C.-3.64

to a narrow gut, the sides of which are from 60ft. to 70ft. in height, with loose rock and boulders among the surface wash, very liable to slide into the workings in wet weather. Indeed, they informed me that a recent slip had taken them a long time to clear away. The ground in this gully in the early days had been driven out from an adit-level, but the present bottom they are working on is about 5ft. above the old workings. They informed me that the quantity of gold from the gut they are at present working averages about 40oz. for every 12ft. in length. If the water were taken down in iron pipes from their head-race, and a derrick erected, with a small Pelton hurdy-gurdy wheel, to lift the stones and boulders, they could have worked the same amount of ground in eight months that has taken them about two years and a half. They have a 3in. pipe from the head-race for supplying water for a small nozzle, but the most of the pressure or head is absorbed in friction, so that it is of very little use. The shareholders in this company are satisfied that they are working their claim in a disadvantageous manner; but, having expended their money in the construction of the head-race, they want to get sufficient gold out of the ground to enable them to put a proper hydraulic plant on their claim. But hydraulic sluicing will never be carried on here systematically until some new company commence extensive operations, and show by actual demonstration the large amount of ground that can be sluiced away with very little manual labour.

Washbourn Bros.' Hamatite-paint Works.—The same plant that was in use on my former visit three years ago is still kept working, and turning out several shades of hæmatite paint. The proprietors have commenced a new industry in connection with their works—namely, manufacturing knife-polish from a felspathic porphyry stone which they find in the neighbourhood, and which, when ground up and dried, forms an excellent knife-polish. This is sold in 11b. tins, and costs 4s. per dozen. The proprietors expect to be able to create a considerable trade in this as soon as they get it properly introduced. They have also erected a one-stamp quartz-mill—Washbourn's patent—to test any parcels of auriferous quartz found in the neighbourhood. They have also a small hand-mortar, which is used to test 14lb. or 28lb. of stone, as the case may be, which would be useful to those prospecting quartz reefs, as this small machine would enable the miners to ascertain the quantity of gold in the stone, such as they might expect from an ordinary crushing-battery, and therefore would be a more authentic way of getting at the actual returns than by making assays from small pieces of stone, as the assay value is never fully realised when treating the lode-stuff in bulk. This small machine is not more than three times the weight of an ordinary pestle-and-mortar which is at present used in connection with prospecting.

Appo's Gully.—Very rich patches of gold were found in this gully in former years, but the workings are now limited to about three men, who have claims in different parts of the gully. One of these—F. West—has a claim at the lower end of the gully, where it widens out into the flat. He has traced a run of deep ground going down the flat, but has not been successful in finding a rich lead of gold. It appears to have been a deep gut, at one time forming the channel of the creek, but slips have come down from the side of the range and filled it completely up, changing the course of the creek from a deep channel to the terrace alongside, and therefore a rich lead of gold is not likely to be found in this gut with the exception of the wash-drift on the bottom. Mr. West is working his claim by an inclined trainway, the wash-dirt being hauled up in a truck by a small overshot water-wheel, and emptied into a paddock alongside the creek, where it is washed in sluiceboxes. On the end of the shaft of the water-wheel there is a small crank which works a pump 3in. in diameter, which is distant from the wheel about 2 chains, and by a very simple and effective method he works the pump from the wheel by a connecting-rod of common telegraph-wire, the wire being made fast to the T-bob and run along on the top of wooden posts driven into the ground, having a staple driven in over the wire. The spear, or rods, of the pump are weighted so as to keep a tension on the wire. On the end of the wire at the wheel there is a common link which slips over the pin or crank, and the wire always being kept in tension by the weighted rods makes this simple arrangement work the pump very smoothly.

Mahakipawa.

The field still continues to support a large population for the small area of payable ground that has been discovered. There are about a hundred and fifty miners at work in the main creek, and about twenty-five in the right branch. There are also about thirty-three men employed in the different gullies—namely, in Maori Gully, seven; Waikakaho, seven; Prospectors' Creek, ten; and on the reefs nine men—making a total of about two hundred and eight men actually employed in claims. This would mean that the field is the means of supporting a population—including business people, women, and children—of about at least eight hundred and fifty persons. The claims in the right branch are getting pretty well worked out, and there are a few claims abandoned in the main creek; but many of those working at the lower end of the main creek will take three years yet to work out, while the claims on the flat near the township, if the lead of gold be discovered, will last for many years to work. The ground on the flat will be very deep and will contain a good deal of water, and will require expensive plant to work it. A good deal of money has already been spent here in prospecting for the deep ground, and small pumps have been used to lift the water, which have been found useless; but the holders of those claims are now beginning to erect more substantial plants, which are likely to enable the flat to be prospected.

The following are the principal claims at work on the field:—

Mahakipawa Claim.—This claim is the lowest down on the flat, about 30 chains below the township. It is held by a company who have sunk a shaft to the depth of 40ft. and have erected a water-wheel and pumping-gear to work a pump 9in. in diameter, the whole of which had just been completed at the time of my visit, and they were ready to commence sinking again. There are six men employed in the claim.