

COMMENTS ON THE
1981 PARTICLE ACCELERATOR CONFERENCE

The ninth Particle Accelerator Conference was held at the Shoreham Hotel in Washington on March 11, 12 and 13, 1981, under the auspices of the Institute of Electrical and Electronic Engineers, Nuclear and Plasma Sciences Society. Judging by the topics presented during this meeting and the number of papers submitted, this field is still expanding. The high level of activity may specifically be gauged by the recent completions of DESY's PETRA, Cornell's CESR, SLAC/LBL's PEP; the progress being made at FNAL towards a 1000 GeV superconducting accelerator, at BNL towards ISABELLE, at KEK towards TRISTAN and at Serpukhov towards UNK; and the developing plans for a number of major projects such as CERN's LEP, DESY's HERA, Cornell's 100 GeV e^+e^- collider and SLAC's single pass collider. In addition, as could be learned from the reports during this conference, progress in the low and intermediate particle energy domain is equally extensive. Also, applications of accelerator technology are ever expanding, as evidenced, for example, by the reports on dedicated synchrotron radiation sources, on Free Electron Laser devices and on heavy ion accelerators for, typically, fusion, pulsed neutron sources or medical applications. Since the progression towards higher particle energies may be slowing down as a consequence of technological and financial limitations, a specific effort has been made in this conference to emphasize new acceleration techniques and novel technology. Even though some of the ideas as presented, may appear to have limited promise, it is essential that new directions be exposed in order to maintain viability of the field.

The number of papers presented orally, invited or otherwise, could be expanded as a result of the scheduling, during the second day only of the conference, of three simultaneous sessions, in addition to a poster session. This made possible, not only the addition of an extra session on accelerator technology, permitting better coverage of superconducting technology, at the heart of today's (and tomorrow's) high energy proton and electron accelerators, but also made possible the addition of a separate session on new acceleration techniques, as mentioned above. Also, the number of invited papers could be increased to 44 presentations. The total number of contributed and invited papers amounted to 585, of which 56 were orally contributed papers and 193 were poster presentations. The remainder, 259 contributed papers, could be accommodated only in the proceedings.

This conference, although a national accelerator conference, has taken on a limited international flavor; exactly 33.3% of the contributions came from non-USA participants. In terms of contributed papers, 240 out of 585 contributions (i.e. 41%) came from 6 major scientific institutes only. There is, of course, a danger in this, to the extent that this conference could be dominated in its exposed program content by too narrow a base. The Program Committee was aware of this. With great care the invited papers, papers for oral and papers for poster presentations were chosen to achieve a well balanced program. Inherent in this process is, of course, that many excellent contributions could not be presented during the conference, but could be published only in the present Proceedings.

The Conference Banquet was held on the second day of the Conference. We were most fortunate to have the Honorable Mike McCormack, former Congressman and Chairman of the House Science and Technology Subcommittee on Energy Research and Production as our after dinner speaker.

Arrangements for this conference were most ably managed by L. Costrell of NBS, assisted by Joan Hydorn, who carried the major burden of conference correspondence and pre-registration. The arrangements group, all of NBS, also included G. Rakowski, who handled the poster sessions, T. Heaton, who managed registration, R. Cutler, who took care of the audiovisual aspects and D. Mohr. We are indebted to A. Wilmunder of SLAC for the use of Session Indicators. The smoothness with which this conference ran is mainly due to those mentioned here.

Finally, the arduous task of organizing the scientific and technical content of this conference was made manageable as a result of the vast effort carried on by Carolyn Albert of the National Synchrotron Light Source, BNL, as secretary to the Program Committee.

A. van Steenbergen,
Chairman, Program Committee