Engine truck, Woodard. Trailing truck, Woodard. Exhaust pipe, single, nozzles, 5% in., 5% in., 6 in.

Grate, style, rocking. Piston rod diam, 4½ in., piston packing, snap rings.

rings, Smoke stack, diam., 17 in., top above rail 15 ft. 2 5/16 in. Whistle, top above rail, 15 ft. 2½ in. Tender frame, channel. Tank, style, water bottom. Tank, capacity, 10,000 gal. Tank, capacity, fuel, 17 tons. Valves, type, 14 in., piston travel, 6½ in., steam lap 1 1/16 in. Valves, setting, lead, ½ in. lap 1 1/16 in. Valves, setting, lead, ½ in.

## Wireless Telegraph Communication With Trains.

In connection with the elaborate tests which have been conducted by some railways in America and the progress made in the development of wireless telgraphy in so far as communication with running trains is concerned, it is claimed that the first experiment made by any railway in America, and probably the world, to dem-onstrate the possibility of wireless com-munication with a fast running train was on the G.T.R. on Oct. 13, 1902. The experiment was made under the direction of E. Rutherford, F.R.S.C. (now Sir Ernest), and H. T. Barnes, F.R.S.C., then both of the MacDonald Physical Laboratory of MacDin Laboratory of McGill University, Montreal.

The following account of the experi-ment is taken from Mr. Barnes' report: "During the passage of the special train on the GTR Distance Toronto and Monton the G.T.R. between Toronto and Montreal, bearing the American Association of General Passenger and Ticket Agents from Chicago to Portland, it was demonstrated that communication could be maintained between a station and a fast moving train by means of electric waves. No attempt was made to cover distances comparable in size to those attained by Marconi and others, but with comparatively simple laboratory apparatus it was possible to keep the train in touch with the station for from 8 to 10 miles. St. Dominique was selected as the transmitting station, where two large metal plate vibrators 10 x 12 ft., connected with an induction coil of the usual pattern, were situated. On the train the waves were received by collecting wires connected to a coherer of nickel and silver powder. The relay operated electric bells in three cars. The collecting wires were run through the guides for the train signal cord, and extended on both sides of the coherer for about a car length. To obcoherer for about a car length. tain the maximum effect it would have been better to have had a long vertical wire, but since such was impossible, the horizontal wire was used. Although these Were placed inside the steel frame cars, strong and definite signals were obtained over the distance named. Another diffi-culty culty militated against obtaining the maximum sensitiveness, as, owing to the natural vibration of the train resulting from its great speed, it was impossible to have the have the relay adjusted to its most sen-sitive point. In spite of these difficulties, the distance to which signals could be sent the distance to which signals could be sent to the train was eminently satisfactory, and with more refined apparatus greater distances could without doubt be obtained. The success of this form of wireless tele-graphy of which this was but a pioneer graphy, of which this was but a pioneer experiment, opens up yet another method providing for the safety of the travelling public.

The Paris, Lyons & Mediterranean Ry. is reported to have ordered 100 locomo-tives from the Pathwin Locomotive from the Baldwin Locomotive Works.

## Birthdays of Transportation Men in March.

Many happy returns of the day to:-W. G. Annable, General Passenger Agent, Canadian Pacific Ocean Services, Ltd., Montreal, born at Ottawa, Mar. 3, 1875.

John Archibald, Locomotive Foreman, C.P.R., Coquitlam, B.C., born at Edin-burgh, Scotland, Mar. 13, 1872. Jas. Balkwill, Division Superintendent,

Canadian Division, Michigan Central Rd., St. Thomas, Ont., born in Southwold Tp.,

Ont., Mar. 8, 1870. George Bury, Vice President, C.P.R., Montreal, born there, Mar. 6, 1866.

Allan Cameron, Superintendent, Land Branch, Department of Natural Resources, C.P.R., Calgary, Alta., born near Owen Sound, Ont., Mar. 14, 1864. H. S. Carmichael, Passenger

and H. S. Carmichaei, Passenger and Freight Manager, Canadian Pacific Ocean Services, Ltd., London, Eng., born at Glasgow, Scotland, Mar. 7, 1874. F. G. J. Comeau, District Freight Agent, C.P.R., Halifax, N.S., born at Me-teghan River, N.S., Mar. 10, 1859.

W. A. Cooper, Manager, Sleeping, Din-ing and Parlor Cars and News Service, C.P.R., Montreal, born there, Mar. 22, 1871.

A. E. Cox, General Storekeeper, Cana-

A. E. Cox, General Storekeeper, Cana-dian Northern Ry., Winnipeg, born at Huddersfield, Eng., Mar. 12, 1863. Hon. N. Curry, President, Canadian Car & Foundry Co., Montreal, born in King's County, N.S., Mar. 26, 1851. C. T. Delamere, acting Engineer of Construction, Eastern Lines, C.P.R., Montreal horm at Brainard Minn Mar

Montreal, born at Brainerd, Minn., Mar. 18, 1881.

H. G. Dring, General Passenger Agent, C.P.R., London, Eng., born at Easton, Northamptonshire, Eng., Mar. 8, 1881.

Patrick Dubee, Secretary-Treasurer, Montreal Tramways Co., Montreal, born

there, Mar. 4, 1876. Frederick Elliott, President, Victoria Navigation Co., Ltd., Thurso, Que., born at Montreal, Mar. 8, 1858.

W. R. Fitzmaurice, Superintendent, District 2, Intercolonial Division, Canadian Government Railways, Campbellton, N.B., born at Bedford, N.S., Mar. 19, 1870. C. Forrester, Superintendent, London

Division, Ontario Lines, G.T.R., London, born at Wanstead, Ont., Mar. 5, 1876. Jas. D. Fraser, Director and Secretary

Treasurer, Ottawa Electric Ry., Ottawa, Ont., and President, Canadian Electric Railway Association, born at St. An-drews, Que., Mar. 26, 1851.

A. Gamble, General Yardmaster, R. Winnipeg Terminals, C.P.R., born at Dub-lin, Ireland, Mar. 1, 1876. E. P. Goodwin, ex-Inspecting Engineer,

National Transcontinental Ry., B. Verte, N.B., born there, Mar. 17, 1865. Baie

Halstead, Division Freight Agent, C.P.R., Calgary, Alta., born at Brace-bridge, Ont., Mar. 2, 1877. R. M. Hannaford, M.Can.Soc.C.E., As-

sistant Chief Engineer, Montreal Tramways Co., Montreal, born there, Mar. 22, 1865.

C. A. Hayes, General Traffic Manager, Canadian Government Railways, Moncton, N.B., born at West Springfield, Mass.,

Mar. 10, 1865. H. T. Hazen, M.Can.Soc.C.E., Chief En-

H. T. Hazen, M.Can.Soc.C.E., Chief En-gineer, Toronto Suburban Ry., Toronto, born at Truro, N.S., Mar. 14, 1870. Joseph Hobson, M.Can.Soc.C.E., Con-sulting Engineer, G.T.R., Hamilton, Ont., born at Guelph, Ont., Mar., 1834. J. I. Hobson, Treasurer, Canada Steam-ship Lines, Ltd., Montreal, born at Guelph, Ont., Mar. 30, 1872.

N. J. Holden, President, The Holden Co., Ltd., Montreal, born at Nobleton, Ont., Mar. 22, 1866.

A R. Holtby, Master of Bridges and Buildings, Mountain Division, Grand Trunk Pacific Ry., Prince Rupert, I born at Rawdon, Que., Mar. 23, 1859. B.C.,

Frank Lee, M.Can.Soc.C.E., Principal ssistant Engineer, C.P.R., Winnipeg, Assistant Engineer, C.P.R., Winnipeg, born at Chicago, Ill., Mar. 7, 1873. R. W. Long, Division Freight Agent,

G.T.R., Hamilton, Ont., born at Appin, Ont., Mar. 20, 1873.

J. M. McKay, Superintendent, Saska-toon Division, Saskatchewan District, C.P.R., Saskatoon, born at Tiverton, Ont., Mar. 13, 1868.

Mar. 13, 1868. Owen McKay, M.Can.Soc.C.E., Chief Engineer, Essex Terminal Ry., Walker-ville, Ont., born in Ross Tp., Renfrew Co., Ont., Mar. 13, 1848. Col. H. H. McLean, K.C., M.P., Presi-dent, St. John Ry., St. John, N.B., born at Fredericton, N.B., Mar. 22, 1855. M. Magiff, Superintendent of Car Ser-vice and Telegraphs. Central Vermont

vice and Telegraphs, Central Vermont Ry., St. Albans, Vt., born at Planks Point, N.Y., Mar. 24, 1852. Sir Donald D. Mann, Vice President,

Mackenzie, Mann & Co., Ltd., and Vice President, Canadian Northern Ry., To-ronto, born at Acton, Ont., Mar. 23, 1853. H. H. Melanson, General Passenger Agent, Canadian Government Railways, Mondern N.R. born at Scadouc, N.B.

Moncton, N.B., born at Scadouc, N.B., Mar. 9, 1872. T. Milne, Locomotive Foreman, C.P.R.,

Windsor, Ont., born at Arbroath, Scot-land, Mar. 3, 1856. J. V. Murphy, General Agent, C.P.R.,

Portland, Ore., born at Bowmanville, Ont., Mar. 5, 1885.

Peter Paton, Purchasing Agent, Canada Steamship Lines, Ltd., Montreal, born at New Lovell, Ont., Mar. 13, 1869.

F. W. Peters, General Superintendent, British Columbia District, C.P.R., Van-couver, born at St. John, N.B., Mar. 25,

1860. J. W. Pugsley, Secretary, Department of Railways and Canals, Ottawa, Ont., born at Amherst, N.S., Mar. 12, 1861.

born at Amherst, N.S., Mar. 12, 1861.
C. J. Smith, Manager and Secretary, Montreal Warehousing Co., Montreal, born at Hamilton, Ont., Mar. 10, 1862.
W. Y. Soper, Vice President, Ottawa Electric Ry. Co., Ottawa, Ont., born at Oldtown, Me., Mar. 9, 1854.
E. F. L. Sturdee, General Agent, Pas-senger Department, C.P.R., Boston, Mass., born at St. John N.B. Mar. 29, 1876.

born at St. John, N.B., Mar. 29, 1876. A. A. Tisdale, Assistant to Vice Presi-dent and General Manager, and Purchas-ing Agent, Grand Trunk Pacific Ry., Win-nipeg, born at Mount Vernon, Ont., Mar. 8, 1874.

G. W. Vaux, General Agent, Passenger Department, Union Pacific Rd., Chicago,

born at Montreal, Mar. 21, 1866. A. D. Watt, District Locomotive Fore-man, Grand Trunk Pacific Ry., Prince Rupert, B.C., born at St. Louis, Que., Mar.

Rupert, B.C., born at St. Louis, Que., Mar. 5, 1874.
A. T. Weldon, Assistant General Freight Agent, Canadian Government Railways, Moncton, N.B., born at Dorchester, N.B., Mar. 6, 1876.
D. O. Wood, Asistant Export and Import Agent, C.P.R., Toronto, born at Kleinburg, Ont., Mar. 16, 1864.
R. Wright, Division Agent, Ontario Lines, G.T.R., Toronto, born at London, Ont., Mar. 15, 1885.
H. K. York, Car Foreman, C.P.R., North Transcona, Man., born at Victoria Corner, Carleton Co., N.B., Mar. 20, 1881.