

constructed at both levels. Commencing crosscutting from No. 4 chamber, the reef was intersected at 295 ft. and driven on for a distance of 150 ft., the lode varying in width from 4 ft. to 18 ft., with promise of favourable results. Connection being effected with the winze previously sunk from No. 3, natural ventilation is maintained, and driving northward is now proceeding on line of reef. A strongly defined ore-body has since been intersected in No. 5 at 323 ft. from the shaft. The stone milled (11,405 tons) yielded 2,392 oz. of melted gold, valued at £9,607, which shows an average yield of 4 dwt. 4.5 gr. per ton, while the cost of milling shows a fraction over 2s. 5d. per ton. Cyanide plant: The alterations effected in elevating and conveying the tailings directly to the newly erected settling-tanks prior to leaching provide a more successful process of percolation, the coarser and finer sands being more uniformly mixed. Comparing the tonnage milled, extraction of cyanide yielded 1,408 oz. 19 dwt. 3 gr. of bullion, valued at £4,210 9s. 10d.; while the extraction computed on the tonnage treated is equal to 7s. 4.5d. per ton, and, allowing 3s. 9d. per ton for labour, chemicals, and other perishable materials, a profit of 3s. 5d. per ton is shown.

New Inkerman.—The operations by the present company have so far (for a period of some five years or thereabouts) consisted of crosscutting, driving, sinking, and rising, with the object of thoroughly proving the existence or otherwise, as well as the extent, of payable reefs over a considerable area of ground before erecting a large new battery plant. The work for the year consisted of 1,938 ft. of driving, &c., and this has opened up a continuous reef, which is found to vary from 3 ft. to 37½ ft. in width, with variable values, and estimated to have exposed (approximately) 20,000 tons of milling-stone. To meet the present requirements and test the values of the stone developed in the mine, fifteen stamps of the old thirty-stamp mill are being thoroughly overhauled and put in order, while Frue vanners and cyanide plant are being installed. Crushing is expected to commence early in June.

Industry Mine.—This property was opened east of the Big River Road, Merrijigs, in view of picking up a reef the outcrop of which was partially exposed in the bed of a small hillside creek. Prior to values or position of reef being actually determined, a crosscut, intersecting a thin coal-seam, pierced the track of reef about 300 ft. from day. Extending the drive northward, the line of main reef was positively cut off by an abrupt displacement. Rising was then effected to the surface to maintain ventilation, when further prospecting was continued without promise of definite results. The stone mined and milled from the various developments was 182 tons, yielding a gold-value of £82 16s. As a result of this crushing, operations were suspended for several months, but two miners have since resumed prospecting.

New Scotia.—Regarding the development of the Scotia and Gallant properties, the various drivings, risings, and sinkings—confined exclusively to determining the position and extent of the Gallant block—have so far not met with the success at first anticipated. The working-conditions are satisfactory, and the plant is in good order.

Victoria and Inglewood.—After a lapse of several years, Mr. P. N. Kingswell, of Reefton, recently acquired all mining rights and privileges to mine and further extend the development of the property. It would appear from past working that the old company confined operations chiefly to the upper reaches of the reef, which yielded exceedingly rich values. The general contour of the country and the original working being practically known to Mr. Kingswell, he is making energetic efforts to prove the continuation of the lode on lower levels; but, according to the prospects so far available, promise of success is not encouraging.

Big River.—This company, after a period of unsuccessful prospecting on the upper levels during the year 1901, ultimately decided to sink the shaft a further depth of 100 ft., making the total depth from the cap of the hill 1,090 ft. Crosscutting has been extended for considerable distances in the bottom levels, but so far as prospects go there is nothing encouraging yet met with.

Last Chance.—Morris and Fleming are working very successfully in a newly opened section of the claim. The leader shows gold freely, and, although a crushing of the new ground has not yet been made, the party is hopeful of satisfactory results. This ground is securely timbered.

Golden Lead.—There is nothing of importance to note. Two men are taking a leading stope on No. 3 level. Great care is taken to secure the ground thoroughly as stoping proceeds.

PAPAROA RANGES.

Garden Gully.—The No. 3 or low-level tunnel has been driven on a uniform grade for a distance of 532 ft., intersecting a reef 12 ft. in thickness, from which a large body of water is given off freely. After the reef is opened out sufficiently rise communication will be made with Nos. 2 and 1 levels, comprising a vertical height of 240 ft. to the surface. A suitable battery-site and all water (available for motive power) in the district have been acquired.

Mount Paparoa.—This company (formerly Croesus, Paparoa) have carried out extensive works exclusively in developing the lower levels of the lode. A strong ore-body was intersected recently, and driven on for a considerable distance, but battery values have not yet been determined.

Taffy.—Owing to the unpayable results won from this property on day-wages, work has been suspended for several months, but satisfactory earnings are now being made on tribute.

GENERAL REMARKS.

Compared with the previous year, the statistical returns from quartz-mining for 1902 show an increase of £5,199 2s. 1d., while the gross earnings of the Progress Mines and Consolidated Gold-fields of New Zealand for the same period increased by £7,613 3s. 6d. Concerning the prospects of the Reefton and Lyell districts, the principal item of mining interest, and one likely to affect the local community generally, is probably the deeper-level sinkings. These sinkings, so far as