AND THE RESPONSIBILITIES OF THE ENLIGHTENED IN COMMUNICATING CHEMISTRY"**

The following awards and recipients are listed below.

### Sixty Year Members:



Dr. J. Raymond Hensler



Dr. Lieng Huang Lee



Dr. Julius L. Silver

### Fifty Year Members:



Dr. Derek D. Chapman



Dr. Phillip T. S. Lau



Dr. David M. Sturmer



Dr. Paul L. Valint Jr  
Additional 50 year members who could not attend the dinner are Mr. James V. Griepenburg, Dr. Harry Price and Mr. John J. Wheeler.

**Rochester Science Teacher of the Year:**



Candace Schneggenburger

**Rochester Section 100-Year Recognition**



Steven Szatynski (Section Chair)

**Salute to Excellence Award for the Chemistry and the Arts Lecture Series:**



N. Zumbulyadis, H. Gysling, R Hartmann

**Salute to Excellence Award for Adventures in Chemistry and Physics**



Deb Janes and Tim Wilson

**Recognition for General Chair, NERM 2012**



Richard Hartmann

**Recognition for Program Chair, NERM 2012**



Terry Bluhm

## 2012 Section Elections -- Candidates for Rochester Section Positions

Balloting ends on November 21<sup>st</sup> (Midnight)

### Candidate for Chair

#### Kimberly Chichester:

##### Biography:

Dr. Kimberly Chichester is a current member of the Rochester Section of the ACS and has served as a Member-at-Large from 2010-2012. In 2009, she co-chaired the Undergraduate Research Symposium held at St. John Fisher College arranging the meeting and booking the speakers. She attended the ACS leadership conference, leadership courses at an ACS national meeting and the strategic planning session held at NERM in 2012. Kim also volunteered at NERM and served as a moderator for an analytical session.

Dr. Chichester is currently an Assistant Professor at St. John Fisher College teaching general, analytical and science scholar courses. She has had twelve research students in the past four years and those students have presented at regional and national meetings. Currently, Dr. Chichester is in collaboration with two different schools performing analytical method transfer research funded by the National Science Foundation.

Kim is currently resides in Pittsford, New York with her husband Christopher and their two year old daughter Cecelia.

##### Position Statement:

The Rochester Section of the ACS is currently discussing the question of how to evolve with the changes in the local economy. As Rochester, moves in a different direction the Section is focusing on strategic planning with a retreat scheduled for November. With these talks, the Section needs to focus on providing more benefits to its members and involving more members in events and governance. A strong focus on education and small businesses could drive membership growth and involvement by members that currently feel the ACS has little to offer for the price.

### Candidate for Chair-Elect

#### Amy E. Irwin:

##### Biography:

Amy Irwin received her BS in Chemistry and PhD in Inorganic Chemistry from the University of Cincinnati. She then spent three years doing post-doctoral research with Gregory Choppin at Florida State University where she also had the opportunity to teach General Chemistry as an adjunct instructor. After working at the Bettis Atomic Power Lab in Pittsburgh, Pa, she was approached by the Community College of Allegheny County to teach Radiochemistry and Organic Chemistry. After teaching at CCAC for 5 years, Amy went to a small liberal arts college in eastern Kentucky, where she taught all levels of chemistry. Amy arrived in Rochester to teach General Chemistry at Monroe Community College in July of 2011. Amy shares a house with her son, Philip, and his two rescue dogs.

##### Position Statement:

I am proud to be a Candidate for Chair-Elect of the Rochester Section for 2013. I am very excited about the possibility of being such an integral part of the future of our Local Section of the American Chemical Society! Since last October, I have gotten to know many members of the Section through the work I was able to do to help with NERM 2012 and also through the Tuesday night social events the Section sponsors each month. I have begun attending the Executive Committee meetings and have learned quite a bit about the workings of the Section. At NERM this year, I was able to attend a Strategic Planning workshop offered by the American Chemical Society as a part of their LEADERSHIP DEVELOPMENT SYSTEM™. Along with some of the other members of the local section, I learned how to develop a strategic plan and good ways of approaching the future of the local section. I believe we developed

some good ideas at this workshop that will help focus the immediate future of the local section. I am very excited about the start of the Section's next 100 years! I believe that with the changes the Rochester area is experiencing in the chemical industry, the academic branch of the section needs to become more active. I am excited about how I can help facilitate that activity.

## **Candidate for Secretary**

**Elizabeth C. Burns:**

### **Biography:**

#### **Academic Record:**

LeMoyne College (1994) B.S. Chemistry with Departmental Honors

Nazareth College (2003) M.S. Education

Honors: American Institute of Chemists Student Medal Award (LeMoyne College)

Outstanding Student Teaching in Chemistry (Nazareth)

#### **Professional Positions:**

Fairport High School (Fairport, NY), Chemistry and Forensic Science Teacher, 2001 to Present  
Eastman Kodak Company (Rochester, NY), Chemical Buyer, Quality Assurance Engineer, 1996 to 2000

Bristol Myers Squibb (Syracuse, NY), Assistant Scientist Chemical Development Labs, 1994 to 1996

#### **Service in ACS:**

Member since 1994 & Member Division of Chemical Education.

Rochester Section Secretary since 2008

Local Section Chair: High School Chemistry Student Recognition Night and High School

Chemistry Teacher of the Year

Local Section Co-chair: Science Teacher Workshop NERM 2012

#### **Position Statement:**

It is an honor to be nominated to run for Secretary of the Local Rochester ACS Section. As a member of the ACS since 1994, I have had many opportunities to utilize the services of the ACS through conferences, workshops and access to ACS publications. As a teacher, I love getting my students excited about chemistry. I am looking forward to finding opportunities to promote chemistry in Rochester.

## **Candidates for Member-at-Large**

**Heidi A. B. Asarese:**

### **Biography:**

#### **Education:**

Canisius College, BS Chemistry 1989

University of Rochester, MS Chemistry 1991

SUNY Brockport, coursework for NYS Teaching Certification

#### **Certifications:**

Permanent certification NYS Public School teacher

Chemistry 7-12, Biology 7-12, General Science 7-12

#### **Experience:**

Substitute teacher, Brighton CSD, Fairport CSD, Honeoye Falls-Lima CSD, Pittsford CSD, Victor CSD 2011-present

Long-term substitute teacher, Gananda CSD 2011

Science teacher, Nazareth Academy, 2000-2010

Research Associate I, Medeva Pharmaceuticals, 1997 - Analytical Method Development Scientist, Bausch and Lomb, 1994-1997 - Analytical Method Development and Validation Chemical Technician, Lehigh Design contract to Kodak, 1992-1993 - Method Development Laboratory Technician, Ecology & Environment, 1988-1989 - Sample Prep. & Analysis for PCB's  
Member of ACS since 1989 - Division: Chemical Education  
ACS High School Chemistry Awards committee member  
NERM 2012 committee - Co-chair Volunteer coordinator

**Position Statement:**

As Member-At-Large for the Rochester Section of ACS, I am interested in making sure that the Section has a positive and visible interaction with the community by continuing and expanding my involvement with the ACS High School Chemistry Awards. I am also anxious to expand the influence of High School teachers within the Local Section's Executive Committee and be part of any new High School outreach programs that may come out of the Section's Strategic Planning efforts.

**Maryann Mendel:**

**Biography:**

Dr. Maryann Mendel is an active member of the Rochester Section of ACS where she is serving as a current Member-At-Large. In this role she is contributing as Publicity Chair and Web Master for the Section's web site. Mendel also participated in NERM 2012 by chairing several areas including the NERM Web Site.

Her contributions to Chemistry were in the area of Photography at Eastman Kodak Company, where she worked as a Senior Development Manager in the Entertainment Imaging Business. More recently, she filled the role of Business Development and Program Manager for digital products until her retirement in 2005. In addition to her ACS membership, Mendel is a Research Fellow and Lifetime Member of the Research Scientific Council, Eastman Kodak Company and is currently a Fellow of the Society of Motion Picture and Television Engineers, Inc.

She is currently a resident of West Irondequoit, New York with her husband John and their 2 dogs (Teddy and Annie).

**Position Statement:**

In 2012, the Rochester Section of the American Chemical Society has been involved in two main areas: Northeast Regional Meeting (NERM) 2012 and Strategic Planning. Both these opportunities are providing us with information to help us redefine what our Section does and how we can meet the needs of our membership for 2013 and beyond. I look forward to start implementing our strategy in 2013 if I am re-elected.

**Phil Rock:**

**Biography**

Phil Rock is a native son of Rochester, NY in addition to a lifelong devotee of science and the arts. Presently a student of Chemical Engineering, President of the Chemistry Club and Chemistry Department student aid and technical advisor at Monroe Community College, he has applied his work and life experience to enriching the lives of those around him. His experience in industry has shown his aptitude for leadership, versatility and a zeal for learning. With a passion for chemical demonstrations, he has applied his knowledge not only for his club, but for other MCC departments as well as numerous schools throughout the community. Some of these demonstrations are currently performed by department faculty, in some cases becoming part of the lab curriculum. His acute aesthetic has driven him to produce detailed displays that adorn the laboratory hallway of Chemistry Department. Currently he is leading an undergraduate

team aimed at researching the effects of hydrofracking pollutants on sustainable hydro-electric systems. He presently resides in the City of Rochester with his wife Amy.

**Position Statement:**

I am a recent member of the American Chemistry Society and an advocate for chemical education and safety. My recent activities have made me known to the regional association and provided many opportunities to network with local, national and international members of the scientific community. Having seven years lab experience in industry and academia I intend to utilize my expertise to better the relationship between the ACS, academic institutions, local business and the general public. As Member-At-Large of the Section I plan on assisting in efforts to create a liaison position to the Younger Chemists Committee at regional colleges and universities for undergraduates to increase younger involvement and membership with the ACS. In addition, I propose to initiate a demonstration competition for first and second year chemistry students throughout the regional area in an effort to increase excitement about chemistry and to foster a desire to further their education.

## National Chemistry Week (NCW)

The Rochester Section and the Rochester Museum and Science Center (RMSC) hosted National Chemistry Week activities on October 27-28, 2012. This year's theme was Nanotechnology: The Smallest BIG Idea in Science. With materials from the Nanoscale Informal Science Education Network, visitors to the museum could learn about nanotechnology and actually participate in at least 15 hands-on activities. The activities included making liquid crystals, electroplating copper, learning about the periodic table, hydrophobicity of nanosand, and building models while wearing oven mitts which simulated the difficulty in building nanostructures, to name a few. Museum visitors had an opportunity to assist in building a giant carbon nanotube using black balloons, which grew to be three stories tall by the end of the day on Sunday.

The Section sponsored a contest where visitors were asked to identify the elements used to spell out **Na N O Te C H** and submit their entries to win t-shirts. Over thirty visitors submitted entries and of those thirty, six people correctly identified the elements. Deb Janes and Tim Wilson supplied kids and their adults with Celebrating Chemistry, Chem Matters, Kids Discover Chemistry, periodic tables and other ACS NCW give-aways. Museum attendance was 1165 people for the weekend, and many of these people stopped by the activity tables and spent time learning about nanoscience.

This event was successful due to the great support of over 100 volunteers from YCCs, SUNY Geneseo, Monroe Community College, Nazareth College, Rochester Institute of Technology, St. John Fisher College, University of Rochester and some RMSC volunteers. Special thanks to Calvin Uzelmeier and RMSC for their continuing support of National Chemistry Week.

As we look forward to National Chemistry Week 2013, we hope **you** will become involved with this great public outreach event.

Deb Janes and Tim Wilson

Pictures below:

