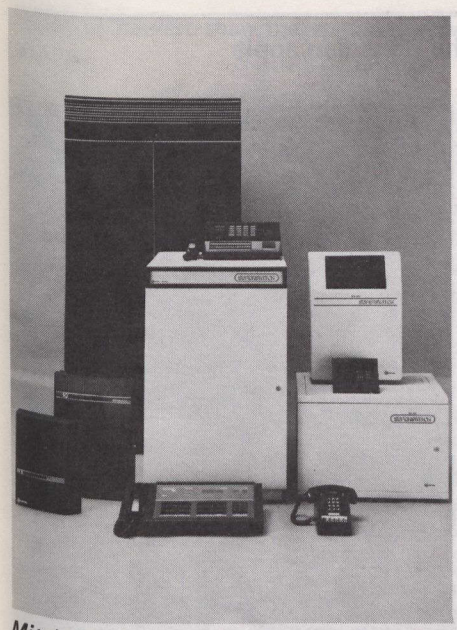

Mitel Corporation, a leader in Canadian telecommunications, produces telephone equipment such as the Superswitch Family shown here. The line runs from the SX-5, with six extensions and two trunks to the SX-2000, a digital switch with capability of over 10,000 lines.

Canada. The cablevision industry in Canada employs more than 5,000 people.

Videotex

In 1978, Canada's Department of Communications announced the development of an advanced videotex terminal called Telidon, capable of producing images with a much higher resolution than currently available equipment. Superiority is also exhibited in flexibility and compatibility of data bases with different terminals and having a designed capacity for future expansion.

Subsequently other Canadian firms, notably Norpak, Electrohome and AEL Microtel, have taken up the Telidon technology and are now manufacturing a range of Telidon hardware and equipment.

Canadian Telidon hardware and information services companies are finding early acceptance in Venezuela, Germany and the United States. The Telidon protocol has also been recommended by AT&T and should encourage its adoption as a North American standard.

Research and development

Canadian telecommunications equipment manufacturers maintain their own research and development and test facilities for all types of telecom systems. These include areas such as satellites, satellite earth stations, digital switching and transmission, fibre optic systems, CATV, microwave and coaxial transmission, mobile radio, etc. The Canadian telecom research annual investment is approximately $250 million a year.

Electronic components

The Canadian electronic/telecommunication industry is supported by an active group of components manufacturers who tend to specialize in excellently engineered, high-technology components for specific applications. Included in such applications are space, nuclear and the higher technology communications and industrial equipment. The military market is a major user and many Canadian component manufacturers are qualified under the well-known MIL Standards, thus ensuring the utmost degree of reliability and quality.

The majority of the microelectronics research and development and manufacturing capability is located in the Ottawa region. This activity includes the private sector, government and university laboratories. The technologies found in this area are silicon, compound semi-conductors, for example, gallium arsenide, thick film and thin film.

(Excerpts from an article in Canada Commerce, *Special Supplement 1982.)*

Petroleum industry revenues rise

Petroleum industry revenues on total operations increased by 22 per cent to nearly $24 billion in the first half of 1981, according to a survey of the industry released by the federal Petroleum Monitoring Agency.

The report is based on data provided by 75 per cent of the largest oil and gas companies in Canada. While total revenues increased, the survey found that profits (net income after tax) declined by 21 per cent to $1.8 billion. This was due to a drop in profits in the upstream sector (exploration, production and development), which was partially offset by profit increases in the other major industry sectors – downstream (refining, marketing and petrochemicals), other Canadian operations and foreign activities.

Profits from downstream operations rose by 18 per cent to more than $800 million. About $340 million of the total downstream profits resulted from gains realized by companies following increases in the petroleum compensation charge.

Total sources of funds available to the industry rose by 56 per cent to $11.9 billion. Funds from internal cash flow (cash generated by operations) decreased slightly to $4.3 billion. External sources of funds more than doubled to $7.6 billion, including approximately $4 billion raised for acquisition and takeover purposes.

The acquisitions and takeovers effected by Canadian-controlled companies during the first six months of 1981 amounted to $6.5 billion, according to the report. The estimated effect of the acquisitions was to reduce the level of foreign ownership (measured on petroleum-related revenues) by 4.5 percentage points to 69.5 per cent and foreign control by 7.2 percentage points to 74.3 per cent.

Development corporation creates high-technology fund

Canada Development Corporation (CDC) has set up a new investment fund to encourage the growth of high technology companies in Canada.

The Vancouver-based holding company has invested $10 million through CDC Ventures Incorporated, its wholly-owned subsidiary to promote ventures in applied science and engineering.

John Shortly, president of CDC Ventures, told a news conference that VASE Fund Incorporated – VASE stands for Ventures in Applied Science and Engineering – is a means through which private interests can invest in potentially-lucrative high technology firms.

Shortly said VASE's first major project is a $6-million investment in HSA Reactors Limited of Toronto, a private high technology anti-pollution and resource-recovery company currently developing practical applications of electrochemical technology. Such technology, whose commercial prospects appear limitless, involves the transfer of electrons in chemical processes to produce new chemicals.

Ian Kennedy, president of both HSA and VASE, said the fund will also look at new proposals in robotics, process control, management information systems and related software and bio-electrochemical innovations.

The fund will be typical of the seven other funds administered by the organization, with a target of six to eight enterprises for each fund. The aim is to increase the VASE Fund's capital (excluding HSA) to between $20 million and $25 million.