



# THE IEEE NORTH JERSEY SECTION NEWSLETTER

Vol. 58, No. 6

OCTOBER 2011

## In this issue

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- Announcement: Life Grade Lunch
- North Jersey Section Seeks Nominations for Committee Chairs, Chapter chairs, Volunteers, and Section Officers
- IEEE Pre-College Activities provides: Pre-College Cyber Defense Competition
- Welcome to New Members
- Program: 26<sup>th</sup> Annual Symposium and Mini-Show
- 2011: North Jersey Section Roster

## Calendar of Upcoming Events and Section Activities:

- Oct 05, 2011: 6:00 PM – 8:45 PM  
[North Jersey Section EXCOM Meeting](#)  
Location: Alcatel-Lucent Bell Laboratories Activity Meeting-Room 6A106, 600, Mountain Ave., Murray Hill, NJ 07974  
Contact: Naresh Chand - [chandnaresh@gmail.com](mailto:chandnaresh@gmail.com) or Adriaan J. van Wijngaarden - ([avw@ieee.org](mailto:avw@ieee.org)) (973)-738 3393
- Oct 05, 2011: 5:30 PM – 7:00 PM  
[IEEE Day-Stevens IEEE Kickoff Event](#)  
Location: 1 Castle Point on Hudson, Hoboken, NJ 07030  
Contact: John Taylor- [john.taylor86@live.com](mailto:john.taylor86@live.com)
- Oct 06, 2011: 9:00 AM TO 5:00 PM  
[26<sup>th</sup> ANNUAL SYMPOSIUM AND MINI-SHOW](#)  
Location: Hanover Manor, 16 Eagle Rock Ave., E. Hanover, NJ 07936. Ph#973-992-7425  
Contact: Kirit Dixit - [kdixit@ieee.org](mailto:kdixit@ieee.org) or Har Dayal - [dayalhar@gmail.com](mailto:dayalhar@gmail.com)
- Oct 11, 2011: 7:00 PM TO 8:30 PM  
[Protecting Smart Grid Automation System against Cyber Attacks](#) - Dong Wei  
Location: Muscarelle Center, Auditorium 105 Fairleigh Dickinson University, 1000 River Rd, Teaneck, NJ 07666  
Contact: Dr. Yun Q. Shi, (973)596-3501, [shi@njit.edu](mailto:shi@njit.edu), Dr. Alfredo Tan - [tan@fdu.edu](mailto:tan@fdu.edu) (201) 692-2324, or Dr. Hong Zhao- [zhao@fdu.edu](mailto:zhao@fdu.edu), 201-692-2350
- Oct 12, 2011: 6:00 PM TO 9:00 PM  
[Time Domain Method for Measurement of S-Parameters of Passive Devices](#) - Alan Blankman: Signal Integrity Product Marketing Manager, LeCroy Corporation  
Location: NJIT ECE Center Room 202, Intersection between Warren & Summit Streets, Newark, NJ 07102  
Contact: Russell C. Pepe 201-960-6796, [rcpepe@ieee.org](mailto:rcpepe@ieee.org)
- Oct 12, 2011: 6:30 PM TO 9:00 PM  
IEEE NNJ Section PACE presents: ENGINEERS MEET FOR: An OCTOBER SOCIAL  
Location: Clifton Memorial Library, 292 Piaget Ave. Clifton NJ 07011  
Contact: Paul Ward, 973 790-1625. [peward@ieee.org](mailto:peward@ieee.org), Richard F. Tax, 201- 664-6954, [rtax@verizon.net](mailto:rtax@verizon.net)
- Oct 12, 2011 through December 7, 2011: 6:30 PM TO 9:00 PM  
[C# .NET Programming 8-Weeks Course](#)  
Location: NJIT, Newark, NJ 07102  
Contact: Donald Hsu- [yanyou@hotmail.com](mailto:yanyou@hotmail.com). You will receive a reply within 24 hours.
- Oct 15, 2011 through December 10, 2011: 9:30 AM TO 12:00 PM  
[Project Management 8-Weeks course](#)  
Location: Fairleigh Dickinson University, Teaneck, NJ 07666  
Contact: Donald Hsu, [yanyou@hotmail.com](mailto:yanyou@hotmail.com) You will get a reply within 24 hours
- Oct 17, 2011: 9:30 AM TO 11:00 AM  
[Seminar on Artificial Pancreas: Combining Engineering with Medicine](#) - Youqing Wang, Professor in College of Information Scier Technology, Beijing University of Chemical Technology  
Location: ECEC Room Number: 202, 140 Warren St. Newark, NJ 07102  
Contact: Prof. MengChu Zhou (908-268-1183) or Dr. Raquel Perez-Castillejos. E-Mails: ([ZHOU@NJIT.EDU](mailto:ZHOU@NJIT.EDU)) or ([RaquelPC@njit.edu](mailto:RaquelPC@njit.edu))
- Oct 24, 2011: 6:30 PM TO 8:30 PM  
Entrepreneurial Inventiveness - Randall Vendetti of Techne Synergies, LLC  
Location: Morris County Library, 30 East Hanover Avenue, Whippany, NJ  
Contact: Robert Walker, 973-728-0344

For updates and registration of events please visit:  
[http://webinabox.vtools.ieee.org/wibp\\_calendar/index/R10327](http://webinabox.vtools.ieee.org/wibp_calendar/index/R10327)

## Calendar of Upcoming Events and Section Activities cont'd:

- Oct 26, 2011: 2:30 PM TO 5:00 PM  
[How to Become an Innovation Sherpa®](#) - Joe Nadan of NYU-Poly  
 Location: Campus Center Atrium, 323 ML King Blvd, 161 Warren St, Newark, NJ 07102  
 Contact: Dr. Durga Misra (973) 596-5739 ([dmisra@njit.edu](mailto:dmisra@njit.edu)) or Dr. Edip Niver (973) 596-3542 (NJIT)
- Oct 26, 2011: 6:00 PM TO 8:00 PM  
[COMSOC Distinguished Lecture: Game-Theoretic Design for Networked Communities](#) - Professor Mihaela van der Schaar of Chancellor's Professor of Electrical Engineering  
 University of California, Los Angeles  
 Location: ECEC Room Number: 202, 140 Warren St. Newark, NJ 07102  
 Contact: Nirwan Ansari (973) 596-3670. Check <http://web.njit.edu/~ieeenj/comm.html> for latest updates
- October 27, 2011: 11:30 AM TO 2:30 PM  
[Life Grade Luncheon - Hamilton Park Conference Center](#)  
 Location: 175 Park Avenue, Florham Park, NJ 07932  
 Contact: Kenneth Oexle, 11 Deerfield Road, Whippany, NJ 07981  
 Reservations are required.
- Oct 28, 2011: 9:00 AM TO 2:00 PM  
[Electrical Testing of Circuit Breakers](#) - Robert Foster of Megger  
 Location: PSE&G - Hadley Road Facility, 4000 Hadley Road, South Plainfield, NJ 07080  
 Contact: Ronald W. Quade, P.E., (973) 219-8802 or [rwquade@ieee.org](mailto:rwquade@ieee.org)
- Nov 01, 2011: 7:00 PM TO 8:30 PM  
[Synthesis of Carbon-Based Nanoscale Materials and Direct Write of Structures for the Next Generation Antennas](#) – Kate Duncan, Electrical engineer with the Army in the Antennas Technology & Analysis Branch of CERDEC  
 Location: Synergy Microwave Corporation, 201 McLean Boulevard, Paterson, NJ 07504  
 Contact: Dr. Chandra Gupta (973 881 8800 x2250)
- Nov 02, 2011: 6:00 PM TO 8:45 PM  
[North Jersey Section Excom Meeting](#)  
 Location: Clifton Public Library - Allwood Branch, Activity Room, 44 Lyall Road, Clifton, NJ 07012  
 Contact: Library Number: (973) 471-0555
- Nov 05, 2011: 1:30 PM – 5:00 PM  
 ISTEP: Integrated Student Transition to Engineering/Technology Professional  
 Location: ECE 202, NJIT  
 Contacts: Durga Misra ([dmisra@ieee.org](mailto:dmisra@ieee.org))
- Nov 09, 2011: 6:30 PM – 8:00 PM  
[Personal Financial Management](#) - Edward Colville of Edward J. Colville LLC  
 Location: Conference Room 6A-106, Alcatel-Lucent, 600 Mountain Ave, Murray Hill, New Jersey  
 Contacts: Dandan Wang @ 972-259-7222.
- Nov 16, 2011: 4:30 PM – 6:15 PM  
[The Perspective of Nanotechnology and its Convergence with Future Information Technology](#)  
 - Jong Min Kim of Samsung Advanced Institute of Technology, South Korea  
 Location: ECE 202, NJIT, 161 Warren Street, Newark, NJ 07102  
 Contact: Dr. Durga Misra (973) 596-5739 ([dmisra@njit.edu](mailto:dmisra@njit.edu)) or Dr. Edip Niver (973) 596-3542
- Nov 17, 2011: 6:45 PM TO 8:45 PM  
[Distinguished Lecture: A Sensitivity Based Generalization Error Model for Supervised Learning Problems](#) - Daniel Yeung, Chair Professor of Computing, The Hong Kong Polytechnic University, Hong Kong  
 Location: ECEC Room Number: 202, 140 Warren St. Newark, NJ 07102  
 Contact: Nirwan Ansari ([nirwan.ansari@njit.edu](mailto:nirwan.ansari@njit.edu))
- Nov 18, 2011: 9:00 AM TO 2:00 PM  
[Electrical Testing of Protective Relays](#)  
 Location: PSE&G - Hadley Road Facility, 4000 Hadley Road, South Plainfield, NJ 07080  
 Contact: Ronald W. Quade, P.E., (973) 219-8802 or [rwquade@ieee.org](mailto:rwquade@ieee.org)
- North Jersey Section Seeks Nominations for Committee Chairs, Volunteers, and Section Officers
- IEEE Pre-College Activities provides: Pre-College Cyber Defense Competition

*For updates and registration of events please visit:*  
[http://webinabox.vtools.ieee.org/wibp\\_calendar/index/R10327](http://webinabox.vtools.ieee.org/wibp_calendar/index/R10327)

## Meeting Announcements:

**October 05, 2011**

### **IEEE North Jersey Section presents: North Jersey Section EXCOM Meeting**

**Note:** For the first time this meeting will take place in the Meeting-Room of Alcatel-Lucent Bell Laboratories.

Normal meeting agenda, times and buffet all still the same.

**Location:** Alcatel-Lucent Bell Laboratories Activity Meeting-Room 6A-106, 600, (go to the Main Entrance), Mountain Ave., Murray Hill, NJ 07974

**Time:** 6:00 PM – 8:45 PM

**Contacts:** Naresh Chand ([chandnaresh@gmail.com](mailto:chandnaresh@gmail.com)), Adriaan J. van Wijngaarden ([avw@ieee.org](mailto:avw@ieee.org)) (973)-738 3393

**For more details, updates and registration please visit:**

[North Jersey Section EXCOM Meeting](#)

**October 05, 2011**

### **Student Activities Society presents: IEEE Day-Stevens IEEE Kickoff Event**

**Abstract:** This event is the kick-off event for the Stevens IEEE. It will also double for IEEE Day event.

**Location:** Stevens Institute of Technology Bowling Alley located on the ground floor of the Westley J. Howe building 1 Castle Point on Hudson, Hoboken, NJ 07030

[Click here for Map](#)

**Time:** 5:30 PM – 7:00 PM

**Contacts:** John Taylor - [john.taylor86@live.com](mailto:john.taylor86@live.com)

**For more details, updates and registration please visit:**

[IEEE Day-Stevens IEEE Kickoff Event](#)

**OCTOBER 6, 2011**

### **IEEE NORTH JERSEY SECTION MTT-Society and AP-Society Joint Chapter present: 26th Annual Symposium and Mini-show**

**Abstract:** 10 –12 LECTURES FEATURING SPEAKERS FROM LEADING COMPANIES, WITH EMPHASIS ON MILITARY ELECTRONICS, WIRELESS TECHNOLOGIES AND MICROWAVE COMMUNICATIONS

MINI SHOW FEATURING LATEST PRODUCTS (APPX. 30-40 EXHIBITORS)

**Location:** Hanover Manor, 16 Eagle Rock Ave., E. Hanover, NJ 07936

**Time:** 9:00 AM – 5:00 PM

**Contacts:** Ph# 973-992-7425, CHAIR/EXHIBITION: KIRIT DIXIT (201-669-7599), [kdixit@ieee.org](mailto:kdixit@ieee.org), [gardner1@optonline.net](mailto:gardner1@optonline.net)

PUBLICITY: ARTHUR GREENBERG

EVENT/ LOCATION CO-ORDINATOR: KEN OEXLE (973-386-1156) [k.oexle@verizon.net](mailto:k.oexle@verizon.net)

CO-CHAIR- TECHNICAL PROGRAMS: HAR DAYAL [dayalhar@gmail.com](mailto:dayalhar@gmail.com)

CO-CHAIR - TECHNICAL PROGRAM: GEORGE KANNELL (973-437-9990), [gkk@lgsinnovations.com](mailto:gkk@lgsinnovations.com)

No Admission Charge.

**For more details, updates and registration please visit:**

[26<sup>th</sup> ANNUAL SYMPOSIUM AND MINI-SHOW](#)

**October 11, 2011**

### **IEEE North Jersey Section presents: SP seminar Protecting Smart Grid Automation System against Cyber Attacks**

**By:** Dong Wei

**Abstract:** Smart Grid moves new power grid automation systems from being proprietary and closed to the current state of Information Technology (IT) which is highly interconnected and open. But open and interconnected automation platforms bring about major security challenges. The power grid automation network has inherent security risks due to the fact that the systems and applications for the power grid were originally designed without much consideration of cyber security. This talk first introduces scope and functionalities of power grid, its automation and control system, and communications. Potential cyber attacks and their adverse impacts on power grid operation are discussed; a general SCADA cyber attack process is presented. This talk discusses the major challenges and strategies to protect smart grid against cyber attacks and finally proposes a conceptual layered framework for protecting power grid automation systems against cyber attacks without compromising timely availability of control and signal data. The proposed “bump-in-the-wire” approach also provides security protection for legacy systems which do not have enough computational power or memory space to perform security functionalities. The on-site system test of the developed prototype security system is briefly presented as well.

**Location:** Muscarelle Center, Auditorium 105 Fairleigh Dickinson University, 1000 River Rd, Teaneck, NJ 07666

[Click here for map](#)

**Time:** 7:00 PM – 8:30 PM

**Contacts:** Dr. Yun Q. Shi, (973)596-3501 [shi@njit.edu](mailto:shi@njit.edu), Dr. Alfredo Tan, [tan@fdu.edu](mailto:tan@fdu.edu), (201) 692-2324, or Dr. Hong Zhao, [zhao@fdu.edu](mailto:zhao@fdu.edu), 201-692-2350

No Admission Charge.

**For more details, updates and registration please visit:**

[Protecting Smart Grid Automation System against Cyber Attacks](#)

**October 12, 2011**

**IEEE North Jersey Section presents:**

**Time Domain Method for Measurement of S-Parameters of Passive Devices**

**By:** Pete Pupalakis, and Alan Blankman - Signal Integrity Product Marketing Manager at LeCroy Corporation

**Abstract:** S-Parameters have become the defacto standard for describing passive devices, in part to the ever-increasing need to predict and understand signal integrity issues that are problematic in both today and tomorrow's high-speed serial designs. This article describes hardware and software techniques used in a TDR/TDT based instrument to measure S-Parameters.

Techniques include TDR pulser/sampler design, coherent interleaved sampling timebase, switch matrix implementation for signal routing, and software algorithms for noise reduction and de-embedding. Comparisons to frequency domain S-Parameter measurements are also discussed.

**Biography:** Alan Blankman is Signal Integrity Product Marketing Manager at LeCroy Corporation, focusing on signal integrity products and applications, including the SPARQ series network analyzers and serial data analysis software. He has a Ph.D. degree in high-energy physics from University of Pennsylvania, and has over 20 years experience developing instrumentation and software solutions for high-energy physicists and electrical engineers.

**Location:** NJIT, ECEC 202, 140 Warren St. Newark, NJ 07102  
[Getting to NJIT](#)

**Time:** 6:00 PM – 9:00 PM

**Contacts:** Russell C. Pepe 201-960-6796 or rcpepe@ieee.org  
No Admission Charge.

**For more details, updates and registration please visit:**

**[Time Domain Method for Measurement of S-Parameters of Passive Devices](#)**

**October 12, 2011**

**IEEE NNJ Section PACE presents:**

**ENGINEERS MEET FOR: AN OCTOBER SOCIAL**

**By:** No Speaker! Just Conversation and Hospitality!

**Abstract:** On Wednesday, the North Jersey Section Professional Activities Committee will meet for an Informal Social with Pizza, soda & refreshments. This is the lighter side of the profession. Come, bring your friends and beat the heat. July brought in five new members. Students are, especially, welcome.

**About the Meeting:** This meeting is to unite members of the Section for an evening of conversation, hospitality and refreshments. Our PACE meetings offer opportunities for lively discussions. Historically, once members get started they just don't want to leave. Our meetings are entertaining, thought provoking and provide opportunities to network.

**Job Notices:** Bring any job notices or employment information to the meeting. Employment Opportunities are always welcome.

All are invited. We encourage North Jersey Section Ex-Com officers to attend. When they do, our Section membership can meet with them on a first name basis.

Bring your associates, friends and spouses and we will talk about the Profession.

**All are welcome. You don't have to be member of IEEE to attend.**

Refreshments will be served.

**Location:** Clifton Memorial Library, 292 Piaget Ave. Clifton NJ 07011

**Time:** 6:30 to 9:00 PM,

**Directions:** tel. 973 772-5500

**Contacts:** Paul Ward, 973 790-1625. [peward@ieee.org](mailto:peward@ieee.org)  
Richard F. Tax, 201- 664-6954 [rtax@verizon.net](mailto:rtax@verizon.net)

CARE is the Congressional Advocacy Recruitment Effort CARE is a voluntary network of IEEE members who are interested in public policy.

To HELP go to [www.ieeeusa.org/policy/care](http://www.ieeeusa.org/policy/care)

**October 12, 2011 through December 7, 2011**

**IEEE North Jersey Section and NJIT offers:**

**C# .NET Programming 8-Weeks Course**

**By:** Donald Hsu, Ph.D., Corporate Manager

**Abstract:** Wednesday, October 12, 2011 through December 7, 2011 Eight weekly classes (October 12, 19, 26, November 2, 9, 16, 30, December 7, 2011)

Since 2004, C# .NET has generated significant headway in Fortune 1000 enterprise development systems. Dice.com lists 1000+ C# .NET jobs in the New York tri-state area daily! This course will cover the fundamentals of C# language, the .NET framework, window and web-based applications, ADO.NET, ASP.NET, and XML. It will be useful for anyone to develop applications based upon these tools.

You will receive the IEEE Certificate of Completion when you finish the course. Microsoft Corp. has MCAD and MCSD certifications. You may wish to get certified by taking the necessary Microsoft exams with the knowledge gained from this course.

TOPICS

1. Compare the enterprise development tools using Java to C# .NET
2. Define Visual Studio .NET Version 2008 to 2010
3. Identify C# syntax, data type, control structures and common language runtime
4. Distinguish methods, arrays, object-oriented programming
5. Build graphical user interface, multithreading, files and streams
6. Explain the benefit of using extensible markup language (XML)
7. Select database, SQL server, and ADO .NET



8. Choose ASP .NET, web forms, web services, advanced topics

9. Present student Projects

**Cost:** IEEE (& affiliate) members \$500;

Non-IEEE members \$550

**Instructor:** Donald Hsu, Ph.D., has been a corporate manager for 11 years and is an experienced trainer. Since 2004, he has trained 700+ people in database, Java, WebLogic, XML, and C# .NET courses in 7 organizations.

**Location:** NJIT, 140 Warren St. Newark, NJ 07102

[Getting to NJIT](#)

**Time:** 6:00 PM – 9:00 PM

**Contacts:** Please email Donald Hsu, [yanyou@hotmail.com](mailto:yanyou@hotmail.com).

You will receive a reply within 24 hours.

Admission Charge applies.

**For more details, updates and registration please visit:**

[C# .NET Programming 8-Weeks Course](#)

REGISTRATION: C# .NET Programming

Please mail the completed registration with a check (payable to "North Jersey Section IEEE") to: Donald Hsu, Chair Education Committee, IEEE North Jersey Section, P.O. Box 2093, Fort Lee, New Jersey 07024.

Name: \_\_\_\_\_

Email address \_\_\_\_\_

☐ Nonmember: \_\_\_\_\_

☐ IEEE Member Member #: \_\_\_\_\_

Member of \_\_\_\_\_ technical society

Employer: \_\_\_\_\_

Employer address: \_\_\_\_\_

Home address: \_\_\_\_\_

Business (day) telephone #: \_\_\_\_\_

Home telephone #: \_\_\_\_\_

Please enclose required fee payable to:

North Jersey Section IEEE

As soon as the completed registration form and the payment are received, you are officially registered for this course.

Registration status will be confirmed by email.

☐ I wish to receive IEEE Completion Certificate

Signature: \_\_\_\_\_

**October 15, 2011 through December 10, 2011**  
**IEEE North Jersey Section and Fairleigh Dickinson University offers:**

[Project Management 8-Weeks course](#)

**By:** Donald Hsu, Corporate Manager

**Abstract:** Dice.com lists 5000+ Project related jobs in the New York tri-state area daily! This course will help you to break down a master project into manageable tasks, pinpoint possible solutions, and provide information to keep the project under control. Using Microsoft Project 2010 software,

you will learn to accomplish various project plans. In addition, it will greatly enhance your business, communications and interpersonal skills.

You will receive the IEEE certificate of completion when you finish the course. You may wish to take two Certification exams, one in Project Management administered by Project Management Institute from the knowledge that you learned in this course. (This is not an exclusive PMP-PMI examination prep course. No PDUs are issued for PMP eligibility. CEU credits would be given by IEEE)

#### TOPICS

1. Explain the need for a project manager
2. Define SOW, PERT, GANTT, CPM, and Scope of the project
3. Identify the team members, resources and plan for the strategy
4. Calculate schedule, budget variances, and monitor project progress
5. Manage changes, estimates, and communications
6. Set a baseline, import tasks from MS Excel, export MS Project files to MS Word
7. Create and modify custom reports, templates and combination views
8. Share resources and create a master plan loaded to Project Server
9. Approve updates and conclude a project plan
10. Analyze global E-Commerce projects
11. Present student Projects

**Instructor:** Donald Hsu, Ph.D., has been a corporate manager for 11 years and an experienced trainer. Since 2001, he has trained 1200+ in IT Project+, MS Project, Project Management, Contract Procurement Management, and International Management.

**Location:** Fairleigh Dickinson University, 1000 River Rd, Teaneck, NJ 07666

[Getting to FDU](#)

**Time:** 9:30 AM – 12:00 PM

On Saturday mornings Eight weekly classes (October 15, 22, 29, November 5, 12, 19, December 3, 10, 2011)

**Contacts:** Donald Hsu - [yanyou@hotmail.com](mailto:yanyou@hotmail.com)

You will get a reply within 24 hours.

Admission Charge applies.

**Cost:** IEEE (& affiliate) members \$500;

Non-IEEE members \$550

**For more details, updates and registration please visit:**

[Project Management 8-Weeks course](#)

REGISTRATION: Project Management

Please mail the registration form with the check (Checks payable to "North Jersey Section IEEE") to

Dr. Kalyan Mondal, Co-Chair Education Committee, IEEE North Jersey Section, Fairleigh Dickinson University, School of Computer Sciences and Engineering, 1000 River Road, T-MU1-01, Teaneck, NJ 07666

Name: \_\_\_\_\_

Email address \_\_\_\_\_

☐ Nonmember☐ IEEE Member Member #: \_\_\_\_\_

Member of \_\_\_\_\_ technical society

Employer: \_\_\_\_\_

Employer Address: \_\_\_\_\_

Home address: \_\_\_\_\_

Business (day) telephone #: \_\_\_\_\_

Home telephone #: \_\_\_\_\_

Please enclose required fee payable to: North Jersey Section  
IEEEAs soon as a completed registration form and the payment  
are received, you are officially registered for this course.  
Registration status will be notified by email.☐ I wish to receive the IEEE Completion Certificate Signature: \_\_\_\_\_**October 17, 2011****IEEE EMBS and IEEE TM Chapter presents:  
Seminar on Artificial Pancreas: Combining  
Engineering with Medicine****By:** Youqing Wang**Abstract:** In 2000, approximately 17.1 million persons worldwide have type 1 diabetes mellitus (T1DM), and a clear rising trend in the incidence of the disease has been reported. The artificial pancreas (AP) system is wide considered a promising candidate to manage the insulin delivery to achieve normal glucose levels for T1DM. Recent progress in insulin pumps and continuous glucose monitoring (CGM) sensors have set the stage for designing an AP system, where an automated control algorithm that allows the sensor and pump to communicate with each other is the key element for a successful AP. In this presentation, the history of AP research will be introduced briefly. Particularly, some latest progresses proposed by our team will be introduced.**Biography:** Dr. Youqing Wang received his B.Sc. in mathematics from Shandong University, Jinan, Shandong, China, in 2003, and received his Ph.D. in control science and engineering from Tsinghua University, Beijing, China, in 2008.

He worked as a Research Assistant in Department of Chemical Engineering, Hong Kong University of Science and Technology, from Feb 2006 to Aug 2007. From Feb 2008 to Feb 2010, he worked as a Senior Investigator in Department of Chemical Engineering, University of California, Santa Barbara. From Mar 2008 to present, he is a Guest Senior Investigator in Sansum Diabetes Research Institute. From Feb 2010 to present, he is a professor in College of Information Science &amp; Technology, Beijing University of Chemical Technology. His research interests include biomedical system

control, batch process, iterative learning control, model predictive control, and fault-tolerant control.

Prof. Wang is the recipient of several research awards (e.g. Journal of Process Control Survey Paper Award, Excellent Ph.D. Thesis from Tsinghua University). He holds membership for several academic societies (e.g. IEEE, ADA, AIChE, and SigmaXi). He is an editor for ISRN Applied Mathematics and reviewer for several international journals. He serviced as a Session Chair and/or an IPC member for several international conferences (e.g. IFAC World Congress, CCC).

**Location:** NJIT, ECEC 202, 140 Warren St. Newark, NJ 07102[Getting to NJIT](#)**Time:** 9:30 AM – 11:00 AM**Contacts:** Prof. MengChu Zhou (908-268-1183) or Dr. Raquel Perez-Castillejos. E-Mails: (ZHOU@NJIT.EDU or RaquelPC@njit.edu).

No Admission Charge.

**For more details, updates and registration please visit:**[Seminar on Artificial Pancreas: Combining Engineering with Medicine](#)**October 24, 2011****IEEE Consultants' Network of Northern New Jersey  
presents:  
Entrepreneurial Inventiveness****By:** Randall Vendetti of Techne Synergies, LLC.**Abstract:** Ensuring Entrepreneurial Inventiveness Across the Industrial Company: What does a company do when faced with the difficulties of lost sales and a shrinking market, all while trying to maintain profitability? All products, and therefore companies, face the maturing market.

Randall P. Vendetti, P.E., Principal, Techne Synergies LLC, will explain how to overcome the ultimate commoditization of your products and services. Individuals, teams, and companies need to break traditional barriers to innovation and growth. Renewing entrepreneurial spirit in a mature industry involves finding once again a pioneering direction and imbedding characteristics of competitive strength into your firm.

Covered will be the following: 1) what is the nature of first revitalizing, then ensuring this business-connected technical inventiveness; 2) what are expected outcomes and telltale indications in the marketplace that it is working; and 3) what is the basis within the organization on how to achieve the growth path, translating factors of success into products and services.

**Biography:** Randall P. Vendetti, P.E., is Principal with Techne Synergies LLC, an engineering management consultancy located in Parsippany, NJ. He has authored the book *A Model of Leadership: How to Manage and Lead in Engineering and Creative Enterprise* and has over thirty year's accomplishments in industry. He is a licensed, professional

engineer with a Masters degree in Technology Management from Stevens Institute of Technology. Randall can be contacted at 973-886-4470, [info@technesynergies.com](mailto:info@technesynergies.com)

**ABOUT THE NETWORK:** Founded in 1992, the IEEE Consultants Network of Northern NJ encourages and promotes the use of independent technical consultants by business and industry.

**ALL ARE WELCOME! No fees or registration required.**

**Location:** Morris County Library, 30 East Hanover Avenue, Whippany, NJ

**Directions to Library:** [www.mclib.info](http://www.mclib.info)

**Time:** 6:30 PM - 8:30 PM (Please note the date; it is not our customary last Thursday of the month.)

**Contacts:** Robert Walker, 973-728-0344, or visit our website,

**For more details, updates and registration please visit:**

[www.TechnologyOnTap.org](http://www.TechnologyOnTap.org).

**October 26, 2011**

**IEEE ED/CAS, TM14, NJIT's ECE Dept & Albert**

**Dorman Honors College present:**

**[How to Become an Innovation Sherpa©](#)**

**By:** Joe Nadan of NYU-Poly

**Abstract:** Managing innovation programs requires Passion, Preparation, People, Process & Practice, and Performance. This talk explains how the speaker became an Innovation Sherpa and what education, experience and mentoring are required to manage and lead technology and business innovation successfully.

**Biography:** Dr. Nadan is an "Innovation Sherpa"; he invented and/or innovated many products and services including EZ Pass, CDROM, and 16:9 HDTV for which he received a 2002 EMMY for Scientific and Technological Advancement. He is Professor, Management of Technology and Business Innovation, and Director of the Executive Master's Degree Programs at New York University Polytechnic Institute. Dr. Nadan is Senior Editor of The International Journal of Innovation Science and is a Senior Member of the IEEE.

Prior to joining NYU Poly he managed and led the US division of TORI Global, with consulting practices focused on the management of innovation programs, and organizational leadership and development. Before that Dr. Nadan was Senior Vice-President and Global CTO of GTECH, the world's leading provider of real-time lotteries, CTO of AIG Technologies, and Senior Executive Vice-President and COO of the Market Data Corporation affiliate of Cantor Fitzgerald, and Senior Vice-President for Strategic Planning and New York Operations for the Rich Division of Reuters. During an earlier part of his career he was a tenured Associate Professor of Computer/ Electrical Engineering and Assistant Dean of the School of Engineering at the City College of the City University of New York.

Dr. Nadan has a Ph.D. in Computer/ Electrical Engineering from the City University of New York, followed 13 years later

by an Executive MBA in consumer behavior, marketing and strategic planning from the Columbia University Graduate School of Business. He is a business strategy expert specializing in the design, implementation and management of innovation programs. Dr. Nadan is a certified leader of "Art of Innovation" Workshops, and a McQuaig certified behavioral assessment interpreter.

Meeting will be held in Campus Center Atrium with Refreshments.

**Location:** Campus Center Atrium, 323 ML King Blvd

161 Warren St, Newark, NJ 07102

You can park at 154 Summit Street, Newark, NJ as in the map.

[Click here for Map](#)

**Time:** 2:30 PM – 5:00 PM

**Contacts:** Dr. Durga Misra (973) 596-5739 ([dmisra@njit.edu](mailto:dmisra@njit.edu)) or Dr. Edip Niver (973) 596-3542 (NJIT). You do not have to be a member of the IEEE to attend.

No Admission Charge

**For more details, updates and registration please visit:**

**[How to Become an Innovation Sherpa©](#)**

**October 26, 2011**

**Communication Society presents:**

**[COMSOC Distinguished Lecture: Game-Theoretic Design for Networked Communities](#)**

**By:** Professor Mihaela van der Schaar of Chancellor's Professor of Electrical Engineering at University of California, Los Angeles

**Abstract:** This talk proposes a new generation of ideas and technologies for designing the interactions between self-interested, learning agents in networked communities (social networks, service networks, online labor markets, crowdsourcing, P2P networks). When the communities are composed of compliant machines (wireless nodes, routers, mobile phones, etc.), network utility maximization (NUM) and other well-known control and optimization methods can be used to achieve efficient designs. When the communities are composed of intelligent and self-interested agents (people or smart software agents acting on their behalf), such methods are not effective and efficiency is much more difficult to achieve because the interests of the individual agents may be in conflict with that of the network designer. This talk describes design principles to achieve efficient outcomes in such networks based on the use of incentives (rewards and punishments). Depending on the characteristics of the network, the community, and the capacity of the designer, the application of these principles may be through any of a number of various mechanisms. This talk discusses mechanisms based on indirect reciprocation (social norms and token exchanges).

**Biography:** Mihaela van der Schaar is Chancellor's Professor of Electrical Engineering at University of California, Los Angeles. Her research interests include dynamic multi-user

networks and system designs, online learning, network economics and game theory, multimedia networking, communication, processing, and systems, and multimedia stream mining. She is an IEEE Fellow, a Distinguished Lecturer of the Communications Society for 2011-2012, the Editor in Chief of IEEE Transactions on Multimedia and a member of the Editorial Board of the IEEE Journal on Selected Topics in Signal Processing. She received an NSF CAREER Award (2004), the Best Paper Award from IEEE Transactions on Circuits and Systems for Video Technology (2005), the Okawa Foundation Award (2006), the IBM Faculty Award (2005, 2007, 2008), the Most Cited Paper Award from EURASIP: Image Communications Journal (2006), the Gamenets Conference Best Paper Award (2011) and the 2011 IEEE Circuits and Systems Society Darlington Award Best Paper Award.

She received three ISO awards for her contributions to the MPEG video compression and streaming international standardization activities, and holds 33 granted US patents. For more information about her research visit: <http://medianetlab.ee.ucla.edu/>.

**Location:** NJIT, ECEC 202, Newark, NJ 07102

[Getting to NJIT](#)

**Time:** 6:00 PM – 8:00 PM

**Contacts:** Nirwan Ansari (973)596-3670. Check <http://web.njit.edu/~ieeenj/comm.html> for latest updates

**For more details, updates and registration please visit:**  
[COMSOC Distinguished Lecture: Game-Theoretic Design for Networked Communities](#)

## October 27, 2011

The PES/IAS Chapters in conjunction with the North Jersey Section Sponsors:

### [Luncheon for Life Grade Members](#)

A luncheon for North Jersey Section Life Grades (Members, Senior Members and Fellows) will be held on Thursday, October 27 at the Hamilton Park Conference Center 175 Park Avenue in Florham Park, New Jersey 07932.

The luncheon will begin at 11:30 AM in the Arrive 1 & 2 meeting rooms. Cost is \$ 5.00 per person.

Advanced registration is required prior to October 18. We can accommodate only 30 people. Registration will be processed in the order of receipt. Reservations cannot be accepted at the door

Please complete the following registration form and include a check in the amount of \$ 5.00 payable to the North Jersey Section IEEE.

Life Grade Luncheon Registration - Oct 27 2011

Name\_\_\_\_\_

Address\_\_\_\_\_

Phone\_\_\_\_\_

IEEE #\_\_\_\_\_ Life Grade\_\_\_\_\_ YES

Return to: Kenneth Oexle  
 11 Deerfield Road, Whippany, NJ 07981

## October 28, 2011

**PES and IAS Chapters present:**  
[Electrical Testing of Circuit Breakers](#)

**By:** Robert Foster of Megger

**Abstract:** The PES and IAS Chapters will sponsor a series of technical seminars on the topic of electrical testing. This second seminar will be on the topic of electrical testing of circuit breakers. The session will be held on Friday, October 28, 2011 at PSE&G's Hadley Road Facility, 4000 Hadley Road, South Plainfield, NJ. The seminar fee includes lunch, refreshments and handouts. Non-members joining IEEE within 30 days of the seminar will be rebated 50% of the IEEE registration charge.

Four hours of instruction will be provided. If desired, IEEE Continuing Education Units (0.4 CEUs) will be offered for this course - a small fee of \$45 will be required for processing.

Please pay attention to the "Registration Fee" and choose the appropriate choice either with or without CEUs.

**Location:** PSE&G - Hadley Road Facility, 4000 Hadley Road South Plainfield, NJ 07080

[Click here for Map](#)

**Time:** 9:00 AM – 2:00 PM

**Contacts:** Ronald W. Quade, P.E., (973) 219-8802 or [rwquade@ieee.org](mailto:rwquade@ieee.org)

**For more details, updates and registration please visit:**  
[Electrical Testing of Circuit Breakers](#)

## November 01, 2011

**IEEE North Jersey AESS Chapter presents:**

**Synthesis of Carbon-Based Nanoscale Materials and Direct Write of Structures for the Next Generation Antennas**

**By:** Kate Duncan

**Abstract:** This talk will describe the "Synthesis of Carbon-Based Nanoscale Materials and Direct Write of Structures for the Next Generation Antennas"

**Biography:** Kate Duncan obtained her PhD in Applied Physics from New Jersey Institute of Technology. For her dissertation work she developed and demonstrated affordable manufacturing techniques for integrating electrically conductive polymer based shock, vibration and infrared sensors into composite aviation structural components. Kate is currently an electrical engineer with the Army in the Antennas Technology & Analysis Branch of CERDEC. Since joining CERDEC she has been engaged in the development of novel nanomaterials for the next generation antennas systems. Synthesis, deposition, material and electrical characterization have been her focus. This has



resulted in her group being among the first to successfully deposit chemically reduced graphene by ink-jet printing on transparent substrate for RF applications. She has developed a direct write laboratory enhancing the Army's in-house prototyping capabilities.

**Location:** Synergy Microwave Corporation, 201 McLean Boulevard, Paterson, NJ 07504.

**Time:** 7:00 PM – 8:30 PM

**Contacts:** Dr. Chandra Gupta (973 881 8800 x2250)

## November 02, 2011

### North Jersey Section Excom Meeting

**Note:** Buffet 6 PM, meeting 7 PM, 8:45 PM (hard end time)

Section Business Discussion/Planning for all chapters, groups, committee chairs

**Location:** Clifton Public Library - Allwood Branch, Activity Room, 44 Lyall Road, Clifton, NJ 07012

**Time:** 6:00 PM – 8:45 PM

**Contacts:** Library Number: (973) 471-0555

For more details, updates and registration please visit:

[North Jersey Section Excom Meeting](#)

## November 05, 2011

### ED/CAS and R1 Southern Area presents:

### ISTEP: Integrated Student Transition to Engineering/Technology Professional

**Location:** ECE 202, NJIT

**Time:** 01:30 PM - 05:00 PM

**Contacts:** Durga Misra ([dmisra@ieee.org](mailto:dmisra@ieee.org))

## November 09, 2011

### IEEE GOLD and Women in Engineering Society presents:

### Personal Financial Management

**By:** Edward Colville of Edward J. Colville LLC

**Abstract:** This talk is to give some general ideas on personal financial management, which include three parts. First, it helps to review the personal budget, including the expense/income percentages, set -up and tracking of budget and debt reduction. Secondly, it will talk about the tax planning and preparation, which will cover W-4(s), 401(k) plans/Company Stock Plan, IRAs and Other pre-tax expenses. Lastly, this talk will discuss the life insurance plans. It aims to help both engineering students and professional engineers to better manage their finance.

**Biography:** Edward Colville is the owner of Edward J. Colville LLC, an Accounting & Tax Consultants Firm. Edward graduated from Fordham University with a Bachelor's Degree in Accountancy. He is a Certified Public Accountant licensed by the State of New York. He started his career in public accounting and has experience in the Media, Entertainment,

Financial Services, and other industries as well. He has worked in the finance & accounting departments in both large publicly traded companies and small to mid-sized private companies. Edward also has experience and a vast knowledge of small businesses, individual & business taxation, and business formation. He is a member of the American Institute of Certified Public Accountants (AICPA) and the Insurance Internal Audit Group (IIAG).

All are welcome! You do not have to be a member of the IEEE to attend.

**Time:** 6:30PM, (Wednesday), dinner starts at 6:00PM.

**Location:** Conference Room 6A-106, Alcatel-Lucent, 600 Mountain Ave, Murray Hill, New Jersey (The conference room 6A-106 is located at the back side of the Bell Labs Technology Showcase area, which is in the visitor's area at the right side of the main entrance reception desk.)

**Contacts:** Dandan Wang @ 972-259-7222.

For more details, updates and registration please visit:

[Personal Financial Management](#)

## November 16, 2011

### Electron Devices Society and NJIT presents:

### The Perspective of Nanotechnology and its Convergence with Future Information Technology

**By:** Jong Min Kim of Samsung Advanced Institute of Technology, South Korea

**Abstract:** This talk will present the current and future of nanotechnology, especially focusing on the convergence of nanotechnology with electronics, photonics, energy, and biology. Nanoelectronics aspect will address the nano-carbon such as graphene and carbon nanotubes in flexible and transparent electrodes, transistors, and in switching devices. This will further address displays, lighting, THz radiation, network transistors and many other applications. As a part of nanophotonics, quantum dot and its related application for LED and displays will be addressed. The talk will also discuss nano-energy generator for energy harvesting. Concept of e-nose and e-tongue with nano wires will be presented. Printable and flexible electronics is discussed with nano materials. The convergence of nanotechnology is covered in details.

**Biography:** Dr. Jong Min Kim is a Samsung Group Fellow and a Senior Vice President of Samsung's Frontier Research Labs, Samsung Advanced Institute of Technology (SAIT) at Seoul, South Korea. He has authored and co-authored more than 225 refereed journal publications and 144 Conference presentations and several articles are in the journals "Nature" and "Science" in quantum dot photonics area. He received numerous awards in display technology and in nanostructure science including Special Achievement Award by Nano Korea'09 by Korean Government and Best paper Award from Samsung for his paper in 'Science.' He received his BSEE in

1980 from Hong-ik University, M.S.E.E. and Ph.D. in Electrical Engineering from New Jersey Institute of Technology in 1986 and 1992 respectively. He has worked at the US Army Research Laboratory and during 1992-94 for FED Corporation. He is listed as an Inventor on 72 domestic patents and 107 international patents.

**Location:** NJIT, ECEC 202, 140 Warren St. Newark, NJ 07102

**For Directions:** [Getting to NJIT](#)

[For Street Map please click here](#)

**Contact:** Dr. Durga Misra (973) 596-5739 (dmisra@njit.edu) or Dr. Edip Niver (973) 596-3542

**Time:** 4:30 PM – 6:15 PM

**For more details, updates and registration please visit:**

[The Perspective of Nanotechnology and its Convergence with Future Information Technology](#)

**November 17, 2011**

**IEEE SMC Chapter presents:**

**[Distinguished Lecture: A Sensitivity Based Generalization Error Model for Supervised Learning Problems](#)**

**By:** Daniel Yeung, Chair Professor of Computing, The Hong Kong Polytechnic University, Hong Kong

**Abstract:** Generalization error model provides a theoretical support for a classifier's performance in terms of prediction accuracy. However, existing models give very loose error bounds. This explains why classification systems generally rely on experimental validation for their claims on prediction accuracy. In this talk we will revisit this problem and explore the idea of developing a new generalization error model based on the assumption that only prediction accuracy on unseen points in a neighborhood of a training point will be considered, since it will be unreasonable to require a classifier to accurately predict unseen points "far away" from training samples. The new error model makes use of the concept of sensitivity measure for multiplayer feedforward neural networks (Multilayer Perceptrons or Radial Basis Function Neural Networks). The new model was developed for both single and multiple classifier systems. Its usefulness is demonstrated in the problems of architecture selection and feature reduction for RBFNN classifiers. A number of experimental results on image classification, content based information retrieval and bankruptcy prediction will be presented.

**Biography:** Daniel S. Yeung (Ph.D., M.Sc., M.B.A., M.S., M.A., B.A.) is the Junior Past President of the IEEE Systems, Man and Cybernetics (SMC) Society, a Fellow of the IEEE and an IEEE Distinguished Lecturer. He received the Ph.D. degree in applied mathematics from Case Western Reserve University. In the past, he has worked as an Assistant Professor of Mathematics and Computer Science at Rochester Institute of Technology, as a Research Scientist in the General Electric Corporate Research Center, and as a System Integration

Engineer at TRW, all in the United States. He was the chairman of the Department of Computing, The Hong Kong Polytechnic University, Hong Kong, and a Chair Professor from 1999 to 2006. Currently he is a Chair Professor in the School of Computer Science and Engineering, South China University of Technology, Guangzhou, China.

His current research interests include neural-network sensitivity analysis, data mining, and fuzzy rough set. He was the Chairman of IEEE Hong Kong Computer Chapter (91 and 92), an associate editor for both IEEE Transactions on Neural Networks and IEEE Transactions on SMC (Part B), and for the International Journal on Wavelet and Multiresolution Processing. He has served as the President (2008 and 2009), President-Elect (2007), a member of the Board of Governors, Vice President for Technical Activities, and Vice President for Long Range Planning and Finance for the IEEE SMC Society. He co-founded and served as a General Co-Chair since 2002 for the International Conference on Machine Learning and Cybernetics held annually in China. He also served as a General Co-Chair (Technical Program) of the 2006 International Conference on Pattern Recognition. He is also the founding Chairman of the IEEE SMC Hong Kong Chapter.

His past teaching and academic administrative positions include a Chair Professor and Head at Department of Computing, The Hong Kong Polytechnic University, the Head of the Management Information Unit at the Hong Kong Polytechnic University, Associate Head/Principal Lecturer at the Department of Computer Science, City Polytechnic of Hong Kong, a tenured Assistant Professor at the School of Computer Science and Technology and an Assistant Professor at the Department of Mathematics, both at Rochester Institute of Technology, Rochester, New York.

He also held industrial and business positions as a Technical Specialist/Application Software Group Leader at the Computer Consoles, Inc., Rochester, New York, an Information Resource Sub-manager/Staff Engineer at the Military and Avionics Division, TRW Inc., San Diego, California, and an Information Scientist of the Information System Operation Lab, General Electric Corporate Research and Development Centre, Schenectady, New York.

**Location:** NJIT, ECEC 202, 140 Warren St. Newark, NJ 07102

[Getting to NJIT](#)

**Time:** 6:00 PM – 8:45 PM

**Contacts:** Nirwan Ansari ([nirwan.ansari@njit.edu](mailto:nirwan.ansari@njit.edu))

**For more details, updates and registration please visit:**

[IEEE SMC Chapter Seminar \(Distinguished Lecture\)](#)

**November 18, 2011**

**PES and IAS Chapters present:**

**Electrical Testing of Protective Relays**

**Abstract:** The PES and IAS Chapters will sponsor a series of technical seminars on the topic of electrical testing. This third seminar will be on the topic of electrical testing of protective relays. The session will be held on Friday, November 18, 2011 at PSE&G's Hadley Road Facility, 4000 Hadley Road, South Plainfield, NJ. The seminar fee includes lunch, refreshments and handouts. Non-members joining IEEE within 30 days of the seminar will be rebated 50% of the IEEE registration charge.

Four hours of instruction will be provided. If desired, IEEE Continuing Education Units (0.4 CEUs) will be offered for this course - a small fee of \$45 will be required for processing.

Please pay attention to the "Registration Fee" and choose the appropriate choice either with or without CEUs.

**Location:** PSE&G - Hadley Road Facility, 4000 Hadley Road South Plainfield, NJ 07080

[Click here for Map](#)

**Time:** 9:00 AM – 2:00 PM

**Contacts:** Ronald W. Quade, P.E., (973) 219-8802 or [rwquade@ieee.org](mailto:rwquade@ieee.org)

**For more details, updates and registration please visit:**

**Electrical Testing of Protective Relays**

**North Jersey Section Seeks Committee Chairs, Chapter Chairs, Volunteers, and 2012 Section Officer Nominations**

The North Section is seeking new volunteers to help conduct business for the benefit of its membership. There are a variety of volunteer positions open and available. They range from technical to non-technical, leadership or just participatory.

North Jersey Section Nomination Committee invites nominations for the election of the officers of the section for 2012 for the following positions.

The nominations committee has nominated the following volunteers for 2012 and invites write-in nominations.

Current Nominee Chair: Naresh Chand

Current Nominee Vice Chair 1: Russ Pepe

Current Nominee Vice Chair 2: Har Dayal

Current Nominee Secretary: MengChu Zhou

Current Nominee Treasurer: Paul Ward

Current Nominee Members-At-Large: Chris Peckham

Current Nominee Members-At-Large: Adriaan Van Wijngaarden

Current Nominee Members-At-Large: \_\_\_\_\_

Write-In-Nominee Chair: -----

Write-In-Nominee Vice Chair 1: -----

Write-In-Nominee Vice Chair 2: -----

Write-In-Nominee Secretary: -----

Write-In-Nominee Treasurer: -----

Write-In-Nominee Members-At-Large: -----

Write-In-Nominee Members-At-Large: -----

Write-In-Nominee Members-At-Large: -----

In addition, Various Societies will hold election of their respective officers (Chair, Vice Chair etc.). The society members are encouraged to nominate for these positions if interested. One requirement for Society position is that the member should be a member of the society for which the nominations are sent.

The Society Chairs will conduct these elections. A list of North Jersey Societies is published at the end of the newsletter.

Please contact Kirit Dixit ([kdixit@ieee.org](mailto:kdixit@ieee.org)), Dr. Chandra Gupta ([c.gupta@ieee.org](mailto:c.gupta@ieee.org)) or Amit Patel ([a.j.patel@ieee.org](mailto:a.j.patel@ieee.org)) and send in your nomination with your Name, Address, Membership #, E-mail and position for which the nomination is desired by the deadline date of October 10 for the 2012 election. A final election ballot will be published in the November newsletter for a voting deadline of November 21.

If you would like to become involved with volunteering in some of these efforts or positions or just become more informed about what is happening at the North Jersey Section, please contact Nominations Committee chair, Kirit Dixit at [kdixit@ieee.org](mailto:kdixit@ieee.org). You are welcome to attend the Section business meeting held the first Wednesday of every month to find out more and other volunteer activities that require some help.

Some committees needing volunteers include the following. Please contact the person indicated for additional information or any Nominations Committee chairperson listed below.

**GOLD** (Graduates of the Last Decade) Affinity Group Volunteers and Committee members needed –

**Contact:** [chandnaresh@gmail.com](mailto:chandnaresh@gmail.com)

**WIE** (Women in Engineering) Affinity Group Volunteers and Committee members needed

**Contact:** Kirit, [kdixit@ieee.org](mailto:kdixit@ieee.org)

**EMBS** (Engineering in Medicine and Biology Society) is seeking active committee volunteers

**Contact:** Kirit, [kdixit@ieee.org](mailto:kdixit@ieee.org)

**Antennas and Propagation Society/ Microwave Theory and Technical Society Chapter** – Chapter chair and vice-chair

**Contact:** Kirit Dixit, [kdixit@ieee.org](mailto:kdixit@ieee.org) and Har Dayal, [dayalhar@gmail.com](mailto:dayalhar@gmail.com)

**IEEE Aerospace and Electronic Systems Society** - Chapter chair and vice-chair

**Contact:** Chandra Gupta, [c.gupta@ieee.org](mailto:c.gupta@ieee.org), phone: 973 881 8800 x 225.

**Computer Society Chapter** - Committee Volunteers

**Contact:** Hanna Zhao, [zhao@fdu.edu](mailto:zhao@fdu.edu)

**Technical Management Council** Committee Volunteers –

**Contact:** Kirit Dixit, [kdixit@ieee.org](mailto:kdixit@ieee.org)

**North Jersey Section Awards Committee** Volunteers -

**Contact:** Ken, [k.oexle@ieee.org](mailto:k.oexle@ieee.org)

**Membership Development** Committee Chair and Volunteers

**Contact:** Kirit, [kdixit@ieee.org](mailto:kdixit@ieee.org)

Additionally, if interested volunteers would like to get more general information about the Section, including a complete listing of all chapters and committees, visit the North Jersey section website:

[http://webinabox.vtools.ieee.org/wibp\\_home/index/R10327](http://webinabox.vtools.ieee.org/wibp_home/index/R10327)

or contact anyone on the Nominations Committee listed above.

### **IEEE Pre-College Activities provides: Pre-College Cyber Defense Competition**

In support of the Section's IEEE Pre-College activities, the following is provided on the Air Force Association's high school computer network security competition program.

The "Shooting Star" Chapter 195 of the Air Force Association will be sponsoring up to four high school CyberPatriot IV teams to compete in the national high school cyber (computer network security) defense competition. The CyberPatriot IV Open Division, which can enroll up to 1250 high school teams, is patterned after the National Collegiate Cyber Defense Competition. Each high school team consists

of a teacher/coach, two to five students, and up to five alternates.

The Open (high school) Division team enrollment deadline is Oct 8th with competition dates scheduled for Nov 13th, Dec 11th, and Jan 8th. The final in-person all paid competition will be held at the AFA's CyberFutures Conference, at the Gaylord National Hotel and Convention Center, National Harbor, Md. April 1-2, 2012.

The Open Division enrollment fee per team is \$350.00. However, for the first four high schools within Morris or Union Counties to fully enroll, the "Shooting Star" Chapter 195 will pay the enrollment fee.

**Contacts:** For local chapter info, contact Howard Leach, 973-540-1283.

For schools outside of Morris and Union Counties, please contact the Section's Pre-College coordinator, Har Dayal, at [har.dayal@baesystems.com](mailto:har.dayal@baesystems.com), for potential support.

**For more details, updates and registration please visit:**

<http://www.uscyberpatriot.org>

### **Warm welcome to New Members!**

Vinay Budhbraja  
Graduate Student Member

Peter L Dziedzic  
Student Member

Richard Steven Ens  
Student Member

Henry Angert  
Graduate Student Member

Luis W Delos Santos  
Student Member

Leonid Korochik  
Graduate Student Member

Silvio Broncales  
Student Member

Wen-Hao Chang  
Member

Charles Chen  
Member

Kelvin Chico  
Student Member

Maria Conneran  
Student Member

Burton Dicht  
Member

Ethan Russell Elenberg  
Student Member

Radu Galis  
Member

Daniel Gilmartin  
Student Member

David Henry Goldschmidt  
Member

Elizabeth Avery Gomez

Member

Brian Goodacre  
Student Member

Zhe He  
Graduate Student Member

Shi Y Ho Student  
Member

Thomas Kim  
Member

James Kizhnerman  
Student Member

Tao Li  
Student Member

Daisy Lorenzo  
Student Member

Patrick Lundrigan  
Member



**THE INSTITUTE OF ELECTRICAL AND ELECTRONIC ENGINEERS, INC**  
**NORTH JERSEY SECTION**



**MTT-Society & AP-Society Joint Chapter  
PRESENTS:**

**26<sup>th</sup> ANNUAL SYMPOSIUM AND MINI – SHOW**



**THURSDAY OCTOBER 6, 2011**

**PLACE: Hanover Manor, 16 Eagle Rock Ave., E. Hanover, NJ 07936. Ph# 973-992-7425**

The conference presents a series of lectures describing the state of the art in Microwave, RF, and Wireless Communications, technologies by leaders in their respective fields.

**MINI SHOW FEATURING LATEST PRODUCTS - (9:30 AM TO 4:30 PM)**

**TECHNICAL SESSIONS (8:50AM to 4:40PM)**

Time	Topic	Speakers	Title	Affiliation
8:50	Opening Remarks	George Kannell	Tech. Chair IEEE MTT/AP NJ	LGS Innovations
9:00-9:30	Digital Predistortion to Linearize High Power Amplifiers for Emerging Wireless Systems	Dr. Murthy Upmaka	Applications Engineer	Agilent Technologies
9:30-10:00	Power Amplifier Characterization for Digital Predistortion	Dr. George Vella-Coleiro	Senior Principal Engineer	Commscope
10:00	BREAK - MINI SHOW EXHIBITION			
10:30-11:00	Cognitive Radio Technology	Dr. Matthew Sherman	Technical Director & Engineering Fellow	BAE Systems
11:00-11:30	Millimetric Wave Gigabit links – Backhaul Network	Krishna Raghunandan	Construction Administrator	NYC Transit
11:30-12:00	Wireless Rotor Data Acquisition System	Dr. Rob Holland	Vice President Engineering	L3 Telemetry East
12:00	LUNCH - MINI SHOW EXHIBITION			
1:00-1:45	GaN-on-SiC HEMT Transistors and MMICs Enter the Mainstream	Ray Pengelly	Manager Strategic Business Development	Cree
1:45-2:30	Physics-Based Approach of Nonlinear Noise Modeling for Oscillator Applications	Dr. Ajay Poddar	Chief Scientist	Synergy Microwave
2:30	BREAK - MINI SHOW EXHIBITION			
3:00-3:30	Liquid Crystal Polymer for Microwave & Millimeter-Wave Multilayer Packages & Modules	Dr. Anh Vu Pham	Professor	University of California, Davis
3:30-4:00	Design of Unit Cell Antennas and Antenna Arrays for Broadcast & Aviation Applications	Bill McGinn	Applications Engineer	Ansys Inc.
4:00-4:30	Cosite Interference: Causes, Lessons Learned & Solutions	Ken Kenjale	Business Development Engineer	Pole Zero Corporation
4:30-4:40	Closing remarks	Kirit Dixit	Chair IEEE MTT/AP NJ	Microcom Sales

Registration is on-site. Details are in the October issue of the NORTH JERSEY IEEE NEWSLETTER and Section Home page <http://www.ieee.org/go/njsection> calendar.

**ALL ARE WELCOME (IEEE Membership not required).**

**REGISTRATION IS ON-SITE THERE IS NO CHARGE TO ATTEND THE SYMPOSIUM OR SHOW  
COMPLEMENTARY BREAKFAST / LUNCH INCLUDED FOR ALL**

FOR FURTHER INFORMATION

Chair / Exhibition:	Kirit Dixit	201-669-7599	<a href="mailto:kdixit@microcomsales.com">kdixit@microcomsales.com</a>
Chair MTT/APS	Har Dayal	973-633-4618	<a href="mailto:dayalhar@gmail.com">dayalhar@gmail.com</a>
Technical Program Chair:	George Kannell	973-437-9990	<a href="mailto:gkk@lgsinnovations.com">gkk@lgsinnovations.com</a>
Publicity:	Arthur Greenberg		<a href="mailto:a.h.greenberg@ieee.org">a.h.greenberg@ieee.org</a>
Event / Location	Ken Oexle	973-386-1156	
Event Coordinator:	Russell Pepe	201-960-6796	<a href="mailto:rpepe@att.net">rpepe@att.net</a>

Special thanks to Dru Reynolds of Reynolds, Recruiters & NJ Coast Section for her invaluable assistance.

## 2011 IEEE North Jersey Section

### Region 1 – Area Volunteers

**Southern Area**  
Chair - Durga Misra  
[dmisra@njit.edu](mailto:dmisra@njit.edu)

**Metsac Society**  
Chair - Kirit Dixit  
[kdixit@ieee.org](mailto:kdixit@ieee.org)

### Section Volunteers

#### Executive Committee

Chair - Naresh Chand  
[chandnaresh@gmail.com](mailto:chandnaresh@gmail.com)

Vice Chairman - 1 - Russell Pepe  
[rcpepe@ieee.org](mailto:rcpepe@ieee.org)

Vice Chairman - 2 - Har Dayal  
[dayalhar@gmail.com](mailto:dayalhar@gmail.com)

Secretary - Mengchu Zhou  
[zhou@njit.edu](mailto:zhou@njit.edu)

Treasurer - Paul E Ward  
[peward@ieee.org](mailto:peward@ieee.org)

#### Members at Large

1. Jignasa Ray  
[jignasa.ray@ieee.org](mailto:jignasa.ray@ieee.org)
2. Adriaan Van Wijngaarden  
[avw@ieee.org](mailto:avw@ieee.org)
3. Chris Peckham  
[cdp@ieee.org](mailto:cdp@ieee.org)

Junior Past Chair - Amit Patel  
[a.j.patel@ieee.org](mailto:a.j.patel@ieee.org)

Senior Past Chair - Kirit Dixit  
[Kdixit@ieee.org](mailto:Kdixit@ieee.org)

### Society/ Chapters/ Chair

**Aerospace Electronic Systems Society**  
Chair - Chandra Gupta  
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