## MANGANESE

#### THE BUENA VISTA PROSPECT \* SOCORRO COUNTY

#### General Statement

The "Buena Vista" group of five lode claims, located in sec. 3, T. 5 S., R. 3 W., Socorro County, is owned by Miera and associates of San Antonio, New Mexico.

This property was examined by this writer at the request of Mr. Miera on Monday, April 23rd, 1951. It was reached by traveling south from San Antonio along U. S. Highway 85, approximately 18 miles to the junction of the San Marcial Lake road, thence northwesterly 12 miles over a ranch road to the old Gianero ranch house where the road ends. From the Gianero ranch house the balance of the trip, a distance of about 2 miles was made on foot over a fairly good trail. The property can also be reached by traveling the Walnut Creek road westerly from San Antonio to the Gianero ranch, a distance of only 12 miles, but this road has been impassable for a year or more.

## The Deposit

The minerals, manganese oxide and iron oxide, occur in a fissure vein in a highly silicified somewhat brecciated rhyolite flow. The vein is five to six feet wide where examined, partially filled with blocks and fragments of rhyolite around which the iron and manganese minerals, hematite and psilomelane have been deposited, filling the voids. In part the minerals are very intimately mixed, but there are segregations of very high grade almost iron free manganese ore, also some high grade almost pure red iron ocher. The highgrade manganese occurs in blobs from the sized of a peanut to lumps that would weigh 100 pounds or more. This ore has assayed as high as 53 percent MnO<sub>2</sub>. It makes up possibly 30 percent of the total vein material in the section examined and is very easily sorted from the other materials.

The vein material comprising the intimate mixture of the two minerals makes up probably another 30 percent of the toal vein fill and the red ocher 5 percent. The balance is fragments and blocks of rhyolite. The manganiferous material would probably average 15 percent to 20 percent  $MnO_2$  and L5 percent  $Fe_2O_3$ .

The vein has a vertical dip and strikes north  $ll_i^{\circ}$  west. Evidence of its continuity is the highgrade float that is found on the slopes and in the canyons for several hundred feet both north and south of the point where the deposit has been opened up.

# The Workings

The vein has been opened up by an open cut about thirty feet long along the vein and a ten foot shaft. Both workings are very near the crest of the mountain through which the vein passes. Some of the work was accomplished some years ago, reportedly during World War I when a small shipment of ore was made. The ore was brought down to the road by pack animal. Recently some work has been done in the open cut and approximately five tons of high grade manganese ore and about the same amount of manganiferous iron ore is piled on the dump.

## Economic Possibilities

The deposit appears promising but considerable more work must be done before an evaluation of the possible reserves can be make. This work could be done by core drilling or by trenches along the vein, both north and south of the present cut and shaft. The old Walnut Canyon road, previously mentioned, could be improved and a new road from the Gianero ranch to the deposit could be constructed without excessive cost.

In the present need for manganese, it is my belief this deposit merits further investigation.

E. C. Anderson Mining Engineer