

to the stacker conveyer. The dredge is spud operated, one spud 38 tons in weight being located slightly off-centre, the stacker being located slightly off-centre in the opposite direction. Gold-recovery is effected by a large spread of tables fitted with Hungarian riffles, the effective width of the sluices being 28 in. and the grade 1½ in. to the foot. Motor horse-powers are: Bucket drive, 400; ladder hoist, 250; screen pump, 200; table pump, 100; hopper pump, 50; screen drive, 100; stacker-conveyer drive, 60; swing winch, 60. In addition to the above motors there are separate motors for the sand-elevator wheels and transverse conveyers, the stacker-hoist, auxiliary pump, and air-compressor. The total horse-power of all motors connected is 1,266. The total weight of the dredge is 1,800 tons. The dredge has worked constantly since the inception of operations, requiring merely adjustments of a minor nature during the running-in period.

*Argo Dredge, Grey County* (A. Fischer, Dredgemaster).—During the year this electrically-driven 4½-cubic-foot-bucket dredge gave employment to an average number of fourteen men, and treated 589,800 cubic yards of gravel, which yielded 3,501 oz. 18 dwt. of alluvial gold, valued at £27,884 3s. 7d.; the sum of £10,000 was paid in dividends. Since the commencement of operations 10,336 oz. 17 dwt. have been won, valued at £82,079 10s., and the sum of £31,200 has been paid in dividends. During the year a new digging-ladder was installed on the dredge, auxiliary pontoons were fitted, and the plant was overhauled generally. The average depth of the ground was 20 ft.

*Blackball Creek Dredge, Grey County* (R. J. Archer, Dredgemaster).—The erection of the dredge was completed on the 11th March, when dredging operations were commenced. From that date until the end of the year 380,000 cubic yards were dredged, the resulting yield being 1,426 oz. 18 dwt. 9 gr. of alluvial gold, valued at £12,483 14s. 7d. The average number of men employed during the year was twelve; the average depth of ground was 33·6 ft. The dredge is electrically driven and is fitted with 5-cubic-foot buckets.

*Maori Gully Dredge, Grey County* (D. Caithness, Dredgemaster).—The dredge ceased operations on the 30th August, 1938, the claims on the Stillwater and Waimea Creeks having been worked out. The dredge was worked as far as was practicable in the shallow ground up the latter creek before operations were suspended. From the beginning of the year until the cessation of dredging 289,200 cubic yards were treated for a yield of 1,330 oz. 6 dwt. of alluvial gold, valued at £9,888 0s. 2d.; the total production figures from the inception until the cessation of dredging operations were 6,156 oz. 15 dwt 7 gr. of alluvial gold, valued at £45,520 5s. 5d. Dividends over the latter period totalled £6,000. The dredge was electrically operated, with 4-cubic-foot buckets, and an average of ten men was employed. During the year the company investigated several auriferous areas in various parts of the West Coast district with a view to resuming dredging operations.

*New River Dredge, Grey County* (J. D. Anderson, Dredgemaster).—During the year this Diesel-powered 4-cubic-foot-bucket dredge treated 403,600 cubic yards, which yielded 1,696 oz. 11 dwt. of alluvial gold, valued at £12,946 0s. 9d. Since the commencement of operations 3,635 oz. 2 dwt. of gold, valued at £26,862 12s., have been won. The company paid its initial dividends during the year, £1,409 7s. 1d. being distributed in this manner. The average number of men employed throughout the year was ten. The average depth of ground was 16 ft. During the year the dredge continued up New River and its tributary, Maori Creek, as far as the Dunganville—Maori Gully Track.

*Nemona Dredge, Grey County* (A. Holden, Dredgemaster).—During the year the dredge operated in Cockeye Creek, a tributary of New River, near Marsden, the average number of men employed being twelve, and the average depth 20 ft. (approximately); 606,700 cubic yards were treated for a yield of 2,378 oz. 19 dwt. of alluvial gold, valued at £20,767 3s., and the sum of £9,000 was paid in dividends. Since the inception of operations the total gold won has been 6,056 oz. 13 dwt. 3 gr., valued at £48,961 6s. 4d., and dividends total £21,000. The dredge is electrically operated and is fitted with 4½-cubic-foot buckets.

*Bundi Dredge, Grey County* (F. E. Fanning, Dredgemaster).—The dredge operated intermittently throughout the year at Chinaman's Terrace, in the New River Valley about two miles from Camerons. Dredging was carried on until the end of January, 1938, when operations were suspended while further prospecting was carried out; dredging operations were resumed in September. During the year 204,940 cubic yards were treated for the return of 956 oz. 13 dwt. 3 gr. of alluvial gold, valued at £7,309 2s. 8d. Since the commencement of operations the total gold-production has been 7,934 oz. 14 dwt. 5 gr., valued at £52,252 5s. 3d. The average number of men employed throughout the year was sixteen; the average depth of ground was 24·5 ft. The dredge is steam-driven and fitted with 10-cubic-foot buckets.

*White's Electric Dredge, Grey County* (H. J. Werner, Dredgemaster).—This electrically-driven dredge, fitted with 4-cubic-foot buckets, worked near Barrytown, an average of seventeen men being employed throughout the year; 320,355 cubic yards were treated for a yield of 1,539 oz. 19 dwt. of alluvial gold, valued at £11,634 9s. 9d. Since the commencement of operations the total gold-production has been 2,489 oz. 6 dwt., valued at £18,522 6s. 7d. The average depth of ground was 16 ft. Additions to the gold-saving tables were carried out during the year.

*Barrytown Dredge, Grey County* (T. B. Gillooly, sen., Dredgemaster).—During the year this dredge treated 2,280,000 cubic yards, which yielded 6,801 oz. 5 dwt. 18 gr. of bullion, valued at £52,299 11s. 11d. Since the commencement of operations the total production has been 9,786 oz. 2 dwt. 3 gr. of bullion, valued at £74,268 18s. 11d. The average number of men employed throughout the year was thirty-nine. The dredge, which is electrically driven, with 12-cubic-foot buckets, worked northwards on the Barrytown Flats, the average depth of ground dredged being 30 ft. Gold-saving is effected by eighteen Bendelari jigs and plush-lined tables, the concentrates being treated in amalgamation barrels. For testing purposes under operating conditions a pilot flotation plant is now being installed.

*Stafford Dredge, Westland County* (D. McRae, Dredgemaster).—This electrically-driven 8-cubic-foot-bucket dredge had the misfortune to be badly holed by a submerged log early in March, 1938, and, partially turning over, sank in the pond, becoming almost a total loss. From the beginning of the year until the cessation of operations 43,120 cubic yards were treated for a return of 176 oz. 18 dwt. of alluvial gold, valued at £1,430 10s. 10d. The total production from the inception of operations was 6,384 oz. 9 dwt. 2 gr., valued at £51,605 19s., and one dividend of £3,750 was paid. Eleven men were employed from the beginning of the year until the cessation of operations. The company is now going into liquidation.

*Rimu Dredge, Westland County* (F. B. Lewis, Dredgemaster).—During the year this electrically-operated 12-cubic-foot-bucket dredge treated 2,559,178 cubic yards, which yielded 12,148 oz. of gold bullion having an estimated value of £104,911; the sum of £37,501 4s. was paid in dividends. Since the commencement of dredging operations the Rimu Gold-dredging Co. has produced 213,511 oz. of gold bullion valued at £1,241,544, and has paid £157,051 4s. in dividends. The average number of men employed throughout the year was forty-two. The dredge excavated a superficial area of 30·141 acres to an average depth of 53 ft.; total operating time was 6,386 hours 26 minutes, representing 87 per cent. of the possible time, the average throughput being 401 cubic yards per digging-hour. The gravel treated throughout the year had an average value of 9·84d. per cubic yard, with gold at the present market price, or 4·38d. with gold at £4 per ounce. Coarser and more tightly compacted gravels were encountered, otherwise the year's operations were uneventful. The dredge is working towards the Rimu Township end of the Flat.

*Kanieri Dredge, Westland County* (D. Pettigrew, Dredgemaster).—The erection of the dredge was completed during the year, and dredging operations were commenced on 9th December, 1938. During trial runs to the 31st December the dredge treated 152,000 cubic yards, which yielded 373 oz. 15 dwt. 10 gr. of bullion, valued at £2,905 2s. 1d. The average number of men employed by the company (Kanieri Gold-dredging, Ltd.) on dredging operations during December was thirty-two. The average depth of ground was 28·5 ft. The dredge is of all-steel construction, with 18-cubic-foot buckets. It is electrically driven, power being obtained from the Greymouth reticulation, which is