

IE&EE Division H. H. Dow Memorial Student Achievement Award



PRABEER BARPANDA has been awarded the IE&EE Division's 2009 H. H. Dow Student Achievement Award. Dr. Barpanda received his BEngg (ceramic engineering) from NIT-Rourkela-India (2002). Following that, he completed an MPhil (materials modeling) at Cambridge University, UK (2004). He completed his PhD (Rutgers University, December 2008), working in the Energy Storage Research Group, directed by Prof. Glenn Amatucci.



With the funding from Office of Naval Research, his research led to the development of carbon-halide nanocomposites, a new class of carbon materials with very high gravimetric/volumetric capacity. The project examined the structural, morphological, and electrochemical development in carbon-halide nanocomposites for possible use as low-voltage batteries/supercapacitors. During this tenure, he spent one month at Dalhousie University, Canada.

Currently, Dr. Barpanda is a postdoctoral fellow under the supervision of Prof. Jean-Marie Tarascon and Prof. Michel Armand at the Laboratoire Réactivité Chimie Solides, Université de Picardie, France. Among other honors, he has won a Young Engineering Fellowship (2001-02), the Shell-Chevening Fellowship (2003), an ECS-Semizone Fellowship (2005), the Ceradyne International Award (2006), an ECS Summer Fellowship (2007), an ECS Student Travel Award (2008), and an ICMR-International Research Fellowship (2008). He is a Fellow of the Cambridge Commonwealth Society and is listed in *Marquis Who's Who* and *Madison's Who's Who* (2008). His research work involves Li-batteries/supercapacitors, micromagnetics, and ceramic materials.

To date, Dr. Barpanda has published one book, twelve journal papers, thirteen conference proceedings, and has attended over 25 international conferences and workshops. He has served as a referee to the *Journal of The Electrochemical Society*, *Mater. Sci. Engg-B*, *IEEE Trans. Magn.*, and *J. Eur. Ceram. Soc.* He may be reached at: prabeer.barpanda@u-picardie.fr.

Paul Albertus Receives IE&EE Division Student Achievement Award



PAUL ALBERTUS has been awarded the IE&EE Division's 2009 Student Achievement Award. He graduated from the Department of Chemical Engineering at the University of Michigan in 2003 with a BSE. After



a year studying poetry and philosophy at the University of York in the United Kingdom, he began studies at the University of California, Berkeley, in the research group of John Newman. There, he has pursued a number of research projects. One involved mathematical modeling of side reactions and nonisothermal effects in the nickel metal-hydride chemistry, with model validation using a module from the Toyota Prius battery.

Another project focused on battery size and capacity use in hybrid and plug-in hybrid electric vehicles, clarifying the importance of the shape of the pulse-power capability and cell equilibrium potential. Other projects include mathematical modeling of the galvanostatic and impedance response of electrodes with multiple active materials and/or a distribution of particle-conductive matrix contact resistances, and aging in lithium-ion batteries.

Albertus co-founded and co-taught a new UC Berkeley graduate-level course on battery technologies and markets in fall 2007. He is a recipient of a National Science Foundation Graduate Research Fellowship, and plans to file his dissertation in May 2009.

call for nominations

For details on each award—including a list of requirements for award nominees, and in some cases, a downloadable application form—please go to the ECS website (www.electrochem.org) and click on the "Awards" link. Awards are grouped in the following sub-categories: Society Awards, ECS Division Awards, Student Awards, and ECS Section Awards. Please see the individual award call for information about where nomination materials should be sent; or contact ECS headquarters.

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Student Chapters

Atlanta Student Chapter Georgia Tech Holds First Student Poster Event

The Georgia Tech Student Chapter held its first poster session on September 30, 2008. There were a total of about 60-65 attendees, including students, faculty, and researchers from various departments at Georgia Tech. Graduate students presented posters on their research activities in different areas of electrochemistry and solid state sciences. Professors Paul Kohl, Dennis Hess, Tom Fuller, Lawrence Bottomley, Peter Hesketh, and Tequila Harris all interacted with the students, exchanged ideas, and judged their posters. Food and soda were served for all attendees.

The first prize of a \$50 Barnes and Nobles bookstore gift card was presented by Peter Hesketh, faculty advisor of the student chapter, to Min Kyu Song for his poster on "Novel Anhydrous Proton Conducting Membrane for PEM Fuel Cells to Be Operated in a Wider Temperature Range without Humidification." The runners-up were Shruti Prakash for her

poster on "DMFCs for Low Power Devices" and Yair Korenblit for his poster on "Supercapacitor Advancement Through Zeolite Templated Carbons." Certificates were given to all three top posters. The event was successful in its primary objective of developing a community among researchers at Georgia Tech. It is hoped that this event leads to further fruitful interactions among participants. The success of the event drew appreciation from faculty members and also suggestions for future activities such as inviting more members from the Georgia Section. Immediate plans include drafting a constitutional bylaw for the Chapter to make it an official student body within the campus. Future events could include guest lectures and collaborative events with other ECS Sections.

This item was submitted by Rajeswari Chandrasekaran, PhD candidate at Georgia Tech.



A view of the first Poster Session held by the **GEORGIA TECH STUDENT CHAPTER**.



The **INDUSTRIAL ELECTROCHEMISTRY & ELECTROCHEMICAL ENGINEERING DIVISION H. H. DOW MEMORIAL STUDENT ACHIEVEMENT AWARD** was established in 1990 to recognize promising young engineers and scientists in the fields of electrochemical engineering and applied electrochemistry. The award consists of a scroll and a prize of \$1,000. The next award will be presented at the ECS spring meeting held in Vancouver, Canada, April 25-30, 2010.

Nominations and supporting documents should be sent to Venkat R. Subramanian, Tennessee Tech Univ., Dept. of Engineering, 307 Prescott Hall PO Box 5013, Cookeville, TN 38505, USA; tel: 931.372.3494, fax: 931.372.6352, e-mail: vsubramanian@tntech.edu. **Materials are due by September 15, 2009.**



The **INDUSTRIAL ELECTROCHEMISTRY & ELECTROCHEMICAL ENGINEERING DIVISION STUDENT ACHIEVEMENT AWARD** was established in 1989 to recognize promising young engineers and scientists in the field of electrochemical engineering and to encourage the recipients to initiate careers in this field. The award consists of a scroll and a prize of \$1,000. The next award will be presented at the ECS spring meeting held in Vancouver, Canada, April 25-30, 2010.

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Student Travel Grants

Several of the Society's Divisions offer travel assistance to students presenting papers at ECS meetings. For details about travel grants for 216th ECS Meeting in Vienna, Austria, (October 4-9, 2009), please visit the ECS website: www.electrochem.org/student/travelgrants.htm. Please be sure to e-mail the student travel grant contact as each Division requires different materials for approval. **The deadline for submission for the fall 2009 Travel Grants is April 24, 2009.**

Awarded Student Memberships Available

ECS Divisions are offering Awarded Student Memberships to qualified full-time students. To be eligible, students must be in their final two years of an undergraduate program or enrolled in a graduate program in science, engineering, or education (with a science or engineering degree). Postdoctoral students are not eligible. Awarded memberships are renewable for up to four years; applicants must reapply each year. Membership provides access to the ECS Digital Library, which includes the top publications in solid-state and electrochemical science and technology. To apply for an Awarded Student Membership, use the application form below or refer to the ECS website at: www.electrochem.org/awards/student/student_awards.htm#a.

Awarded Membership Application

ECS Divisions are offering Awarded Student Memberships to qualified fulltime students. To be eligible, students must be in their final two years of an undergraduate program or be enrolled in a graduate program in science, engineering, or education (with a science or engineering degree). Postdoctoral students are not eligible. Awarded memberships are renewable for up to four years; applicants must reapply each year. Memberships include subscriptions to the *Journal of The Electrochemical Society* online, *Electrochemical and Solid-State Letters* online, *Interface*, and a CD-ROM of the *Journal and Letters*.

Personal Information

Name: (Prefix) _____ (Last/Family) _____ (First/Given) _____

Date of Birth: _____ Gender: ☐ Male ☐ Female

Mailing Address: ☐ University ☐ Home

Phone: _____ Fax: _____

Email: _____

School Information

School: _____

(please include Division and Department)

Address: _____

Undergraduate Year (U) or Graduate Year (G) - circle one: U3 U4 G1 G2 G3 G4 G5

Major Subject: _____ Grade Point Average: _____ out of possible: _____

Have you ever won this award before? ☐ YES ☐ NO If yes, how many times? ____

Signatures

Student Signature: _____ Date: _____

Sections (please choose one): ☐ If you do not want your information listed online, please check this box.

☐ ECS occasionally makes available its members' addresses to vendors. If you prefer not to be included in these lists, please check this box.

Faculty member attesting to eligibility of full time student:

Faculty Member: _____ Dept.: _____

E-mail Address: _____ Date: _____

Division (please select only one):

- ☐ Battery
- ☐ Corrosion
- ☐ Dielectric Science & Technology
- ☐ Electrodeposition
- ☐ Electronics and Photonics
- ☐ Energy Technology
- ☐ Fullerenes, Nanotubes, and Carbon Materials
- ☐ High Temperature Materials
- ☐ Industrial Electrochemistry & Electrochemical Engineering
- ☐ Luminescence & Display Materials
- ☐ Organic & Biological Electrochemistry
- ☐ Physical and Analytical Electrochemistry
- ☐ Sensor