## CANADA'S DEPENDENCE ON ELECTRIC POWER

### Many Resources Can be Developed Only Through Use of Hydro-Electric Energy

FEW realize the important relation which Canada's wealth in water power bears towards reaping the full benefit from her numerous other natural resources. It is true that these other resources would not otherwise be entirely lost to the country, but they would have to be exported as raw material in its most primary state with a minimum return to us. The presence of cheap power, which is almost invariably found side by side with these other resources, facilitates their development, while their full industrial value is retained in being able to deliver them as a fully manufactured product.

It may be even permitted to predict that this cheap power will soon attract raw material from other countries. For instance, the large aluminium plant on the United States side of Niagara Falls is operating largely from hydro-electric energy exported from Canada. Had it been physically or economically impossible to export this energy, as the question of power is of utmost importance, these works would have doubtless been attracted to use it on the Canadian side.

In Canada, the pulp and paper industry has been greatly expanded through the proximity of abundant water power to our forest resources. A recent census bulletin on this industry shows that there is a total of 524,252 h.p. installed to operate pulp and paper mills in Canada. From other figures given it is fair to estimate that at least 475,000 h.p. of this is derived directly or indirectly from water power.

If we consider pulp mills alone, the figures from the bulletin also demonstrate the important part which power holds in connection with this industry. The Canadian mills producing pulp exclusively are stated to have a yearly output of 490,615 tons, for which it is necessary to use 95,463 h.p. In other words, one horse-power will produce approximately five tons of pulp yearly. This one horse-power usually costs from $8 to $10 with water power, while, if other sources of energy had to be used, the corresponding cost might be from $30 to $50. This would mean an increase in cost of at least $4 per ton, or, in all probability, if the water power had not been available, the pulp would not have been manufactured.—From "Conservation."

## COMPULSORY TOWN PLANNING

TOWN planning in Great Britain has so far advanced beyond the experimental stage that it has now been decided to make it compulsory for every town having 20,000 inhabitants or more, to submit a town planning scheme for its own area to the Local Government Board, not later than 1926. Such a scheme must embrace the limitation of population densities per acre, define the portion of a site area to be covered with buildings, the character of the buildings, the lines of arterial roads and the provision of open spaces.

The British people realize that haphazard growth of towns leads to serious evils and they are determined to control it. In future, land will have to be developed so as best to serve the interests of the community, which, in the long run, is usually in the interests of the landholders themselves. Only the land speculator is adversely affected. If the public wish to put that individual out of business, they cannot do it more effectively than by actively promoting proper schemes of town planning.

In Canada, the province of Nova Scotia took the lead in making town planning compulsory in 1915. The only other province which has a compulsory Act is Saskatchewan. These are therefore the only two provinces abreast of the Old Country in town-planning progress, though most of our provinces have enabling Acts in force.—From "Conservation," published by the Commission of Conservation, Ottawa.

## PERSONALS

JOHN LEY RETALLACK, of Vancouver, B. C., who was recently appointed as the first public utilities commissioner for the Province of British Columbia, has had experience in railway construction, banking, mining and corporation accounting. He served for five years with the Royal North-west Mounted Police, and after his discharge in 1889, settled in the Kootenay district of British Columbia. At the outbreak of war he obtained a commission and soon became a major. He was at Ypres and the Somme and subsequently was connected with railway construction work at the Front. R. H. Gale, mayor of Vancouver, was first appointed to the position by the provincial government, but the Great War Veterans' Association protested against the appointment, urging that Major Retallack should receive the post on account of his war services and because of his technical qualifications. On account of this protest, Mayor Gale resigned two or three days after he had been appointed, and the provincial government then named Major Retallack. He is now examining into the scope and methods of public utility commissions elsewhere. His headquarters will be at Vancouver.

ALFRED G. KING, JR., formerly of the firm of King, Evans & Pickard, of Victoria, B.C., has been appointed city engineer of Nanaimo, B.C.

A. R. ROBERTS, formerly of Burns & Roberts, Ltd., has opened an office at 201 Bank of Hamilton Bldg., Toronto, and will deal in new and used machinery, contractors', railway and power plant equipment.

T. CARMICHAEL, who was assistant superintendent of the Public Works Department, Regina, Sask., is now directing the department in place of W. T. Mollard, formerly superintendent, who recently resigned.

L. P. BURNS, president of Burns & Roberts, Ltd., Toronto, has bought the interest in the firm held by A. R. Roberts, and will continue the business as formerly, the organization otherwise remaining unchanged.

MAJOR A. G. NUTTER, who prior to going overseas was connected with Mussens Limited, has associated himself with the exporting and importing firm of Wonham, Bates & Goode, Inc., New York and London. This firm has just opened an office at 145 St. James St., Montreal, under the management of Major Nutter.

GEORGE A. JOHNSON, whose partnership with Major W. L. Benham was announced in this column a short time ago, was promoted July 3rd to the rank of colonel. Colonel Johnson entered the service in the spring of 1918, as major, and was promoted to lieutenant-colonel on November 7th, 1918. He is now second in command of the operation and repair branch of the construction division of the U.S. Army, in charge of the operation and maintenance of road, railroad, building, water supply, sewerage, electrical and all other utilities in the various establishments under the jurisdiction of the United States War Department.