



THE INSTITUTE OF ELECTRICAL AND ELECTRONIC ENGINEERS, INC.

## September PES/IAS Chapter Meeting Tour at Tampa Armature Works

- Date/Time:** Thursday, September 23, 1999 4:30 PM
- Location:** Tampa Armature Works  
440 South 78<sup>th</sup> Street, Tampa
- Cost:** \$5.00 per member, \$10.00 non-member  
See page 3 of this newsletter for how you can  
attend this meeting for **FREE**

**Reservations :** Contact James Reed at 813-654-8331 or e-mail jamesreed@ieee.org or Paul Leal at 813-635-1411 or e-mail paulleal@ieee.org

**Reservations must be made no later than Sept. 17th, 1999!**

Ever wondered how or where to get a 7000 HP motor rebuilt or repaired? How about a critical motor, of any size, that you need repaired or replaced in a short turn-around time (like you need it yesterday)? Or, if it is less expensive to repair your large motor than replace it? These are questions Tampa Armature answers each and every day. Their facilities are capable of repairing almost any size or shape motor and you will get a chance to see just how they accomplish this tremendous task.

In addition, Tampa Armature Works (TAW) handles all the controls and distribution equipment for industrial customers. From switchgear to motor control assemblies, from programmable logic controllers (PLC's), to AC drives, from pump motors to draglines, they are prepared to help the Industrial and Commercial customers with all their needs in a timely manner.

Be sure to make your reservations early and join the group as they gain knowledge and information about this valuable resource you may need to keep your company up-and-running today, tomorrow, and into the future.

### Inside this issue of the Suncoast Signal

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*September 1999*

## **Chair's Comment**

by Al Rosenheck

In 1997 Florida Gulf Coast University opened its doors to make available higher education in the Fort Myers and Naples area. Later in that same year, the Southern Association of Colleges and Schools accepted FGCU as a candidate for accreditation. In 1999, FGCU was granted accreditation subject to follow-up on five items. This is good news since accreditation is important to universities as it provides recognition to peers and employers that the university meets its academic promises. Accreditation facilitates the transfer of students to other educational institutions, validates their studies and is tied to federal financial aid.

Still, however, FGCU does not offer an engineering program, that is until now. Under a new distance learning program recently started at FGCU, students may take general education and pre-engineering courses at FGCU and their engineering classes at the University of Central Florida in Orlando via video conferencing. Graduates will earn a Bachelor of Science degree from UCF. The video conferencing system is installed and paid for by a \$94,000 grant from the State Board of Regents. The local Fort-Myers News Press said that thus far nineteen students have enrolled in the FGCU-UCF engineering program. It is interesting to note that UCF offers similar distance learning programs for students in Orlando, Daytona, Cocoa Beach and Tampa.

The FGCU strategy is to offer distance learning programs that are in demand that they themselves cannot offer due to budget limitations. FGCU consulted with the Southwest Florida business community and found their needs are for employees with engineering degrees.

Sounds like there is a need developing for a IEEE Student Branch at FGCU!

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Web Page <<http://ewh.ieee.org/r3/floridawc>  
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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.

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All material for THE SUNCOAST SIGNAL is due by the Friday following the 1st Thursday of the month preceding the issue month. Address all correspondence to:

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## Florida Counsel and Region 3 Awards 1999 IEEE EXECUTIVE COMMITTEE

The Florida Counsel of IEEE and Region 3 both sponsor awards that give us the opportunity to recognize Florida West Coast Section members that have contributed to our electro-technology industry and to our professional organization. These awards are for Outstanding Service, Outstanding Engineering Educator, and Outstanding Engineer. All that must be done to get the ball rolling to prepare a nomination is to call any member of the FWCS Executive Committee with a name, and we will do the rest to place an outstanding area engineer in contention! September is a great time to think of that coworker or fellow Section member that deserves recognition.

### Students Corner

by John Tatum

Welcome Back!!!

I hope that all students had a relaxing summer. Here we are, academia has marched forward and we are now into the fall session at USF. The IEEE student branch is in full swing. Our first meeting will be Wednesday, September 8th at which we will promote our back to school social later that month. We are planning some late festivities at the Riverfront Park.

### Speakers and Recruiters

We still have available venues for a few guest speakers this fall. If you have a topic in which you would like to share your expertise, the students of the IEEE would love to be your audience. The stage is also open to recruiters and human resource departments who may wish to attract our bright and motivated young up-and-coming EE's.

### Open For a Tour?

One of the most common suggestions that I receive from the IEEE Student Members is that they enjoy touring the facilities of our local industry and see technology in action. If you believe that the IEEE Student Branch could be afforded a visit to your facilities please contact me at [johntatum@ieee.org](mailto:johntatum@ieee.org) or voice at (813)974-4776

Please give me the name of a contact person with your organization with an e-mail address or phone number.

Thanks for all of your support.

### USF Engineering Alumni Bull Session is back!!!

Date:	September 23, 1999
Time:	5:30 PM - 7:30 PM
Cost:	Free to paid USF Alumni Association Member
Location:	Landry's Seafood House Courtney Campbell Causeway, Tampa

Come and help the USF BULLS kick off the football season with food and drinks out on Landry's Deck. The cost is free to paid USF Alumni Association Members and \$10 for non-members, or free if fill out the USF Alumni form (print from <http://www.usf.edu/alumni/aaapp.html>) and pay dues.

RSVP to Rose at (813)974-2222 or [rwagner2@eng.usf.edu](mailto:rwagner2@eng.usf.edu) before September 10.

# PE/IA Additional Meetings for September

## Tour of Lazzara Yachts

### Joint with the ASME

**DATE/TIME:** Wednesday, September 15, 1999 6:30 PM

**LOCATION:** 5250 W. Tyson Ave. (Near Westshore & Gandy in Tampa)

**RESERVATIONS :** Contact James Reed at 813-654-8331 or e-mail jamesreed@ieee.org or Paul Leal at 813-635-1411 or e-mail paulleal@ieee.org  
**Reservations must be made no later than September 13th, 1999.**

**DINNER:** Dinner is optional at Jimmy Mac's after the tour. You must let them know if you will attend the dinner when you make your reservations.  
**Cost is \$16.00 per person**

Lazzara Yachts makes 70 foot plus Mega Yachts for customers around the world. These yachts are basically small self-contained cities capable of producing their own water and electricity. They contain some of the most state-of-the-art communication and navigation system available. Come join us as we experience the way these yachts are designed and built.

A special thanks to the ASME for allowing us to join with them in this unique tour.

## The Internet - Drastically Changing all Business Models

### Joint with the ISA

**DATE/TIME:** Monday, September 20, 1999 7:00 PM

**PRESENTATION:** Mr. Arnie Ellini, President of ContactWise

**LOCATION:** Radisson Hotel at Sable Park  
10221 Princess Palm Ave.  
Tampa, Florida  
Phone: 813-623-6363

**RESERVATIONS :** Contact Charles Drane - Program Chair for ISA 813-627-0603

This is the first meeting for ISA's new year. Please join us to hear this enlightening presentation on drastically changing all business models by the internet.

## Upcoming Meetings:

October - Meeting on the Rebuild of the City Waste-To-Energy Plant  
(Joint with ASME)

November - Dr. Durrance, Retired Astronaut and Professor from University of Central FL.  
(Joint with ASME)

## Want to attend September PES/IAS meeting FREE?

Membership Drive will be the focus of the Florida West Coast Section at this meeting and upcoming meetings. The cost to attend this meeting is waived and it's easy, just **bring a non-member guest who is eligible to join the IEEE** or bring a completed **Senior Member application** for yourself and your meal is free for both you and your non-member guest.

## by Butch Shadwell

### August BTC Solution

My nephew got the answer to last month's problem immediately. All he needed was a little high school chemistry. Beyond his personal hygiene issues Fred also lacked the knowledge that water is not a conductor. It only conducts electricity when it has been contaminated with a substance that will produce free ions in the solution, or if it is heated to the point that it changes to plasma (but of course it's not really water anymore at that point).

Don't forget, you can avoid some of Fred Smith's problems if you will simply give your grocery bag person (as well as everyone else) a pleasant smile and 'hello' once in a while.

### September BTC

You know, writing a column like this one attracts all sorts of letters and requests. I generally ignore the ones involving stuffing something somewhere, but I have had quite a few requests for a brain teaser challenge involving cheese. I am beginning to wonder if this piece is being distributed in institutions for the emotionally challenged.

Most of you don't know of my predilection for places of archeological significance. However, I lack an appreciation of digging. So I generally restrict you investigation to the last two or three years. That way I don't have any serious earth moving issues. In three years the intervening layers of sediment are usually only two or tree millimeters thick and in fact most of the time, some portion of the artifacts are still sticking out of the ground. I can't tell you the thrill of uncovering some new fact about the culture of some little explored region (like Jacksonville Beach) from the recent past. One of the most interesting digs I have done was in Yulee, Florida. I found a spot in a relatively undeveloped part of town, where with just a little effort and archeological scientific method, I was able to determine to most popular beer in the region for each of the last five years. Now for the interesting part- Interspersed among the crushed beer cans were the usual assortment of chewing tobacco sacks and beef jerky wrappers, but to my surprise there were also quite a few remnants of cheese stick packaging. Upon reviewing some of the cheese packaging, I realized that the logos on the packages didn't match the time strata in the dig site. I wondered if the indigenous beings may have stumbled across a much older supply of cheese and with total disregard for the expiration dates, ate them anyway. As luck would have it I was able to recover small morsels of cheese from several layers. Thanks to my remarkable eclectic reading list, I recalled an article from Popular Cheese that described a new cheese dating method involving light absorption. It seems that as cheese gets older it tends to absorb less light at 640nm. The question this month is which LED might be closest to the wavelength of interest for cheese dating, a green, yellow, or red one?

Reply with the IEEE Florida West Coast Section Suncoast Signal reference to Butch Shadwell by the 20th at (904)223-4465 (voice), 904-223-4510 (fax), b.shadwell@ieee.org, 3308 Queen Palm Dr., Jacksonville, FL 32250-2328. (<http://www.ccse.net/~butchs/>). Only the names of correct respondents are mentioned in the solution column on the next Signal.

### Electrical Designer (IE potential)

Electrical CAD technician (AutoCAD 14), Long & Associates, Engineers/Architects, Inc., a full service design firm, is seeking personnel for the following positions: lighting, power distribution, fire alarm, data, and telecommunications system design for educational, commercial, government, and industrial projects should send their resume and letter of interest to:

Curt Wasko, PE  
Long & Associates, Engineers/Architects, Inc  
4525 S. Manhattan Ave  
Tampa, FL 33611

Salary commensurate with experience. Inquiries will be held in strict confidence. No calls or faxes please.



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**/ 2000**

**May 23 - 25, 2000**

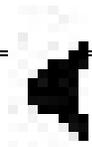
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**SENIOR PRODUCT ENGINEER**

Provide technical support for R & D. design modifications to existing products, and technical support to Production and Quality. Also support customers for application issues, trouble shooting and field repair.

BSEE with 2 to 4 years related experience and/or training exp. in a manufacturing environment. Knowledge of Beckwith products a plus. Knowledge of electronic circuit analysis (both analog and digital.)

**SENIOR SOFTWARE ENGINEER**

Research, design and develop computer software systems in conjunction with hardware product development for power system protection and control products. Duties involve engineering and consultation with customer and technical responses as well as coordination of installation of system systems.

BSEE with 3 to 5 years related experience and/or training. 3 to 5 years in software coding using Assembly, "C", "C++". Familiar with high speed serial communication protocols and developing algorithms on microprocessors. Experience in developing products for power system control and protection.

**SENIOR DESIGN ENGINEER**

Develops digital electronic circuits by analyzing product or equipment specifications and performance requirements. Determines feasibility of designing new or modifying products and provides technical information concerning manufacturing or processing techniques and processes.

BS/BA and 3 to 5 years experience and/or training including design experience for the power industry, including the development of digital /analog hardware.

**TECHNICAL WRITER**

High level writer needed to develop, write and edit material for instruction books, application guides, specification sheets and technical papers concerned with installation, operation and maintenance of products and equipment. Operates IBM-PC/Macintosh computer system, primarily using desktop publishing. Writes patents and assist in software and hardware documentation. Writes research reports for R & D contracts.

Four year degree or demonstrated competence in Electrical Engineering. Additional degree or demonstrated competence in English or Communications. Five years experience in power utility industry. Familiarity using word processing, desktop pub, and illustration package.

Post-offer physical and drug screen, criminal background check, educational verification, positive reference check. Post offer worker's comp history search. Please mail with salary requirements. Mail , email or drop off resume. Fax resume to (727) 544-2015 Email: [lgrady@psinet.com](mailto:lgrady@psinet.com) Applications accepted Mondays to Fridays 8:00 am – 4:30 pm.





# September 1999 Calendar of Events

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Sunday	Monday	Tuesday	Wednesday	Thursday	Friday	Saturday
			1	2	3	4
5	6 Labor Day	7 IEEE-FWCS Executive Committee Mtg at TECO Data Ctr 6:00PM	8	9	10	11
12	13	14	15 PE/IA/ASME Joint Meeting Tour of Lazzara Yachts 6:30 PM	16	17	18
19	20 PE/IA/ISA Joint Meeting - Business Models 7:00 PM at Radisson Hotel at Sable Park	21	22	23 PES/IAS Mtg Tour of TAW 4:30 PM; USF Bull Session 5:30PM at Landry's	24	25
26	27	28	29	30		

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**DATE SENSITIVE MATERIAL. DO NOT DELAY**

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