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# Berkshire Section News

DECEMBER 1995 ISSUE NO. 40

## MESSAGE FROM THE CHAIRPERSON

### ON THE IEEE REORGANIZATION

For months now the IEEE has been attempting to reorganize itself. I believe such a plan is long overdue. However, the needs of members are not being addressed adequately once again.

Does the reorganization address the critical issue of pension reform? The answer is **NO**. How about the immigration issue of cheap technical labor? Again the answer is **NO**. And how about the issue of unpaid overtime and under utilization of engineers? Once again the answer is **NO**. If this sounds redundant, it is. This proposed reorganization is business as usual and is nothing more than another attempt to short-change USA members.

It is my view that any reorganization should concentrate on giving USA members more attention and more voice. First, the USAB should be made stronger. To this end, the USA members should be able to elect the USAB officers, such as a President and Vice-President. Second, perhaps the IEEE should be split in two -- one organization for professional activities and one that would deal with technical matters, publications and standards.

What is your view? Let me know at KOLOD@ix.netcom.net or write to our newsletter editor.

On the occasion of the upcoming holidays season -- **HAPPY HOLIDAYS.**

### ANNOUNCEMENT

In recognition of a member achievements in the profession, the section executive committee has created a recognition award of \$50.00 to each member who passes either the Engineering In Training (EIT) or Professional Engineering (PE) exams. Please let us know of your success and receive the award.

### PACE COLUMN

I have Video tape presentation of several sessions at the PACE Conference held in Cedar Rapids, Iowa over Labor Day Weekend. The titles are:

1. CHANGE AND CHALLENGE: AN INDUSTRY PROSPECTIVE  
Kent M. Black, Rockwell International Corporation
2. THE ENGINEER'S ROLE IN NATIONAL TECHNOLOGY POLICY  
J. Mark Pullen, James E. Gover
3. IN PURSUIT OF A RESILIENT CAREER  
Panel
4. IMMIGRATION ISSUES  
Panel

Anyone wishing to borrow these Videos may do so by calling Carroll F. Kane at (413) 443-0116.



The Senate Judiciary Subcommittee on Immigration held a mark-up session on November 29th to resolve the final wording of Senator Allan Simpson's bill The Immigration Reform Act of 1995 (S. 1394). This bill would reduce permanent, employment-based immigration from 140,000 to 90,000 per year and strengthen administrative requirements governing the entry of foreign professionals on both permanent and temporary admissions programs. A more detailed description of the bill and its provisions is available from Vin O'Neill in the IEEE Washington office or by e-mail request to v.oneill@ieee.org.

### FRONTIERS IN EDUCATION

Allan Boschen, Vice-Chair of the Berkshire Section of IEEE and a member of IEEE's Precollege Education Committee, has just returned from the 25th "Frontiers in Education", where he presented a paper, the abstract of which appears below.

"Frontiers in Education" is the annual conference of electrical engineering educators. It is sponsored jointly by the IEEE Education Society and Educational Research and Methods Division of the American Society for Engineering Education, and this year by the IEEE Computer Society as well. Allan's paper was one of several on precollege education. It is being sent to selected educators of this area. IEEE members can get copies from the Internet, or by sending S.S.A.E. to Allan at 585 Shaw Road, Windsor, MA 01270. It is contained in the "Proceedings" of this conference, which is on the Internet, at:

<http://www.ee.gatech.edu/conferences/fie95/>

Its abstract follows:

#### Esperanto to Aid Education Reform

Amidst vast and intense social dislocations and budget crises we agonize over

ways to improve our education base -- to ferret out deficiencies and bring it into step with the needs of the times (a strategy, furthermore, to check the further decline of society). Educational philosophies are under close scrutiny, as also the bare nuts and bolts. Here we are suggesting that these analyses go just a bit deeper than we are in the habit of doing on such matters, more in the manner of an Engineering Analysis. Something akin to a Time and Motion Study is suggested, and in this vein a profound consideration of language itself, as the lowest base of communication -- and of education. How do the gross irregularities of language impact the learning process? In what ways and to what extent could a scientifically designed language aid the process? A close look at Esperanto\* is offered. It is the one such language that has stood the test of time, in continuous and extensive use by a worldwide speaking, reading and writing community.

\* Esperanto was designed to serve as the International Language, the universal second language, for which role it is uniquely qualified by being orders of magnitude less difficult to learn (but still a complete and elegant language) and being politically neutral. Esperanto can serve the objectives of education too, and on a broader scope than would at first be supposed.

#### From the Treasurer's Desk

I'm just finishing up my first year as Treasurer of the Berkshire Section IEEE, and I must say that it's been a rewarding and educational year. We've had a very successful year in 1995, and if re-elected, I will look forward to serving you as Treasurer again in 1996.

Our section is on solid financial ground, as you might have guessed by the extremely low costs we have charged for recent meetings. A dinner at the Lenox House for just \$1.00 is not a bad deal at all! As a result of our sound

financial position, we have been able to offer you interesting meetings at very reasonable prices. It is good to see so many of you taking advantage of your IEEE memberships and participating in these meetings. In addition to the meetings, we have been saving some money to send at least one Section officer to the Sections Congress in Denver, Colorado next summer. Look for more information about the Congress in upcoming issues of The Institute.

If you are not currently involved in some aspect of leadership in our Section, I urge you to become more involved in the coming year. The Section always needs new ideas and new people to carry out those ideas. Many of you have vast wealth of technical experience, and you would do us a great service by sharing that knowledge in a meeting of some sort. If you'd like to be the presenter at a meeting but don't know how to go about organizing the event, please get in touch with one of the Executive Committee members and we will make it happen.

Finally, for those of you who will be spending or collecting Section funds next year, I have made up new Request for Payment and Cash Receipt forms for 1996. Please give me a call or drop me a note and I will see that you get the correct forms. I use these forms to keep the Section's books, and using the up-to-date versions makes my job a little easier.

Matt Fisher, Berkshire Section Treasurer  
E-mail: FishAM29@aol.com

#### WRITING CONTEST WITH BONUS!

Berkshire Section IEEE will conduct a revived writing contest in 1996 that is designed to excite more of the county schools to participate. This time the new twist is a bonus to the schools for participating. In addition to the "entry prize" schools that have winners

will get extra payments based on the finishing positions of the students.

To keep the contest and the prizes for the schools in the science field, school prizes will be certificates to purchase science supplies or equipment from one of the leading supply houses. Students will still get cash awards, and the recognition for school awards day.

Mailings to schools will be done in January to both science and english teachers, in addition to the principal. The contest is also planned to have two sections, one for grades 9-10, and one for grades 11-12.

George Haus  
Education Chair

#### IEEE MEMBERS CHOOSE CHARLES K. ALEXANDER AS 1996 PRESIDENT-ELECT

PISCATAWAY, NJ Nov. 7, 1995 -- Charles K. Alexander, dean of the School of Engineering and Computer Science at California State University, Northridge, has been elected 1996 president-elect of the Institute of Electrical and Electronics Engineers, Inc. (IEEE). Dr. Alexander will begin serving as IEEE president on January 1, 1997.

Of the 231,656 ballots mailed to eligible IEEE voting members, 46,225 valid ballots (19.95 percent) were returned. This compares with 19.68 percent in 1994.

Dr. Alexander, who was nominated by petition for the office of president-elect, was one of three candidates seeking this office. The other two candidates, nominated by the IEEE Board of Directors, were Joseph Bordogna, director for Engineering, National Science Foundation and Jan Brown, JB Consulting.



Of the members who voted, 19,568 selected Dr. Alexander. Dr. Bordogna received 18,272 votes, Dr. Brown received 15,051 and write-in candidates received 110.

Dr. Alexander joined the Institute in 1970 and has been an active member. He served as a member of the Board of Directors from 1991-1994, as vice president of Professional Activities from 1993-1994 and as director for Region 2 from 1991-1992. In 1994, he was named IEEE Fellow.

The following item was copied from the December 1995 issue of "the institute":

#### GETTING THE MOST FROM YOUR IEEE MEMBERSHIP

##### Values in IEEE Canada

By Raymond Findlay  
Director, IEEE Region 7

Our Membership Department asked me what it meant to be a member of IEEE in Region 7, IEEE Canada. So I asked members in IEEE Canada what they saw as tangible benefits of membership in the IEEE. They mentioned things like the IEEE Canadian Review, which is our region newsletter. They also mentioned their section newsletters, often because they feel some pride of ownership or because they worked to ensure its success. Of course, they talked about attending local and society meetings and workshops, too.

Some waxed enthusiastically about [ieee.ca](http://ieee.ca) our Internet domain server. It provides Canadian members with access to electronic services such as e-mail and the World Wide Web. Our IEEE Canadian network has several local servers, set up with the aid of a grant from the Canadian Network for Advancement of Research, Industry and Education. Our electronic newsletter, published monthly for all sections in Canada, is important to some members, as are the

IEEE Canada Lectures, broadcast from time to time via the fiberoptic ATM network across the country.

**STUDENT SUPPORT.** Students talked about our McNaughton centers. There is a center attached to each university and a few in community colleges. The centers receive grants from the IEEE Canadian Foundation, a charitable organization set up by some IEEE members to make wise use of surplus funding from previous Canadian conferences. The Foundation also supports scholarships for undergraduates who have served their branches well. Students appreciate the chance to be involved in Student Professional Awareness Activities.

Recent graduates now receive Potentials, the magazine for young professionals, six times a year. Or they may read Spectrum to keep abreast.

Practicing engineers look to the societies to help them keep current, with publications, conferences, and the opportunity to network with other professionals in the area. About 60 percent feel that this is very important to ensure that they stay current.

**DEVELOPING SKILLS.** Some members like the prestige of belonging. Some want the experience associated with holding office, or the status. Others see the IEEE as a fertile ground for developing interpersonal skills - often at their company's suggestion!

The principal reason most people tell me they belong, though, is the people. Whether they mean staff, volunteer or the ordinary member wandering around at a conference, it is the people who make the difference, meeting them, sharing experiences, making friends, often for life.

At a recent technical meeting I posed the question, "Why do you put all this effort into your IEEE volunteer activities? There are no tangible rewards, are there?"

"It's personal," they told me. "I do this because I know I have something to give back to the profession. That's the ultimate reward giving something back - making a difference."

That's how I feel about membership, too. It's an opportunity to give something back after getting so much out of my membership for so many years. I can help nurture students and provide mentoring for them, if they wish. I can help conduct workshops on developing group skills, team building, leadership and other skills that our employers want. I can extol the benefits of membership to the younger engineers and help to get them involved in their profession. Without enthusiasm for the profession their careers will be limited. I can help run meetings, organize conferences and help disseminate technical information. I suppose, in summary, you might say that membership for me too, is personal.

Raymond Findlay is director of IEEE Region 7, and president of IEEE Canada.

#### DINNER MEETINGS

Recently we have had several excellent dinner meetings. They were all well attended. I don't know whether it was the Topics, Speakers or the Low Prices that resulted in an increase in attendance at these meetings. I would like to think that it was a combination of all three.

On Friday, October 20, 1995, Dr. Irving Gabelman of Rome, NY, a Fellow in IEEE, spoke on Legislative Action. He emphasized that engineers must organize to have an effective voice in government on matters that concern them.

On Friday, November 10, 1995, Florian M. Ptak, our Secretary's brother, spoke on Albert Einstein and the Wonder of Science. His presentation included some of the less well-known aspects of

Professor Einstein's life. His talk also explored Einstein's incredibly productive year of 1905 and looked more closely at experiments that verified the Special and General theories of Relativity.

On Thursday, November 16, 1995, Marsha Parry, Reference Librarian at the Berkshire Athenaeum, and Marry Joe Daly, Assistant Librarian at the Johnathan Edwards Library at Berkshire Community College, spoke on How Local Libraries serve the Technical Community. Their presentations covered the following topics:

Their collections of technical books and periodicals

Modern techniques for finding, using and retrieving technical information

Information available through the internet and electronic data bases

How they acquire, catalogue and store new books

What new technical books they have recently acquired

What to do if a particular item is not available at the local library

On Tuesday, December 5, 1995, John Church and Samuel Sass spoke on Battle of the Currents and William Stanley - Local and National Genus. Their presentation included a brief account of Stanley's early years, and explored the bitter rivalry between proponents of d.c. systems and supporters of a.c. It also highlighted Stanley's achievements and inventions, and his thoughts on the rigidly structured engineering education of the time.

John and Sam worked together to nominate Stanley for induction into the National Inventors Hall of Fame in Akron, Ohio on July 22, 1995.



The following article was copied from the November 1995 issue of "IEEE - USA NEWS SERVICE HOTLINES":

#### IEEE-USA ANNOUNCES SUPPORT OF SIMPSON IMMIGRATION BILL

The U.S. Senate should adopt legislation that will strike "a reasonable balance between employers' needs for access to high-tech professionals and the need to safeguard job opportunities, wages and working conditions in the United States -- for both citizens and foreign nationals who have been legally admitted to work in this country," according to IEEE-USA and a coalition of organizations representing high-technology professionals.

In a statement released at a Capitol-Hill news conference on Nov. 29, IEEE-USA supported the Immigration Reform Act of 1995 (S.1394), introduced by Sen. Alan Simpson, R-Wyo. The Simpson bill would reduce employment-based admissions ceilings for foreign professionals and "safeguard employment opportunities, wages and working conditions for U.S. citizens," the statement noted.

Joining IEEE-USA were the American Engineering Association, the Network of

Engineering Scientists, and the Software Professionals Political Action Committee. In addition, former employees of two high-tech companies described their experiences in being replaced by lower-paid foreign workers.

IEEE-USA Board Chair Joel B. Snyder responded to concerns that employers will move jobs overseas if they are denied access to foreign workers in the United States. Snyder said: "Such employers are not seeking a technical workforce in the Third World. They want a high-tech workforce in the United States that will accept Third World wages and working conditions."

The proposed legislation would require employers who wish to hire foreign professionals to meet the following conditions: (1) take timely and significant steps to recruit and train American workers; (2) offer actual or prevailing wages; and (3) refrain from replacing American high-tech professionals with lower-paid foreign professionals. In addition, IEEE-USA is urging lawmakers to strengthen the bill's enforcement provisions, by adding stiff fines" for employers who abuse the system and by granting the Labor Department more authority to investigate violations.

#### BOOKS AVAILABLE TO MEMBERS

The following books or publications are now available to the section members:

IEEE Organization Roster: Regions 1 - 10  
IEEE U.S. Membership Salary & Fringe Benefit Survey 1995  
1995 Membership Directory  
The Electrical Engineering Handbook by Richard C. Dorf, CRC Press  
The Circuits and Filters Handbook by Wai-Kai Chen, CRC Press  
The Biomedical Engineering Handbook by Joseph D. Bronzino, CRC Press  
The Civil Engineering Handbook by W. F. Chen, CRC Press  
The Transforms and Applications Handbook by Alexander Poularikas, CRC Press  
The Mobile Communications Handbook by Jerry D. Gibson, CRC Press  
The Control Handbook by William S. Levine, CRC Press  
The Engineering Handbook by Richard C. Dorf, CRC Press  
IEEE-USA Job Postings

Please contact Rich Kolodziejczyk for details. (413) 499-2135

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