



storage, analysis, distribution and management of geographically referenced information. This technology can be applied by both private-sector and government users to manage information on such diverse areas as natural resources (such as forestry), the weather and tax collection. The Canadian government has encouraged co-ordinated partnerships between the private and public sectors in this field. Canadian industry-government consortia have recorded several successes in winning projects internationally.

## THE SPACE INDUSTRY

More than 150 Canadian firms are now involved in the space industry. In 1994, they sold over \$700 million in goods and services, of which nearly half was exported. The Canadian space industry exports a larger proportion of its total production than do any of its competitors.

Canadian companies have registered many successes around the world, most notably in mobile personal satellite communications, remote-sensing hardware and data acquisition. They are responding to growing demand for space equipment and services related to Earth observation facilities and telecommunications equipment. The industry has also developed an advanced capacity in robotics and space infrastructure and has been a major contributor to the International Space Station Program.

The recently launched Canadian satellite RADARSAT ushers in a new age in remote sensing and firmly positions Canada as a leader in Earth observation. Unlike most remote-sensing satellites, which use optical sensors to capture sunlight reflected from the Earth, RADARSAT can collect images of the Earth day or night and through clouds using a powerful microwave Synthetic Aperture Radar system. Positioned approximately 800 km above the Earth, RADARSAT produces images of the surface that can be used in monitoring the environment and managing the Earth's natural resources.

Television viewers around the world observed the mission of the U.S. space shuttle Atlantis in the fall of 1995. This mission used Canada's newly developed Space Vision System, which made possible the installation of a connecting bridge between the shuttle and the Russian space station MIR.

The Canadian-made MSAT, launched in early 1996, is the world's most powerful commercial satellite for mobile and fixed applications. The MSAT Network has brought advanced mobile and stationary wireless telecommunications to almost every square kilometre of Canada, picking up where cellular networks leave off. It covers all of Canada, the United States and Mexico, most of the Caribbean and Central America, and 400 km out to sea, helping individuals, businesses and search-and-rescue teams, in coastal and remote areas.

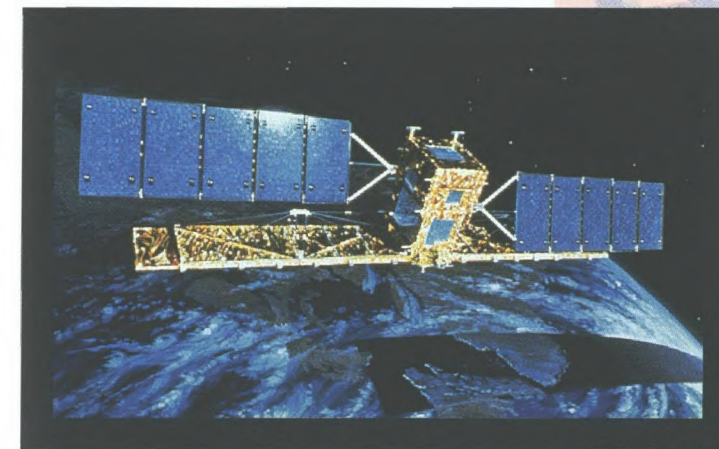


PHOTO COURTESY OF  
RADARSAT INTERNATIONAL INC.

