NOTES ON RAWHIDE, NEVADA.

Being an Excerpt From the Letter of One Mine-Operator to Another.

The formation is eruptive and the three porphyries, rhyolite, dacite, and andesite, are found in the district. I think the rocks occur as flows. The most important of the three is rhyolite, next the andesite, and lastly the dacite. The dacite, without doubt, occurs in necks similar to those of Tonopah. The rocks are all altered and silicified, and probably much faulted. A more careful study than I gave the camp is necessary to determine these features.

The important strikes are on three low hills, really one north and south ridge cut into three small hills by erosion. The first to the north is Grutt hill, the second Balloon hill, and the third Murray hill.

Grutt hill more than others shows a great shattering due to cooling from a molten mass. The contraction joints are so numerous that, when cemented by quartz, a piece of rock will have as many seams of quartz as a piece of quarter-sawed oak will have markings. This quartz was probably deposited from heated ascending silicious waters. The quartz is a chalcedony and is, I think, usually barren. Occasionally a better character of quartz is found and with it some free gold; in fact, quite a few fair free-gold specimens have been taken from Grutt hill. However, with all their talk, I cannot find that a shipment has ever been made from this wonderful hill. There is nothing that can be called a fissure, nor any body of ore that in any way approaches a vein. Such workings as the hill affords, show no definition or walls. I rather think most of the shafts have been sunk at places where a few specimens have been found; these occur always in the irregular 'seams,' as they are called. They are not 'seams,' but I know of no better word. They are narrow, as a rule, and the widest is seldom more than a half-inch wide. The ore does not even follow a zone of fracture, shear zone, brecciated zone, or crushed zone. The whole hill of some 60 or more acres is of about the same character as far as the seams go. I can account for it in no other way than that the whole hill was infinitely cracked in cooling and the little cracks cemented with silica. These seams are very numerous, but those carrying gold are not numerous enough, in my opinion, to make the whole mass even a low-grade ore.

There are probably some half dozen shafts on this hill. Most of them are the work of lessees. Their 'ore,' as they call it, is thrown over the dump like waste, and it resembles waste, regardless of the claim being made that it is all mill-ore. It is mostly altered rhyolite and shows a little iron stain. The lessees all say that they "will cross-cut at the 50-ft. level," as they left the vein at some point higher up in the shaft. Most of these leases are for sale, and one must expect a strong statement from the owners, and generally gets it. I saw some twenty or thirty sacks of ore on the hill, but no claims are made that any has ever been shipped. I am told that a few sacks running from $1000 to $3000 have been shipped. This arises from the fact that many specimens have been found on the hill.

As an example of the foundation for stories such as you are reading daily: On Grutt hill about February 1, quite a few little seams were observed. After cleaning off the surface, this strike was left for ten days, and was daily visited by hundreds, if not thousands. When it got stale as a star attraction of this kind, a few holes were placed and the mass blown out. It is said some seven sacks of $3000 each were recovered. A piece was thrown through a bank window, and was accepted for the price of the glass and put on deposit for the orphan fund. These kind of yarns, when well circulated, are largely responsible for the 3000 people that now inhabit the camp. I was not present at the great blast, but arrived the next day. I visited the hole from which this $21,000 came and found it about 6 ft. long, 3 ft. wide, and about 18 in. deep. I saw no signs of a continuation of the ore, or any ore at all in the side, ends, or bottom. This will give an idea how completely these seams can be dug out and how they lack continuity. Holes may be found within ten feet of one another, and yet no connection can be observed between one and the other.

The lessees on Grutt hill are working most indifferently—none of that snap that was found at Tonopah and Goldfield. On one lease some 20 sacks are piled, and at two other places from five to ten sacks. These have been on the ground for several months. One lessee claimed $12,000 per ton for his six sacks—but no care was taken to prevent theft! This is a sample of the 'dope' that is handed out.

Balloon hill is somewhat different, in that the mineralization seems to follow incipient fissures in the rhyolite. There is but little silicification, and pieces of much altered rhyolite, called locally 'talc,' will be found at times to run very high. In this respect this hill much resembles the Bullfrog district, much of the high-grade stuff being a marker for the ore of the Montgomery-Shoshone. The two principal leases on this hill are the Kearns No. 1 and No. 2. The No. 1 is said to have shipped 23 tons of ore to Goldfield that assayed $44.80 per ton. Some 120 tons of ore are now sacked on the dump. At the time of my visit all the material that came from the shaft went over the dump. It looked like country rock, some pieces being more silicified than others. Great claims are made for this and the No. 2 lease, but I saw no ore being sacked on either. At best they can be only fair mill propositions, in my opinion. What gives the values are the talc seams, and the gold in these is secondary and as fine as flour. It is not uncommon to see very rich hornings on any and all of the principal leases. When one knows the streaks and seams, the richest kind of rock is readily found for the visitor. Many a visitor leaves the camp with most glowing yarns of the hornings that have been made for him.

I was not permitted to sample anything, in fact, did not go that thoroughly into the camp. Prices for both mining ground and real estate were so high and the tone of the camp so uncertain, that it

did not appeal to me as a camp that would win out. In this way I may be wrong, as these desert porphyry camps have proved surprises only too frequently. The heart of the camp, say about 60 claims, is owned by three outfits—the Grutt Bros., King of Montana, and the Van Dorn's.

The only working of any consequence on Murray hill is the Murray lease, incorporated under the name of the Rawhide Mining & Reduction Co. There seems to be more of a vein here than on any of the above mentioned leases. A shaft has been sunk some 75 ft. and a few sacks of ore were to be seen on the dump. Mr. Murray told me that he had sampled 350 ft. of vein and had secured an average of $79.80 per ton in gold. Stock is to be had, I think, at 25 cents. In fact, every lease or hole in the ground is incorporated or in the process, and it is readily apparent why such statements issue. I noticed that all ore went over the dump with the usual carelessness; it is probably not very high-grade.

The Miller lease is located on Hooligan hill. The shaft is about 60 ft. deep and considerable drifting has been done. No high-grade is claimed, but I was told the whole width of country rock, called a vein, assayed 16 oz. gold. This is pretty high-grade ore to throw over the dump. This lease, I understand, is incorporated and the stock held in Chicago. There are seams that will pan well, but I am very much of the opinion that the general run is low. I saw nothing that I would call a vein. The formation at this point is, I think, a dacite and is quite strongly fissured; most of these fissures are open and in many places one can shove his hand in. The shaft has been sunk on one of these and it is called a hanging wall. I saw no silicification or even crushing along this fissure or zone, so I could hardly call it a vein. There are little oxide of iron seams that will pan very well. At a certain place on the dump good pannings are found, but whether the whole dump will do as well, I am unable to say.

Well, there are many other points of interest about the camp, but they are about like those enumerated, in fact, the ones mentioned are the best. Now, I cannot see that Rawhide has developed a great quantity of even milling ore. The obscure occurrence of the ore has made it difficult to find and more difficult to follow it. Still we have all grown to think that anything is possible in these porphyry formations, after the history of Goldfield. I think it well to keep an eye on the camp, but at present I could not recommend either mining or real estate investments. I had an eye only to the speculative side of the camp, and intended to invest only upon finding a camp of undoubted merit. I think conditions poor for promotion, and the camp did not look good enough to take a chance at their prices.

There will, in my opinion, be a great reaction from the present boom, as there are now some 4000 people in the camp and probably not more than 500 are given a living. The rest are hangers-on or prospectors and lessees. This condition cannot last, and undoubtedly the great number of unemployed left in various busted camps round about, made it possible for Rawhide to have a population today of 4000. The camp does not justify a population of more than a few hundred, as there are but 50 men working on the mines for wages. The wages are high and have attracted a great many idle miners from other camps, like Goldfield and Tonopah.

While I have not a great deal of confidence in Rawhide, I will keep an eye on the camp. If I get any really reliable information I may make another visit in there during the next month or two. At that time I expect to see prices much lower for mining ground. But it is not unlikely that by that time at least 100 mining companies will have been incorporated, and in that event it will be hard to get in on the ground.

To sum it all up: There is at present no quantity of high-grade ore opened up in the camp; this is evident, for they are not sacking and shipping, and there are at least 75 teams going back empty to the railroad and willing to haul ore for $5; there is not a true well defined vein in the camp, outside of the Royal and Tiger, some two miles west of the town. As a milling proposition, the conditions are bad because there is no water within 9 miles and no fuel within 35 miles. The camp will have to have a railroad, and to get this they must show up a large amount of ore. The little mills that are talked of now will never pay much better than shipping. It is very difficult to get any reliable information, and knowing that there is a great deal of fake handed out, one is too suspicious to believe any stranger. To sample the camp independently is unallowable, so that general impressions are all that most leave the camp with. To me there is not the right tone about things and there is too much insincerity about the whole place. But keep an eye on the place; it may have some surprises.

U. S. Geological Survey.—A report on the Park City district, Utah, is in course of preparation by J. M. Boutwell, who has recently returned to Washington from a thorough inspection of this district. Last year Mr. Boutwell had the charge of the statistical work of the Survey on the production of zinc, lead, and quicksilver in the United States; but he is now devoting his entire attention to mining geology. C. E. Siebenthal has taken up Mr. Boutwell's work in zinc and lead, and the subject of quicksilver has been assigned to W. D. McCaskey. Mr. Siebenthal is also gathering statistics of general mine products in the Mississippi Valley. By direction of the Secretary of the Interior, James H. Gardner is making a classification of the government coal lands in the Carthage district, Socorro county, New Mexico, which will be followed by their valuation and restoration to public entry. Mr. Gardner has been at work in the Carthage district nearly a month. Waldemar Lindgren left Washington on March 15 to gather geological and statistical information in California, Nevada, and Utah. Mr. Lindgren is in charge of the work of the Survey on metalliferous mineral deposits of the United States. His trip will consume about a month. The Survey investigation of the copper deposits of Shasta county, California, has recently been completed by L. C. Graton. Mr. Graton is now in Washington working on his report in this connection.