The present standard ferry scow (see Fig. 1) is 18 ft. in width and 52 ft. in length with two 12-ft. aprons extending beyond the ends of the scow. The carrying capacity of the new boats is figured to take care of four heavy tanks of wheat at one load.

The service is managed by a small office staff at Regina, one field inspector and usually two small construction and maintenance crews who are kept constantly in the field all the year, overhauling the boats in the winter and attending to repairs and approaches in the summer.

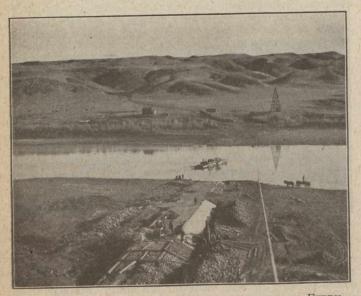


FIG. 5-CONSTRUCTING PERMANENT APPROACH TO FERRY

Fig. 2 indicates the characteristics of the South Saskatchewan river for 250 miles east of the western boundary of Saskatchewan. This view illustrates the sandbars which form at one level of the water, re-form, move and disappear at succeeding stages of the water. This natural feature of this section of the river makes the operation of ferries a difficult problem for the department to contend against. The road in the foreground is a typical road entry to an ascent from the river level to the plateau, which in some places is as high as 300 ft.

Fig. 1 is a fair-weather scene; Fig. 3 shows the difficulties of ferriage prior to the setting in of the severe

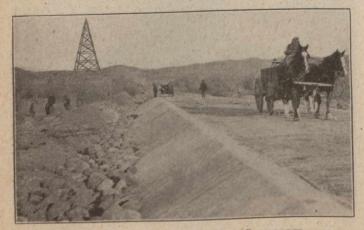


FIG. 6-PERMANENT APPROACH COMPLETED

weather. The river is full of "slush" ice, which forms on the ferry scow and obstructs the landings. The ferrymen are required to operate their boats under these conditions as long as possible consistent with safety. In Fig. 3 on the far side of the river can be seen one of the standard cable towers. At most crossings one of these towers is required at each side of the river. The cables (1¼-in. crucible cast steel cables with hemp centres) are suspended from the top of the towers and it is upon these cables that the pulleys of the travellers run. The travellers are connected with the ferry scows by $\frac{1}{2}$ -in. cables, which can be seen in Fig. 1.

Fig. 4 shows one method of making a solid road across the loose sand of the bars at points where the ferry scow cannot make a good natural landing. The dark material is successive layers of straw (preferably flax straw) which binds into the sand and makes a solid road for the heaviest kind of traffic.

A permanent ferry landing consists of a rampart of boulders with a concrete cover, the centre being laid with planks. Fig. 5 shows an approach road in the course of construction; also the South Saskatchewan river at its narrowest point, extreme low water. On the far bank the road can be seen entering the hills. The height of the tower on the far bank is 60 ft. The hills in the background are characteristic of the river benches in this vicinity. Fig. 6 is a "close-up" of the completed permanent approach.

TOWN PLANNING IN RELATION TO INDUSTRIAL DEVELOPMENT*

BY C. W. KIRKPATRICK Industrial Commissioner, Hamilton, Ont.

YOU cannot get the most or the best out of a man unless he is happy and contented. High wages and short hours are not, in themselves, sufficient to make him either. He demands, and he is entitled to, the right to live, and unless you provide him with proper living conditions for himself and his family he will never prove 100% efficient.

I cannot claim originality for either the above paragraph or the thoughts it expresses. They are the words spoken to several others and myself by H. S. Firestone, head of the great Firestone Tire & Rubber Co., but they struck me with much force, and the more I have turned them over in my mind, the more have I become impressed with the idea that they have probably had much to do with Mr. Firestone's success. And they sum up briefly and concisely the few remarks that I intend to make. They may not appear to have any direct bearing on the subject, "Town Planning in Relation to Industrial Development," but when you analyse them I think you will agree with me that they tell pretty nearly the whole story.

In my comparatively brief experience as commissioner of industries for the city of Hamilton, I have found that the first concern of practically all large manufacturers is labor. The availability of a labor supply concerns him more than any one other thing, and the quality of that labor is to him of quite equal importance. In inquiring into the quality of the available labor supply, he invariably seeks a first-hand knowledge of housing conditions. If he finds that the workingmen of the city are properly housed, it does not take much more to satisfy him that the quality of the labor is good, but if on the contrary he finds that the particular class of labor in which he is interested is housed in shacks or tenements, or that the families of the workmen are surrounded by conditions that are not congenial or healthful, it takes more than the persuasive eloquence of an industrial commissioner to convince him that in that community he will find that which is most essential to the successful conduct of his business-efficient labor. In support of that statement (you will pardon me if I make another local reference), a few weeks ago H. W. Hoover, general manager of the Hoover Suction Sweeper Co., of Canton, Ohio, was asked-not by myself but by an indirect representative of the Department of Trade and Commerce-why he had selected Hamilton as the location for the company's Canadian plant, and this is what he wrote in

reply:--"First of all we were most favorably impressed with the seemingly ideal living conditions of the laboring people. The large percentage of these folks who owned their own

*Address at the Southwestern Ontario Town Planning Conference, Hamilton, Ont., November 27th and 28th, 1919.