

**New Type of Enlarged Filling Hole for Locomotive Tender Tanks.**

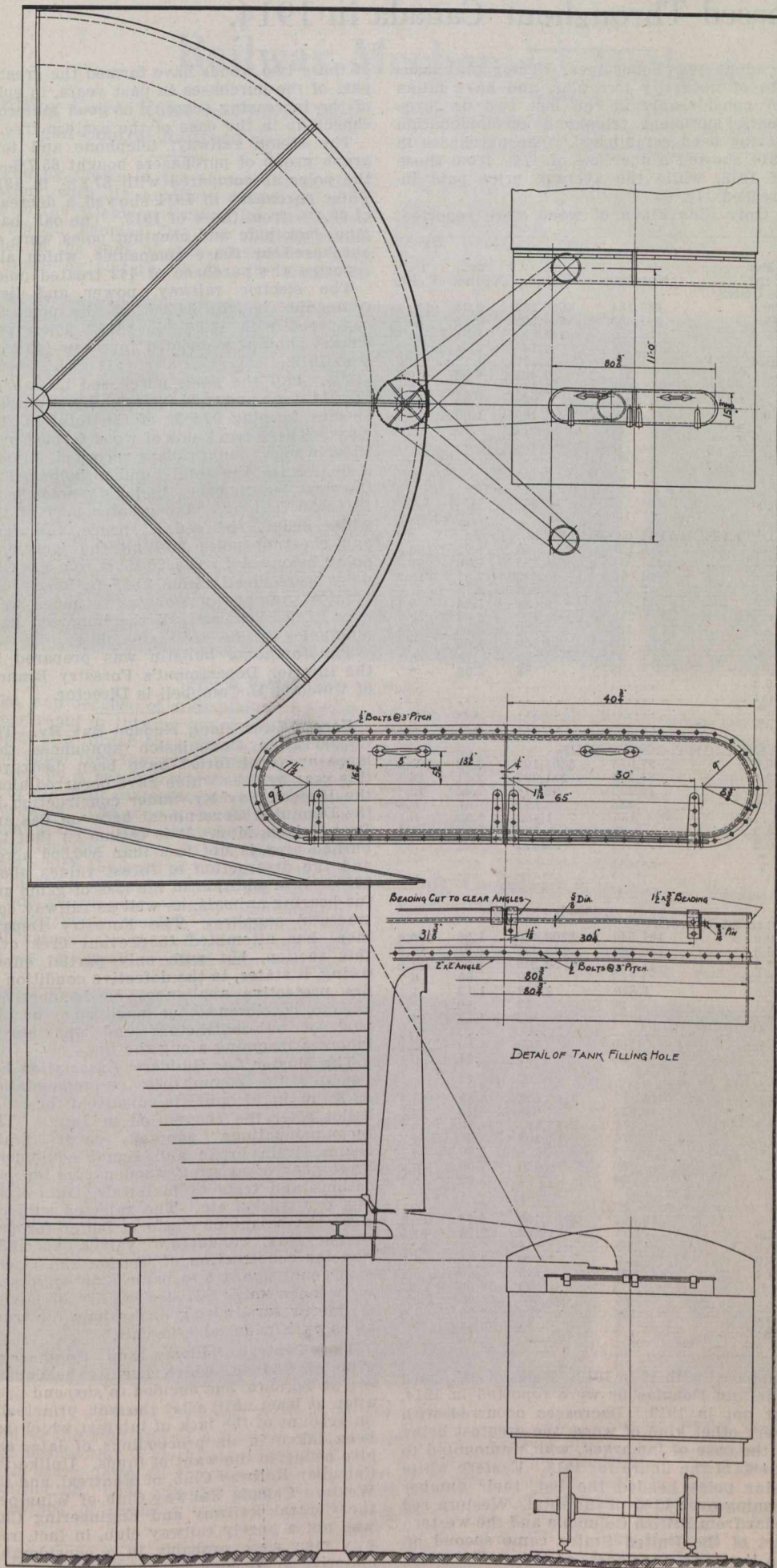
Among other notable features of interest incorporated in the design of the 15 heavy consolidation type locomotives built for the Canadian Government Railways recently, is the enlarged type of filling hole applied to the tender tank, which is shown in the accompanying illustration. It is seldom, if ever, possible to stop heavy freight trains within a predetermined area less than  $\pm$  ft. over or under that desired. The cause for this is apparent, and the ruling factor is invariably that known as "slack action," that is, the movement allowed by reason of the compression of draft rigging which in a 60 car train often exceeds 15 ft. This tends to gather at one end or the other and the recoil forces the train beyond any refined movement that may be desired.

Realizing conditions as above stated, it has been the practice on many roads to disconnect the locomotive from the train when taking water, as the manhole of the usual size only allows for a maximum length of travel for the standpipe or tank spout of 6 ft., or 3 ft., each way. By examining the accompanying illustration, it will be noted that a travel of 11 ft. is easily obtained from any usual design of standpipe or water tank spout. Furthermore these conditions are applicable to both sides of the tank and the design is such that it can be applied to any style of tank, large or small.

The construction details do not vary from those usually experienced, except that the cover is made in two sections of  $\frac{1}{2}$  in. steel plate resting directly on top of the  $\frac{3}{8}$  in. filling hole wrapper sheet, which is stiffened by a  $1\frac{1}{2}$  x  $\frac{3}{8}$  in. steel beading as shown, the latter being cut to clear the  $2\frac{1}{4}$  x  $2\frac{1}{4}$  in. hinge angles. The wrapper sheet extends 8 ins. above the water space top plate of tank and is formed with rounded ends so as to give a maximum inside opening  $15\frac{3}{8}$  ins. wide by  $80\frac{3}{8}$  ins. long. For this data we are indebted to A. W. Wheatley, Vice President & General Manager, Canadian Locomotive Co., the builders of the locomotives referred to above.

**American Railway Master Mechanics' Association.**—Following on the association's convention in June, 54 subjects were submitted to the members for letter ballot, and of this number one subject only has been rejected, viz., the recommendation that the locomotiveman's torch be made of steel tubing. Recommendations accepted covered the specification for steel axles, fire box steel, forging, cylinder castings and steel castings; inspection and testing of locomotive boilers; operation of brakes on locomotives and tenders handled dead in trains and offered in interchange; photometering headlights, rules for determining stresses in longitudinal barrel seams and patches, gusset braces and flat surfaces, and staybolts, radial stays, crown bar bolts, etc.; tinware; fuel economy; forging specifications, and boiler washing.

**The Churchill Basin Fish and Traction Co.,** which is a joint stock company registered in Saskatchewan, has been granted a license by the Dominion Government, to occupy for one year a strip of land 40 ft. wide from Big River to the Great Sandbar on the Beaver River, from the latter place to Ile a la Crosse, 125 miles; and from the Great Sandbar to Lac la Rouge, 100 miles. The license is renewable from year to year, and "generally use the said strips of land and the company may make roads thereon, for the ordinary purposes of a common carrier."



Enlarged Filling Hole for Tender Tanks.