

development of this infant service (Government of Iraq: Ministry of Defence: Meteorological Service. Annual Report of the Director, No. 4: Year ending 31st March 1940. Pp. 30. Baghdad: Government Press, 1940). Measures taken in previous years to provide the most efficient service of information about the existing and anticipated weather on the various air routes of civil aviation "blossomed and bore fruit towards the end of the year", to quote the report, an achievement which practically coincided in time with a reduced demand for such information resulting from reduced civil aviation on account of the War. In addition there were the minor disturbances of continuity arising from the transfer of the service from the administrative control of the Officer Commanding the Royal Iraq Air Force to the Director of Civil Aviation and from a change of directorship, although the latter did not occur until the fourth day of the last month of the period covered by the report, when Mr. J. S. Farquharson relieved Mr. J. Durward, the first full-time director.

But the greatest obstacle to progress in national meteorological organization remained, as in previous years, that of getting suitably educated staff of the right calibre willing to take up the openings that become available in the expansion of such a youthful service. A consequence of this was that several of the observatories were maintained single-handed without a day's respite—no mean achievement when the climate of Iraq is taken into consideration. The calling up for military service of some of the trained staff was a contributory cause of this state of affairs. As regards the work of the Service, the report shows that a large part of this consisted in the carrying out, in spite of the obstacles just referred to, of a fixed scheme of distribution of information for the benefit of aviation, and supplying answers to various climatological inquiries. In addition, the first three of a series of non-routine publications described as "Occasional Publications" were completed. Of these the first and third dealt with climatological statistics—principally monthly mean temperature and rainfall—while the second was concerned with administrative regulations.

Expansion of Electrical Industries in Canada

MR. JOHN R. READ, president of the Canadian Westinghouse Co., Ltd., gave an interesting broadcast in Canada on the vital part being played by the Canadian electrical industries in the war effort (Bull. Hydro-Electric Power Commission of Ontario). He stated that the Canadian worker has more electrical energy to call upon than anyone else in the world except the Norwegian. More than 80 per cent of the power used for all purposes in Canada is electric power, and to-day the electrical plants of the Dominion can produce some nine million h.p., more than five times the amount of electric power which was available for the service of Canadian industry during the War of 1914–18.

Enormous supplies of power and power equipment are required in the manufacture of explosives.

Because Canada has the power available, a total of 106 million dollars is being expended in creating great chemical and munitions plants in various parts of the country. A large new aluminium plant is now being constructed in Canada, representing an investment of about fifty million dollars, and capable of producing when completed enough aluminium a year for the construction of about fifty thousand military aeroplanes. This will be an installation of 700,000 h.p.

It is much the same story with respect to all those other metals vital in war—gold, copper, nickel, lead and zinc. Almost one tenth of all the electric power used in Canada is employed by the mining industry. Ample power supplies have made it possible for the mines to increase their production to meet war needs. One of the very striking differences between the present War and that of 1914–18 relates to communications. Since 1918, the whole new world of radio has emerged, and radio equipment makes possible the constant co-ordination of military action. Radio is also a vital link in the national life. Already scientific men of the industry have moved far in the fields of television, facsimile transmission, electron optics and extremely high frequencies. More than 60,000 Canadians are engaged in the electrical industry. Their wages and salaries amount to more than one hundred and ten million dollars a year. The electrical industry of Canada well realizes the task which war imposes, the duty which it owes to democracy, to Canada, and to the ideals of its founders.

The Gas Industry in War-time

THE seventy-eighth general meeting of the Institution of Gas Engineers was held in London on June 11 under the presidency of Mr. George Dixon of Nottingham. At the luncheon Mr. Oliver Lyttelton, then president of the Board of Trade, and Sir Peter Bennett, of the Ministry of Aircraft Production, spoke in complimentary terms of the resilience of the industry and its valuable services under present war conditions. The technical business consisted in the discussion of a symposium in "The Gas Industry, 1941 and After"—nine short papers on topics of current interest and importance. These revealed a strong movement for reorganization and administrative concentration of the industry which it is felt consists of an excessive number of producing and distributing units. The number of standards of calorific value is excessive, with consequent undue multiplication in patterns of appliance and their cost. The success of grouping small undertakings and the establishment of 'gas grids' in promoting the freer use of public gas supply was taken as an example to follow. There are obstacles to reorganization in an old industry consisting of numerous and sometimes small local units. If, however, desirable changes are not undertaken spontaneously, it was suggested that they might be enforced by national action to meet urgent and national needs. Coal carbonization industries with their production of liquid fuel may, under post-war economic conditions, acquire a new and greater importance.