

The Wellington district has been largely engaged in the restoration of sealed highways affected by military traffic, and a total of 39 miles has been resurfaced. A contract has been let for a new 590 ft. bridge over the Manawatu River at Whirokino, and the work is well advanced. This replaces an old timber-truss bridge damaged by an accident and is in line with and only a few chains distant from the 4,000 ft. concrete trestle erected over the river flood-channel a few years ago.

In the Upper Hutt Borough the pavement has been widened over $3\frac{3}{4}$ miles by sealing the shoulders for a width of 10 ft. on each side, with considerable improvement to the safety of traffic in the borough.

The 95 ft. Wangaehu Bridge, in the Masterton County, was completed, and several other bridges and large box culverts are in progress in the district.

The principal new work in the Nelson-Marlborough district was the sealing of the highways adjoining the Delta military camps, a total length of 6 miles 25 chains being involved. In addition, $2\frac{1}{2}$ miles of resurfacing and widening was undertaken.

Some heavy bridge repairs and other flood-damage works have been carried out.

Footways were installed on two bridges, and 8 chains of footpath constructed adjacent to Nelson City. A contract for the 80 ft. Clark River Bridge on the Nelson-Westport Highway is in progress.

The West Coast district experienced an unusually dry year, but in February continuous heavy rain caused considerable damage, particularly on the Christchurch-Kumara State Highway.

Six and a half miles of maintenance sealing was carried out. The 64-chain Orwell Creek deviation, which eliminates a dangerous length of road near Ahaura, has been completed, and 10 chains of formation was raised above flood-level at Kotokohu.

The 160 ft. Duffers Creek Bridge south of Greymouth and the 78 ft. Sandel Creek Bridge on the Karamea Highway were erected. Traffic planking was installed on two combined road-rail bridges between Inangahua and Greymouth.

In North Canterbury the chief works were the construction of a new approach to the Waiau River Bridge on the Picton-Christchurch Highway, the second-coat sealing of $3\frac{3}{4}$ miles on the inland highway to Kaikoura, and the installation of a twin 4 ft. culvert between Hawarden and Waitohi Gorge.

In the Christchurch area 2 miles of plant-mix paving was laid near Halswell, and $3\frac{1}{2}$ miles resealed in the Waimairi County.

The approaches to the Kowai River Bridge were rebuilt owing to flood-damage, and an old bridge at the Kaikanui Stream replaced by twin 5 ft. pipes.

The Tinwald-Westerfield Highway in South Canterbury was reconstructed and sealed over a length of $8\frac{1}{2}$ miles, principally for military-camp traffic.

A contract was let for the new bridge over the Rakaia Gorge flood-channel, and the work commenced.

The Hooker Bridge near the Hermitage, which was partly washed away by flood two years ago, has been reinstated.

In both the Otago Central and Otago South districts the thin metallised surfaces of many highways were detrimentally affected by winter conditions, including a long succession of heavy frosts, and a great deal of remetalling is necessary.

In the northern area the reconstruction and sealing of $5\frac{1}{4}$ miles below Kurow has been completed.

On the Glenorchy-Paradise Highway a 34 ft. bridge over the Oxburn has been erected, and two others are overdue for renewal, one, over the Rees River, being 860 ft. long.

Three and a quarter miles was resealed south of Green Island, and a 16-chain length is being reconstructed and sealed in the borough itself. One mile was resealed between Milton and Clarksville. A concrete footpath is being constructed for $\frac{3}{4}$ mile north of Roxburgh.

In the Southland district $2\frac{1}{2}$ miles of new sealing was carried out between Buxton's Corner and Branxholm. Four short lengths were sealed adjoining dairy factories in Wallace County.

On the Queenstown Highway four short bridges are being renewed between Fairlight and Garston, one being completed.

Extensive repairs to the Mataura River Bridge at Gore have been carried out.

Magnetic Truck.—During the year this machine has been in operation clearing aerodromes and military camps in both the North and South Islands. Appreciation of the result, being a reduction in the number of punctures to military vehicles, has been expressed by the commanding officers of the various Air and military areas concerned. The machine picked up on aerodrome and military camps, 9,294 lb. (previous year, 12,184 lb.) of puncture-producing articles, and when travelling between aerodromes, &c., the quantity picked up on main highways over a distance of 3,618 miles was 5,182 lb., or 1.43 lb. to the mile (previous year, 2.1 lb.).

The seventeenth examination for foremen and overseers of road-construction was held on the 8th of December, 1943, when 15 candidates presented themselves for paper No. 1 and 14 for paper No. 2. Four candidates passed in paper No. 1, while 6 passed in paper No. 2. To date, 153 certificates have been issued.

The Board appreciates the co-operation it has received from local authorities and automobile associations during the year, and looks forward to the future with confidence.

The Board acknowledges with thanks the valuable services given at all times by the Public Works Department and its officers.

Signed on behalf of the Main Highways Board :

W. L. NEWNHAM, M.Inst.C.E., Chairman.