Pittsburgh Section

Bulletin

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Included in this issue:

Editor: Philip Cox, p.e.cox@ieee.org; Contributors: Joe Cioletti, Tom Dionise, Brandon Grainger, Gene Kern, Drew Lowery, Sarika Khushalani Solanki and Dave Vaglia

All announcements for publication in a particular month's bulletin are due to the Editor by the 20th of the previous month. The accuracy of the published material is not guaranteed. If there is any error, please bring it to the Editor's attention. The Section's web site, https://webinabox.vtools.ieee.org/wibp_home/index/r20037, has recent issues of the bulletin and lots of other useful information

• *Notes From the Chair*

The field of Engineering in the world is not new. It is thought that one of the first engineers was the Egyptian Imhotep, a chief official for the temple pyramids. Generations later, Archimedes of ancient Greece and Vitruvius of ancient Rome left their print on the world by structures and statues that would inspire some of the greatest minds. Leonardo Da Vinci, a self-taught engineer, in his personal sketches, gave the world models for inventions that would take centuries to bring to fruition.

This tradition has continued throughout the entire history of the United States. In the late eighteenth century, George Washington, considered our country's first engineer, formed our nation's first group of practicing engineers. These architectural, structural, civil, and military engineers were formed into what is now known as the Army Corp of Engineers. Although there are dozens more fields of engineering now-a-days, we still honor the foundations and guidance from these early engineers every year.

Founded by National Society of Professional Engineers, E-Week dedicated to ensuring a diverse and well-educated engineering workforce and increasing understanding and interest in engineering careers. Dedicated to raising public awareness of engineers' positive contributions to quality of life, E-Week promotes recognition among parents, teachers, and students of the importance of a technical education and motivates youth, to pursue engineering careers. And in honor of our nation's "first engineer", the week-long celebration always falls on the week including his birthday.

Here in the Pittsburgh section, we have had a long history of celebrating E-Week with our members and student members, and will continue to do so this year. Our student chapters in Pittsburgh and West Virginia also have multiple events scheduled to promote and celebrate current engineers and future engineers. Our society chapters and affinity groups will diligently schedule technical and professional presentations to continue to educate our members. To close E-Week, our Section hosts an electronic demonstration as well as a robot car race at the Carnegie Science Center.

I would like to personally invite you to help us use E-Week to honor the history and tradition of the engineers in our community.

Drew Lowery
2017 IEEE Pittsburgh Section Chair

Section

Chair - Dr. Drew Lowery, drew.lowery@mail.wvu.edu

Vice Chair -- Dan Wilson, djwilson06@gmail.com

Treasurer – Gene Kern, geneKern@ieee.org
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Immediate Past Chair – Jim Lagree, JamesLLagree@Eaton.com

Awards Chair – Dr. Kal Sen, senkk@ieee.org

Webmaster – Gerry Kumnik, g.kumnik@computer.org

UpperMon Subsection

Chair: Dr. Gianfranco Doretto, Gianfranco.Doretto@mail.wvu.edu

Chapters

Communications Society – Chair: Dr. Balaji Palanisamy, bpalan@pitt.edu; Sec: Phil Cox, p.e.cox@ieee.org

Computer Society – Chair: Dr. Ralph Sprang, rsprang@ieee.org

Components, Packaging, and Manufacturing Technology/Electron Devices Societies – Chair: Dr. Louis Hart, louishart@ieee.org

Engineering In Medicine & Biology Society
Chair: Steve Mozelewski, Steve.Mozelewski@gmail.com

Electromagnetic Compatibility Society
Chair: Michael J. Oliver
emi@majr.com (814) 763-3211

Power Electronics Society – Chair: Dr. Brandon Grainger bmg10@pitt.edu

Power & Energy & Industry Applications Societies
Chair: Steve Dobos, dobos.s.p@ieee.org; Vice-Chair: Julie Clark; Treas.: Dave Vaglia, davevaglia@ieee.org

Magnetics Society – Chair: Vincent Sokalsky, vsokalsk@andrew.cmu.edu

Nanotechnology Society - Chair: Dr. MinheeYun yunmh@engr.pitt.edu

Robotics Society – Chair: Gene Kern, geneKern@ieee.org

Signal Processing Society – Chair: Dr. Deniz Gencaga d.gencaga@ieee.org

Society on Social Implications of Technology
Chair: Joe Kalasky, P.E., j.kalasky@ieee.org 724-244-1609

Council of Electronic Design Automation Chair: Dr. Xin Li, xinli@cmu.edu

Affinity Groups

Young Professionals (formerly GOLD) – Chair: Matthew Rehder mattrehder@gmail.com

Women In Engineering –Co Chairs: Paige Kassalen, Paige.kassalen.us@ieee.org and Mey Sen, senml@ieee.org

Committees

Professional/Career Activities (PACE)
Chair: Joe Cioletti, P.E. jcioletti@ieee.org

Student Activities – Dr. Irvin Jones, irjones@ieee.org; student reps: Chair: Blaine Headley bmheadley@mix.wvu.edu, Vice-chair: Brandon Contino brandon.contino@pitt.edu

Membership Development – Steve Mozelewski, Steve.Mozelewski@gmail.com

Publicity – Chair: Thomas Dionise, P.E.
ThomasJDionise@eaton.com (724) 779-5864

- ***What I saw on my visit to Chernobyl***

Speaker: David J. Vaglia, Prominent Lecturer for the Industry Applications Society
Date: Thursday, February 9th, 2017
Time: Light Dinner at 6:00 PM, Program begins at 6:45 PM
Location: Westinghouse Electric Company Headquarters, Cranberry Township, PA

RSVP: Required at: Detailed information and signup will be on the IEEE Pittsburgh Joint PES/IAS Chapter page "Calendar" tab: **https://webinabox.vtools.ieee.org/wibp_home/index/CH02085**
Signup by February 8th, 2017.
Professional Development Hours: If you would like to receive PDHs, please bring a copy of this announcement for verification of your attendance. A non-Member who would like to receive PDHs is required to pay $10 to IEEE Pittsburgh Section. A Member who would like to receive PDH is required to show membership ID. Contact Dave Vaglia **(davevaglia@ieee.org)** for additional details.

Abstract: In October, 2016, Mr. Vaglia was fortunate enough to be asked to give presentations in Budapest and Kiev. While in Kiev, he arranged for a visit to the exclusion zone around the failed Chernobyl nuclear power plant. His visit was 30 years after the accident, but only a few weeks before the new containment building was pushed into place around the failed unit. Mr. Vaglia will present what he saw, provide an overview of the RBMK type reactors, and what went terribly wrong the night of the accident. Lastly, he will touch on how Ukraine is generating power today, and what they are looking toward in the future.

Bio: David Vaglia has his roots in the energy sector. He began his career in the coal mining industry, working as a maintenance engineer, and then moved to electrical design engineer responsible for mine power distribution, and electric train haulage systems, both above and below ground. He has also worked in the renewable energy area, investigating new concept wind generation applications and solar thermal systems. Mr. Vaglia transitioned to instrumentation and control working with supervisory control and data acquisition systems, and then to the man-machine interface design of nuclear power plant control rooms. Mr. Vaglia is presently a Principal Engineer in the Control Room Design Group, Operating Plants Business, at the Westinghouse Electric Company. In Westinghouse, he has held positions in management, marketing, and engineering.

Mr. Vaglia has a Bachelor of Science in Electrical Engineering and a Bachelor of Arts in General Arts and Sciences, both from the Pennsylvania State University. He also has a Master of Business Administration from the University of Pittsburgh and is a registered Professional Engineer working in the state of Pennsylvania.

Mr. Vaglia has been active in the IEEE for over 40 years. He is a Senior member serving the Pittsburgh Section (Region 2) in various capacities. Mr. Vaglia's volunteer positions have included Section

Awards Chair, Treasurer, and Section Chair. In the IAS-PES Pittsburgh Joint Chapter, he has served as Secretary, Treasurer, and Chair. He has also served as the General Chair of the 2008 PES Annual Meeting. Mr. Vaglia was nominated and appointed an IAS Distinguished Lecturer for 2015-16. He is presently a Prominent Lecturer for the IAS and Treasurer of the joint chapters of the IAS and PES, Pittsburgh Section, which has won numerous IAS and PES chapter awards.

DIRECTIONS TO WESTINGHOUSE ELECTRIC COMPANY, CRANBERRY

Directions from the South: Take 79 North to the route 228 east exit. Stay in right lane and drive by Marriott Hotel (on right). Turn right into Cranberry Woods facility and stay in left lane. Make first left into Westinghouse Headquarters and drive straight through roundabout. Please park in the visitors parking places that are located on either side of the entry road.

Directions from the East: Take the PA Turnpike (I-76) West following signs for Ohio / I-76 W. Take Exit 28 and follow I-79 N toward Erie. Stay in the entrance lane (right lane) and immediately take Exit 78, PA-228 Cranberry/Mars. Turn right onto PA-228 E toward Mars. Turn right onto Cranberry Woods Drive. Take immediate left at Westinghouse sign and drive straight through roundabout. Please park in the visitors parking places that are located on either side of the entry road.

• *Solar City Discussion on Residential Solar Energy*

Date: Monday, February 13 2017
Time: 6:00 PM dinner and discussion
Place: Old Energy Center Site: 4350 Northern Pike, Monroeville PA 15146

RSVP: Register at https://events.vtools.ieee.org/m/42825 by noon on February 13, 2017. Please provide telephone, email address, and IEEE membership number. This is a PACE event and the contact is Joe Cioletti (jcioletti@ieee.org).

Abstract: SolarCity is an American company that specializes in solar energy services. Headquartered in San Mateo, California, it is the largest solar energy services provider in the US. Among its primary services, the company designs, manufactures, permits, finances, sells, installs, maintains, and monitors solar energy systems and panels for residential, commercial and government applications. SolarCity sells renewable energy to customers at prices below utility rates, with a focus on reducing the cost of solar energy. The company has over 15,000 employees.

SolarCity was founded in 2006 by brothers Peter and Lyndon Rive, based on a suggestion for a solar company concept by their cousin, Elon Musk, who is the chairman and helped start the company. On August 1, 2016, Tesla Motors announced in a joint statement with SolarCity it would be acquiring the company in an all-stock $2.6 billion merger. More than 85% of unaffiliated shareholders from Tesla and SolarCity voted to approve the acquisition on November 17, 2016.

SolarCity is leading the US solar industry in innovation and overall installed rooftop capacity. As of November 2016, Solarcity has installed over 300,000 customers, which represent over 2.5 GW of solar capacity.

Biographies:

Patrick Rulong. Patrick is a Pittsburgh area native and graduated from Bethel High School. He has a B.A. in History/Political Science from Warren Wilson College and a master's in Sustainable Development from the University of Waterloo. He has lived in three foreign countries (China, Canada, and Malaysia) for school and work related purposes. His experiences abroad have been significant influencers upon his fervent passion for environmentalism. Now with over a year's experience of working within the solar industry he has helped many dozens of homeowners transform their homes into 'solar homes'. With a strong conviction towards the moral uprightness of sustainable energy and knowledge of the pragmatic economics behind solar energy, Patrick continues to be a top performing Energy Consultant for SolarCity in their Pittsburgh office.

Gail Raspanti. Gail grew up in Pittsburgh, PA. She attended Allegheny College, where she received a BS in Environmental Science with a strong focus on renewable energy. Upon graduation, she moved to Denver, CO and began working for SolarCity. At the time SolarCity was new to Denver and over the 4 years she lived there, she helped hundreds of homeowners go solar. A year ago she was promoted in SolarCity to a regional manager where she managed a team in Santa Cruz, California. During this time SolarCity opened in Pittsburgh, PA where she received a phone call to again move and help open the Pittsburgh market. She is happy to be back home and hopes to transform Pittsburgh into one of the greenest cities in the U.S.

DIRECTIONS TO WESTINGHOUSE ENERGY CENTER (MONROEVILLE)

From Pittsburgh take Interstate 376 East (Parkway East). Take Exit 84A to Monroeville. Cross Business Rt. 22 at the traffic light and proceed on Rt. 48 South (Moss Side Blvd) approximately ½ mile (two traffic lights). The 2nd traffic light is at a 4-way intersection with a Marathon station on the right. Turn left onto Northern Pike. Proceed approximately 0.2 miles and turn right at the 1st traffic light onto Westinghouse Dr. Travel 0.7 miles (past the guard stand) to the 3 flags where the building's main entrance is located. Parking in the evening will be plentiful. Use the main entrance and check with the security guards inside. You will be directed to the proper room for your meeting.

From the PA Turnpike, take Exit 57 (Monroeville). After the toll plaza, get in the left lane to get on Business Rt. 22 West. At the first light, turn left onto Rt. 48 South (Moss Side Blvd) and follow the above directions.

- ***Computational Science And Engineering Resources For West Virginia University Researchers***

Speaker: Nathan Gregg and Don McLaughlin
Date: Monday, Feb 13, 2017
Time: 5:00 PM – 6:00 PM
Place: G102 Engineering Sciences Building (ESB)
West Virginia University, Morgantown, WV

Abstract: This presentation will cover two closely related topics. The first of these will describe the computational resources managed by WVU's Information Technology Services to support computational science and engineering research at the University. Specific topics that will be discussed will include the University's high performance computing systems and how they may accessed and used by WVU researchers. The session will also describe the research computing program's high performance parallel storage system as well as the dedicated campus science DMZ network known as REX. There will also be a review of new storage service options that will be available to the WVU Research Community. The second part of this session will focus on computational science and engineering resources and services available through XSEDE. XSEDE is a program sponsored by the National Science Foundation to provide world class computational resources to researchers in academia. This portion of the seminar will describe the resources available through XSEDE and how WVU researchers can take advantage of them.

Speaker Bios:

Nathan Gregg – Nathan Gregg is the Manager of ITS' Research Computing Department. He has been working for WVU since 2013 and he is responsible for the daily operations of WVU's Research Computing Systems. Research Computing maintains WVU's two centrally shared high-performance computing systems Mountaineer and Spruce Knob. Along with Don, Nathan is also an XSEDE Campus Champion.

Don McLaughlin – Don McLaughlin is a part-time instructor in the Lane Department of Computer Science and Electrical Engineering. He spent several years working in the WVU Research Office where he managed high performance computing resources offered by the University. He also has served as an XSEDE Campus Champion since 2013. Don retired from WVU in 2015 but continues to teach an occasional course in the Lane Department. He also continues in his role as an XSEDE Campus Champion.

• *Multi-Terminal VSC HVDC Effective Power Sharing*

Speaker: Rajat Majumder, Ph.D, Group Manager, System Stability & Planning, Power System Engineering Services, Mitsubishi Electric Power Products, Inc.
Date: Monday, February 20th, 2017
Time: Refreshments - 6:30 PM; Presentation- 7:00 PM
Place: Westinghouse Energy Research Center
4350 Northern Pike
Monroeville, Pennsylvania 15146
Directions: See directions on the previous page.
Organizer: Power Electronics Society (PELS)

RSVP: **Required** at https://meetings.vtools.ieee.org/m/43342 by February 19th, 2017. If you are an IEEE member, you must enter your membership number. If you would like to receive PDH, please bring a copy of this announcement for verification of your attendance and your membership identification card. A non-member who would like to receive PDH is required to pay $10 to "IEEE Pittsburgh Section."

Abstract: Voltage Sources Converter (VSC) based HVDC is gaining momentum towards a potential multi terminal HVDC grid (MTDC). However there are some unique control challenges in control and protection before a MTDC grid could be made operational. One of them is following a converter outage in a MTDC grid, it is critical that the healthy converter stations share the power mismatch/burden in a desirable way. A fixed value of power-voltage droop in the DC link voltage control loops can ensure proper distribution according to the converter ratings. Here a scheme for adapting the droop coefficients to share the burden according to the available headroom of each converter station is proposed. Advantage of this adaptive (variable) droop scheme for autonomous power sharing is established through transient simulations on an MTDC grid with four bipolar converters and DC cable network with metallic return. Results for both rectifier and inverter outages under two different scenarios are presented. Post-contingency steady-state operating points obtained from transient simulation are shown to be consistent with those derived analytically. Impact of varying droop coefficients on the stability of the MTDC grid is established. An averaged model in Matlab/SIMULINK which has been validated against detailed switched model in EMTDC/PSCAD is used for the stability and modal analysis.

Speaker: Dr. Majumder manages and leads system stability team at Power System Engineering Services (PSES) Group in Mitsubishi Electric Power product Inc. (MEPPI). Provide leadership and technical direction to grow the existing business and add new business areas. Dr. Majumder was with Siemens Industry, Digital Grid Business Unit (2011- 2016) as a specialist Planning Consultant focusing of HVDC, FACTS and Wind Integration projects in the US. He was the primary technical interface with the lead design center in Germany and was involved in the very early stages of project development, working toward obtaining the interconnection service agreement for large HVDC/FACTS projects. In this role he had worked closely with various system operators and utility companies ensuring a satisfactory outcome of feasibility and system impact studies. Before joining Siemens, Dr. Majumder worked in ABB's Corporate Research Center in both Sweden and the US (2007 – 2011). He has led a number of very highly sensitive intellectual property R&D projects, with extremely successful outcomes. Some of his inventions have already been commercialized within ABB's FACTS product line. He has also worked as a lecturer in Power and Energy Systems at University of Queensland, Brisbane, Australia between 2006 – 2007.

- ***How to Get Published: An Inside View of the IEEE Peer-Review Process***

Speaker: Matt Valenti
Date: Monday, Feb. 20, 2016
Time: 5:00 PM – 6:00 PM
Place: G102 Engineering Sciences Building (ESB)
West Virginia University, Morgantown, WV

Abstract: Publishing in peer-reviewed journals and conference proceedings is an essential part of the research process. But to get published, you need to first understand the process. This talk gives a detailed, behind the scenes look at how papers are handled by typical journals and conferences. Specific case studies are provided, focusing on the flow from submission to acceptance (or rejection) and the Internet-based tools used to manage this flow. The first example is a journal — IEEE Transactions on Wireless Communications — which uses Manuscript Central to handle reviews. The second example is a conference — IEEE MILCOM — which uses the EDAS system. By understanding the process, you will be able to avoid common pitfalls and maximize the chances for acceptance.

Speaker Bio: When not teaching classes at West Virginia University, Matthew Valenti serves the IEEE Communication Society (ComSoc) in a variety of ways. He is the Chair of the Executive Editorial Committee for the IEEE Transactions on Wireless Communications. In this capacity, he serves directly under the Editor-in-Chief and oversees the pre-screening of 2,000 submitted papers per year. He has previously been an editor for IEEE Transactions on Communications, IEEE Wireless Communications Letters, and IEEE Transactions on Vehicular Technology. He is the Technical Program Chair for the 2017 IEEE Military Communications Conference (MILCOM-2017) and has served in various senior leadership roles and on the steering committee for MILCOM. He is on the technical steering committee for IEEE International Conference on Communications (ICC) and IEEE Global Communications Conference (GLOBECOM) and has served in various leadership roles for these conferences, including Technical Program Vice Chair for GLOBECOM-2013. In collaboration with his students, he has published 132 papers in peer-reviewed conferences and journals.

- ***Volunteer for the 2017 IndEEE 500 Robot Car Race***

It's time once again to plan for the annual Robotic Car Race IndEEE 500cm at Carnegie Science Center on Sat. Feb. 25, 2017. The Pittsburgh section of IEEE sponsors this event as a part of the annual National Engineers Week celebration at Carnegie Science Center and has been doing this successfully for last 24 years. Each year, this event has attracted over 30 volunteers, about 10-12 teams, a few hundred visitors and a couple of media representatives. Additionally, Carnegie Science Center is packed with exhibits on this day and you can find more information at http://www.carnegiesciencecenter.org/stemcenter/national-engineers-week/

NXT kits by Lego Mindstorms will be provided to competing teams for building and programming the autonomous robotic cars. The NXT provides new capabilities and with that we will provide new challenges to the students. We are seeking your enthusiasm and creativity, to help 8th grade students in building and programming the Lego cars and racing them on the 500cm tracks.

Working together with students, teachers and engineers from Pittsburgh is a wonderful opportunity for fun, networking, and giving back to the community. The program starts at noon and is over by 4:30 PM. Plan to arrive around 11:00 AM to get setup. Other minor perks include: free admission to Carnegie Science Center, t-shirt, food coupons, etc.

On Saturday, February 11th, we will hold a workshop at 2 PM for volunteers on the NXT hardware and programming. The workshop is necessary to get familiar with the NXT kits as well as make plans for the event. Please let us know if you or anyone in your network would like to volunteer for the 2017 IndEEE 500 Robot Car Race. ***Also, please let us know if your local school would like to participate.*** To volunteer or register your local school, just email tom.dionise@ieee.org, and you will be given more details and included in future mailings.

• *Engineer's Week 2017 – Call for Volunteers*

Once again the IEEE will have a demonstration table for Engineer's Week 2017 at the Carnegie Science Center on Saturday, February 25. The event table is a fun and effective way for the IEEE to communicate to our youth that electrical engineering can be both enjoyable and challenging. Volunteers are needed to take a turn at the table for about 1 hour each. If you are interested, please reply with the time slot you would like by February 18. The 1-hour slots will begin with the first at 10 AM and the last at 4 PM. The volunteers get an E-Week T-shirt, free admission, free parking, and $2 off coupon for family members. See more details in the February IEEE Bulletin.

To volunteer to help with the IEEE table for 2017 Engineer's Week, just email tom.dionise@ieee.org, and you will be given more details and included in future mailings.

• *2017 Power and Energy Society (PES) Outstanding Engineer Award*

The IEEE Joint Chapter of the Power & Energy Society and the Industry Applications Society of the Pittsburgh Section is seeking nominations from the local PES members for the 2017 PES Chapter Outstanding Engineer Award. The Outstanding Engineer Award is designed to recognize members of the Pittsburgh PES who have made outstanding contributions to their profession through their technical abilities and service to IEEE. The nominees will be judged mainly on the basis of their activities during the past two calendar years (2015 and 2016). Please nominate yourself or someone else by providing the following information:

- Name/IEEE Grade/IEEE Membership Number
- Professional Affiliations
- Description of technical contributions
- Service to IEEE
- Patents/proprietary designs/papers/technical presentations
- Service to the engineering profession outside IEEE
- Recognition through other honors

Nominations should be submitted to the Chapter Award Committee (Immediate Past Chair David Vaglia, davevaglia@ieee.org) no later than February 28, 2017. The decision of the Award Committee is final.

The winner will be recognized at the Pittsburgh Section's History Dinner in the spring of 2017.

- ***Covestro Female Engineer Named To Exclusive Forbes 30 Under 30 List***

Paige Kassalen singled out in recognition of her role on Solar Impulse ground crew

Pittsburgh, January 9, 2017 — Paige Kassalen, market analyst at Covestro LLC, is one of 600 individuals selected from a pool of more than 15,000 nominees to be named a member of the Forbes 30 Under 30 Class of 2017. Kassalen was named to the Energy list in recognition of her role on the Solar Impulse ground crew.

Covestro, a long-time leader in sustainability, played a key role in helping Solar Impulse achieve its mission to complete the first-ever, round-the-world flight without using a single drop of fossil fuel. A partner since 2010, Covestro provided advanced materials and technical expertise for several applications in the solar-powered airplane, including its silver coating, door, cockpit window and insulation. Covestro, which also strongly supports STEM education, selected Kassalen to represent the company during the plane's historic journey as a member of the ground crew. Kassalen was the first U.S. female engineer – and the youngest – to serve on this predominately male team.

"My experience traveling the world with Solar Impulse gave me a chance to apply my technical background in a new and exciting way," said Kassalen. "I'm grateful to Covestro for giving me this once-in-a-lifetime opportunity to represent the company and, in turn, enable me to show the next generation that if you pursue a career in STEM, the sky's the limit – literally!"

"Science is at the heart of everything we do at Covestro," said Jerry MacCleary, president of Covestro LLC in North America. "To continue to be a leader in materials technology that will solve the challenges of tomorrow, we need to ensure that we are inspiring the next generation of scientists. Through her role on the Solar Impulse team, and now as a mentor to other young women interested in STEM careers, Paige is doing just that."

Solar impulse was the mission of two pioneering pilots – Bertrand Piccard and André Borschberg – and a team of 90 engineers, technicians and mission controllers to fly around the world in a solar plane to explore and promote clean technologies. In July 2016, Solar Impulse successfully completed its mission, breaking aviation records along the way.

In August 2016, Covestro became the first partner of the International Committee for Clean Technology (ICCT). This organization, founded by the Solar Impulse pilots, strives to continue advancing clean technologies and sustainable solutions in line with the United Nations Sustainable Development Goals.

Paige is the chair of the IEEE Pittsburgh Section's Women in Engineering Affinity Group.

- ***IEEE Robotics and Automation Society Chairman's Notes***

Happy New Year (a month late). Apparently I am still on software development time! Even after retiring!

FIRST (For Inspiration & Recognition of Science & Technology) is in need of volunteers for the FIRST Robotics Competition at California University of Pennsylvania. Technical expertise is not needed. To volunteer go to www.firstinspires.org and follow the volunteers link.

On another note, I've been the RAS Chairman for 3 years. IEEE prefers that chairman serve only2 years. I can stay in the position. However, if there are any RAS members who would like the position, it is available.

With all of the robotics based companies and university robotics programs in the area, we should have a more active Society. What would you like our technical meetings to cover? Do you have a conference room we could use at your company?

Comments welcome.

Gene Kern

Pittsburgh Section IEEE Robotics and Automation Society
genekern@ieee.org

As a member of IEEE-Eta Kappa Nu (HKN), you are invited to attend the IEEE-HKN 2017 Student Leadership Conference!

Register Today

This year's conference will be held 31 March to 1 April and hosted by the Beta Chapter of Purdue University, West Lafayette, Indiana. The Beta Chapter is planning a program focused on "Worldwide Engineering" with sessions covering diversity, entrepreneurship, leadership, and technology. The conference will give you the opportunity to network with fellow IEEE-Eta Kappa Nu Members, participate in interesting sessions and, most importantly, have fun!

Travel Information
The conference events will take place at the Purdue Memorial Union. Hotel information will be provided to you once you have completed your registration. The nearest airports to the conference sites are Indianapolis International (65 miles), Chicago O'Hare (140 miles) and Chicago Midway (130 miles). Amtrak and Greyhound also serve the area, stopping at a station in Lafayette. From there, you can ride Greater Lafayette's CityBus system to Purdue (about 1.5 miles).

Travel Stipends
Please note that your registration fee, hotel, and travel costs are ***your responsibility***. IEEE-HKN Chapters are eligible to apply for a travel stipend up to US$250. The stipend will be received as a reimbursement following the conference. Please note this stipend is ***per Chapter***, not per student. An additional stipend of US$250 is available for attending faculty advisors.

Early Registration
Register by 1 March for the early registration fee of US$45! The registration fee will increase to US$55 after 1 March.

Alumni
Alumni are invited to attend the conference, with a registration cost of US$100 per person. Should you wish instead to support the Student Leadership Conference or your local chapters attendence, please consider donating to the HKN Student Leadership fund.

A suggested donation of:

- US$131 would cover the cost of one student attending
- US$250 would cover one Chapter attending
- US$500 would cover two Chapters attending

Space is limited, register today.

Learn more about today's IEEE-HKN and find opportunities to volunteer, participate, support, and stay involved. Visit www.hkn.org or email us: info@hkn.org.

2017 Calendar – Meetings of IEEE Pittsburgh Section

	Jan	Feb	Mar	Apr	May	June	July	August	Sept	Oct	Nov	Dec
Executive Committee (AdCom)	19 U Pitt Oakland	16 Panera Robinson										
Section		25 Engineers Week										
Communications												
Computer												
EMBS												
EMCS												
Power Electronics	18 Power Source Buffer	20 VSC-HVDC										
PES/IAS		9 Chernobyl										
Magnetics												
Robotics												
Sig. Processing												
CPMT/ED	25 Scientific Validity											
Social Impl Technology												
Upper Mon		13 Resources 20 Publishing										
Women in Eng'ing												
Life Mem.												
Young Pros												
PACE		13 Solar City										
Student Act												