

piers and abutments of the bridge, consisting of one 30 ft. and two 20 ft. spans are complete. At 33 m. 42 ch. the construction of the piers for the Matahaura Viaduct is now in hand. The excavation for the foundations of piers C and D is completed, and the concreting of pier D is in hand. The viaduct itself consists of two 40 ft., two 60 ft., and one 250 ft. spans, with a total height of 215 ft.

Platelaying is now complete to the Waikoau Viaduct at 26 m. 60 ch., and preparations are being made for the laying of the rails from the north side of this viaduct to the Matahaura Viaduct at 33 m. 42 ch. The rails for this work will be taken over the Waikoau Gorge on the bridge transporter cable-way, and the sleepers will be carted ahead to Tutira from the 26 m. peg.

Ballasting is being vigorously pushed ahead. The first lift has been completed to 26 m. 60 ch., the second lift to 18 m. 40 ch., and the third lift to 13 m., and also between 16 m. and 18 m., the ballast being loaded by a steam-shovel from pit at 13 m. 65 ch.

Cattle-stops have been put in at 16 m. 72 ch. and at the north end of the Waipunga station-yard. Overbridge at 18 m. 69 ch. has been completed, those at 23 m. 31 ch. and at 28 m. being under construction. The road-deviation at 30 m. 19 ch. is completed, and that at 35 m. 10 ch. is being metalled. The reconstruction of the telephone line to the new railway standard is well in hand. Two concrete cottages for platelayers have been erected at Matahaura and the provision of a permanent water-supply is on the way.

The original sawmill at Makomako has been replaced by a new outfit, which is turning out approximately 100,000 super. ft. of timber per month. The bush itself is of good quality and consequently timber for general purposes on the works as well as for the housing of employees is being procured at considerably less cost than it can be purchased. In addition, there is the added convenience of being able to obtain delivery of timber as it is required.

The general housing conditions for workmen are good and whenever necessary new provision has been made and houses moved forward as the work progressed.

The line from Eskdale onwards to Waikoau has been well maintained and a regular train service has been run to connect with the Napier-Eskdale service at Eskdale, and a fair amount of goods has been handled, particularly over the last four months.

*Wairoa Section* (37 m. 35 ch. to 70 m. 67 ch. ; length, 33 m. 32 ch.).—This section now comprises all that part of the above railway previously dealt with as the Mohaka, Waihua, and Wairoa Sections, including the Wairoa station-yard. The construction of this section involves a considerable amount of very heavy work, including, as it does, five tunnels aggregating 120 ch. in length. It also includes three viaducts over the Waihua, Mohaka, and Maungaturanga Rivers respectively. The principal objective during the period has been as far as possible to get the tunnels under way, as they comprise the greatest portion of the work from a time-to-complete point of view.

At the Chimney Creek Tunnel No. 1 (46 m. 15 ch. to 46 m. 31 ch.) the northern approach has been taken out and 3 ch. of tunnel driven ; a steam-shovel is engaged on the southern approach to this tunnel. At Chimney Creek Tunnel No. 2 (47 m. 1 ch. to 47 m. 17 ch.) the northern approach has been completed and 7 ch. of tunnel driven, also bottom heading holed right through. The Mohaka Tunnel (52 m. 74 ch. to 53 m. 27 ch.) has been driven for a distance of about 6 ch. from the southern end. The Waihua Tunnel (60 m. 63 ch. to 60 m. 77 ch.) is being pierced from the northern end and about 7 ch. have been completed. The Kotemaori Tunnel, which is 41 ch. long, and the longest tunnel on the section, has unfortunately very long heavy approaches. These are being vigorously pushed on, two steam-shovels being engaged on the southern end and one on the northern end ; it will, however, be some considerable time before work can be commenced on the tunnel proper. A steam-shovel is at present engaged in shifting slip country from the southern end of the Waihua Tunnel ; two shovels are at work, and another is being installed to deal with the heavy work between 53 m. 30 ch. and 55 m. 40 ch.

Between the beginning of the Wairoa Section and the Mohaka Tunnel no continuous length of railway is being worked, attention being mainly given to those works which will require the longest period for construction. The formation of the Wairoa station-yard has been completed and all sidings laid, while the formation and platelaying has been extended a distance of 2 m. in readiness for the erection of the Wairoa Bridge there. In the meantime all formation work as far as Te Kumi is in hand, so that on the completion of the bridge the rails may be laid for 18 m. and thus facilitate the transport of construction material for the Mohaka Tunnel and works farther south. A number of road-deviations have been constructed in connection with the railway, one at Kiwi Creek approximately a mile long being in hand, while two at Waihua are completed and metalled. These are principally to avoid level crossings. Four concrete block cottages were erected at Kotemaori, where the headquarters for part of the section is now established. At the Wairoa station-yard the passenger-station buildings, goods-shed, platform, and loading-bank have been built. As the main construction headquarters for the Wairoa Section is also located here, various other buildings for carpenters' shop, fitters' shop, stores, and other buildings have been erected or shifted from other sites to this yard. The general housing facilities for workmen throughout the section are good. A large Y.M.C.A. building was transferred from Waipunga to Kotemaori and is well patronized. Twenty-nine huts, sixteen married men's cottages, and four bath-houses have been erected.

#### WAIKOKOPU BRANCH RAILWAY.

*Wairoa Station-yard to Waikokopu Wharf* (0 m. 41 ch. to 23 m. 23 ch. ; length, 24 m. 35 ch.).—During the year work has been mainly confined to completing the bridges and maintaining the line for traffic. The Awatiri Bridge and the Wai Bridge have had permanent caps placed. The goods-shed at Waikokopu station-yard has been completed, and the Harbour Board's shed has been extended to allow of a loop line being run under cover through the shed, thus allowing of goods being handled