

Drains.—Some 65 miles of drains were cleaned during the year.

Whangatane Spillway.—The erosion at the spillway intake has not increased very much during the year, but shortly it will be necessary to erect some protective works in this locality. The construction of a breastwork on the western side of the channel would remove the source of danger, and with this object in view inquiries are being made as to the amount of steel-sheet piling that can be made available from other works.

There is no question that the construction of this overflow channel is the key to the solution of the drainage problem in the district, but it is not large enough to cope with the considerable volume of water that is to be expected periodically.

Kaitia River.—The river above the spillway intake is definitely enlarging its channel, and as a result of this erosion the banks, in places, have slipped in to a considerable extent.

The contract mentioned in last year's report for the clearing of fallen timber from the channel was completed before last winter, and appreciably improved the carrying-capacity of the river.

Works Expenditure.—The total expenditure for the year was £1,820.

Drainage Rates.—The following schedule shows the position of the rates struck and collected in the two wards:—

			Capital.		Maintenance.	
			Struck.	Collected.	Struck.	Collected.
			£ s. d.	£ s. d.	£ s. d.	£ s. d.
Town	411 8 8	221 19 6	201 1 3	86 18 8
Rural	3,136 18 9	374 3 4	1,357 12 11	207 12 9

HIKURANGI DRAINAGE AREA (50,000 ACRES), WHANGAREI COUNTY.

No work has been carried out on this area during the year under review, and all staff has been disbanded or transferred to other localities. The investigation made by the District Engineer and myself definitely showed that it was impossible to prevent flooding on the swamp area, and that if further major works were carried out between Lewis's Bridge and the falls at Ruatangata there was very grave danger of serious slips occurring in this narrow valley, whilst it was certain that the hastened discharge would detrimentally affect the low-lying lands farther down the Wairua River.

The stores at Apotu are being overhauled, and every endeavour is being made to utilize them on other works, but, unfortunately, there is a lot of plant that has been used on the works for many years and is now practically worn out and unserviceable.

The works expenditure was—Capital, £346 8s. 4d.; maintenance, £115 19s.: total, £462 7s. 4d.

WAIHI DRAINAGE AREA (20,000 ACRES), TAURANGA COUNTY.

The drainage outlets, stop-banks, and flood-gates in this area were maintained by the Department, improvements and replacements being carried out when desirable. The total length of drains annually maintained is 37 m. 73 ch., the bulk of this work being done by contract. Two lengths of drain totalling 225 ch. were reconditioned during the year.

A gang was employed removing willows and other obstructions from the upper reaches of the Kaikokopu Stream.

Two new steel flood-gate doors were installed to replace concrete doors, and the outlets of these gates were protected with stone.

The Monighan dredge was employed for four months of the year removing accumulated silt from the upper reaches of the Wharere Canal. The distance covered during this period was 115 ch., a total of 30,438 cubic yards of spoil being removed. It will be necessary to consider in the near future the employment of a light walking-plant on maintenance dredging in the lower reaches of the Kaikokopu Canal.

Flax-milling was carried out throughout the season by the company which leases the major portion of the unsettled swamp area. Development was proceeded with by the Department on a swamp area west of the Wharere Canal, the total area grassed to date being 738 acres. This land is being prepared as dairy-farms, five farms being fully equipped for this purpose. Bullocks and sheep are being run on the balance of the area to assist consolidation and to control ragwort. A water-supply was provided for the area, and an electrically operated flood-pump will shortly be installed to maintain a lower average water-level in the low-lying areas.

Late in the year the Native Department commenced development operations in the Wacwaetutuki Block.

The expenditure during the year was £1,109 12s. 8d.

Drainage rates struck totalled—Capital £658 7s. 9d., maintenance £934 2s. 7d., whilst the amount collected was—Capital £322 19s. 5d., maintenance £812 1s. 11d.

POUKAWA DRAINAGE AREA (15,567 ACRES), HAWKE'S BAY.

Maintenance of completed work was carried out during the year, and I am indebted to the Commissioner of Crown Lands, Napier, for carrying out inspections of cleaning contracts.

The expenditure during the year was £94 1s. 9d.

Rates struck amounted to £1,121 1s. 5d., whilst £679 13s. 9d. was collected by the District Office at Napier.

I have, &c.,

R. G. MACMORRAN,

Chief Drainage Engineer.

The Under-Secretary for Lands, Wellington.