

Canadians now telephone around the world almost as easily as they call across town. Businessmen may contact clients rapidly, even though the latter may live on another continent. Meanwhile, Canadian television viewers are able to watch major events around the world live through satellite relays.

Public telephone, telex and telegraph services are the backbone of international telecommunications. Teleglobe Canada operates 920 international lines with 185 countries for telex. Over 250 countries can be reached by telegraph. The Crown corporation also operates 2,300 telephone lines which cover 217 countries.

Teleglobe Canada is a member of a Commonwealth telecommunications organization (CTO) and as described in section 16.2.4, an international telecommunications satellite organization (INTELSAT). It is a recognized private operating agency on an international radio consultative committee and international telegraph and telephone committee of the ITU. Teleglobe Canada participated in the negotiations to found an international maritime satellite organization operating a satellite communications network to link the fleets of member countries with their coastal stations. The negotiations were expected to be completed in 1979, and the system to become operational in 1980.

16.5 Radio and television

Broadcasting, like other communications systems in Canada, has evolved to meet the needs of a comparatively small bilingual and bicultural population in a country of vast size. One problem has always been to provide an adequate broadcasting service for all Canadians — even those living in remote parts of the country.

The first move was to establish an east-west radio network during the late 1920s and 1930s to link communities from the Atlantic to the Pacific along Canada's southern border where the vast majority of the population lives. Television broadcasting in Canada began in 1952, but it was not until 1959 that a basic television network between British Columbia and Newfoundland was established.

The next problem was to reach people in Canada's North. In 1958, Parliament voted funds for the northern service of the CBC, Canada's public broadcasting service. In its early years, provision of the service depended upon adaptations of resources normally used to serve southern Canada, or upon such improvisations as CBC's scheme of circulating recorded TV programs to low-powered, self-contained television transmitters installed in remote or isolated communities.

Then with the new information technology — the communications satellite — CBC's northern television service moved to live satellite transmission in 1973. Stations north of the 60th parallel obtain their programming by satellite mainly from the CBC transcontinental networks across southern Canada.

In 1974, Parliament approved a CBC's accelerated coverage plan to provide radio and television services in all communities of 500 or more. By mid-1979, radio and television transmitters were located in all but one such community.

Because of accelerated coverage and the satellite technologies, the reach of Canadian broadcasters is now extensive. Only 1.1% of Canadians could not pick up at least one television station in January 1979. In 1977 nearly 95% could receive at least two Canadian television stations in their own language and 98% of English-speaking Canadians outside Quebec had access to at least four Canadian radio stations. Roughly 97% of the Quebec population could pick up at least four French-language radio stations.

According to the CRTC, in 1977 there were still 590,000 anglophones and 250,000 francophones who could not receive television in their official language. Fibre optics transmission systems, which can carry many more channels than the existing copper cable, may provide one solution to this problem. Direct broadcast satellites might also provide an economic solution. Small earth terminals costing less than \$200 could be placed on the rooftops of homes in remote areas.

The extension of broadcasting service throughout a country as large as Canada is expensive, and Canada has combined public ownership and commercial operations to achieve this purpose.