



One of Canada's many new library buildings

## Adult Education

Provincial departments of education and university extension departments are continually broadening the scope of adult education in Canada, and organizations such as the Canadian Association for Adult Education are active in wide programmes centred on the education of people for enlightened community service. It is possible to learn a trade or craft or to study for a degree through the courses now offered to adults in night lectures and by correspondence.

Immigrants are encouraged to take courses in language and citizenship held throughout Canada and, if classes are not available, may receive self-teaching materials for either English or French on application to the Department of Citizenship and Immigration. More than sixteen hundred such classes were held during the

winter of 1955-56 and almost thirty-five thousand immigrants took advantage of them. Many take further courses in such specialized subjects as drama, writing, music, and so on.

Public libraries for adults and children are found in every province. They circulate books, films, gramophone records, pictures and occasionally works of art. They give reference service and in some areas serve as community centres. Traveling libraries, known as "bookmobiles", are used in both town and country. The National Library in Ottawa has microfilmed the catalogues of many universities, research and public libraries.

## SCIENCE

Scientific research in Canada has a well-established tradition dating back to the days of Sir William Osler, the great physician and teacher; Sir Ernest Rutherford, who did his early research in radioactivity at McGill; Sir Charles Edward Saunders, whose development of Marquis wheat was an important factor in the economy of the Canadian Prairies; and Sir Frederick Banting, one of the discoverers of insulin. Today government departments, universities and private industries are united in a programme of research that includes such diverse enterprises as attempts to master the Arctic environment and investigations into certain processes of the human mind.

### University Research

University research is financed by government grants, scholarships and fellowships as well as by foundations, industrial corporations and private donors. Medical research at hospitals and universities gets similar support, and active programmes are in progress in each of twelve Canadian medical schools. Outstanding contributions have been made by the Connaught Laboratories in Toronto, which co-operated in the development of the Salk vaccine for poliomyelitis; by the Montreal Neurological Institute, whose director, Dr. Wilder Penfield, has achieved world recognition for his work on the human brain; and by the Institute of Experimental Medicine and Surgery at the University of Montreal, where Dr. Hans Selye has earned an international reputation for his theories in the area of human stress.

### The National Research Council

It is the National Research Council, established in 1917, that has had perhaps the greatest effect on scientific research in Canada. This is the principal scientific arm of the Federal Government, although various other departments also carry on research projects. The National Research Council gives scholarships (more than three thousand up to 1957), coordinates national research through a network of committees, and operates its own laboratories.

The Second World War brought a tremendous expansion in the National Research Council, which now employs six hundred scientists and eighteen hundred other workers. Its annual budget is twenty million dollars and its laboratories are organized into divisions dealing with applied biology, pure chemistry, applied chemistry, pure physics, applied physics, building research, mechanical engineering, radio and electrical engineering and medical research.

The Council's interests are very broad. They range from the wartime development of thirty kinds of radar equipment to the more recent invention of an automatic system for de-icing aircraft. Development of new building materials and new clothing fabrics, research into the problems of snow and permafrost, suppression of industrial noise, investigations into the potential use of seaweed—all these diverse research projects come within its scope.