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SEAC *communications*

President's Message

Transitions

Last June, Rick McCreery called me with the news that it was time for him to hand over to me the job of President of the Society of Electroanalytical Chemistry. Following his message, a package arrived with all of the Society files, and it became clear that I had to start understanding the inner workings of the Society. Rick took us through a snow storm in Chicago and a moderate climate in Atlanta, with great symposia in each location. I hope I can follow his role and keep the Society growing. Thanks, Rick, for making it such a smooth transition, and for guiding the Society well for the past two years.

For the the last few months I have been trying to figure out how to keep the Society running as well as it has in the past. What I have discovered is that there are a large number of people who are working together to keep the Society operating smoothly. In particular, people like Joe Maloy, Jim Cox, Andy Ewing, Dan Buttry, Joe Gordon, as well as Debra Rolison, the loyal editor of this newsletter, stay on top of things and make sure they are run smoothly. A special thank you goes to Gary Christian who served as social chairman the last few years. The person with this job makes sure that rooms are available at the Pittsburgh Conference for the Society functions. Everything went very smoothly thanks to Gary. Craig Bruntlett has agreed to take his place for the next few years.

The transition of the presidency of the Society from Rick to me made me stop and consider that such transitions constantly occur around us. Although the future may diverge abruptly from the past and present course of events, we nonetheless move forward to new, exciting times. Here at UNC, also known as the southern part of heaven, we have seen both our basketball and football coaches leave within three months of each other. Both had outstanding records, and Dean Smith had become such a legend that he is probably known to all members of the Society, even those who are not basketball fans. While we all regret their leaving, my bets are that these athletic programs will continue to provide excitement for the campus. In a similar manner, I also predict that this Society will continue to expand and provide a useful forum for the exchange of scientific ideas.

As scientists, our job requires that we make transitions constantly because our experimental results are providing us with new information and an increased understanding of the system under study. Our experiments may reveal new ways to solve old problems, create new materials, or, as happens occasionally, lead us into whole new areas. I imagined all of us became electroanalytical chemists because the challenges of investigation and discovery appealed to us. However, for me it wasn't so apparent at the beginning of my scientific career how profoundly these discoveries would feed back into the next set of scientific inquiries, and change the directions that we all are exploring. One consequence of this is that the job never seems to be done. A project appears to be finished when a final report or scientific paper is prepared, but the results of the previous investigation always seem to be opening new areas that require investigation.

A clear example of this will be given at the next Pittsburgh Conference in the symposium on "Chemical Analysis in Nanoenvironments: Pushing the Frontiers." Ten years ago I considered a microliter a miniature sample, and indeed any term with the prefix micro involved a considerable scientific challenge to my way of thinking. But, advances and discoveries in a variety of areas from tiny electrodes to piezoelectric positioners to micromachining have all changed the way we routinely think of small environments. For electroanalytical chemists, nanoenvironments offer a unique set of challenges as we seek ways to measure fewer and fewer molecules. Indeed, as we approach the ultimate goal for analytical chemists, the measurement of a single molecule, I am sure new transitions

will occur in our thinking from the discoveries made in that quest, and send us off in new, exciting research directions.

Mark Wightman

Editorial

Welcome indeed to our new President, Mark Wightman! And, again, full Societal and editorial thanks to Rick McCreery for his able leadership as SEAC President from July 1995 to July 1997.

As promised and/or threatened, I am returning to the topic of incarnating *SEAC Communications* as a home page on the Web, so that a more frequently updated SEAC news site can be created. Thus hopeth your lazy editor. ("loyal editor", Mark?? Rarely has that adverb been used to describe the current editor...insurrectional, maybe...but *loyal*?!?)

The SEAC stalwarts were profoundly silent on almost all channels. Either extreme apathy reigns or the need to be Webbed is so obvious that no comment is necessary. What consensus does seem to have trickled in to me (mostly via passing and happenstance conversations) is that a Web site is a great idea and will definitely be surfed by the members, especially come those times of award nominations and the Pittsburgh Conference. A related plaint heard from several members is that one cannot always be expected to have a prior issue of *SEAC Communications* at one's fingertips (and why not, your editor demands?), so being able to call up the bookmarked SEAC home page will be a true time-saver.

I am convinced and so will take the silent eloquence of the membership to be a tacit vote of support for SEAC to venture on-line. Rather than dive headfirst into setting up the home page through a commercial provider of Web sites, I propose to accept (gratefully) Sam Kounaves' offer to evolve SEAC's status on-line by initially existing as a site hosted on one of Sam's servers at Tufts (please see Sam's E-message to me on this matter in "From the (E-) Mailbag"). At some future date, the Society may decide to establish a commercial account with an on-line provider, but at that time, we (the Society, your (virtual or real) editor) will have a far greater understanding of what does and does not work for the surfin' SEAC membership.

Sam has already blocked out the form and content of SEAC's proto home page—in fact he has set up two designs for the membership to browse and then comment back to either of us. You can find these sample home pages at: <http://electrochem.tufts.edu/seac/> ... or <http://electrochem.tufts.edu/seac2/> ... not to break any of the suspense, but I *love* the cascading SEAC on /seac/. Sam has already laid out the features that a surfer can select to browse the standard information on what SEAC does and why it exists (including the programs and awards SEAC supports). As you read this hard copy, that information should be loaded and available on the trial site. Check it out!

Comments and suggestions from the membership regarding SEAC's new home page(s) are again welcome and desired [[rolison\(at\)nrl.navy.mil](mailto:rolison@nrl.navy.mil) and/or [skounave\(at\)emerald.tufts.edu](mailto:skounave@emerald.tufts.edu)]. I plan to obtain final changes and approval of the inaugural design at the Annual Meeting of SEAC's Board of Directors at PittCon '98 (New Orleans, 1-5 March 1998). We will then officially launch onto the sea of electrons immediately after PittCon courtesy of Sam. I would still like comments from the membership on how long we should print a hard copy of the newsletter once we are on-line (one year? one issue??) As Sam has pointed out, the most natural address (www.seac.org) has been precluded due to the co-SEAC-existence of the Student Environmental Action Coalition (to be found at: www.seac.org). So, dear members, let's hear your counteroffers! I propose, to get the bidding started: www.echem-R-us.org. Sam and I look forward to hearing from you.

...and to all of SEAC: may your New Year be filled with electrons!

Debra Rolison

SEAC on the Move!

Larry Faulkner, Professor of Chemistry and Provost for Academic Affairs at the University of Illinois-Urbana (*and* 1998 recipient of SEAC's Reilly Award; see Larry's biography in the July 1997 issue of *SEAC Communications*) was elected by the Texas Board of Regents on 16 December 1997 as the 23rd President of the University of Texas at Austin. Larry expects to take office sometime between the Pittsburgh Conference and May 1. He points out that fellow SEAC member Allen Bard was on the search committee, but clearly declared his conflict of interest. Larry comments that Mary Ann and he are delighted to be taking up the challenge of leading an excellent university that holds a special place in their regard (and SEAC's).

Rich Carlin, *SEAC Communications*' roving reporter for the RAO bash in Raleigh in January (see the July issue (13-3) for Rich's thorough coverage of that event), can now update for us his mysterious TBA address: Rich has signed on as the

Program Officer of the Electrochemical S&T Program at the Office of Naval Research. FYI: [carlinr\(at\)onr.navy.mil](mailto:carlinr@onr.navy.mil)

Dave Curran, Professor Emeritus, University of Massachusetts, Amherst, recently finished his two-year tour as a rotator in the Analytical and Surface Chemistry Program at the National Science Foundation and has returned to the scene of his academic crimes. Dave is now Associate Head of the Department of Chemistry at U Mass-Amherst. One and all (except, possibly, NSF PIs) can reach him at: [curran\(at\)chem.umass.edu](mailto:curran@chem.umass.edu)

Joan Fuller, new to most of you, but often seen as the trusting (and foolhardy sidekick of Rich Carlin) has abandoned molten salt electrochemistry (for awhile, anyway) and jumped headfirst into the thrilling world of science policy. Joan was selected as an American Association for the Advancement of Science DoD Science and Technology Policy Fellow and is assigned to the Office of the Air Force Deputy Assistant Secretary (Science, Technology and Engineering). FYI: [fullerjo\(at\)af.pentagon.mil](mailto:fullerjo@af.pentagon.mil)

Larry Bottomley (Georgia Tech) is spending a sabbatical with Rich Colton and Gil Lee at the Naval Research Laboratory where he's learning how to unzip individual DNA molecules and measure the force required to do so. Contact him at 202-404-2550 or [lawrence.bottomley\(at\)chemistry.gatech.edu](mailto:lawrence.bottomley@chemistry.gatech.edu) for further details.

Jeffrey Long (Ph.D., August 1997, The University of North Carolina) has electromigrated from Royce Murray's group (and Tar Heel heaven) to join Debra Rolison's group at the Naval Research Laboratory as an NRC Post-doctoral Fellow. He can be reached at [jwlong\(at\)ccf.nrl.navy.mil](mailto:jwlong@ccf.nrl.navy.mil)

Michele Anderson (Ph.D., December 1997, The University of Arizona) has tunneled from Neal Armstrong's group (and saguaro heaven) to join Debra Rolison's group at the Naval Research Laboratory as an ASEE-NRL Post-doctoral Fellow: [manderso\(at\)ccf.nrl.navy.mil](mailto:manderso@ccf.nrl.navy.mil)

Charles N. Reilley Award Nominations (Still) Solicited

Nominations for the 1999 C.N. Reilley Award, sponsored by Bioanalytical Systems, Inc., are again solicited. Nominations should include a letter of nomination describing the individual's significant contributions to electroanalytical chemistry, at least two seconding letters of support, and a curriculum vitae for the individual. All nomination materials will be retained by SEAC.

Once nominated, any individual will be considered for the Reilley Award for three years without being renominated. The submission of any additional supporting information or a renomination is welcome at any time, but the decision on the 1999 Award will be based upon the material that is available to the Award Committee on February 27, 1998.

For further information, please contact Dan Buttry at:

voice: 307-766-6677

FAX: 307-766-2807 —or—

email: [buttry\(at\)uwyo.edu](mailto:buttry@uwyo.edu)

All nomination materials should be sent to:

Professor Dan Buttry
Department of Chemistry
University of Wyoming
Laramie, WY 82071-383

Previous Reilley Awardees

1984 **Allen J. Bard**

University of Texas

1985 **Ralph N. Adams**

University of Kansas

1986 **Fred C. Anson**

California Institute of Technology

1987 **Robert A. Osteryoung**

North Carolina State University

1988 **Royce W. Murray**

University of North Carolina

1989 **Theodore Kuwana**

University of Kansas

1990 **Jean-Michel Saveant**

Université de Paris VII

1991 **Stanley Bruckenstein**

SUNY—Buffalo

1992 **Stephen Feldberg**

Brookhaven National Laboratory

1993 **Dennis Evans**

University of Delaware

1994 **Barry Miller**

Case Western Reserve University

1995 **William Heineman**

University of Cincinnati

1996 **R. Mark Wightman**

University of North Carolina

1997 **Dennis Johnson**

Iowa State University

1998 **Larry Faulkner**

University of Illinois

SEAC Young Investigator Award Nominations (Still) Solicited

Nominations for the 1999 SEAC Young Investigator Award, sponsored by Ensman Instruments, are again solicited. Potential recipients must be within seven years of obtaining their Ph.D. or other terminal degree at the time of nomination. Candidates may be nominated by any member of SEAC. Nominations should include a letter of nomination describing the individual's promise in the area of electroanalytical chemistry, at least one seconding letter of support, and a curriculum vitae for the individual. All nomination materials will be retained by SEAC.

Once nominated, any individual will be considered for the SEAC Young Investigator Award for three years without being renominated. The submission of any additional supporting information or a renomination is welcome at any time, but the decision on the 1999 Award will be based upon the material that is available to the Award Committee on February 27, 1998.

For further information, please contact Dan Buttry at:

voice: 307-766-6677

FAX: 307-766-2807 —or—

email: [buttry\(at\)uwyo.edu](mailto:buttry(at)uwyo.edu)

All nomination materials should be sent to:

Professor Dan Buttry
Department of Chemistry
University of Wyoming
Laramie, WY 82071-3838

Previous Young Investigator Awardees

- 1993 **Leonidas Bachas Werner Kuhr**
University of Kentucky University of California, Riverside
- 1994 **Adrian C. Michael**
University of Pittsburgh
- 1995 **Mark Anderson**
Virginia Polytechnic Institute
- 1996 **Louis A. Coury**
Duke University
- 1997 **Ingrid Fritsch**
University of Arkansas
- 1998 **Greg Swain**
Utah State University

International Kudos to SEAC member Royce Murray

Royce Murray, Kenan Professor of Chemistry at the University of North Carolina, has gone beyond gold and platinum to go palladium. Royce was the 1997 recipient of the Electrochemical Society's Olin Palladium Medal presented this September at the joint meeting of the International Society of Electrochemistry and the Electrochemical Society in Paris, France. His talk on "Solid-State Voltammetry" was standing room only and the reception in his honor immediately following was further distinguished by a brief glimpse of Royce's real Palladium Medal (of real palladium) and the for-show replica.

Among a sampling of his many awards, Professor Murray has received the American Chemical Society's Awards in Electrochemistry in 1990 and Analytical Chemistry in 1991, the Electrochemistry Group Medal of the Royal Society of Chemistry, and most prominently, SEAC's Reilley Award in 1988. He is a Fellow of the American Academy of Arts and Sciences, the American Association for the Advancement of Science, the American Institute of Chemists, and the Electrochemical Society. He was elected as a member of the National Academy of Sciences in 1991. He further serves the chemical community as editor of *Analytical Chemistry*, a guise in which many of us have stumbled over him!

...Many congratulations, Royce...and an excellent choice of venue to receive the Palladium Medal!...(many of us felt Royce's reception was also noteworthy for the presence of crudités...the first sign of vegetables many of us had seen during our stay in Paris...thank you, Royce!)

Items of Note, Noted in Passing

—A Scene from Paris—

As a reminder that some segments of the electroanalytical chemistry community cherish the traditions of their elders in all their WETS glory, your editor reports on a soupçon of the ISE-ECS meeting in Paris.*

Chuck Martin (a.k.a. Moondoggie) and your editor finally got a Parisian bartender to make a PROPER dry martini!! Charles was nearly in despair on this noble quest—he had been in Europe almost three weeks (between time in Venice, the French wine country, Germany, and Paris) and had yet to be served a martini that was not drenched in vermouth. Asking in your editor's best French for *quatre martinis, très sec—sans vermouth—s'il vous plait* only elicited the discouraging comment from the waiter that that was not a martini! Fortunately this bar (on the 33rd floor of Le Concorde La Fayette) had a manager for whom the (desperate) customers were indeed right. Chuck and I recommend it for your next trip to Paris...but be sure to ask for Christian or you will *not* be handed a martini that is homeopathic in vermouth!

WETS* = *Western Electroanalytical Theoretical Society*

...A most enjoyable cocktail hour...a mere 78 FF (\$13) per martini...but...what a view of the Tour Eiffel!!!

—Scenes from après-Paris—

...well...your editor indulged in something completely different after her two French conferences! (ISE-ECS in Paris and the 5th International Symposium on Aerogels in Montpellier) Hmmm. How to say this? I'm lucky to be alive. Of course it was my stupidity/stubbornness that created the problem. I jumped off a (moving) French train. sigh. one of these days though my luck will not be able to counter the magnitude of my stupidity. I have a feeling I am more than one or two into my nine lives.

This latest act should complete the jumping+Debra+Pons' trilogy (I hope). I broke my foot before the January 1987 GRC on Electrochemistry when I was jumping rope (barefoot) with Stan and Sheila Pon's then-10-year old daughter Joyce (and for those of you with a calendar in your memory banks...that was the last GRC at the Miramar...sob...try hobbling on sand with a cast on!). I followed that jumping episode with a crash-landing when I jumped out of a cherry tree in the Pons' Utah backyard in 1988 to general bruising and abrading (and the dive did not even rate scores of 10!)

This time Sheila was meeting me at a small train station in Provence and my luggage and I were ready and waiting at the train door. I saw her as the train rolled in, but couldn't get the door open...naturally, even though I was at the door on the side I had entered in Marseilles and I could see Sheila and could see other people getting off that side of the train, we train-entrapped were supposed to exit on the *other* side! Ever stubborn, I got the door open, eventually, but by then the train had started to roll out of the station (fortunately it was *not* a TGV)...so I jumped, luggage and all. Well...it seemed like a good idea at the time. (it wasn't.) I *am* going to recommend to SNCF that they switch to goosedown mattresses between the tracks rather than those big, jagged chunks of gravel they prefer.

The head wounds bled profusely, as head wounds do, which frightened dear Sheila half to death (I evidently came up off the gravel (but not immediately) laughing, but lucid) and I had new bumps for the phrenologists and a left side bruised and abraded beyond the ability to sleep on and a wrenched right knee and a sprained left ankle (try getting out of the driver's side of a sports car with that particular knee/ankle combination out of commission!) My blackened left eye drew surprisingly little comment, however.

But I had a pleasant two days on Stan and Sheila's farm (even though Stan was *not* amused at my exotic way to disembark, he had some superb French champagne on ice when I limped in the door from the train station), and I seem to be on my way to being French legend. And I was ambulatory...witness carting my luggage about Nice and JFK three days after the *plus grande deraillement*!!

...so put train-jumping into the category of things-not-to-do-after-ECS meetings. Hmmm...maybe it's the ECS meeting...I broke my left arm during a white-water rafting trip immediately after the 1982 Spring ECS meeting in Montréal...looks like a trend to me!...

Plan your attendance accordingly! Part One.

**Gordon Research Conference on Electrochemistry
18-23 January 1998, Ventura, CA**

Jeanne Pemberton (pembertn@u.arizona.edu) reminds us that electrochemists sneer in the face of El Niño and she expects to see one and all at the Doubletree in Ventura for a romping good discussion on breaking work on electrochemistry with a materials or biological flavor. Romping in the storm-tossed breaking waves is optional. The program follows and can also be found as part of the GRC Web site (<http://www.grc.uri.edu>).

Electrochemistry

Jeanne E. Pemberton, Chair
January 18-23, 1998/Doubletree Hotel, Ventura, CA

Sunday Evening: Materials 1

Discussion Leader: Geraldine L. Richmond (*University of Oregon*)

- Debra Rolison (*Naval Research Laboratory*)—"Aerogels: Composites of Being and Nothingness"
- Mark Thompson (*University of Southern California*)—"Photoelectrochemical Thin Films Built from Molecular Materials"

Monday Morning: Biology 1

Discussion Leader: Fred M. Hawkrige (*Virginia Commonwealth*)

- Naotoshi Nakashima (*Nagasaki University*)—"Structure and Regulated Electrochemistry of Self-Organized Fullerene Lipid Films on Electrodes"
- Susan Lunte (*University of Kansas*)—"Applications of Capillary Electrophoresis / Electrochemistry to In Vivo Monitoring and Drug Screening"
- Michael Natan (*Penn State University*)—"Optical and Electrical Properties of 2-D and 3-D Arrays of Protein-Coated Colloidal Au Particles"

Monday Evening: Materials 2

Discussion Leader: Charles R. Martin (*Colorado State University*)

- John Facci (*Xerox Corporation*)—"Charge Transport in Insulating Redox Polymers"
- James Cowin (*Pacific Northwest Laboratory*)—"Soft Landing of Ions to Recreate Electrochemical Double Layers in UHV"

Tuesday Morning: Materials 3

Discussion Leader: Neal R. Armstrong (*University of Arizona*)

- Maryanne M. Collinson (*Kansas State University*)—"Structure and Chemistry of Silicate Materials Prepared by the Sol-Gel Process"
- Robert Forster (*Dublin City University*)—"Electrochemistry of the Excited State"
- Curtis Shannon (*Auburn University*)—"Atomic Level Probes of Electrosynthesized Materials"

Tuesday Evening: Biology 2

Discussion Leader: Therese M. Cotton (*Iowa State University*)

- Frieder Scheller (*Universität Potsdam*)—"Protein Electrochemistry Towards Sensorics"
- James Q. Chambers (*University of Tennessee*)—"Nucleotides and Oligodeoxynucleotides Bearing Electroactive Groups: Voltammetric Probes for Nucleic Acid Hybridization?"

Wednesday Morning: Materials 4

Discussion Leader: Richard M. Crooks (*Texas A&M University*)

- Carol Korzeniewski (*Texas Tech University*)—"Surface Structural Effects on Organic Oxidation Pathways Probed by Electrochemical, Spectroscopic and Chromatographic Techniques"
- Nicholas Abbott (*UC-Davis*)—"Principles for Active Control of Amphiphilic Molecules using Electrochemical Methods"

· Lori Vermeulen (*Southern Illinois University*)—"Electrochemical Synthesis of Polymers with Inorganic Backbones"

Wednesday Evening: Open Session— Short Talks by Conference Participants

Discussion Leader: James McIntyre (*Dow Chemical*)

Thursday Morning: Biology 3

Discussion Leader: Mark Wightman (*University of North Carolina*)

· Robert Kennedy (*University of Florida*)—"Electrochemical Probes for Biomedical Analysis and Discovery"

· John Cullison (*ESA, Inc.*)—"Critical Development Aspects of the LeadCare Electrochemical Blood Lead Diagnostic Testing System"

· Mario Rivera (*Oklahoma State University*)—"Applications of Electrochemistry and NMR Spectroscopy to the Study of Structure-Activity Relationships in Heme Proteins: Cytochrome b5 as a Case Study"

Thursday Evening: Materials 5

Discussion Leader: Joseph G. Gordon (*IBM-Almaden*)

· Ilan Benjamin (*UC-Santa Cruz*)—"Molecular Dynamics Studies of Structure and Dynamics at Electrochemical Interfaces"

· Israel Rubinstein (*Weizmann Institute of Science*)—"Alkylthiol Monolayers on Gold: What else is New?"

—*El Niño...okay, Jeanne...but just hold off on another earthquake!*—

Plan your attendance accordingly! Part Deux.

Symposium on Nano-etc. at the Spring ACS Meeting, Dallas

Henry White (University of Utah; [white\(at\)atlas.chem.utah.edu](mailto:white(at)atlas.chem.utah.edu)) and Debra Rolison (Naval Research Laboratory; [rolison\(at\)nrl.navy.mil](mailto:rolison(at)nrl.navy.mil)) wish to announce they are despondent: the response to the call for papers for our Symposium on *Electrochemistry at Nanostructured Materials* (215th Meeting of the American Chemical Society; Dallas TX, 29 March-2 April 1998) was *way* too good...we were in fear of running a 5-day symposium.

Instead, seven half-day sessions and one stuffed poster session are planned. Highlights include keynote addresses by Nick Abbott, Bruce Dunn, Joe Hupp, Carol Korzeniewski, Michael Natan, and George Whitesides (not necessarily in that order). Y'all come!

Monday morning, 30 March 1998—*Nanostructures and Electrochemistry*

Debra Rolison and Henry White, presiding

08:55 *Introduction*: Debra Rolison and Henry White

09:00 **George Whitesides**, Rebecca Jackman, Tao Deng, Junmin Hu, Joe Tien, Wilhelm Huck, Noo-Li Jeon, Olivier Schueller, and Scott Britain (*Harvard University*)—Fabrication of Small Structures for and by Electrochemistry

09:20 **Jay Switzer**, Chen-Jen Hung, Ling-Yuang Huang, Eric R. Switzer, Teresa D. Golden, and Eric W. Bohannon (*University of Missouri-Rolla*)—Electrochemical Self Assembly of Copper/Cuprous Oxide Layered Nanostructures

09:40 **Charles Martin**, Ellen Fisher, Charles Patrissi, Guangli Che, and Kshama Jirage (*Colorado State University*)—Template-Synthesized Nanomaterials in Electrochemical Energy Production

10:00 **Li Sun** (*Texas A&M University*)—Single-Pore Membranes as Models for Studying Molecular Transport in Nanoscale Domains

10:20 Break

10:35 **Hiroshi Yoneyama**, D. Oyamatsu, M. Nishizawa, and S. Kuwabata (*Osaka University*)—Underpotential Deposition of Silver onto Gold Electrodes Covered with Self-Assembled Monolayers of Alkanethiols

10:55 **Robin McCarley**, Sonya L. Caston, Paul Moberg, John S. Peanasky, and K. Cory Schomburg (*Louisiana State University*)—Nanostructures Constructed from Molecular Assemblies

11:15 **Anna Brajter-Toth**, F. Ebrahimi, Q. Zhai, and D. Kong (*University of Florida*)—Electrochemical Fabrication of Multilayered Cu-Ag and Cu-Ni Nanostructures

11:35 **Oliver Chyan**, P.S. Gao, J.J. Chen, T. Ponnuswamy, P. Goodwill, and S. Chhim (*University of North Texas*)—The Mechanism of Discrete Nanometal Deposition on Silicon and Diamond Surfaces

Monday afternoon, 30 March 1998—*Nanostructures and Power Sources*

Robert Nowak (*DARPA*) and Charles Martin (*Colorado State University*), presiding

1:40 **Bruce Dunn**, Wei Cheng, Winny Dong, and John Harreld (*UCLA*)—Synthesis and Characterization of Transition Metal Oxide Aerogels

2:20 **Ellen Fisher**, C.R. Martin, and G. Che (*Colorado State University*)—Chemical Vapor Deposition-Based Template Synthesis of Nanostructured Graphitic Carbon and Metal Nanocluster-Filled Carbon Ensemble Materials

2:40 **Noboru Oyama**, Q. Chi, F. Matsumoto, O. Hatozaki, and T. Tatsuma (*Tokyo University*)—Electrochemical Interaction of Organosulfur at Cu Electrode Surface

3:00 **Daniel Buttry** and Eiichi Shoji (*University of Wyoming*)—New Redox Active Intercalation Materials Based on Vanadium Pentoxide and Organic Disulfides

3:20 Break

3:35 **Carol Korzeniewski**, C.S. Kim, D.J. Tarnowski, and A. Dailey (*Texas Tech University*)—Effects of Surface Nanoscale Terraces on Molecular Adsorption and Reactivity

3:55 **Ralph Nuzzo**, John R. Shapley, Anatoly I. Frenkel, Michael S. Nashner, and Charles W. Hills (*University of Illinois-Urbana*)—Phase Dynamics and Rate/Structure Correlations in Electrocatalytic Nanoclusters

4:15 **Jeffrey Long**, Karen E. Swider, Celia I. Merzbacher, and Debra R. Rolison (*Naval Research Laboratory*)—Ruthenium Dioxide-Impregnated Aerogels as High Surface Area Electrode Materials

4:35 **Andrea Russell**, Rebecca J. Mathew, and Stephanie Maniguet (*University of Southampton*)—Dynamic EXAFS of Carbon-Supported Pt Fuel Cell Electrocatalysts

Tuesday morning, 31 March 1998—*Golden Nanostructures*

Nick Abbott (*UC-Davis*) and Henry White (*University of Utah*), presiding

08:40 **David Schiffrin**, Mathias Brust, Sarah Horswell, Theo Baum, and Donald Bethell (*University of Liverpool*)—Electrochemistry of Nanostructured Systems

09:00 **Royce Murray**, Shao-wei Chen, Jeremy J. Pietron, Roychelle S. Ingram, Peter Wuelfing, Stephen J. Green, and Michael J. Hostetler (*University of North Carolina*)—Electron Transfers at Nanometer-Sized Monolayer Protected Metal Clusters

09:20 **C.-R. Chris Wang**, Ser-Sing Chang, Chien-Liang Lee, and Wei-Cheng Lai (*National Chung Cheng University*)—Electrochemical Synthesis of Gold Nanorods

09:40 **Michael Natan**, Steven L. Botsko, David J. Pena, Brian D. Reiss, L. Andrew Lyon (*Pennsylvania State University*) and Todd M. McEvoy, John N. Richardson (*Shippensburg University*)—Electrochemistry at Nanoparticle Assemblies: How to Make a Perfectly Good Electrode out of Colloidal Au, a Glass Slide, and Some Organic or Inorganic Molecules

10:20 Break

10:35 **F.-R. Frank Fan** and Allen J. Bard (*University of Texas-Austin*)—Considerations in Scanning Electrochemical Microscopy at Nanometer-Size Electrodes

10:55 **Daniel Feldheim**, Louis C. Brousseau, III, Stella Marinakos, and James P. Novak (*North Carolina State University*)—Toward Truly Single Redox Event Electrochemistry: Experimental and Theoretical Studies of a Chemical Single Electron Transistor

11:15 **Masashi Kunitake**, U. Akiba, and K. Itaya (*Kumamoto University*)—*In-situ* STM Study of Molecular Layers of Metal-Free and Metal-Incorporated Porphyrins on Iodine-Modified Metal Surfaces

11:35 **Katsuhiko Nishiyama**, S. Tahara, and I. Taniguchi (*Kumamoto University*)—Structural Change of Self-Assembled Monolayer of Anthraquinone Derivatives at Gold and Silver Electrodes

Tuesday Afternoon, 31 March 1998—COLL and PHYS Award Addresses

Tuesday Evening, 31 March 1998—COLL Posters: *Electrochemistry at Nanostructured Materials*

Henry White (*University of Utah*) and Debra Rolison (*Naval Research Laboratory*), presiding

Lane Baker, H. Tokuhisa, R.F. Peez, and R.M. Crooks (*Texas A&M University*)—Characterization of Bulk and Surface-Confined Electroactive Dendrimers

Carlos Cabrera and T. Ohmori (*University of Puerto Rico*)—Surface Modification of MoSe₂ in Solution Using a Combined Technique of STM Indentation and Electrochemical Etching

Joseph Campbell and R.M. Crooks (*Texas A&M University*)—The Influence of Self-Assembled Monolayers on the Morphology of Electrodeposited Metals

K.L. Cheng and Khalid R. Tamsamani (*University of Missouri-Kansas City*)—Challenges to Conventional Redox Mechanisms of Calomel and Ag/AgCl Reference Electrodes

Daniel Dermody, Robert F. Peez, David E. Bergbreiter, and Richard M. Crooks (*Texas A&M University*)—Synthesis and Electrochemical Characterization of Surface-Grafted Poly(acrylic acid)/Beta-Cyclodextrin Films Modified with Polymer Filter Layers

Maurie Garcia, L.A. Baker, and R.M. Crooks (*Texas A&M University*)—Preparation and Characterization of Dendrimer-Gold Colloid Nanocomposites

Yizhu Guo and Ana R. Guadalupe (*University of Puerto Rico*)—Transmission Electron Microscopy Does More for Nanoscience and Nanotechnology

W. Jiang, Z. Yue, C.U. Pittman, S. Gardner, L. Wang, and H. Toghiani (*Mississippi State University*)—Surface Properties of Electrochemical Oxidized Carbon Fibers

Melissa Mitchell, Keith J. Stevenson, and Henry S. White (*University of Utah*)—Oxidative Adsorption of n-Alkanethiolates at Mercury. The Dependence of Adsorption Free Energy on Chain Length

Takuya Nakanishi, Bunsho Ohtani, and Kohei Uosaki (*Hokkaido University*)—Fabrication and Characterization of Semiconductor-Particle Monolayers Attached on a Self-Assembled Monolayer of Alkanedithiol

Debra Rolison and Carol A. Bessel (*Naval Research Laboratory*)—Dispersed Nanocrystallite Electrocatalysts: How to Divorce the Reactor Electrode from the Catalyzed Electron Transfer Reaction

Rory Uibel, David W. Hatchett, Keith J. Stevenson, Joel M. Harris, and Henry White (*University of Utah*)—Electrochemical and SERS Measurements Used to Determine The Structure and Free Energy of Adsorption of n-Alkanethiolates

Shen Ye, Hideo Naohara, and Kohei Uosaki (*Hokkaido University*)—Adsorption and Reduction of Platinum and Palladium Complexes on Gold Single Crystal Electrodes

Francis Zamborini and R.M. Crooks (*Texas A&M University*)—Selective Nanoscale Electrochemical and Chemical Reactions Under an Electrochemical Scanning Tunneling Microscopy Tip

M. Zhao, H. Tokuhisa, Y. Liu, R.M. Crooks, and D.E. Bergbreiter (*Texas A&M University*)—pH-Switchable, Ultra-thin Permselective Membranes Based on Surface-Confined, Dendrimer-Containing Monolayers and Multilayers

Wednesday morning, 1 April 1998—*Nanostructured Semiconductors*

Chris Chidsey (*Stanford University*) and Andrew Hillier (*University of Virginia*), presiding

09:00 **Joseph Hupp**, Suzanne Belanger, and Robert Slone (*Northwestern University*)—Electrochemical Interrogation of Selective Molecular Transport through New Nanoporous Inorganic Thin-Film Materials

09:20 **Paul Alivisatos** (*University of California-Berkeley*)—Electrical Characteristics of Single Semiconductor Nanocrystals

09:40 **N. Papageorgiou** and Michael Grätzel (*École Polytechnique Fédérale, Lausanne*)—Nanocrystalline Energy Conversion and Storage Devices

10:00 **Gerald Meyer**, Fereshteh Farzad, Craig A. Kelly, and David Thompson (*Johns Hopkins University*)—Charge Transfer, Recombination, and Transport in Sensitized, Nanocrystalline Titanium Dioxide Films

10:20 Break

10:35 **Reginald Penner**, Sasha Gorer, and Matt Anderson (*University of California-Irvine*)—A Hybrid Electrochemical/Chemical Synthetic Route to Optically Intrinsic and Epitaxial Cadmium Sulfide Nanocrystallites on Graphite

10:55 **John Texter** and Mark Lelental (*Eastman Kodak*)—Network Formation in Nanoparticulate Tin Oxide-Gelatin Thin Films

11:15 **Irina Shiyanovskaya** and Maria Hepel (*SUNY-Potsdam*)—Photosensitization of Nanostructured Transition Metal Oxide Films

11:35 **Curtis Shannon**, B. Edward Boone, Anthony Gichuhi, Xiaohui Yue, Hong Yin, and Igor Nicić (*Auburn University*)—Toward Band Gap Engineering in Electrosynthesized Films and Nanostructures

Wednesday afternoon, 1 April 1998—*The Soft Side of Nanostructures*

Reg Penner (*UC-Irvine*) and Jerry Meyer (*Johns Hopkins University*), presiding

1:40 **Nicholas Abbott**, Benedict S. Gallardo, Nihal Adoygan, and Doyle E. Bennett (*University of California-Davis*)—Electrochemical Control of Amphiphilicity: Ferrocenyl Surfactants

2:20 **David Allara** and K. Seshadri (*Pennsylvania State University*) and A. Guiseppe-Elie (*ABTECH Scientific*)—Electrochemistry at Polymethylene Nanocluster-Covered Gold Surfaces

2:40 **Richard Crooks**, Mingqi Zhao, and Li Sun (*Texas A&M University*)—Electrocatalysts Based on Dendrimer-Confined, Nanoscopic Metal Clusters

3:00 **Hector Abruña** (*Cornell University*)—Electrochemical, EQCM, and AFM Studies of Redox-Active Dendrimers on Electrodes

3:20 Break

3:35 **Eric Stuve**, T.D. Pinkerton, and D.L. Scovell (*University of Washington*)—On the Electrochemical Response of Water in High Surface Electric Fields

3:55 **Andrew Hillier** (*University of Virginia*) and Allen J. Bard (*University of Texas-Austin*)—Nanometer-Scale Probing of Diffuse Double Layer Forces at Electrode Electrolyte Interface Using the Atomic Force Microscope

4:15 **Johna Leddy**, Sudath Amarasinghe, Lois A. Zook, and Shelley Minter (*University of Iowa*)—Magnetic Microstructures in Ion Exchange Polymers

4:35 **Chris Chidsey**, J. Cheng, D. Robinson, R. Cicero, C. Barrelet, (*Stanford University*)—Electron-Transfer Kinetics through Alkyl Monolayers Covalently Bonded on Si(111)

Thursday Morning, 2 April 1998—*Nanostructures in Electroanalysis and Biology*

Johna Leddy (*University of Iowa*) and Dick Crooks (*Texas A&M University*), presiding

09:00 **Daren Caruana**, T. de Lumley-Woodyear, C.N. Campbell, and A. Heller (*University of Texas-Austin*)—Enzyme-Amplified Amperometric Detection of Oligonucleotide Hybridization on a Microelectrode

09:20 **Scott Glazier**, D.J. Vanderah, and A.L. Plant (*NIST*)—Electrochemical Characteristics of Hexaoxathiol Monolayers and Phospholipid/Hexaoxathiol Supported Bilayers

09:40 **Yuri Lvov**, Zhongqing Lu, and James F. Rusling (*University of Connecticut*) and John B. Schenkman (*University of Connecticut Health Center-Farmington*)—Protein Film Architecture: Layer-by-Layer Electrostatic Assembly of Oppositely Charged Proteins and Polyions and Their Direct Electrochemistry

10:00 **Isao Taniguchi**, M. Yoshida, R. Kiyoshima, and S. Yoshimoto (*Kumamoto University*)—Cytochrome c Electrochemistry on Pyridine Thiol Modified Single Crystal Gold Surfaces

10:20 Break

10:35 **Maryanne Collinson**, Hanming Wang, and Pedro Zambrano (*Kansas State University*)—Electrochemical Characterization of Nanostructured Materials Prepared by the Sol-Gel Process

10:55 **Wendy Baker** and R.M. Crooks (*Texas A&M University*)—Characterization of Nanometer-Scale Microelectrode Arrays Prepared From Self-Assembled Monolayers

11:15 **Ignacio Villegas** and Y. Li (*University of New Mexico*)—Infrared Spectroscopic Evidence of Cation-Anion Interactions at Electrochemical Interfaces

11:35 **Kohei Uosaki**, Shen Ye, and Chikara Ishibashi (*Hokkaido University*)—Anodic Dissolution of Gold Single Crystal Electrodes in Acid Solution Containing Chloride Ion

Thursday Afternoon, 2 April 1998—*The Next Generation Looks at Nanostructures*

Maryanne Collinson (*Kansas State University*) and Debra Rolison (*NRL*), presiding

1:40 **Jodie Conyers** and Henry S. White (*University of Utah*)—Solvent Isotope Effects on the Electrochemical Deposition of Sulfide Adlayers on Ag

2:00 **Andrea Wells** and J.T. McDevitt (*University of Texas-Austin*)—Probing the Electrochemical Characteristics of Surface-Modified Yttrium Barium Copper Oxide (YBa₂Cu₃O₇)

2:20 **Carlos Cabrera** and E.R. Fachini (*University of Puerto Rico*)—X-ray Photoelectron Spectroscopy of Ru₂(CO)₉(MeCN)₃-Modified Pt Surfaces: Method to Prepare Pt/Ru Catalytic Surfaces

2:40 **Rosana Carone**, R. Bertazzoli, and M.F.B. Souza, (*Universidade Estadual de Campinas*)—Nucleation and Growth of Chromium from Dilute Solutions of Cr(VI) on Vitreous Carbon Surface

3:00 **Ellen Chen** (*FDA*) and Harry L. Pardue (*Purdue University*)—Fabrication and Characterization of Novel Amperometric Biomimetic Enzyme Sensors

3:20 Break

3:35 **Michele Anderson**, Catherine Morris, Celia Merzbacher, and Debra Rolison (*Naval Research Laboratory*)—Colloidal Gold Aerogels: Their Synthesis, Characterization, and Properties

3:55 **Louis Brousseau**, J.P. Novak, E.M. Marinakos, and D.L. Feldheim (*North Carolina State University*)—Molecular Templates of Gold Nanoparticle Superstructures

4:15 **Krishnan Rajeshwar** and N.R. de Tacconi (*University of Texas-Arlington*)—Metal/Semiconductor Nanocomposite Films for Photoelectrochemical Applications

4:35 **Henry White** and Bradley D. Bath (*University of Utah*) and Eric R. Scott (*ALZA, Inc.*)—Imaging Electroosmotic Flow Across Skin Using SECM

...*Be there. Think big about small.*

Special Exclusive Report!

Keith Stevenson, a recent Ph.D. out of Henry White's group at the University of Utah reports the following from the relatively safe distance of his post-doctoral berth with Joe Hupp at Northwestern University—**Adventures with Horseshoe Henry:**

Those of you who know Henry White know that he likes adventure. His quest for adventure, however, can sometimes get him into trouble. So much so, that he has officially designated a member of his research group as the CARP (commissioned advisor rescue person). This appointment came about from Henry's frequent need to be rescued from his ambitious adventures. I'm sure some of you have heard about (if not personally experienced with him) at least one of these events. For instance, have you heard the infamous Alta ski story where Henry sprained his back (on the first run of the day) and had to be towed down the hill on a body sled by two members of the ski patrol?

At Debra' request, I have been asked to relay yet another adventure of Henry White, one recently completed with his research group to the mountains of Utah. To be concise, I will tell you that this trip possessed all the essential components of a good group adventure. We suffered thirst, exhaustion, and near suffocation from the stench of a dead cow. We endured assault from the elements (rain, hail, lightning, and smoke) and fought off attacks of fish too overly eager to be caught. Fishing and camping gear got burned, broken, lost, and forgotten. People fell into raging streams or tripped over rocks. And everyone got muddy, wet and complained incessantly.

At the suggestion of Henry, we undertook a backpacking/fishing trip to Farmers Lake which is situated in the 460,000-acre High Uintas Wilderness Area about 100 miles NE of Salt Lake City. Initially, the trip seemed simple enough, a little hiking uphill (supposedly only 8 miles) and then a few days of camping and fishing. However, the ruggedness and remoteness of this area, with elevations ranging from 8,000 to over 13,000 feet, provided ample opportunity for one to get into trouble, if not lost. In fact, under Henry's navigation, we managed to get lost even before reaching the trailhead. Fortunately, at least one female, Melissa Mitchell, had come along. Recognizing the male's innate inability to stop and ask for directions, she forced us to stop and ask the local gas station attendant for the correct route.



Yes, Henry...we've seen *that* hat before!

Having safely reached the Swift Creek trailhead, we started up the trail to Farmers Lake, soon to realize that it was going to be a challenge to reach the lake before dark, since a storm had blown through the night before leaving the trail wet and muddy. Later, after reading the trail guide, (which, by the way, is better to read before the trip) I was to find out that we had chosen one of the most demanding hikes. The trail guide indicated that this hike had an overall 2800-ft elevation gain with a 1000-ft rise in the first 1.5 miles. For some of us the hiking was easier than for others, depending upon how much stuff you had packed. Unbeknownst to everyone, the speediest hiker, Jay, had nothing more than a sleeping bag and a pillow stuffed in his pack. Henry, though, had come prepared, carrying enough to equip a small RV. It wasn't long, however, before we were all silently reciting the exhausted hiker's mantra. "Oh, lord if you pick 'em up, I promise to put 'em back down." For brevity's sake, I will tell you that we never made it to the anticipated destination the first day. Too exhausted from the elevation gain and rocky terrain, we camped on a mud bog near the shores of a drainage basin named Deer Lake.

Early the next morning we awoke to a clear, sunny day, ate a gourmet breakfast of instant oatmeal, and left our camp behind to fish Farmers Lake. As it turned out, the lake was only two more miles up the trail, with a series of smaller, shallower lakes in between. As we were hiking, I noticed Henry's curious habit of picking up interesting rocks and other discarded objects. "They're souvenirs, to remember the trip by," he said. "That's just what he needs is more weight in his overloaded pack," I thought. By the time, we had arrived at Farmers Lake, Henry had found two rusty horseshoes that he had tied to his belt. I guess he figured they would bring him good luck with the fishing. Later, they were to be potentially fatal to his existence.



Horseshoe Henry, contemplating the free vs. solvated electron

It has been stated that, there is a fine line between fishing and just standing on the bank looking like an idiot. Assuredly, if any other hikers had stumbled upon this band of fishing fools, they would have concluded the latter.

Now, for those of you who fish, you know that fishing with your buddies is a competitive sport. The goal is to out-fish them, no matter what the cost, even if it requires taking life-threatening actions to find the perfect fishing spot. The classic move, which is the one Henry pulled, is to be first to fish and then as others catch up, you quickly run ahead again, being the first to fish a new spot. What this does, is to distract the others from catching fish, as they concentrate more on strategically outmaneuvering you. It has also been said, that there are two kinds of fishermen, those who fish for sport, and those who catch fish. Luckily, for the sake of dinner that night, we had both kinds in our group. I'll let you draw the conclusions, but out of the six fishermen, two people who had barely fished before, Jay Conyers and Derek Kosnak, caught 11 of the 14 fish. Henry, with years of claimed fishing skill, caught zero.

Before I end, I will describe how Henry subconsciously chose to commemorate the 100th anniversary of J. J. Thomson's discovery of the electron. Earlier, I mentioned that Henry had fastened two horseshoes to his belt and that this was to be potentially life-threatening. What I didn't mention was the afternoon lightning and hail storm that blew over the lake while we were fishing. Being at nearly 11,000 feet, we were just above the timberline, and if you know anything about lightning, you know that it likes to strike the tallest, most conductive, object. Henry's problem was that, while trying to outmaneuver the rest of us for the perfect fishing spot, he had found himself positioned high in the middle of a barren boulder field on the far side of the lake. As the fulmination occurred, we watched Henry, the large human cathode, dance a commemorative jig to safety. Almost in effigy of all electrochemists who borrow so generously from the electron well.



The White group (L-to-R: Jay Conyers, Solomon Basame, Derek Kosnak, Keith Stevenson, and HSW) and soon-to-be sushi

If you're interested in adventures of this type, contact Henry. Word is that in his next adventure he will journey into the realm of snow camping. Stay tuned, I'm sure we are bound to hear something about this next catastrophe...I mean...adventure.

—Henry...Henry...you were supposed to celebrate J.J. Thomson's discovery of the electron, not Ben Franklin's discovery of atmospheric electricity!!—

From the (E-)Mailbag

—In comments on last issue's request for membership feedback re: creating a SEAC home page—

In message Fri, 28 Nov 1997 13:55:51 -0500, Samuel Kounaves writes:

Subject: SEAC/PITTCON/WWW

Dear Debra—Two quick questions. First, I heard through Rick McCreery that you were thinking about a WWW site for SEAC. Is this true and would you (SEAC) be interested in considering a site hosted on one of my servers at Tufts? The reason I ask this is because this morning I was wondering about bringing this up at the next meeting...but...when/where will SEAC meet at PittCon? (2nd question!) It would have been handy having a site to provide such info.

Best regards, Sam Kounaves

P.S. As you may already know, I also found out that the address www.seac.org already belongs to the Student Environmental Action Coalition! C'est dommage!

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<http://electrochem.tufts.edu/>

—Hurray!...this neatly avoids the problem of dueling potentiostats (UNC vs. UT-Austin)...Sam and I will be playing with the initial form and look of SEAC's coming-soon-to-a-computer-near-you Web site before PittCon '98 [New Orleans, 1-5 March 1998...see you there!]...comments are welcome!—

In message Wed, 13 Aug 1997 09:52:15 -0400, Mark R. Anderson writes:

Debra—A home page for the SEAC is a great idea. I believe that it could ultimately replace a hard copy of the newsletter and that savings could go to supporting a site with a commercial internet provider (of course I am not up to date on the finances). This brings up point number 4 that you address in the newsletter—should an e-mail reminder be sent to notify people of an updated homepage. The most recent versions of Netscape (4.0) and Internet Explorer (4.0) integrate "push" technology in which individuals can "subscribe" to a page and then the subscriber will be automatically notified when changes to the page are made. This places the burden of subscribing to the page on the shoulders of the membership, but eliminates the need for the society to maintain an accurate membership email directory.

Other problems include the fact that both 4.0 versions of these browsers are now available only as beta tests, and both implement the subscription capabilities somewhat differently (although reason would suggest that the compatibility issues will be worked out prior to final release). Also, if the SEAC page were to use this subscription procedure, it would be available only to those members who use the latest versions of the browsers.

Hope this is useful and helps. Mark

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<http://www.chem.vt.edu/chem-dept/anderson>

—*Excellent* news, Mark—automatic notification to the subscribing members when the home page is updated is my idea of technology in action...the fewer the bumps in the activation barrier for the editor, the better!—

In message Tues, 23 Dec 1997 16:36:31 +1000, Alan Bond writes:

Dear Debra—I am sorry for the delay in responding to the important matter of future forms of publication of SEAC Communications as raised in your Editorial in the July issue. In Australia, where the mail takes a rather long time to arrive from the USA, we would have no hesitation in supporting an electronic version of SEAC Communications. I have discussed this matter with my colleagues and we universally endorse this proposal. With respect to other matters about the Communications I respond as follows:

1. We think an interim period of about 12 months where both hard and electronic version were available would be appropriate.
2. We believe that some of the material should be in the public domain, but, of course, there will be a range of matters that should be restricted to members of SEAC.

I hope the above advice from the Downunder group is of some assistance in your deliberations. Best wishes, Alan Bond
a.bond@sci.monash.edu.au

— Thanks, Alan, for forwarding Australia's vote for electrons!—

—The birthday Bob reports in—

In message Wed, 20 Aug 1997 16:48:53 -0400, Robert Osteryoung writes:

Subject: Happy Birthday to Me

Dear Debra—Thank you...and Rich Carlin...for the report on my Birthday Bash in the July *SEAC Communication*.

As I told Rich, more people will read his report on the Party than have ever read any of our molten salt papers! It was very nice to see so many old friends and former colleagues; I hope they had as good a time as I did—and as Rich did.

When you get to be my age, maybe you should plan on doing this every year; why wait for 80? Bob

Professor and Head
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In message Fri, 28 Nov 1997 16:41:40 -0500, Robert Osteryoung writes:

PS: Hope to see you, if I survive, in Downtown Ventura eating sushi, if all else fails. Happy Turkey to you, too. Bob

...Janet: you've read it here first! Set your watch *now* for RAO's next Birthday Bash...

—A comment from a survivor of two years in Washington, DC returning home to Massachusetts—

In message Mon, 24 Nov 1997 11:25:37 -0500, David J. Curran writes:

Debra—Just checking in. Am settled in a new office with the old telephone number 413-545-2585 and old e-mail address. Took weeks of discarding stuff in the old office to arrive at the pile of stuff left that came up to the new office. Still have a lab but my last student finished in August. The weather is lousy with snow on the ground already! It is hard to imagine but the weather in Washington is better...if you discard the summer. In some ways we are still settling in after nearly three months.

The snow caught me by surprise and the leaves weren't raked. In fact, the idea of raking leaves had left my mind upon going to Washington. Home ownership is not something I missed. Ah well!

Here's to J.J. Thompson and his discovery. Dave

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—Washington, DC doesn't need snow, Dave...we have all this paper instead...—

Reminders to the SEAC Members

—from Joe Maloy—

Dues notices for 1998 and ballots are being mailed out under separate cover by the Secretary. All members should vote for new Directors and Officers before the specified deadline. Ballots should be returned to the Secretary [Joe Maloy, Department of Chemistry, Seton Hall University, South Orange, NJ 07079, USA]. All those who are not Life Members should return the dues notices and payments for 1998 dues to the Secretary at the same time.

SEAC Membership Chairman, Andy Ewing [Department of Chemistry, Pennsylvania State University, University Park, PA 16802, USA] will continue to receive all NEW MEMBERSHIP APPLICATIONS and INITIAL DUES PAYMENTS. Any new members recruited by current members should send their completed applications directly to Andy.

—Vote early...but not often!—

Candidates Standing for Election to the SEAC Board of Directors (three candidates to be elected)

Richard Baldwin (*University of Louisville*) Howard Dewald (*Ohio State University*) Andy Gilicinski (*Air Products & Chemicals, Inc.*) Susan Lunte (*University of Kansas*) Marc Porter (*Iowa State University*) Herb Silverman (*Consultant*)

Candidates Standing for Election as Officers of SEAC President-Elect: Steve Weber (*University of Pittsburgh*) Treasurer: Joe Maloy (*Seton Hall University*) Secretary: Andy Ewing (*Pennsylvania State University*)