ICE DISPLAY PIANC, OTTAWA 9-12 JULY, 1973

The Permanent International Association of Navigation Congresses quadrennial convention in Ottawa featured a number of displays relating to marine navigation. Among these was an exhibit demonstrating the work of the Ice Division of AES.

Delegates to PIANC conventions are marine experts from the maritime nations of the world. They represent Government and Industry, inland and ocean navigation. Many are engineers and specialists in the field of ship construction, communications, etc. Their prime concerns are scientific and technical developments which affect marine navigation. These conventions permit exchanges of information on these developments and related problems between nations at a very high level. This convention had broad international press coverage.

Our exhibit, a 20' x 20' area, was designed by Information Canada to highlight some of the features of the ice program. Coordination was handled by A.P. Beaton in Ottawa, and by Lloyd Clarke, C.I. Taggart and A. Lavinski, of Head-quarters staff in Toronto. A bluish background, including the rug, was chosen to portray a feeling of coldness throughout the exhibit. When back-lighting was used this was very effective, particularly the "open water" areas of Hudson Bay.



Model of Lockhead Electra 188C

Static features of the display were:

- an area of operations charts showing the year-round extent of our reconnaissance and forecast activity, the "active areas" at the time of the congress, the bases from which aerial reconnaissance is flown, and the location of the radio facsimile transmitters over which ice charts are broadcast.





Views of AES Exhibit at PIANC - Ottawa

- a stylized map of the Hudson Bay area, with an overlay showing actual ice conditions in the bay.
- two aircraft models (24 inch wingspan): the Lockhead Electra 188C in its first year of service under AES contract, and the Douglas DC4 our flying platform from 1966-1972.

a series of pictures (20" x 23") of operations and equipment in the Electra Aircraft, including infra-red film strips and a laser profilometer trace.

several blown-up color transparencies, back-lighted, showing ice, icebergs and ship operations in ice.

samples of Very High Resolution Radiometer pictures from NOAA-2, and Earth Resources Technology Satellite pictures, indicating the potential of these recent developments in observing technology.

a sample of a composite ice chart prepared in the Ice Central for mail distribution to a long list of multipurpose users.

Side Looking Airborne Radar imagery - the all weather tool for ice observing (but which we do not have in our electronic kit at the present time).

The "live" feature of the exhibit was facsimile transmission and reception of ice and weather charts. Over a broadband circuit three transmissions per day were made from the Ice Central to the display booth in the Chateau Laurier Hotel. A radio facsimile transmitter, similar to those which the ice reconnaissance aircraft use for direct relays to ice-breakers was on display and was used to make transmissions from one side of the exhibit to the other.

The exhibit was manned by John Comeau from the Ice Observing Unit in Toronto with assistance from Fred Geddes of Ice Central.

Exhibits were open for viewing from 9:00 a.m. to 7:00 p.m. Monday to Thursday and most delegates appear to have visited them. Our display was one of four from D.O.F M.O.T. also had four, with single exhibits from Telesat Canada, Ports Canada, National Research Council, St. Lawrence Seaway Authority and the Department of Public Works. Comments on the complete display were quite complimentary, and our exhibit from the Ice Division was apparently one of the more interesting.



Ice Observer John M Comeau recording ice conditions from new Electra ice reconnaissance aircraft leased by AES Ice Branch in 1972

