

report of the Inspector, Mr. Rutherford, in December, 1866, to have embraced several veins of different thicknesses, included in a breadth of seven feet. At that time several shafts had been sunk to depths of from 70 to 183 feet, and nearly all the lode between these had been removed.

The Hattie lode is about 700 feet to the southward of the Middle vein, and so near the margin of the sea that it has been found necessary to exclude the waters at high tide by means of a dyke. The four shafts sunk upon this lode on the property of the present Provincial Company are from 90 to 240 feet in depth, and a gallery 300 feet in length has been opened at a depth of 180 feet.

The raising of the mineral and the drainage are effected by means of a steam engine, which has cost \$8,000. The quartz which was taken from the depth of 180 feet was rich in visible gold, particularly near to the walls, where it was seen in large grains, and we were assured that the average produce was two ounces of gold to the ton. The mill consists of two batteries of four stamps each, with fixed tables, and has a steam engine of twelve horse-power; its cost was said to be \$4,000. The weight of each stamp was 400 pounds, the lift ten inches, and the number of strokes sixty-five in a minute. At the time of our visit, only one of the batteries was in operation. It reduces less than a ton in twenty-four hours for each stamp, but the pulverization is extremely fine, a condition which is very favorable to thorough amalgamation. This establishment employed at that time from twenty to twenty-five workmen.

Recent accounts shew a renewed activity at Wine Harbor, which has suffered from imperfect drainage and from the want of sufficient machinery, but under proper management, will probably again assert its old position as a rich gold-producing district. Considerable alluvial gold has been in former years obtained at Wine Harbor.

STORMONT.

The gold district of Stormont lies some distance to the eastward of Wine Harbor, and embraces within its limits Seal Harbor, Country Harbor, and Isaac's Harbor. Some details with regard to its geology and mineralogy have already been given, on pages 7 and 9, from the report of Mr. Campbell, according to whom the whole of the coast between Country Harbor and Isaac's Harbor presents quartz lodes, which might be mined with advantage. It appears, from the last report of the Chief Commissioner of Mines, that explorations with very satisfactory results were, last year, carried on at Seal Harbor, and also at Country Harbor, from which, however, there are no returns since 1862, when twenty-four tons of quartz yielded forty ounces of gold. Twelve miles beyond, at Isaac's Harbor, considerable mining work has been done, and with most encouraging results, as will appear from the official returns, which show, up to the 30th September, 1866, a total yield of 6,636 oz. of gold; the average yield per ton being 2 oz. 2 dwt. 1 gr. During the last year there were treated 1,149 tons of quartz, which gave 1,505 oz. of gold; being an average of 1 oz. 5 dwt. 8 gr. to the ton. The average number of miners employed during the year was forty-five, and the product for each man \$618.75. In his last report, the Honorable Commissioner of Mines informs us that "this year (1867), as compared with the last, gave an increase of 450 ounces, with a much smaller quantity of quartz crushed, and a larger yield per man." The great difficulty of access, except by water, has hitherto prevented the development of this large and promising gold district. Profitable alluvial washings were wrought here in 1862, but have since been abandoned.

TANGIER.

The first discovery of gold-bearing quartz in Nova Scotia appears to have been made in 1858, by Captain L'Estrange, R.A., in what is known as Mooseland or Old Tangier, about twelve miles from Tangier Harbor or New Tangier.

Both of these localities are included in the Tangier gold district, which is described as having a length of about fifteen miles and a breadth of two miles. At Tangier Harbor, according to Mr. Campbell, clay slate, generally blue, but sometimes olive colored, is the predominant rock, interstratified however with hard flinty bands stained with oxyd of manganese, and with beds of dark white-weathering quartzite. In the opinion of Mr. Campbell the beds, which appear on the crown of the anticlinal, belong to the uppermost part of the gold series, of which only the summit has been exposed by denudation. The