

## REPORTS ON OTHER CONFERENCES

### FREQUENCY CONTROL SYMPOSIUM

**Jack Kusters, Hewlett-Packard:**

Good morning. I have been asked to talk on the Frequency Control Symposium. One thing that has happened since the symposium became part of the IEEE is that our name has gotten much longer. It used to be the "Annual Symposium on Frequency Control;" it's now the IEEE International Frequency Control Symposium.

The 1993 symposium was held in Salt Lake City. We had 129 paper summaries that we received; we accepted 104. Many papers were combined, and that is one of the reasons that it perhaps looks like we had many more rejections than we really did. But there were 12 tutorial sessions, four separate tracks, three sessions per track; and we now have the auspices of Dave Allan as essentially a permanent tutorial chair to make sure that our tutorials end up having some coherence from year to year. Rather than giving the same talk over and over again, we can actually now plan out several years in advance. We think it is quite effective.

The attendance last year was 297 people, down slightly from 1992. I think we had 308. We had thirty-six complementary attendees; four were students. And one of the most important things we have been doing in the last couple years is funding a number of foreign visitors, primarily eastern Europeans. There have been also some people from the People's Republic of China coming to give talks. Those people, for the most part, need virtually full funding, especially for transportation to and support while in the United States. So it turns out to be a rather substantial expense. We have been very lucky to have monies coming from the various agencies that are associated with the Frequency Control Symposium, and companies that are donating money. We had 87 people for the tutorial sessions, up from 1992.

Some of the other activities that are somewhat of interest: this past year we took a survey of conference attendees, specifically asking them to evaluate six things, such as a potential change in date. Frequency Control has always been almost exactly out of phase with PTTI, we're almost exactly six months apart. So that was done by design and it seems to work out extremely well. We tested the flavor of the symposia attendees, and for the most part there is no desire to change meeting dates. Apparently this six-month time lag seems to work extremely well as far as the two symposia are concerned. However, 75 percent were in favor of occasional foreign meetings — and you see that as we get down into this slide. The 1994 meeting is in Boston at the Westin Copley Place; it promises to be at least an interesting place to have a meeting. The Local Arrangements Chairman is Mike Garvey. In 1995, it is at the Fairmount

Hotel in San Francisco. I am the Local Arrangements Chairman. If you wish any information on any of these, contact one of us.

1996 — whereas this is PTTI's 25th anniversary, in 1996 we will have the 50th anniversary of the Frequency Control Symposium. And this will be our first excursion off the continental United States. Our plan is to hold this in Hawaii. The local chair is John Vig. 1997 is Orlando, Don Malocha will be the Local Arrangements Cochair. 1998 will probably be a West Coast meeting, we don't know where yet. 1999 — we are talking about holding a joint meeting with the FTF in Europe. You will probably hear more about this when the person from EFTF gives his report. We're looking at setting up an arrangement such that we can periodically hold meetings in the United States and in Europe with the FTF. The periodicity may be about five years. But there is still a lot of logistic things to be worked out, such as responsibility for the conference and financial as well as sponsorship by organizations. And so this is something that we're working on. And beyond 1999, right now there are no concrete plans.

That is a very quick report of the status of the Frequency Control Symposium. It continues to draw around 300 people; we continue to get a very good, wide selection of technical papers associated with technology and theory. And it looks like the symposium is still healthy and going well. Any comments or questions?

#### QUESTIONS AND ANSWERS

**John Gerhard, Rockwell International:** I am Chairman of the Board of the Measurement Science Conference. And you mentioned that you fund travel for foreign attendees, primarily from China and the Soviet Union —

**Jack Kusters:** Well, the Eastern European countries; we have people from Bulgaria, the former Czechoslovakia, the former Yugoslavia — I'm not going to remember where they are actually from these days.

**John Gerhard:** Yes, we've had requests from the Japanese and other people for funding, and I didn't know if other conferences did that as part of a budgetary thing; and whether they get a really good return on their investment. Because travel is expensive.

**Jack Kusters:** Travel is very expensive. And we have been able to do some fairly decent arrangements. We've been able to work out deals with airlines to handle that in a certain direction. We have been doing it for two years now. Do we get a return investment? Certainly in the technical areas that are associated with the Frequency Control Symposium, specifically in the material areas. There are activities going on today in Russia that far surpass anything that is happening in the United States. And without having this kind of interchange, we wouldn't be as well versed in it as we are now.

So I think there is virtue. Do all of the people who come here to present papers give us this kernel of knowledge? No. It is like any other series of papers that we receive. But we get far more submissions from Eastern Europe than we can possibly handle. So we cherry-pick; we try to find the best ones. And I think we have been reasonably successful.

**Dr. Winkler:** Yes, I agree.

**Jack Kusters:** There are several other members of the committee here and I think we are content with where our money is going.