

Six minor irrigation projects in Saskatchewan provide water for 125,000 acres of land. Major irrigation projects include the St. Mary Irrigation Project, jointly undertaken by the Federal Government and the Government of Alberta in 1946. The St. Mary Dam, completed in 1951, impounds water from the Belly and Waterton Rivers, providing sufficient water to irrigate approximately half a million acres. The South Saskatchewan River Development Project, completed in the late summer of 1967, involved building of a main dam 210 feet high and 16,700 feet long—the largest rolled earth dam in Canada and one of the largest in the world. Located between the towns of Outlook and Elbow, this dam will create a reservoir 140 miles long with a capacity, when filled, of 8,000,000 acre feet of water (usable storage of 2,700,000 acre feet). The project will provide water to irrigate 500,000 acres of land, the power potential is 475,000 kilowatts, and the artificial lake will have considerable recreational potential. A second, smaller dam adjacent to the height of land between the South Saskatchewan and Qu'Appelle Rivers will divert water into the Qu'Appelle-Assiniboine system to provide much-needed water supplies for irrigation and the considerable urban areas of the watershed. The cost of developing the main reservoir was \$117,000,000, of which the provincial government contributed \$25,000,000.

Land reclamation projects have been carried out by the PFRA in Manitoba along the Saskatchewan and Pasquia Rivers near The Pas, the Assiniboine River between Portage la Prairie and Headingly, at various points in the Interlake Region, and along the Northwest Escarpment. The Assiniboine River project includes creation of a large reservoir near Shellmouth and construction of a diversion canal near Portage la Prairie to carry floodwaters to Lake Manitoba. Construction of the main dam began in 1964.

Smaller irrigation and water-supply projects assisted by PFRA number better than 14,800; most of them serve individual farmers but a number serve adjacent farms or small communities and many of them provide substantial water supplies for various uses. Since the inception of the program, some \$19,700,000 has been spent by PFRA on such projects.

Under the provisions of the Atlantic Development Board Act of 1962, amended in 1963 and 1966, a \$150,000,000 Atlantic Development Fund was established to support projects which would contribute to the growth and development of the economy of the Atlantic region. The Act also required the Board, in consultation with the Economic Council of Canada, to prepare an over-all co-ordinated plan for the promotion of the economic growth of the region. Among the projects initiated during the Board's first four years of operation were a number relative to water use for power production and for industry, the most notable being a \$20,000,000 grant toward the \$120,000,000, 600,000-kilowatt Mactaquac dam in New Brunswick and a similar grant toward Newfoundland's \$88,000,000, 225,000-kilowatt (first stage) Bay d'Espoir hydro-electric project. The Board also assisted in developing water supplies to meet the needs of industries—mainly fish-processing plants—in some 35 communities, and committed \$2,000,000 toward abatement of industrial pollution in inland waters of the region. As part of its planning activities, the Board engaged consultants to carry out a \$1,500,000 study on the supplies of water in the region and the demands that are likely to be made upon them up to 1981 and beyond. To Mar. 31, 1967, the Board had committed from the Atlantic Development Fund \$99,000,000, of which \$55,000,000 had been spent.*

The program under the Agricultural Rehabilitation and Development Act (ARDA) (see p. 471) included, during the first three years of the program to Mar. 31, 1965, some 207 soil and water conservation projects for which the Federal Government shared the costs to the extent of \$12,300,682.

Under the Canada Water Conservation Assistance Act of 1953, which enables federal participation up to 37½ p.c. of the cost of dams and other major water projects, six water control programs—the Halton Region, Metropolitan Toronto Region, and the Upper Thames River conservation programs in Ontario, and the Alberni, North and West Van-

* The functions of the Board and its operations are dealt with in greater detail in Chapter XXIV, Sect. 6, Subsect. 2.