

for each end of the ashpan. They hold 1,500 pounds of ashes, and have smokebox netting in the bottom to let the water run out, but prevent large cinders from blocking the drain.

The tracks upon which the buckets move are made of common iron piping, and steam passes through them in cold weather, keeping the oil from freezing on wheels of buckets, and also keeping the pit free of snow and ice in the winter time.

At each end of the pit extra openings can be seen under the rails for the men to get under the engine and rake the ashes from each end of ashpan, and avoid the danger of crawling between the wheels. When the men are in position at each end of pan, the buckets stand immediately in front of them, and the ash hoes are kept at each end of the pit between the rails, and can be drawn forward when needed. There is also a very convenient arrangement for each man for wetting the ashes. A pair of pipes come through the side of the pit at each end, one for steam, and the other for water. Valves are placed just clear of the pit wall, and beyond the valves the two pipes are joined in one, to which a length of hose is attached. When not in use, in cold weather, the water valve is shut, and a slight escape of steam keeps the hose from freezing. Water can be used for wetting the ashes, or steam for thawing frozen ashpans.

With the crane for hoisting the buckets, a very heavy load of ashes can be put on a car to any desired height. The dumpings can be distributed over the car, and one shift only is needed to fill it from end to end. The next car can be then drawn into position by the crane.

Two of these pits have been in operation, one at McAdam, N.B., and the other at Brownville, Me., for over two years, and have given perfect satisfaction during two of the hardest winters experienced for many years. The cost of labor of loading ashes on to cars has been one cent per ton. Average time taken to draw buckets from under engine, dump ashes on car, and replace under engine is three minutes. In ordinary business one man on each shift has hoisted the ashes, hoed out one end of ashpan, placed the ash cars and dried the sand.

With two crews handling incoming engines, about fifty engines can be handled per day on this pit. An engine is put on the pit, fire cleaned, and put in the house. The following engine is put on pit by second crew. The first crew, returning from engine-house, take charge of third engine, which they coal, sand, and water, and by this time the second engine has the fire cleaned, and is ready to move on the turntable.

The pit is 36 feet long between the rails to give room to work the hoe. Outside of rails it measures 27 feet, and is, therefore, bridged by one rail. The width from rail to ash car track is 15 feet.

The ash buckets are five feet long, and are so situated as to suit engines with long or short ashpans.

ORDERS OF THE RAILWAY COMMISSIONERS OF CANADA.

Copies of these orders may be secured from the Canadian Engineer for a small fee.

4664—April 14—Authorizing the Chatham, Wallaceburg and Lake Erie Railway Company to temporarily operate the crossing at grade with the Grand Trunk Railway on William Street, Chatham, Ontario, pending the installation of interlocking plant and derails.

4665—April 7—Recommending to the Governor-in-Council, for approval by law No. 105, of the Quebec Harbor Commissioners.

4666—April 29—Authorizing the C.P.R. to cross with its track the track of the C.N.R. Company's spur to the Bird's Hill gravel pit in Section 16, Township 11, Range 4, Province of Manitoba.

4667—April 16—Authorizing the C.P.R. to construct its railway across road allowances at one hundred and twenty-six points on its Pheasant Hills branch, Province of Saskatchewan.

4668—April 30—Authorizing Toronto and Niagara Power Company to erect its transmission wires across the tracks of the C.P.R. north of Toronto Junction, County of York, Ont.

4669—April 30—Authorizing the Toronto and Niagara Power Company to erect its transmission power wires across the tracks of the C.P.R. at Lambton Park, County York, Ont.

4670—April 30—Authorizing Madame P. H. Roy, for St. Johns Waterworks Company, to lay water pipe under the tracks of the G.T.R. at Allen Street, St. Johns, P.Q.

4671—April 30—Approving deviation in the location of the C.P.R. main line and double track at Scovil, mile 130 to 132.

4672—April 30—Authorizing the G.T.P. to cross with its line or tracks the tracks of the Edmonton and Slave Lake Railway, Section 15, Township 53, Range 25, west fourth meridian, District of Edmonton, Alberta.

4673—April 30—Authorizing the Norfolk and Tillsonburg Telephone Association to erect, place and maintain its wires across the track of the C.P.R., near Eden, Ont.

4674—April 30—Approving deviation of the C.P.R. Company's main line and double track between Busteed and Deception, mile 16 to 19.5 from Kenora, Ont.

4675—April 30—Approving deviation of the C.P.R. Company's main line and double track between Snell and Hodge, mile 113.2 to mile 114.90, new line, and mile 113.2 to mile 114.83, old line, from Ignace.

4676—April 30—Approving deviation of the C.P.R. Company's main line and double track between Edison pine, mile 99.4 to mile 109.9, old line, and mile 99.4 to mile 110.4, new line, from Ignace.

4677—April 30—Authorizing the New Brunswick Telephone Company to erect its aerial wires across the tracks of the C.P.R. at Arthur Raymond's house, near Woodstock, N.B.

4678—April 30—Authorizing the New Brunswick Telephone Company to erect its aerial wires across the track of the C.P.R. at Moore's Mills, N.B.

4679—April 30—Granting leave to the Consumers' Gas Company of Toronto to lay and maintain an eight-inch cast iron gas pipe under the track of the C.P.R. on Dovercourt Road, Toronto, Ont.

4680—May 7—Ordering that the Canadian Classification No. 13 be amended by the addition of a carload rating of third class on books in boxes or cases (item 30, page 12), and that the amendment become effective not later than May 20th, 1908.

4681—May 7—Authorizing the South-western Traction Company of London to erect its transmission wires across the track of the G.T.R. at a point approximately one mile north of St. Thomas, at Lyndhurst Road, Ont.

4682—May 5—Ordering that the I.C.R. and G.T.R. be absolved from the agreement with the C.P.R. re rates to Fredericton on traffic from points west of Montreal, which were raised from 2½ cents to 8 cents per hundred pounds.

4683—May 1st—Authorizing the corporation of the town of Aylmer, Ont., to lay water main under tracks of Canada Southern Railway within the limits of the town of Aylmer, Ont.

4684—May 7—Approving maximum freight tariff of the Klondike Mines Railway Company, submitted for the approval of the Governor-in-Council, April 21st, 1902.

4685—May 5—Varying Order of the Board No. 3238, dated July 3rd, 1907, so as to permit the railway companies, subject to the jurisdiction of the Board, to equip passenger coaches with one fire extinguisher instead of two.

4686—May 7—Authorizing the G.T.R. to construct and operate a branch line of railway or spur at a point on Lot No. 157, Parish of St. Blaise, County of St. Johns, P.Q., thence in a westerly direction across Lot 158, in the said parish, the Grand Bernier Road and Lot 157 to the premises of the People's Specialty Company, Grand Ligne, P.Q.