The organization of research in Canada is unique because of the country's enormous area and small and unevenly distributed population. Furthermore, the fact that Canada borders three oceans and possesses vast northern regions makes it particularly fitted for many types of research.

Research in Canada is carried on at four levels: by the Federal Government, by provincial governments, by universities and by industry.

The federal departments that administer the development of natural resources have the longest history of scientific research. Some provincial governments have research councils that concentrate mainly on applied research directed toward the development of provincial resources and local industry.

In the federal sphere of research, many areas of science and technology, particularly those that aid the secondary industries, fall within the scope of the National Research Council, which was established in 1916. Beginning with three research division, in chemistry, physics and biology, the NRC has expanded to comprise 10 divisions and two regional laboratories in science and engineering. Of 2,919 NRC employees, 838 are professional scientists and engineers.

Under federal jurisdiction also are Atomic Energy of Canada Ltd., the Defence Research Board, and the Medical Research Council. The Defence Research Board conducts investigations into materials, armaments, special weapons, telecommunications, aeronautics and Arctic problems. This Board, the NRC and the Medical Research Council make extensive financial grants to universities and university students.

Atomic Energy of Canada Ltd., a Crown company, is concerned with nuclear research and development, the design and construction of reactors for nuclear power, and the production of radioactive isotopes and associated equipment, such as cobalt-60 beam-therapy units for the treatment of cancer.