

## What's happening in the CSN?

November 20, 2018



Volume 4, Issue 2



### Celebrations

#### Welcome to New CSN Members

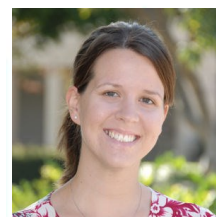
*It's the time of year when new students join CSN labs, so please be sure to let Mike and Miriam know about any new incoming participants who will be working on center projects.*



The CSN welcomes Dr. **Peiguang Hu** to the CSN! Peiguang is a postdoc in the **Giraldo** group, and will be working on nanomaterials applications in plants. Welcome Peiguang!

### Good News

Congratulations to **Emily Tollefson** (Carlson group), who just accepted a position as an Assistant Professor of Chemistry at the University of Puget Sound! Emily will continue her work with the CSN until next summer when she moves to the West Coast.



### Milestones and awards

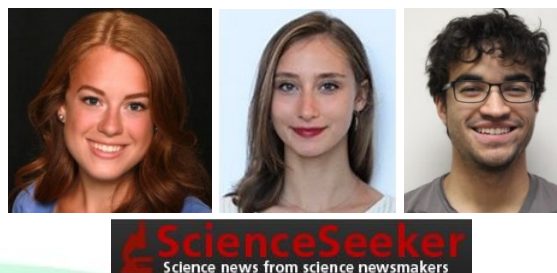
**Ronghua (Andy) Bei**, who participated in the CSN REU program last summer (**Hernandez** group), won second place in the Materials Engineering and Sciences IX section of the student poster competition at **AIChE**, the Global Conference for Chemical Engineering. Andy's poster was "A Computational Study of the Coverage of Poly(oxonorbornenes) and O-(2-carboxyethyl)-O'-(2-mercaptoethyl)heptaethylene Glycols on Gold Nanoparticles," based on work he did in Rigoberto's lab with mentor **Ali Rahnamoun**.



**Jason White** was invited to become an Associate Editor at the Elsevier journal *NanoImpact*. He was previously a member of the editorial board but due to reviewing activity and manuscript submissions over the first three years of the journal, he was promoted to Associate Editor. *NanoImpact* will be receiving its first impact factor in June 2019 and the current estimate is that the value will be above 5.0.



Three recent Sustainable Nano blog posts have been recognized by [ScienceSeeker](#) as “best posts of the week”: “From Beer Bubbles to Nanoparticles: What is Nucleation?” ([Sept 24-30](#)) by **Stephanie Mitchell** (Carlson group), “Bog bodies: the chemistry behind natural embalming” ([Oct 29-Nov4](#)) by **Jaya Borgatta** (Hamers group), and “Zack’s Nano Adventure” ([Nov 12-18](#)) by **Zack Jones** (Hamers group). Congratulations to Stephanie, Jaya, and Zack!

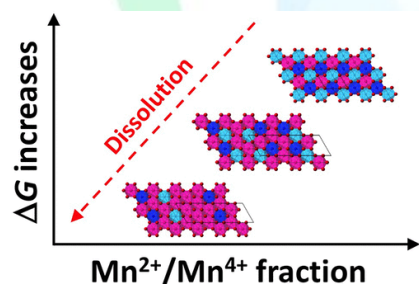
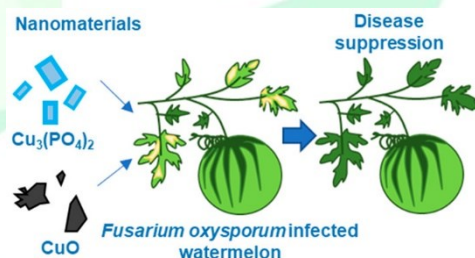


## CSN Productivity

Find the most recent list of all center publications on the [CSN Google Scholar](#) page.

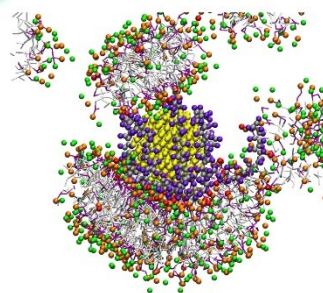
**The CSN officially broke the 30 publication barrier for 2018 (currently 33 and counting)! Congrats to everyone for helping us reach this milestone!**

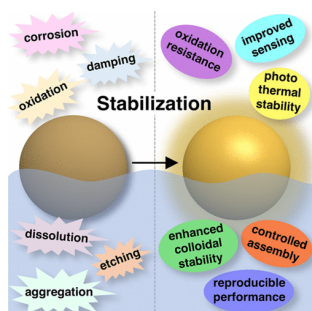
Jaya Borgatta, Chuanxin Ma, Natalie Hudson-Smith, Wade Elmer, Cristian David Plaza Pérez, Roberto De La Torre-Roche, Nubia Zuverza-Mena, Christy L. Haynes, Jason C. White and Robert J. Hamers (2018). Copper Based Nanomaterials Suppress Root Fungal Disease in Watermelon (*Citrullus lanatus*): Role of Particle Morphology, Composition and Dissolution Behavior. *ACS Sustainable Chemistry & Engineering*. 6 (11), 14847-14856. Read the publication online [here](#).



Joseph W. Bennett, Diamond T. Jones, Robert J. Hamers and Sara E. Mason (2018). First-Principles and Thermodynamics Study of Compositionally Tuned Complex Metal Oxides: Cation Release from the (001) Surface of Mn-Rich Lithium Nickel Manganese Cobalt Oxide. *Inorganic Chemistry*. 57 (21), 13300-13311. Read the publication online [here](#).

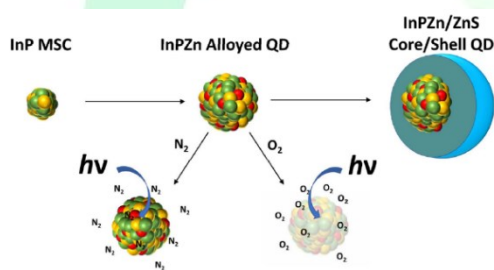
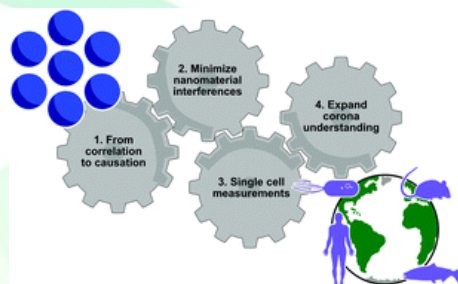
Laura L. Olenick, Julianne M. Troiano, Ariane Vartanian, Eric S. Melby, Arielle C. Mensch, Leili Zhang, Jiewei Hong, Oluwaseun Mesele, Tian Qiu, Jared Bozich, Samuel Lohse, Xi Zhang, Thomas R. Kuech, Augusto Millevolte, Ian Gunsolus, Alicia C. McGeachy, Merve Doğangün, Tianzhe Li, Dehong Hu, Stephanie R. Walter, Aurash Mohaimani, Angela Schmoldt, Marco D. Torelli, Katherine R. Hurley, Joe Dalluge, Gene Chong, Z. Vivian Feng, Christy L. Haynes, Robert J. Hamers, Joel A. Pedersen, Qiang Cui, Rigoberto Hernandez, Rebecca Klaper, Galya Orr, Catherine J. Murphy and Franz M. Geiger (2018). Lipid Corona Formation from Nanoparticle Interactions with Bilayers. *Chem*. 4 (11), 2709-2723. Read the publication online [here](#). See the CSN press release [here](#).





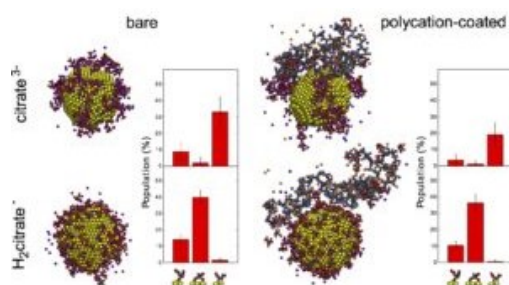
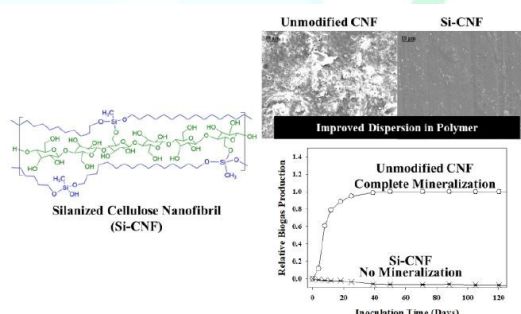
Hyunho Kang, Joseph T. Buchman, Rebeca S. Rodriguez, Hattie L. Ring, Jiayi He, Kyle C. Bantz and Christy L. Haynes (2018). Stabilization of Silver and Gold Nanoparticles: Preservation and Improvement of Plasmonic Functionalities. *Chemical Reviews*. Accepted. Read the publication online [here](#).

Tian Autumn Qiu, Peter Clement and Christy Haynes (2018). Linking nanomaterial properties to biological outcomes: analytical chemistry challenges in nanotoxicology for the next decade. *Chemical Communications*. 54, 12787-12803. Read the publication online [here](#).



Richard P. Brown, Miranda J. Gallagher, D. Howard Fairbrother and Zeev Rosenzweig (2018). Synthesis and Degradation of Cadmium-Free InP and InPZn/ZnS Quantum Dots in Solution. *Langmuir*. Accepted. Read the publication online [here](#).

Benjamin P. Frank, David P. Durkin, Emily Caudill, Lingchao Zhu, Donald White, Michael L. Curry, Joel A. Pedersen and D. Howard Fairbrother (2018). Impact of Silanization on the Structure, Dispersion Properties, and Biodegradability of Nanocellulose as a Nanocomposite Filler. *ACS Applied Nano Materials*. Accepted. Read the publication online [here](#).

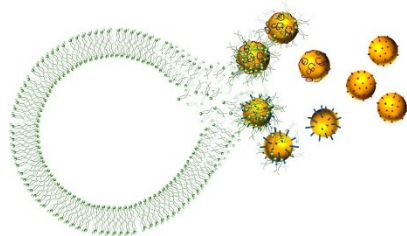
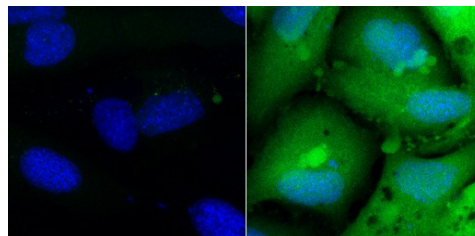


Gene Chong, Elizabeth D. Laudadio, Meng Wu, Catherine J. Murphy, Robert J. Hamers and Rigoberto Hernandez (2018). Density, Structure, and Stability of Citrate<sup>3-</sup> and H<sub>2</sub>Citrate<sup>-</sup> on Bare and Coated Gold Nanoparticles. *The Journal of Physical Chemistry C*. Just Accepted. Read the manuscript online [here](#).



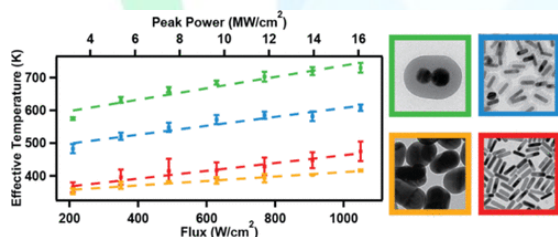
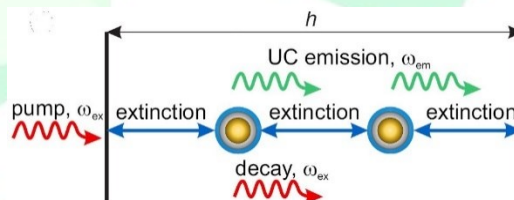


Eric S. Melby, Yi Cui, Jaya Borgatta, Arielle C. Mensch, Mimi N. Hang, William B. Chrisler, Alice Dohnalkova, John M. Van Gilder, Catherine M. Alvarez, Jordan N. Smith, Robert J. Hamers and Galya Orr (2018). Impact of lithiated cobalt oxide and phosphate nanoparticles on rainbow trout gill epithelial cells. *Nanotoxicology*. Accepted. Read the manuscript online [here](#).



Xi Zhang, Arun Kumar Pandiakumar, Robert J. Hamers and Catherine J. Murphy (2018). Quantification of Lipid Corona Formation on Colloidal Nanoparticles from Lipid Vesicles. *Analytical Chemistry*. ASAP. Read the manuscript online [here](#).

Iliia L. Rasskazov, Lang Wang, Catherine J. Murphy, Rohit Bhargava and P. Scott Carney (2018). Plasmon-enhanced upconversion: engineering enhancement and quenching at nano and macro scales. *Optical Materials Express*. 8 (12), 3787-3804. Read the publication online [here](#).



Emily L. Keller, Hyunho Kang, Christy L. Haynes and Renee R. Frontiera (2018). Effect of Silica Supports on Plasmonic Heating of Molecular Adsorbates as Measured by Ultrafast Surface-Enhanced Raman Thermometry. *Acs Applied Materials & Interfaces*. Read the publication online [here](#).

**Acknowledging the CSN for center-funded resources.** The CSN has provided funds for several capital equipment purchases. Please treat center-funded resources similar to other shared instrumentation or facilities by acknowledging the CSN grant for any publications that include data generated using CSN-funded equipment, even for non-CSN projects. Please use the following language to acknowledge the use of CSN-funded equipment or resources:

**“[EXPERIMENT] used [INSTRUMENTATION], which was funded by the National Science Foundation under the Center for Sustainable Nanotechnology (CSN), CHE-1503408.”**

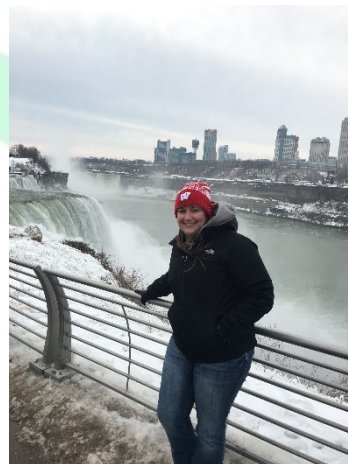
It is not necessary to add this language to center publications that *already include* the standard CSN and CCI acknowledgement.



## ***SPRING Board/Executive Committee Liaison Transition***

Thank you to **Stephanie Mitchell** (Carlson group) for serving as our SB/EC Liaison for the past nine months. We had several nominations to succeed her as the next Liaison, but due to various factors we have ended up with only one volunteer: **Arielle Mensch** (Orr group). Here is her candidate statement:

“Hi friends! I’m Arielle and am currently a postdoc in Galya Orr’s lab at Pacific Northwest National Laboratory. I received my undergraduate degree in chemistry from St. John Fisher College in Rochester, NY before joining the Hamers lab at the University of Wisconsin-Madison to complete my PhD. When I started graduate school, the Center was just getting started so I had the opportunity to join right at the beginning. My graduate studies focused on characterizing the interactions between nanoparticles and supported lipid bilayers using in situ analytical techniques. Since joining the Orr lab a year ago, I have been working on using correlative super resolution fluorescence microscopy and atomic force microscopy to understand nanoparticle uptake mechanisms in cells. Having been with the Center since the beginning, I have a lot of experience to make me uniquely equipped to serve as the SB/EC Liaison. I’ve had the opportunity to be the SPRING Board representative for both the Hamers and Orr labs, which has demonstrated to me how important the role of the Liaison can be. SPRINGers need to be able to raise concerns they have about the direction of the Center or the way it’s operating and I’m comfortable being the voice of the SPRINGers to communicate these concerns to Center management. I’ve served as a peer editor for the blog and as the SPRING Seed Committee chair since both of those roles were established. Both have allowed me to get to know many of you and take advantage of the unique opportunities the Center provides. I’ve also been through the review process with NSF in the past so I can help to minimize stress and communicate any concerns leading up to and through this process in May. Outside of the lab, I enjoy exploring new places, cooking, and watching college football and basketball (Go Badgers!).”



Congratulations to Arielle! Her term as Liaison will run through mid-August 2019.

## ***Did You Know?***

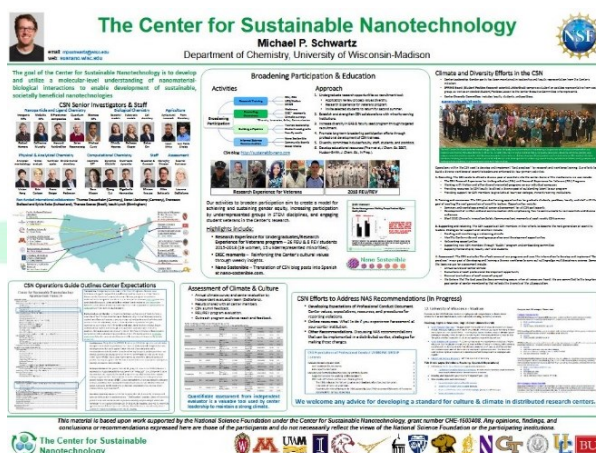
Check out this heartwarming story about Sophia Spencer, an 8-year old girl who co-authored a paper in the [Annals of the Entomological Society of America](#). You can read all about how Sophia’s love of bugs transformed from something to be teased about by classmates to an overwhelming show of support from the scientific community and a renewed respect from her peers in this article from The Week: [“Bug-loving girl who was teased at school co-authors research paper.”](#)



Credit: Morgan Jackson/Twitter



The National Academies of Sciences, Engineering, and Medicine (NASEM) hosted a one-day workshop, entitled "Together We Can Do Better: A Convening of Leaders in Academia to Prevent Sexual Harassment," on November 9. Webcast recordings of the presentations as well as posters and other documents are now available [at this site](#). **Mike Schwartz** attended the meeting and submitted a poster describing CSN efforts to begin addressing some of the NAS recommendations, and more general efforts to create an inclusive climate in the center. You can download the CSN poster from the NASEM site linked above, or from the Nanodatabase "[CSN External Presentations and Posters](#)" Study page.

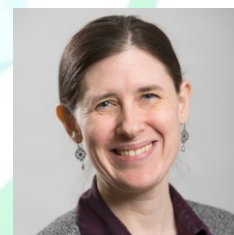


Interesting article from *Business Insider*: "[The US just elected 9 new scientists to Congress, including an ocean expert, a nurse, and a biochemist. Here's the full list.](#)" by Hilary Brueck and Peter Kotecki.

Want to participate in a survey about communicating science to the public? Check out [Investigation of research paper accessibility methods regarding different science-interested populations](#), being conducted by Kate Bredbenner, Lab of Cellular Biophysics, Graduate Fellow, Rockefeller University.

## Lab Exchanges

**Miriam Krause** briefly visited UW-Madison on October 24 while in town for a [Facilitating Entering Research Workshop](#). Unfortunately, no one remembered to take a photo!



## CSN Talks and Presentations

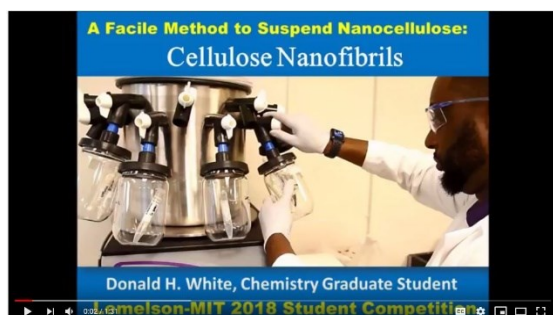
**Zack Jones** (Hamers group) participated in the inaugural "Quantum Summit" at the University of Chicago.



Zack's work on  $N_V$ -nanodiamond for the center's nano-imaging work is part of the QISE-NET (Quantum Information Science and Engineering NETWORK), an NSF-funded effort to link students, faculty, and industries engaged in quantum science research, with the goal of enhancing technology transfer and US competitiveness in the burgeoning area of "Quantum Leap". Also participating was CSN Innovation Council member **Olga Shenderova** from Adamas Nanotechnologies. More information on this exciting effort can be found [here](#).

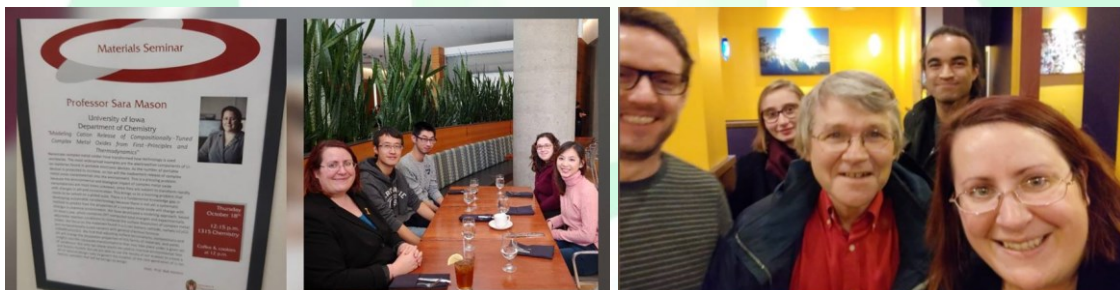






Check out **Donald White's** (Curry group) presentation entitled "[A facile method to suspend nanocellulose: Cellulose nanofibrils](#)", which he submitted for the Lemelson-MIT 2018 Student Prize Competition. Good luck, Donald!

**Sara Mason** presented an invited seminar at the University of Wisconsin-Madison Department of Chemistry on October 18. Her presentation, entitled "Modeling Cation Release of Compositionally-Tuned Complex Metal Oxides from First-Principles and Thermodynamics," was part of the Materials Chemistry seminar series.



**Rebecca Klaper** gave a plenary talk, entitled "What is Known About the Environmental Impacts of the Main Engineered Nanomaterials (ENMs) in Commerce," at the 2018 U.S.-EU: Bridging NanoEHS Research Efforts Joint Workshop. This meeting is to brief government officials and policy makers regarding the state of the science and leads to discussions about what needs to happen next.



**Bob Hamers** presented a Plenary talk on "Transformations and Environmental Impact of Next-generation Energy Storage Nanomaterials" at the "Nanosafe 18" Conference in Grenoble, France on Nov. 7. This conference brings together all aspects of nanomaterials health and safety, primarily among the European Community. Bob also participated in a workshop of the "Nanocommons", an effort by the European Union to improve the ability to annotate, store, and search information about health and safety aspects of nanomaterials.



Also from **Bob Hamers**: "A colleague of mine did a [1-hour podcast on "nano-innovations"](#) that is an extended interview with me ranging from the weather to Silatronix to the CSN to solvated electrons. If you have a spare hour to kill, you might find it interesting."





**Mike Curry** represented Eco-friendly Plastic Materials at the UNC Inclusive STEM Innovation Pitch Summit. You can watch the video on [Eco-friendly Plastic Materials' Facebook page](#).

**Christy Haynes** gave two talks at Humboldt University on October 14 – the first was all about the science we're doing in the Center for Sustainable Nanotechnology and the second was a professional development talk about publishing in ACS journals. Check out graduate student Gergő Péter Szekeres' tweet (right).



**Miriam Krause** presented a poster at SciComm Camp, a science communication conference, on Nov 2 entitled, "Outreach as Professional Development: Lessons from Sustainable Nano." Check out the SustainableNano tweet (left).

**Jason White** attended the 13th International Conference on the Environmental Effects of Nanoparticles and Nanomaterials (ICEENN 2018) from September 5-8, 2018 at Duke University. He gave a presentation entitled "Engineered nanomaterials suppress fungal and viral crop disease." Other CSN attendees/presenters at the meeting included **Sara Mason**, **Howard Fairbrother**, **Juan Pablo Giraldo**, **Becky Curtis**, and **Nicholas Niemuth**.

Jason was also conference organizer for the [15th Annual International Phytotechnologies Conference](#) which was held at the University of Novi Sad in Serbia from October 2-5, 2018. Jason co-chaired a session on plant-nanoparticle interactions and gave a presentation entitled "Use of engineered nanomaterials to suppress crop disease in plants" and CSN work was featured prominently. Finally, Jason visited collaborators at Zhejiang





University in Hangzhou China and at the Research Institute of Subtropical Forestry of the Chinese Academy of Forestry and presented a lecture (at each location) entitled "Engineered Nanomaterial Use in Agriculture: Applications and Implications."



**Jason White, Juan Pablo Giraldo, and Wade Elmer** attended the "2nd Quantifying Exposure to Engineered Nanomaterials from Manufactured Products (QEEN II)" Workshop which was sponsored by the Consumer Product Safety Commission (CPSC), US Department of Labor, Occupational Safety and Health Administration (OSHA) and the National Nanotechnology Initiative (NNI) from October 9-10 in Washington DC at the US Department of Labor, Frances Perkins Building. Jason chaired a session and discussion panel on "Exposure to nanomaterials in agroecosystems and agricultural production" and gave the session report out during a plenary session. In the agricultural session, Wade gave a presentation entitled "Nanoparticles of metalloid and metallic oxides for plant disease suppression," and Juan Pablo gave a presentation entitled "Targeted foliar delivery of nanomaterials for improving crop productivity and reducing human exposure."

**Hamers** group graduate students **Paige Kinsley, Liz Laudadio, and Michelle Harasimowicz** (M.S. student and IC member from Research Products Corporation) participated in the Wisconsin Science Festival. They hosted hands-on activities teaching kids how batteries worked; they talked about the components of a battery and provided hands-on demonstrations on how to build a battery out of lemons or make a penny battery with the goal of getting an LED to light up. **Liz Laudadio** and **Paige Kinsley** also did a "Science Improv Trolley" on Friday evening (right picture).



## Latest from Sustainable Nano

See [sustainable-nano.com](http://sustainable-nano.com) for all the CSN blog posts and podcast episodes.

### CSN Blog Posts & Podcast Episodes Since the Last Newsletter

- Oct 5: [¿Por qué no deberíamos tirar baterías de iones de litio a la basura?](#) (translation of “Why Shouldn’t We Toss Lithium-Ion Batteries in the Trash?” by Merve Doğangün)
- Oct 5: [How do scientists determine the texture of cells?](#) by Arielle Mensch & Yi Cui (this post was inspired by a blog reader question!)
- Oct 12: [An engineer as President??](#) by Joe Bennett
- Oct 19: Podcast Episode 26: [Nanomaterials and Renewable Energy: From Solar Panels to Machine Learning](#) (interview with Jillian Buriak)
- Oct 23: [Happy Mole Day: 2018 Edition](#) by Rigoberto Hernandez
- Oct 24: [El cuento cauteloso del DDT: biomagnificación, bioacumulación y motivo de investigación](#) (translation of “The Cautionary Tale of DDT – Biomagnification, Bioaccumulation, and Research Motivation” by Laura Olenick)
- Oct 31: [Bog bodies: the chemistry behind natural embalming](#) by Jaya Borgatta
- Nov 2: Podcast Episode 27: [The Constant Loop: How Nanoparticles and the Environment Affect Each Other](#) (interview with Liz Laudadio about a recent publication: Laudadio, L., Bennett, J., Green, C., Mason, S., & Hamers, R. Impact of Phosphate Adsorption on Complex Cobalt Oxide Nanoparticle Dispersibility in Aqueous Media. Environmental Science & Technology 2018, 52 (17), pp 10186–10195 DOI: 10.1021/acs.est.8b02324)
- Nov 7: [Voluntariado para el Proyecto de Educación Penitenciaria](#) (translation of “Volunteering for the Prison Education Project” by Micaela Homer)
- Nov 12: [Zack's Nano Adventure](#) by Zack Jones
- Nov 19: [De Burbujas de Cerveza a Nanopartículas: ¿Qué es la Nucleación?](#) (translation of “From Beer Bubbles to Nanoparticles: What is Nucleation?” by Stephanie Mitchell)
- Nov 19: [Have you ever seen colorful "carbon"?](#) by Bo Zhi

### Nanodatabase update

**Manuscript page.** The CSN Nanodatabase now has a *Manuscript* page where all data for published papers will be uploaded (replaces the *Study* page for published manuscripts). Data should be uploaded to *Manuscript* pages once the paper is accepted, but we recommend organizing all data and drafts as soon as you start preparing the manuscript for submission. You can choose “In Preparation” from the “Status” dropdown when you create the Manuscript page. All the details that are unknown when you create an “In Preparation” *Manuscript* page can be filled in later, as the manuscript moves through the submission process (e.g., Journal, Volume, Pages, etc).

As a reminder of the original intention for how different pages in the Nanodatabase might be used, please see the figure and descriptions of page types at the end of the “[Five Easy Steps to Nanodatabase Mastery](#)” document (link takes you to the Nanodatabase page where you can upload the file).



## Opportunities

### SPRING Seed Grants deadline extended

Have a great idea for a new CSN project? Just a reminder that the Spring Seed Committee is extending the call for proposals. Consider submitting a white paper during this round! You can find the guidelines and examples of past white papers and proposals on the Nanodatabase under [Study #110](#).

#### New deadlines:

- White Paper submission ( $\leq 1$  page) due **December 14<sup>th</sup> 2018**
- Invited full proposal submission (3 pages) due **January 25<sup>th</sup> 2019**

If you have questions about whether or not your seed proposal is different enough from your ongoing Center work please contact Mike to get clarification. The committee is more than happy to help, so please reach out if you have any other concerns or questions!

### Postdoc Opportunity at the University of Pennsylvania

From the website: “The NIH sponsored [PennPORT Program](#) combines a traditional mentored postdoctoral research experience at the University of Pennsylvania with a mentored teaching experience at a partnering institution. The Program is designed to provide an opportunity for postdoctoral appointees to develop their teaching skills. An integral part of the program is formal instruction in pedagogical methods from the Graduate School of Education at the University of Pennsylvania. Postdocs will also be able to take advantage of the many research and career success skills training programs provided by Biomedical Postdoctoral Programs (BPP).” Applications for fall 2018 opened on January 1, so 2019 may have a similar timeline.

### Assistant Professor of Biochemistry Position at Colorado Mesa University: [Announcement](#)

CSN Alum Sam Lohse shared a faculty posting from his university. Official deadline was Oct 29 but contact Sam for more information. From the posting summary: “The Assistant Professor of Biochemistry is a tenure-track faculty position responsible for teaching upper division biochemistry courses and other courses as assigned, such as organic chemistry lab and/or lower division lecture and lab courses. Development of a research program involving undergraduates in biochemistry or a very closely related field of chemistry is expected.”

### Postdoc Opportunity at Notre Dame

From the job ad: “There’s an open postdoctoral scholar position in the newly established White Lab at the University of Notre Dame ([www.sites.nd.edu/whitelab](http://www.sites.nd.edu/whitelab)). The White Lab is in the Department of Chemistry and Biochemistry with affiliation at the Harper Cancer Research Institute. We seek to understand how intracellular pH (pHi) dynamics regulate proteins, pathways, and cell behaviors and mechanisms by which dysregulated pHi dynamics promote cancer initiation, maintenance, drug resistance, and evolution... All qualified applicants will be considered, but those with expertise in quantitative microscopy, PI3K signaling,





organoid or spheroid culture, or SILAC mass spectrometry techniques are particularly encouraged to apply. Interested candidates can submit a cover letter, CV, and contact information for three references to Dr. White ([kwhite6@nd.edu](mailto:kwhite6@nd.edu))."

### **Postdoc Opportunity at Stony Brook University**

Applications are due on **December 20, 2018** for a start date on or after May 1st. Candidates must have their **PhD in hand by September 15, 2019**. From the job ad: "The Center for Inclusive Education at Stony Brook University welcomes applications for its IRACDA NY-CAPS (New York Consortium for the Advancement of Postdoctoral Scholars) program - a funded fellowship for postdoctoral scholars in the biological sciences. Scholars advance their teaching skills and research experience during a 3-year mentored fellowship at Stony Brook University and at minority-serving NY-CAPS Partner Institutions: CUNY Brooklyn College, SUNY College at Old Westbury and Suffolk County Community College. For more information and to apply, please visit the Center for Inclusive Education's [website](#). Please email [IRACDA@stonybrook.edu](mailto:IRACDA@stonybrook.edu) or call 631-632-1386 with any questions."

### **Inorganometallic Catalyst Design Center Summer Undergraduate Research Fellowships**

The application deadline for the summer 2019 program is **January 31, 2019**. We have a tenure-track biochem position (led by the Bio dept, joint between Bio and Chem depts) open this year at Augsburg. If you know of any good candidates, please share the attached job announcement. We are pleased to announce a Summer Undergraduate Theoretical Chemistry Research Fellowship Program sponsored by the Chemical Theory Center (CTC), Inorganometallic Catalyst Design Center (ICDC) and the Nanoporous Materials Genome Center (NMGC) in the Department of Chemistry at the University of Minnesota in Minneapolis. The program is open to all undergraduate chemistry majors who will be entering their senior year in Fall 2019. For more information and to apply please visit our [website](#).

### **Kendall Fellowship: EV Battery Recycling and Reuse**

Deadline: **December 1, 2018** or until filled. Review of applications will begin immediately. Clean Vehicles Program, Union of Concerned Scientists. The Union of Concerned Scientists (UCS), the leading science-based organization at the center of today's most exciting and important policy debates, seeks outstanding candidates for the Electric Vehicle Battery Recycling and Reuse Kendall Fellowship. This two-year fellowship is open to candidates who will have completed their Ph.D. in the physical sciences, engineering, or other appropriate fields before Fall 2019. As a Fellow, you will investigate how recycling and reuse of battery materials can contribute to the sustainability of electric vehicles. Information about the organization is available at <http://www.ucsusa.org>. A listing of all open jobs is available at <https://www.ucsusa.org/about/jobs-ucs>.



## ***Looking Ahead***

### **CSN Professional Development**

**Citation Management Tools & Strategies - Friday, January 11, 2019, 2:30-3:30pm Central.** Presented by Meghan Lafferty, University of Minnesota Chemistry, Chemical Engineering, & Materials Science Librarian

**Careers in Policy** - Likely December: Exact date to be announced!

### **Environmental Nano GRC**

Rebecca Klaper is chairing this year's Environmental Nanotechnology GRC, with the theme of Preventing and Solving Problems with Environmental Nanotechnology. Conference dates are June 2-7, 2019, and applications for the meeting must be submitted by May 5. For more information, see the [website](#) and/or talk to Rebecca!

### **ACS Green Chemistry & Engineering Conference**

**June 11-13, 2019** in Reston, VA. Call for abstracts opens Nov 19, program information [here](#).



## Lost in Cyber-Space?

HOME ABOUT US OUR TEAM NEWS EDUCATION & OUTREACH WORKING WITH THE CSN PUBLICATIONS RESEARCH MEMBERS

### Links to frequently requested CSN documents and information sources

For these documents and more, visit the [Center Resources page](#) on the [CSN website](#) (requires login though Members page, contact [Miriam](#) if you need help).

#### Newsletter submissions

Awards, highlights, lab exchanges, publications, FUN, etc: [link](#)

#### CSN Documents and Downloads

- Nanodatabase Login: [link](#)
- Nanodatabase Help page: [link](#)
- CSN calendar (RFA, All-hands, professional development): [link](#)
- CSN Operations Guide: [link](#)
- CSN participants list (Names, group, and email addresses): [link](#)
- CSN Projects Documents: [CSN Projects](#) - [% Effort sheet](#)

#### CSN Reporting Forms

- Report lab exchange activities: [link](#)
- New CSN Presentations: [link](#)
- Report Outreach Activity: [link](#)
- CSN Safety Verification form: [link](#)
- CSN Shipping Addresses: [link](#)

#### CSN Feedback Forms

- SuggestionOx (completely anonymous comments/suggestions to CSN staff):  
Director (Bob): [link](#)  
Associate Director (Christy): [link](#)  
Managing Director (Mike): [link](#)  
E/O Director (Miriam): [link](#)

Find the most recent list of all center publications on the [CSN Google Scholar](#) page.

**Are there any links that you want added to the list above?** Email Mike ([mpschwartz@wisc.edu](mailto:mpschwartz@wisc.edu))

