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SUNCOAST

SIGNAL

THE INSTITUTE OF ELECTRICAL AND ELECTRONICS ENGINEERS, INC.

Volume 53 — No. 10

http://www.ieee.org/fwcs

THE

October 2010



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This Month's Meetings

Tuesday, October 5th: EXCOM Meeting
Meeting starts at 5:30PM At TECO Plaza
Register online at http://time2meet.com/fwcs-excom/index.html
Open to all FWCS Members

Net SILO Seminar, Meeting is open to all Thursday October 7th, 2010 7701 E. Telecom Pkwy Temple Terrace

Details on page 4!

Robotics and Automation Society Meeting

Tuesday, October 19th, 2010

Meeting Starts at 6:30PM, Social Time Starts at 6PM

Location is Subject to Change

Go to the RAS Page of FWCS Website for Latest Info!

LabCorp Tampa Tour

Thursday, October 21, 2010
Florida Division Main Facility, 5610 LaSalle Street, Tampa, 33607

<u>Details on page 7</u>

Upcoming Event!
Substation Commissioning Seminar
Friday, November 12, 2010

Seminole Electric, 16313 North Dale Mabry

Details on Page 6!

2010 IEEE EXECUTIVE COMMITTEE FLORIDA WEST COAST SECTION

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THE SUNCOAST SIGNAL is published monthly by the Florida West Coast Section (FWCS) of the Institute of Electrical and Electronics Engineers, Inc. (IEEE). THE SUNCOAST SIGNAL is sent each month to members of the IEEE on Florida's West Coast. Annual subscription is included in the IEEE membership dues. The opinions expressed, as well as the technical accuracy of authors, advertisers or speakers published in this newsletter are those of the individual authors, advertisers, and speakers. Therefore, no endorsement by the IEEE, its officers, or its members is made or implied.

All material for THE SUNCOAST SIGNAL is due in electronic form by 1st Sunday after the 1st Tuesday of the month preceding the issue month.

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This Month...(Editor's Column)

THE WEB IS DEAD! Or so says last month's article in Wired Magazine. Ten years ago it was a battle between Web browsers and as time progressed they became more interactive and threatened to replace PC applications. Now things are moving towards mobile computing on the iPhone model. Consumers are increasingly using smart phones for their daily computing and communications needs and apps are increasingly more capable. I personally find my self reaching for my iPhone more and more for the things I need to do. There are now tens of thousands of apps available for the iPhone and its competition and a whole industry has grown up around creating new ones. Don't worry, though. There will always be a place for the Web as there is a place for snail mail. It's just nice to have the option. The full article is available at www.wired.com







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Announcing IEEEXtreme 4.0

IEEEXtreme is a global challenge in which teams of IEEE student members – supported by an IEEE Student Branch, advised and proctored by an IEEE Member – compete in a 24-hour time span against each other to solve a set of programming problems.

IEEEXtreme Details

IEEEXtreme 4.0 is going to be held **23 October 2010**, starting at 00:00 GMT and ending 23:59 GMT.

Get your team members together, find a proctor, and start practicing your programming skills.

See <u>official competition rules</u> (PDF, 72KB) for more information on eligibility, requirements, prizes, problem samples, and judging.

Registration is open 1 September 2010 – 8 October 2010. Teams who register prior to 27 September 2010 will be entered into a drawing for a special prize. Please note the following:

- All team members and the team proctor must be IEEE members.
- All of the fields for all team members and the proctor are required, including member number, first and last names, e-mail address, and T-Shirt size.
- Submitted information will be used for communication, certificates, and other competitionrelated activities.
- Once the form is submitted, the data can not be modified.
- Upon form submission, all team members and the team proctor will receive a registration confirmation by e-mail.

gister at http://xtreme.vtools.ieee.org/



IEEE 802.11 Working Group Celebrates 20 Years

Many Contributions to Wireless Local Area Networks Group commemorates its ongoing, industry-making role and contributions to today's global wireless computer communication networks

13 September 2010 – The IEEE 802.11 Working Group is celebrating its 20th anniversary as an active wireless standards development organization. When project IEEE 802.11 (Wireless Local Area Networks, WLAN) was created in September of 1990, its original goals were to bring together forward-thinking technology leaders to develop interoperable wireless standards reaching a data rate of over 1 Mb/s. Nineteen years later the working group produced IEEE Std 802.11n, which provided a 600-fold increase in data rate. The newest project goals are to extend the data rate to 5000 Mb/s (5 Gb/s).



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USA Science and Engineering Festival

The Inaugural USA Science & Engineering Festival, hosted by Lockheed Martin, is the country's first national science festival and descends on the Washington, D.C. area in October 2010. Opening on 10/10/10 with a concert of amazing science songs performed by over 200 children and adults at the University of Maryland, the Festival promises to be the ultimate multi-cultural, multi-generational and multidisciplinary celebration of science in the United States. The culmination of the Festival will be a free, two-day Expo on the National Mall and surrounding areas that will feature over 1500 fun, hands-on science activities and over 50 stage shows and performances on four stages. The Festival is a grassroots collaboration of over 500 of the nation's leading science organizations. The Festival has a bipartisan Honorary Congressional Host Committee with over 100 Members supporting its efforts.

http://www.usasciencefestival.org



Net SILO Architecture Seminar

In this talk we will present the Net SILO architecture of fine-grain services for the Future Internet (http://net-silos.net/). The design of the architecture is based on three fundamental principles. First, SILO generalizes the concept of layering and decouples layers from services, making it possible to introduce new functionality and innovations. Second, cross-



layer interactions are explicitly supported by extending the definition of a service to include control interfaces that can be tuned externally so as to modify the behavior of the service. The third principle is "design for change". The architecture does not dictate the services to be implemented, but provides mechanisms to introduce new services and compose them to perform specific communication tasks. We will present the

components of the architecture and the prototype software implementation. We will also describe ongoing work on deploying SILO within the GENI test bed to enable advanced cross-layer experimentation in the optical substrate by harnessing new capabilities available within an emerging intelligent and programmable optical layer.

George Rouskas is a Professor of Computer Science at North Carolina State University. He received the Ph.D. and MS degrees in Computer Science from the College of Computing, Georgia Institute of Technology, and an undergraduate degree in Computer Engineering from the National Technical University of Athens (NTUA), Athens, Greece. His research interests are in network design and optimization, network architecture, and performance evaluation. He is the author of a book on "Internet Tiered Services" (Springer, 2009), co-editor of the book "Traffic Grooming for Optical Networks" (Springer, 2008), and co-editor of the upcoming book "Next-Generation Internet Architectures and Protocols" (Cambridge University Press, 2010 He is a recipient of a 1997 NSF AREER Award, the 2004 ALCOA Foundation Engineering Research Achievement Award and the 2003 NCSU Alumni Outstanding Research Award, and he was inducted in the NCSU Academy of Outstanding Teachers in 2004. He is the founding editor-in-chief of the Optical Switching and Networking journal, and is serving as the co-chair of the Optical Networks and Systems Symposium for IEEE Globecom 2010 and as co-chair of the IEEE ICCCN 2011 conference. He has served as associate editor for IEEE/ACM Transactions on Networking and the Computer Networks journal, and he has organized several networking conferences.

It is important that you add your name to the attendees list to reserve your seat.

PLACE Verizon 7701 E. Telecom Pkwy Temple Terrace, FL 33637Auditorium - 1st Floor Note: Must bring a valid picture ID (Driver License) for entry into the building (no exception).

DATE: Thursday October 7th, 2010

TIME: 5:45PM to 7:30PM COST: \$5 for students (w/ student ID), \$10 for IEEE members (w/ IEEE member ID) and \$20 for non-members. Soft drinks and food will be provided. Please bring cash or check.

Off East Fletcher Ave., close to the exit 266 of Interstate 75 If you have any immediate questions please call Hector A. Martinez -(850)339-5943



Tampa Bay Engineers Week Banquet Coming Soon

We are pleased to announce that the **Tampa Bay Engineer's Week Banquet will be held February 25, 2011** at A la Carte Pavilion. Please join us at this elegant gathering to celebrate the 61st National Engineer and to recognize many contributions made to society by those in the engineering profession.

The evening will feature fine dining, a guest speaker (to be announced), and an exhibition room for vendors. And we are expecting as many as four hundred or more attendees including 250-300 engineers, so you will plenty of opportunities to meet with friends and colleagues in the Tampa Bay technology community.

In keeping with the spirit of the event, awards will be given to accomplished engineers in each engineering discipline and to local university students who excel in engineering related studies. We will also be honoring select local high school educators with the Lignell Award for their outstanding instruction in the area of science, technology, engineering and mathematics.

We hope you will consider being part of this outstanding event to recognize those in the Tampa Bay area who are doing so much to promote engineering.

Career Survival for Engineers and Scientists in the 21st Century



A one day career management seminar provided by IEEE-USA Career & Workforce Policy Committee (CWPC) in cooperation with IEEE-USA Employment and Career Services Committee (ECSC) and Hosted by IEEE Region, IEEE Canaveral and Orlando Sections, Florida SBDC and the City of Cocoa, Office of Economic Development.

Date: Saturday, October 23, 2010 **Time**: 8:00 AM – 5:00 PM

Location: Cocoa Civic Center, 430 Delannoy Avenue, Cocoa, FL 32922

Cost: \$20 for IEEE members; \$30 for non members, \$10 for students, \$10 unemployed. Includes coffee, lunch, and

handout of slides

IEEE-USA and IEEE Region 3 care about your career development. This Career Workshop provides practical and powerful strategies to maximize your career talents presented in a positive and entertaining way. This program will open your eyes and senses to see your career in a brand new light. You can not afford to miss this perception-changing career makeover program.

Every mega trend requires new frontiers, new visions, new tools, and new problem solving skills. The latest trend is globalization of commerce, science and technology development. Change is the only unchangeable force in nature. Engineers' and scientists' career markets have gone through the following paradigms:

I. 1950s-1960s: Secure engineers in corporate world

II. 1970s-1980s: Restless and trend-knowledgeable engineers

III. 1990s-2000: Project-based engineers

IV. Future Trend: Globalization, Globally competitive engineers

The goal of this Career Workshop is to empower engineers, technologists, and scientists and their profession to take control of their careers.

Objectives and Outcomes

The goal of this seminar is to teach you how to help yourself manage/run your career in this era of globalization and selective hiring.

You will learn about:

- Changes in job market, list of resulting challenges
- Job market requirements, how you relate to market, your business model
- Analyzing personal factors impacting adapting to new workplace
- Starting a personal career plan, values statement, and branding
- New methods of job search, and begin development of your elevator pitch
- Understanding the interview process, what to expect, how to present yourself
- How to help yourself using IEEE resources and be motivated to try new job search approaches

Speakers

- Ed Perkins past chair of IEEE-USA CWPC
- **Henry Lindborg** is a recognized expert in organizational program development and planning, management consultant and career coach.
- Tarek Lahdhiri is the CWPC Outreach Vice Chair.
- Charles J. Lord, IEEE Region 3 Leadership and Regional Support Chair









Substation Commissioning Seminar

Date: Friday, November 12, 2010

Time: Seminar: Registration 8:30am-9:00am, Speaker 9:00am-3:00pm

Speaker: Alberto Gutierrez, Doble Engineering and Ghaff Khazami and Nelson

Barbeito - Megaway Inc. Consulting Engineers

Location: Seminole Electric, 16313 North Dale Mabry

Hwy, Tampa, FL 33618

Cost: \$100 Members, \$150 Non-Members, \$50 Students. (Includes Lunch)

PDH Credit 5 professional development hours will be awarded. Be sure to enter your name and PE number

on the signup website as it appears on your license.

RSVP: Online at: http://time2meet.com/fwcs-pesX/index.html

Make checks payable to: IEEE FWCS

Send checks to: John Stankowich, IEEE PES/IAS Treasurer

2593 Forest Run Court Clearwater, FL 33761-3716

Space limited to the first 45 registrants!!!

Cancellation must be submitted online 24 Hrs prior to the seminar at:

http://time2meet.com/fwcs-pesX/index.html

No shows will be invoiced for the total cost of the seminar.

Questions: Serge Beauzile at 863-834-6511 or Serge.Beauzile@lakelandelectric.com

TOPICS:

- Substation Design process and equipment selection
- Substation Commissioning process
- Surge Arrester Testing
- Transformer Testing
- Current Transformer Testing
- Circuit Breaker Testing
- Power Transformer Testing
- Shunt Reactor Testing
- Capacitor Bank Testing
- Protective Relaying Testing
- Substation Grounding Design and Testing

Ghaff Khazami is a Senior Member of IEEE, former PES/IAS Chairman for FWCS of IEEE and Vice-President of Megaway Inc. Consulting Engineers in Tampa. Ghaff is an alumnus of the University of South Florida, Electrical Engineering. He is a registered Professional Engineer in the states of Florida, Georgia, and Wisconsin. **Alberto Gutiérrez** (M 1973) has a BEE (Bachelor of Electrical Engineering, 5 year program) from the City College of New York, a Master of Science from Columbia University and a Certificate of the Power System Engineering Program from GE (Schenectady, NY).

Has 26 years of experience in the power industry, including electric utility companies, consulting engineering companies and teaching in universities of the USA, Colombia and México.

Nelson Barbeito graduated from Christian Brothers University in Memphis Tennessee 1968 after which he started his career with one of the major Power Utilities in the State of Florida. During his tenure Mr. Barbeito's assignments included bulk power and distribution substation projects, including the first 500 kV substations in the State.









LabCorp Tampa Tour

Sponsors: Jointly Sponsored by PE/IA and the EMB Chapters

Date: Thursday October 21, 2010

Time: 4:00PM -5:00PM

Speaker: Thomas Herman, PhD, Technical Director

Location: Florida Division, Main Facility, 5610 West La Salle Street, Tampa, FL 33607

(Can be accessed by turning north at the west limit of Cypress street)

Cost: Free of Charge to attend!

RSVP: Online at: http://time2meet.com/fwcs-pes3/index.html

Space limited to the first 20 registrants!!!

Questions: Tim Doolittle at 813-892-7190 or tdoolittle@fastmail.fm

With scientific expertise in esoteric testing, genomics, and clinical and anatomic pathology, LabCorp performs more than one million tests on approximately 400,000 samples each day. LabCorp is a pioneer in applying advances in medicine and science to laboratory testing, with more than 35 years of experience in serving physicians and their patients.

LabCorp operates a sophisticated laboratory network, with corporate headquarters in Burlington, NC, and over 28,000 employees worldwide. Their 220,000 clients include physician offices, hospitals, managed care organizations, and biotechnology and pharmaceutical companies.

The headquarters for the Florida Region, the Tampa LabCorp facility processes over 30,000 samples on a 24/7 schedule using sophisticated and sensitive automation equipment from companies like Siemens, Beckman-Coulter, Sysmex, and others, each with specialized infrastructure and utility requirements.



Teacher in Service Update

Welcome to the new School Year of 2010-2011. The following are important announcements for education and engineering around the Tampa Bay Area. Please continue to browse the Teacher In Service Lesson Plans at the following URL for topics: http://www.ieee.org/web/education/preuniversity/home.html or www.tryengineering.org. We want to assign an engineer to a project that is appropriate for your science educators. We encourage every school to take a look at the lesson plans. I need you to pick a lesson plan most appropriate for the event. Please contact me at wenner20@ieee.org to ask an engineer to do a presentation for your school going forward. The Great American Teach-In will be November 18th. Hillsborough County Schools provided me with the necessary application forms for their district. If there is any other School district that needs to provide their Great American Teach-In applications, please forward them to me at your earliest convenience. We ask all IEEE members and Certified Engineers to volunteer with your local schools. Please let me know if you are volunteering so that I can provide you with IEEE surveys that need to be given and collected. The IEEE is dedicated to also helping your districts as well.

I wish to announce there will be a significant update to the nominations of the Lignell Outstanding Teacher Awards to be given at the Tampa Bay Engineering Week Banquet (TBEWB) on February 25, 2011 at the A La Carte Pavilion in Tampa. The first time this Fall, the TBEWB Committee and the FWCS IEEE have agreed to expand to all 12 counties that the FL West Coast Section covers. These counties include: Charlotte, Citrus, DeSoto, Hardee, Hernando, Hillsborough, Lee, Manatee, Pasco, Pinellas, Polk, and Sarasota Counties. We are still going to choose three Science or Math High School Teachers which will be the best of the best. More information will follow in the coming months. Nomination forms and explanation letters have been sent out via e-mail. They need to be forwarded electronically to all High Schools in the 12 aforementioned districts. I need the completed forms before the Christmas break either by mail (5545 Dartmouth Ave. N. St. Petersburg, FL, 33710) or email venner20@ieee.org. The TBEWB committee will pick the top three and ask the nominators to write a copy ready bio on the winning educator. I'll give more information in January on that.

Sean Denny

Institute of Electrical and Electronics Engineers, Inc. Florida West Coast Section 3133 W. Paris Tampa, Florida 33614



Florid West Coast Section, Tampa

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Or fax your address changes to (732) 562-5445

October 2010 Calendar of Events (For more information see P. 1) inside this Signal...

Sunday	Monday	Tuesday	Wednesday	Thursday	Friday	Saturday
26	27	28	29	30	1	2
3	4	5 EXCOM at TECO Plaza, See page 1	6	7 Net SILO Seminar, see page 4	8	9
10	11	12	13	14	15	16
17	18	19 RAS Meeting, See page 1	20	21 LabCorp Tour, see page 7	22	23 Career Survival Seminar, see page 5
24	25	26	27	28	29	30