## **Construction of a Cattle Stop**

A some part of the farm, whether it be at the entrance to the homestead or through paddocks normally traversed by pneumatic-wheeled traffic, an efficient cattle stop can obviate the otherwise irksome duty of opening and shutting gates, and also the possibility

## Short Courses For Farmers

Tentative arrangements have been made for short courses for farmers in the Auckland district as follows:— June 10-14: Young Farmers' Clubs

- at Whangarei.
- June 13-17: Young Farmers' Clubs at Pukekohe.
- June 24-28: Dairy Farming Course at Ruakura.
- July 1-5: Farm Management Course at Ruakura.
- July 8-12: Course for Maori Farmers at Ruakura.

Full details will appear in the May "Journal," and further information can be obtained from the Fields Superintendent, Department of Agriculture, Hamilton.

of gates being left open and stock straying. Nevertheless, a cattle stop is suitable only for rubber-tyred vehicles; a separate gateway must be provided for heavy vehicles, farm implements, and animals.

The most important constructional features to bear in mind are the durability and strength of the building materials (this is particularly applic-



able if timber is used), sufficient width bedded on either side in the concrete. and length, and lastly, ample depth be-If this is done the pipe ends should neath the bearers to deter animals be embedded in concrete to keep them from attempting to jump the gap. A better plan still is to embed

## For Durability

For all-round durability and ability to bear heavy weights either light railway rails or, more preferably, 2½ in. galvanised water piping set in reinforced concrete is ideal. When using rails or pipes it is wise to space them no closer than 4 inches, with the rails themselves supported on two bearers spaced about 5 feet apart and in such position that they will bear the weight of the load.

Pipes may be held in position over concrete bearers by pieces of reinforcing steel rod bent over and embedded on either side in the concrete. If this is done the pipe ends should be embedded in concrete to keep them firm. A better plan still is to embed the pipes completely both at the ends and where they pass over the bearers, in which case the concrete surface should be moulded over to prevent animals gaining foothold.

## Serviceable Type

The cattle stop in the illustrations, which is a serviceable wooden type, has the following dimensions and constructional details:—

Overall width of bearers .... 9 feet Length of cattle stop ...... 10 feet Depth of ground floor ...... 2 feet

The general appearance of the finished stop is as in Fig. 1. Fig. 2 is a close-up of the rails and supports. The rails are 6 in. x 4 in. hardwood, on edge, and bevelled at road surface. These rest on four beams, also of hardwood, 8 in. deep and  $6\frac{1}{2}$  in. wide. The four outer walls of the cattle stop have been built of reinforced concrete, the sides of which are 6 in. through and the ends 8 in. at ground level, with a 4-inch ledge to support at either end the 4-8 inch x  $6\frac{1}{2}$ -inch bearers.

In this particular stop the cross rails were separated by wooden blocks having a width of 4<sup>§</sup> in. spiked to the bearers beneath, and set 2 in. below the level of the rails. As shown in Fig. 1, the stop has been neatly finished with guard rails on either side of the driveway. To extend the life of the wooden rails they could be brushed over with a creosote mixture.

> -D. M. E. MERRY, Instructor in Agriculture, Nelson.

