



CONTACT INFORMATION

Mining Records Curator
Arizona Geological Survey
1520 West Adams St.
Phoenix, AZ 85007
602-771-1601
<http://www.azgs.az.gov>
inquiries@azgs.az.gov

The following file is part of the

Arizona Department of Mines and Mineral Resources Mining Collection

ACCESS STATEMENT

These digitized collections are accessible for purposes of education and research. We have indicated what we know about copyright and rights of privacy, publicity, or trademark. Due to the nature of archival collections, we are not always able to identify this information. We are eager to hear from any rights owners, so that we may obtain accurate information. Upon request, we will remove material from public view while we address a rights issue.

CONSTRAINTS STATEMENT

The Arizona Geological Survey does not claim to control all rights for all materials in its collection. These rights include, but are not limited to: copyright, privacy rights, and cultural protection rights. The User hereby assumes all responsibility for obtaining any rights to use the material in excess of "fair use."

The Survey makes no intellectual property claims to the products created by individual authors in the manuscript collections, except when the author deeded those rights to the Survey or when those authors were employed by the State of Arizona and created intellectual products as a function of their official duties. The Survey does maintain property rights to the physical and digital representations of the works.

QUALITY STATEMENT

The Arizona Geological Survey is not responsible for the accuracy of the records, information, or opinions that may be contained in the files. The Survey collects, catalogs, and archives data on mineral properties regardless of its views of the veracity or accuracy of those data.

Bigbee, Arizona

December 30, 1949

Mr. Thomas Bardon

Portland Mine

You wrote me about the Portland mine near Kingman, Arizona. I contacted a Mr. Payne, whom I know, and who had worked at the Producers' Mill not far from the Portland. He gave a very good report on the property, so I called Mr. R. P. Jones to whom you referred in your letters. I arranged for a visit to the property and was accompanied by Mr. Jones and Mr. Phil Morse. Mr. Jones is very talkative and somewhat on the high-pressure type. However, I found the property to be as they described it. All maps and records were in California and they promised to get these for our inspection.

I believe this mine has some excellent possibilities if properly equipped and mined on a basis of not less than 1,000 tons per day. Milling should be done at the mine.

Mr. Jones has two other properties in the same range of mountains which he declares are equal to, or better, than the Portland owned by Mr. Potter. They are stock companies and will relinquish 60% of the stock for finance money sufficient to place the mine in operation and build a cyanide mill. All these properties are reported to have large tonnages with grades of ore equal to those of the Portland.

Perhaps I have been oversold by the things I saw, but I believe the property warrants further examination. I suggest that Mr. Newell and Mr. Hamilton look the property over and that Mr. Hamilton investigate the metallurgical results obtained on the 132,000 tons milled at the Producers' Mill and at the Catherine Mill.

Herewith you will find my report on the Portland Mine.

J. A. Wilcox
J. A. Wilcox,
Manager

JAW/e
Encls.

R/H

Fortland Mine, Mohave County.

Humboldt, Arizona,
Jan. 18, 1950.

Mr. Bardon, Pres.,
Shattuck Denn Mining Corp.,
New York.

Tom Newell and I, with Mr. Ray Jones, visited this property on January 13th. The general features of this mine, its past production and grade of ore have been reported on by Joe Wilcox and Jack Hamilton and will not be repeated in this letter. Enclosed is a rough map which I made from Brunton and pacing notes, and several photographs. Accurate maps were not available.

The vein consists of a sheet of metamorphosed silicified rhyolite containing abundant quartz and quartz-calcite. As observed in the south pit and in the underground workings, the vein has a smooth well defined hanging wall which shows iron stains. About 20 feet below this hanging wall, and roughly parallel to it is a basic dike, probably intruded into the structure during a reopening in the vein. Below the dike the footwall material is silicified and brecciated andesite. The metamorphism fades further from the dike, but is pronounced for as much as 40 feet. Below this the andesite is but little altered.

The adit shown at the south end of the map was the haulage level. It is caved at the face, and its course between the cave and the point at which we were able to enter it from the north face of the stope is in doubt. Apparently the portal was in the hanging wall part of the vein, it crossed into the footwall and then turned easterly across the dike. From the north face of the stope the adit trends westerly and again gets below the dike. Just north of this dike is a crosscut 50' long which ends in normal andesite. About 80 feet north of this crosscut a connection has been made to the adit run south from the north pit. This north drift is 10 feet higher in elevation, and the map gives a false impression of an offset in the dike because of the difference in elevation.

The mining in the north pit was from below the dike, which at the south end of the pit is about 30 feet higher than the pit floor. The ore removed from the underground stope was the ten feet immediately below the hanging wall, and in no place in the stope was the dike visible, indicating that the full thickness of the upper part of the vein was not mined. The stoped areas extend several hundred feet down the dip below the adit level. Part of this stope collapsed because of inadequate pillars, making it apparently impossible to haul ore out the south adit. It is probable that about 80,000 tons came from this stope. Subsequent ore came from shovel operation in the south pit.

The silicified footwall andesite is exposed in the southwest corner of the south pit, and is well shown on the second print which also shows the dike immediately above.

Without an accurate map it is difficult to approximate tonnage available for shovel mining. The highest point of the hill is about 90 feet above the adit level. Assuming that ten feet is average mining thickness, there may be 120,000 tons north of the stope and eastward to a point at which waste stripping becomes excessive. It is possible that with low costs of shovel mining that 20 or even 30 feet of thickness could be extracted. However, with an absence of sampling this is pure speculation. Three drill holes have been put down from a gulch just east of the hill and are said to have penetrated the dike at about 150'. If the assay results on these holes can be obtained, and if the gold content and thickness are favorable the property has some possibilities of underground mining, as there is a possibility of a considerable tonnage if values extend about 1000 feet down the dip below the stope and over the 1000 feet along the strike covered by this map.

It seems reasonable that operating margins on the grade of ore previously extracted would be very low after costs of underground mining, fine-grind milling and either amortization of plant and water and power installation or truck haul and milling costs at the Producers mill with its limited capacity. I believe that the remaining tonnage available for shovel mining is too limited to justify the expense of a limited operation.

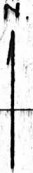
Mr. Jones advised us that he had notified Kennecott, Howe Sound and the Gould interests that the property was available for sale on the basis of \$50,000 cash with \$5,000 down to secure refusal of the property for 90 days with the additional \$45,000 put into escrow with the deed. This is a shotgun or first come first served proposition. The Portland is certainly not without merit, and an extensive program of drilling might indicate available tonnages sufficient to justify a large enough milling operation for a profitable operation.

H.F.Mills.

Jan. 18, 1950.

B Shaft 100'

Approximate Sketch
PORTLAND MINE
Scale 1"=100'



Gulch

North Pit

Incline up 10'

Dike

Surface Cuts

25° Dip
Staged

Opening

Crest of Hill

Hanging Wall

Gulch

Cave

Coned Area

Probable S. limit of stage

Haulage Adit

1/16/00 H.T. Wells

Dann Mill

January 9, 1950

Mr. S.S. Shattuck

Portland Mine

I arrived in Kingman January 2nd and contacted Mr. Jones who gave me some additional information regarding the Portland Mine. We made an appointment to go out to the mine Tuesday January 3rd.

Portland Mine:

On January 3rd we drove out to the Portland, went through the mine and covered the surface. I was very impressed with what I saw and, having only a limited experience with mines, can only say that I agree with Mr. Wilcox in his statement concerning the potentiality of the mine.

Producer Mill:

We then visited the Producer Cyanide Plant where in 1941 ore from 80 different mines were treated on a custom basis. This plant has a 250 ton capacity, having been built in 1937. It is in excellent condition and is complete. I was told that the plant was available for \$100,000.00 with a tentative cost of \$50,000.00 to move and set it up at the Portland Mine.

Later I had a long talk with Mr. Bob Payne who was, for two years, superintendent of the Producer Mill. He said that on all the ores treated a recovery of from 95-98% recovery was made paying for 92%, thus averaging about 0.48¢ a ton additional profit over the milling charge. Mr. Payne also said that although he did not mill any ore from the Portland Mine he did run tests attaining a recovery of 98% by grinding to 80% minus 200 mesh which is some finer than required by most of the other ores.

Goldroad Mill:

The Goldroad cyanide plant which was also built in 1937 was then examined. It has a capacity of 400 tons and although the crushing plant and half of the grinding circuit is gone, the rest of the plant is in excellent condition. The price of this plant is \$50,000.00 including all mine equipment which is considerable.

While at the Goldroad Plant which is near Oatman we were in the vicinity of the Victoria and Lexington properties owned by a company of which Mr. Jones is President. We went over the properties of which the only value gained was to accentuate the tremendous possibilities of the country as a gold producer.

Records of Portland ore treated:

I was very fortunate in Mr. Jones obtaining, through a bookkeeping firm, the yearly report for the fiscal year ending on October 31, 1938 of the Gold Standard Mines Corporation. This was the company at whose Katherine Mill the Portland ore was treated.

In this report it was stated that from 1934 to October 31, 1938 a total tonnage of 315,807 tons was treated from nine different mines of which 118,870 tons were from the Portland

Denn Mill

January 9, 1950

Mr. S.S. Shattuck

Page "2"

Portland Mine.

The cost of reducing the ore to bullion and marketing same was \$1.27 per ton of which a breakdown follows at the end of this report.

A breakdown of each ore milled was made giving the actual gross recovered value for the Portland as \$7.99 per ton. At no place in the report could be found a gross value of an ore on a percentage of recovery, but by calculating from gross values reported for royalty purposes for the Portland, an average gross value of \$8.34 was established with a mill recovery of 95.80%.

The Gold Standard Mines Corporation either owned or leased most of the properties from which ore was received. The Portland was leased and following is a report of the operation.

Portland ore milled in 1938,	27,925 tons.	
Gross recovered value per ton		\$7.99
Marketing and Milling		1.27
Mining Royalties and Hauling		4.47
Camp, board and Administration		.55
Operating profit		1.70
Depreciation etc		.59
Net Profit		1.11

*250 4 inch royalty
200 1/2 inch or less*

The milling cost was based on an average daily tonnage of 174 tons.

With the property owned, a mill on the property and a minimum of 600 tons per day produced the following figures should be considered. Although labor and other costs are up, power costs are the same and reagent costs are very little higher. Therefore, the milling cost plus pumping water from the river should not exceed \$1.50 per ton. Royalties amounted to 0.83¢ per ton and trucking about \$1.70 per ton. Therefore, on a high tonnage basis mining should come well within \$2.00 per ton. With the town of Bullhead within driving distance of the mine, Housing and boarding house would be eliminated.

Summary:

From the available information the following facts were established; The total tons mined and treated was just over 132,000 tons, with an average gross value of \$7.97 per ton based on the royalty reports. The recovery based on actual figures available on 27,925 tons was 95.80% on an average gross value of \$8.34 per ton.

Denn Mill

January 9, 1950

Mr. S.S. Shattuck

Portland Mine

Page "3"

It seems from the available information, making allowances for increased costs and based on a production of 600 tons or better per day that a milling cost of \$1.50, including pumping water from the river, and a mininb cost not to exceed \$2.00 per ton can be made. Other costs should not exceed 50¢ per ton making a total cost of \$4.00 per ton. (I mention a production of 600 tons per day because that would be a minimum tonnage that could be treated in the Producer and Goldroad Cyanide Plants if they were moved to the mine).

I understand that the Portland can be bought for \$50,000.00 and Mr. Jones tells me that a 90 day examination period would be allowed.

Milling cost of the Katherine Cyanid Plant for the fiscal year of 1938 on 63,562 tons.

	Cost per ton
Salaries and wages	0.3187
Compensation Inc.	.0153
Unemployment tax	.0090
Old Age Benefit Tax	<u>0.0080</u>
Total Emp. Cost	0.3460
Treatment Materials	0.1667
Grinding Balls	.1012
Ball Mill Liners	.0366
Gas, Oil and grease	.0100
Other supplies	.0179
Repairs and Replacements	<u>0.0301</u>
Total material & Sup.	0.3625
Sampling	0.0384
Warehousing	<u>.0121</u>
Total Service other Dept.	0.0505

*Milling 2.50
- mill 1.50
- labor 50.0
- power 10.0*

THE PORTLAND MINE

KINGMAN, ARIZONA

The Portland Mine in the San Francisco Mining District of Arizona was visited on December 18th. I was accompanied by Mr. R. P. Jones, and Mr. Phil Morse, both of Kingman, Arizona.

LOCATION

The Portland Mine is located in Mohave County, Arizona, 46 miles North-east of Kingman by road. Twenty-five miles is on Highway 98 to Hoover Dam and 19 miles over a graded county road that is high gear nearly all the way. The Mine site is 4 miles from the Colorado River and will be on the Lake-side of the Lake formed by Davis Dam when completed next year. The mine is at an elevation of 1,400 feet and will be 800 feet above Davis Dam Lake. There is a power line 12 miles distant. Davis Dam and the town of Bull Head, Nevada, will be 12 miles distant.

CLIMATE

The climate is very arid and practically free of snow in the winter. The summers are hot with a minimum of rainfall. Roads are seldom closed by storms.

GEOLOGY

The range of mountains in which the mine is located parallels the Colorado River and is called the River Range. Several big mines are in this range, the Gold Roads, United Eastern, and Gold Standard. The range was built by volcanism in the Tertiary age and is composed of Rhyolites and Andesite intrusions with later Malpais Coverings. Ore occurrences are predominately in Metamorphosed Calcite beds which have become highly silicified. Gold and silver are the only metals to be found and they occur in almost microscopic particles disseminated through quartz.

GEOLOGY (Continued)

The metal bearing structure consists of two parallel veins, one about 20 feet thick and the other about 100 feet thick. The separating horse of waste is from 5 to 10 feet wide. The veins dip to the east at 27° and outcrop across a ridge for 2500 feet. A third vein of 5 foot thickness runs at right angles to the other across the south of the property and it dips to the North at about 40° . The ore is very silicious and dense and has a greenish cast.

PRESENT DEVELOPMENT

The mine was developed by a hundred foot shaft which is inaccessible. A tunnel on the surface level runs through the ridge for 900 feet. From this area a considerable tonnage was mined by room and pillar methods. All the ore was mined from the upper or 20 foot vein. No ore was mined from the thicker vein. Part of the tonnage mined was from the surface with shovels and trucks. It is reported that 152,000 tons were extracted and trucked, to the Catherine and Producers Mills, both some 17 miles distant.

Many samples from the thicker veins are reported to indicate equal values with those obtained in mining the thinner vein. The average recovered value reported to me on the 152,000 tons was \$7.94 per ton. Closure of the mine was forced by the embargoes placed on gold mines in 1942. Mining was done by antiquated methods and on much too small a scale for the grade of the ore and in view of the large tonnage available. There is no equipment of value on the property.

The owners report 500,000 tons of ore available above the present truck loading deck, and another 500,000 tons down to 100 feet below ground. These figures seem to be fair estimates provided exploration work verified the reported values in the thicker vein.

NEEDED EXPLORATION

Verification of reported tonnage and grade would require about ten drill holes approximately 200 feet deep, and some test runs on ore from outcrops and old faces. The records of past shipments would be valuable information for comparative

purposes. Shattuck Denn owns all the equipment necessary for drilling and drifting.

MINING METHODS

The first 500,000 tons can be mined with shovels and trucks. Drilling would be by churn drill and it appears secondary blasting will be required. Very little stripping will be required to this depth. During the mining of the surface ore a shaft could be sunk to a depth determined by drilling, and the deeper part of the ore body mined by Room and Pillar methods. I believe mining should be carried on at the rate of 1,000 tons or more, per day.

MILLING

It seems that milling at the mine site is essential. This would require the erection of a 1,000 ton cyanide mill. Water would have to be pumped 4 miles against an 800 foot head from the Colorado River. Power is available 12 miles away. Perhaps the mills at Gold Roads and Producers could be bought and moved. The ore must be finely ground (80-200 mesh) for good recoveries. The Producers' Mill is reported to have made better than a 95% recovery.

TERMS

The terms are those quoted in your letter of December 2nd. Mr. Jones assured me that titles are clear and there are no liens involved. He stated a period of exploration without cost could be arranged.

ESTIMATED MINING & MILLING COSTS

Mining	150
Milling	175
Marketing	25
Exploration & Development	100
	<u>450</u>
Reported Values	794
Net Earnings	<u>544</u>

CONCLUSION

I feel that this property merits further examination and a more thorough study of mining and milling procedures and costs be made.

J. A. Wilcox

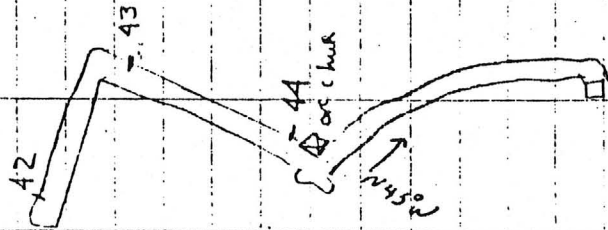
Port. 44 → 5' high just S of one
-Auto-chip - 70% cc - 20% host 10%
gtz - Vhs Breccia - in Slot of N. Pit

PORT-45: 6' high chip suppl
of aggregate poorly consolidated,
slightly calcified fragments.
contain some fragments of gtz vein
mat - up to 60% locally. Fine
& poorly sorted or unsorted matrix
of gtz vein fragments, clays, gtc,
volcanic fragments.

PORT-51: 6.5' high chip suppl
of calcite gtz + silicified
& latite fragments. Green gtz
- most abundant at top of vein (85%)
- mostly white cc at bottom
CC locally as large rosettes
looking over pit, get aug. attitude
N1E, 29SE
Basalt dikes 1-3' thick
cuts vein - in place concordantly
in place discordantly

From bottom of 92' shaft

1" = 40'



N ↓

-52: 4' high chip sample of coarse cc + green gtz (~30-40%) - green gtz is later than cc & may have oxydized it into the ore. Below S1 - ~~partly~~ partly This sample not 9' thick

-53: 10' high chip sample as S2 - following down dip slope - only a couple feet dip thickness ~~to~~ (not sure how much)

Now go to incline on "LITTLE OREBODY" About 30' down, east to S1, HAL taken PORT-SA

4.0' thick banded & partly vuggy green gtz + cc on top & red sm (limited) gtz on bottom.

-58: 4.2' thick green gtz + cc at HW - red-brown gtz + cc at F.W. N80W, 47NE - no banding lots of br textures, some br - big mass of silicified - at taken where small drift intersects incline

FROM SHAFT, 60 ~ 250' NBSU to diggings in vein. - here's PORT-59 is 2.5' THICK (FW NOT seen) of white cc + pads of green gtz E-W, to N (30-50% green gtz) - ~~End~~

Find outcrop of sand thin (2-5') zone of silicification ~80' W of here, but can't find any mineral W of here. Either pinches out, or is faulted off at the N15W trending valley here. I think it pinches out.

mcf80-100 dump sample
 from Democrat Mine in Hualapain
 Can't find outcrop of any decuss
 vein - little string of gtz - py
 vlt's in deep, with biotite
 adularites. Lots of x-cutting
 white c.g. granite r pyroxenite
 dikes. Dumps are primarily
 gtz - py vein - quite gossany

10/31/80
 COOL, PEARLY CLAY
 TODAY'S OBJ.
 SAMPLE PORTLAND MINE W/ DON
 IN N. PIT:

PORT-30: 1.5' THICK OF
 DEEPLY FC OF CLAY-ALT VOLT
 ANDESITE (?) - has .1 mm to
 .5 mm string of white cc
 ON HW of vein. N12W,
 21 NE.

-31: directly below 30. 5.0'
 THICK N10W, 18NE mixed
 clay - lim - goethite - w/ variable
 gtz content (some zones mostly
 lim - clay, some mostly gtz - spiked
 with volc). Perhaps 60-70%
 gtz overall.

-32 - Don collects

-33: 3.1' vertical clay cgl.
 70-80% green & porcelain like.

FRI- Oct. 31

PORTLAND - Pete & I

Alu Ag

- .009 2.05 Port 30 → 1.5' deep Fred-clay alt. andentite - 5. 1mm streaks white cc. on h.w. of vein - N12W-21°E
- .032 .2 Port → 31 → 5.0' thick - mixed lim- + clay + Qtz, locally in c.c. - soft w/ clay to hard → ≈ 70% Qtz. N18°W; 18° N.E.

- .142 .8 Port. 32 → S. end of N. Pit 10' from top wall - un. #. - ≈ N-S; 34° E dip (note - just below latite H.W. near pinching out of h.w. which is overlain by Qtz bearing fanglomerate. 34' fanglomerate andentite (latite) Qtz un. singl-32 f/ort
 Smpl = 6.7' thick - 90+90 Qtz = 59% rest + poss. 5% acc. some hem stain - does not go to f.w. (15-20# smpl)

- .196 2.8 Port 33 → 3.1' net. chip - 70-80% - gran. Qtz - white to pink clay, smpl doesn't go to f.w. - AH. N27W, 27NE

- .144 .80 Port-34 → S. end of N. Pit - seeable - scratch - into overlying fangl. for 3 1/2' thick (true x-sect.) - very representative due to soft nature of unit - ≈ 30-40% Qtz - rest is clay + caliche matrix. AH of fangl^{see} N10W-10°E (rough cont of latite ~~~~~ general dip). 10-15# smpl

- .020 .6 Port 35 - S end of N. Pit - 20' below 32 - here 90% Qtz - silica mineral, + hort - smpl = 4' wide (overlain by 1 1/2' thick latite which is overlain

abundant white & pinkish clays.
No lim or grethite. Don't go to
Ful of vein since it is
covered by talus. D27W ZRNE

vein is concordant w/ volcanic

PORT-36: IN SMALL SHAPE
AT TOP OF WORKINGS FROM
N. PIT ~~DE~~ INCLINE - NEST
TO SAMPLE H4 MASSIVE

white cc locally v. c. grained;
has bx fragments of spherulites
volcanic wallrocks. 6.2' high
& looks to go deeper since
we're not on top of vein at
bottom. V. minor gtz. < 5%

-40: 5.5' high at W
end of drift (x-cut sort of)
Clay + cc alt wallrock + massive
white + brown cc as irregular
pods + v lts.
It slicked f/t surface
at end of x-cut here is N75E,

52 SE w/ rounded mass

-41: 5.7' high chip - note vein
goes another 2' higher when viewed
from corner - bottom of vein not
seen. Massive pink + white
gtz + cc - top half is
> 75% gtz - bottom of sample
mostly cc - up to 100% "

Port 42 - in E drift below shaft of N.P.T
near H-18 (4' from face) 5 1/2' segd. of
vein bx = 10-15% host rock (latite) +
the rest br-grn-wh. c.c. - locally vein
contains much more bx frags of host (to 60%)
ATT not obtainable. (Cut by several thin
c.c. stringers - random orientation to 1" thick)

PORT 43: W. # of #42 + right
near to H16 (a v. carefully
channeled segd) - all white -
pink + grey cc w/ unsupported
large fragments of wallrocks
5.5' high

MCF80-100 dump sample
 from Democrat Mine in Hualapala
 Car's find outcrop of any ductile
 vein - little stringers of gtz - py
 vls in deeply weathered biotite
 amphibolites. Lots of x-cubing
 white c.g. granite & pyroxenite
 dikes. Dumps are primarily
 gtz - py vein - quite gossany

10/31/80
 COOL, PARTLY CLAY
 Today's obj:
 SAMPLE PORTLAND MINE w/ DON
 IN N. PIT:

PORT-30: 1.5' THICK OF
 DEEPLY FE O CLAY - AIT vls
 ANDESITE (?) - res .1 mm to
 .5 mm stringer of white cl
 ON HW of vein. N12W,
 21 NE.

-31: ductly below 30. 5.0'
 THICK N12W, 18NE mixed
 clay - lim - goethite - w/ variable
 gtz content (some zones mostly
 lim - clay). Some mostly gtz - typical
 vls vls. Perhaps 60-70%
 gtz area.

-32 - Don collects

-33: 3.1' ducted clay cgl.
 70-80% green's porcelain like gl - v.

Bulland (cont.)

#2 Adit - $\theta = N25^\circ E$ approx - 81 paces (220')

25' in \rightarrow X-cut. struck $Att. = N40^\circ E, 33-45^\circ S.E.$

219 \rightarrow 5' zone in drift to E. of drift. - 20-30% ...

Post 10 \rightarrow 57' of dips along E. wall of drift. - un. material (qtz-cr.)

Was stage above this drift.

Post 11 \rightarrow dump below ^(s.) #2 adit - 50-60% ^{wh-grn.} qtz , 20-30% ^{wh-blk.} $fc.c.$, rest host

Note: #2 sngl - from dump above + N. of #2 adit. large
long hole there

S. Incline (decline) $\approx 1,000'$ S. of #2 Adit

\rightarrow dip $47^\circ N.$ - un. dip. - note change from before (partly dip)

Post 12 \rightarrow dump from incline 80% qtz , pred. $grn.$

Post 13 \rightarrow 3-400' W. of incline, un. 2-3' wide, 60% $grn. qtz. c.c.$

host. sngl - 2' wide. - W. of Rd., $Att. = 50-60^\circ$ dip to NE.

All adits, inclines, etc follow contact of low. of $qtz.$ vein & overlying,
usually agglomeratic unit - commonly hem. stained.

Post 15 - 50' E of incline, in workings - handun. to 3' below here

un. - 70% silic. host (volc.), 20%-30% ^{grn.} qtz - & $msr. cc.$ extremely tuff
rock. - overlying H.W. is aggl. tuff (?) - includes $grn. qtz.$ frags.

Dip 35° to $5(N15^\circ E)$. - near H. 4

Post-14 \rightarrow 3' $qtz.$ - 30% $wtz.$ - ^{near} H9 & H9A.

Post-16 \rightarrow alt. Rk. 2 mi N - $qtz.$ H. 6. sngl.

Leon Berger
- Norm Adams -

Portland Mine 10/27/80

Port # 17 - et below workings

6' qv 60% 20% CaCO_3
20% and wall vx. qtz un
and bx near Sackroog spl?

Prob 2-30' below surface.
SW not reached

Port # 18

6' hi spl 90% CaCO_3
un 5% wall vx 5% qtz .
Near fw. Total thickness.
+ 12' SW not reached

Port # 19

6 1/2' qtz CaCO_3 un. stent
w/ un 16' Hw . stgly

Showed grn & brn qtz 80%
20% CaCO_3 . SW not reached

Port # 26

5% and 85% qtz 10%
 CaCO_3 - most qtz grn - rest
gray or white spl. 4' hi
Hw un. w/ un 6" of Hw
at spl 1572

Port # 27

6' high e spl 1522
massive qtz & CaCO_3 loc
sanded. ~~sw not reached~~
old workings Total un
at least 15'

Port # 28

Deep spl mod. select
y grn qtz . From S. pit.
prob 6-8000 T and up

Port # 23 - Deep spl. from
Tunnel spl #22. 75%
 qtz & cal. 25% and. Inside
mine

Port # 24 - 7' bx qtz un
& CaCO_3 . 90% 10% and.
 qtz & CaCO_3 . both 1' grn to
Tan. spl at H-286 #1471

Port # 25 - 4' Hw qv w/
 qtz & CaCO_3 bx w/ 10% w and
vx frogs & 1' green to honey
yellow qtz . e spl 1499.
spl. in this area continue
1-2' into barren Hw
and. Foot of drift is
not exposed.

Port # 20 - bx and 6' qtz un
bx Tectonic ~~for~~ over 58'
at same local as H-38, 38A.
At limit of workings

Port # 21 Hw bx w/
20% green qtz - 70%
slc and + 10% CaCO_3
6' TK spl. alt H-35, 35A
local.

Port # 22 Hw ~~at~~ CaCO_3
un + and bx w/ ^{white} qtz
& CaCO_3 . Immediately below
Hw and. No green qtz . If
spl. runs. U. sig. & includes
good tonnage potential if black?
6' TK

poss w fwo on spl
H-46, Port # 430 gave w
different values.

Port # 63

~~Port # 63~~ Duplicate

H-13' w/ ~~0.11~~ 0.11 or T

Au. spl across 8'-40% CalO₃

Un Ni qtz - 60% wall rx

Port # 64 across 22'

spl 70% pegn & 30% un.
CalO₃. no qtz. rx actually
a mag. bx

Port # 65 petr. Song spl

Port # 65A in raise ~
4' Hw on? exposed along N-S
60w ft. spl 90% CalO₃ 10% qm qtz

Portland Mine

12/2/80

N. Pit shaft

Port # 61 at end of
drift spl 4' L to on

struct poss in Hw
near SW contact. Un

below contact SW on
bx? spl 90% CalO₃

10% wall rx frogs no
qtz seen. near spl # 65

but H-18 in rx frub

Low CalO₃. No qtz in
un @ this local

Port # 62

spl @ H-16 90% CalO₃ un
10% wall rx pegn & a d.

Port # 68 Sa. cu above
but along next 30'. If
spl run thru ore
continues N. from stop

Port # 69

HG. Day spl banded
green qtz from 5m
vertical shaft

2/9/81

Port 70

spl bx and why on
exposed little un. If runs
v. interesting up to 20' Th

Port 71 on strike 200'
N. of 70 as above

25

236

90

2/2/80

Port = 66 30,000

Hw on upper 14' above
haul tunnel. Shows distinct

Hw w/ and a ft. ore &
bx qtz, CalO₃ on below. Tr

FeOx qtz > CalO₃. wall rx
< 10%. lower 10' not
sampled.

~~Port = 67. Next 10' below~~

~~is a drift into fuzg
un. massive qtz & CalO₃~~

Port # 67 a series of
5' hi. vert spl along
Hw portion of vein spl along
40' length

March 17, 1944

MEMORANDUM

PORTLAND GOLD MINE
MOHAVE COUNTY

TO: W. C. Broadgate

FROM: J. S. Coupal

I am enclosing a report by Holt on the Portland gold mine together with a memorandum which he has forwarded regarding it.

This is one of the few sizeable gold properties in the state and I believe it is worthy of calling to the attention of the people you mentioned.

JSC:LP
Enc.

August 31, 1944

Mr. Fred W. Koehler
Room 521 Guaranty Bldg.
Hollywood Blvd.
Hollywood, California

Dear Sir:

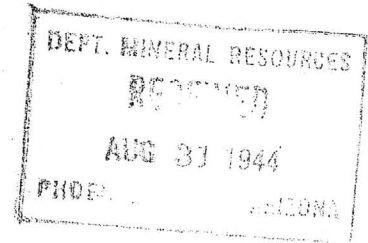
At the request of Mr. Elgin B. Holt,
field engineer, we are enclosing copy of his
report on the Portland Mine.

Yours very truly,

Secretary

lp
Enc.

August 30, 1944



To: Lorraine Porter
From: Elgin B. Holt
Subject: Report on Portland mine

Kindly mail a copy of my report on the PORYLAND MINE to:

Mr. Fred W. Koehler,
Room 521 Guaranty Bldg.,
Hollywood Blvd.,
Hollywood, Calif.

Thanks.

Elgin B. Holt
Elgin B. Holt

**STATE OF ARIZONA
FIELD ENGINEERS REPORT**

Mine PORTLAND

Date March 3, 1944

District Minnesota-Weaver, Mohave Co.

Engineer Elgin B. Holt

Subject: Gold Mine Survey

R E P O R T

OWNER: J. A. Potter, Kingman, Arizona.

AGENT: E. A. McVicar, Kingman, Arizona.

DETAILS: Gold with small amount of silver.

AREA: LOCATION: This property, consisting of 3 patented and 5 unpatented claims, is situated in Mohave County, Arizona, 50 miles northwest of Kingman and six miles east of the Colorado River. From Kingman, the property is reached by following U. S. Highway 93 north 26 miles to Pleasant Valley Junction; thence west along the Searchlight road for 10 miles; thence southwesterly about 12 miles to the mine.

HISTORICAL:

Property was discovered about 1920. From 1935 to 1940 it was worked under a lease and option arrangement by the Gold Standard Mines Corporation. During this period approximately 132,000 tons of ore were milled averaging \$7.22 gold per ton, according to settlement sheets now on file in McVicar's office in Kingman. The said ore was treated in the Katherine cyanidation plant located 11 miles southeasterly from property, or about 16 miles over a very poor sandy road, over which the ore was hauled by trucks. The property was abandoned during 1940 by Gold Standard due mainly to the fact about that time this company secured control and started operating the Tyro mine, a much larger property and located only 7 miles from the Katherine mill.

Per F. C. Schrader, 1909, "The country rock", of that general area, "consists of the Tertiary volcanic rocks, with rhyolite and green chlorite andesite most abundant."

ORE RESERVES:

During April, 1937, after the Gold Standard company had started work on the Portland mine, Mr. Clyde M. Becker, a very able geologist, reported on that property as follows:

"I estimated that approximately 700 feet of development work on these three ore bodies had proven 287,000 tons of ore of an average value of \$6.64 (gold) per ton."

Referring to the cross-vein on the Portland claim, Becker stated:

"On the little ore body an inclined shaft had been sunk 100 feet with ore of grade similar in type and values to the south tunnel ore body. A series of assays taken at 95 feet ran 0.18 to 0.44 ounces gold. All carry silver in the approximate ration of 5 to 1 by weight. No other mineral (metallics) is present."

MAIN VEIN:

The main vein, which strikes north to south, is a wide flat vein dipping about 35 degrees easterly. The deepest work on mine is about 100 feet vertically, reaching the permanent water level.

The main vein mentioned is exposed on surface for around 1200 feet; but it is believed to extend 500 feet further to the south through a basin where the vein is covered by debris. This vein is wide, averaging 12 feet in thickness, but "bellies" out in places to 20 feet or more in ^{width} ~~thickness~~. The vein gangue is composed of quartz and calcite, with no deleterious metals present. Hence the ore is ideal for treatment by cyanidation, by which process around 97% of gold values should be recovered.

MINE WORKINGS:

The main workings of property consist of the following openings:
1. A 100-foot shaft sunk on the cross-vein, exposing the "Little Ore Body" mentioned by Becker. 2. The South Tunnel which develops the "South Tunnel Ore Body"; and 3. The North Tunnel, which develops the "North Tunnel Ore Body". Also at the bottom of the 100-foot shaft on the cross-vein a drift 100 feet in length has been run on vein, which is from 4 to 6 feet wide of good milling ore. It will be noted that this ore, per Becker, assays from 0.18 to 0.44 ounces gold per ton.

The South Tunnel is about 200 feet in length connecting with the "Big Stope" at back end, which is now partly caved; but ore faces in stope are accessible for sampling.

The North Tunnel starts as an open cut about 100 feet in length on the main vein, and continues south as a tunnel partly on vein and partly in the foot wall to a point where it connects with the "Big Stope" workings. Also there is a shaft 100 feet deep on vein near the mouth of the open cut at north end of property; also a 100-foot drift running south on vein from the bottom of the said 100-foot shaft and connects with a raise to the open cut above. All of these workings are open and accessible for sampling.

MINE SAMPLED BY OTHER ENGINEERS:

After the Portland mine was abandoned by Gold Standard, it was sampled by engineers representing the Continental Mining Company of New York and also by Mette and Hamron of Los Angeles. The average results of both of these samplings gave better than \$7.00 gold per ton, according to records in McVicar's office, and which can be examined at any convenient time.

0.2002

WATER:

Ample water for milling and domestic purposes could be secured from the Colorado River, six miles from property, by means of an application for a water right from the Arizona Water Commission.

MILLING PLANT:

Further work should be done on the Portland Mine in order to determine its ore reserves, average value of ore, and the capacity of a treatment plant that should be installed at a later time. As additional ore could be secured in quantity for such a plant from four or five other gold mines within a radius of 10 miles of Portland, it is believed that an operation could finally be developed that would result in supplying a mill of large capacity, say from 300 to 500 tons daily, with gold ore of goodly grade over a long period of years.

Elgin B. Holt
Elgin B. Holt,
Field Engineer.

DEPARTMENT OF MINERAL RESOURCES
STATE OF ARIZONA
FIELD ENGINEERS REPORT

Mine FORTLAND

Date March 3, 1944

District Minnesota-Weaver, Mohave Co.

Engineer Elgin P. Molt

Subject: Gold Mine Survey

R E P O R T

OWNER: J. A. Potter, Kingman, Arizona.

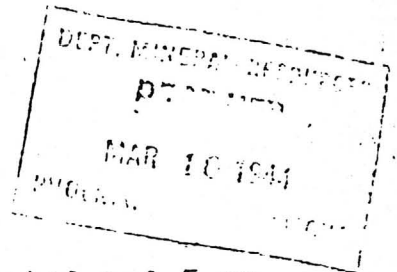
AGENT: E. A. McVicar, Kingman, Arizona.

METALS: Gold with small amount of silver.

AREA: LOCATION: This property, consisting of 3 patented and 5 unpatented claims, is situated in Mohave County, Arizona, 50 miles northwest of Kingman and six miles east of the Colorado River. From Kingman, the property is reached by following U. S. Highway 93 north 28 miles to Pleasant Valley Junction; thence west along the Searchlight road for 10 miles; thence southwesterly about 12 miles to the mine.

HISTORICAL:

Property was discovered about 1920. From 1935 to 1940 it was worked under a lease and option arrangement by the Gold Standard Mines Corporation. During this period approximately 132,000 tons of ore were milled averaging \$7.22 gold per ton, according to settlement sheets now on file in McVicar's office in Kingman. The said ore was treated in the Katherine cyanidation plant located 11 miles southeasterly from property, or about 16 miles over a very poor sandy road, over which the ore was hauled by trucks. The property was abandoned during 1940 by Gold Standard due mainly to the fact about that time this company secured control and started operating the Tyre mine, a much larger property and located only 7 miles from the Katherine mill.



GEOLOGY:

For F. S. Schrader, 1909, "The country rock", of that general area, "consists of the Tertiary volcanic rocks, with andesite and green chlorite andesite most abundant."

ORE RESERVES:

During April, 1937, after the Gold Standard company had started work on the Portland mine, Mr. Clyde M. Becker, a very able geologist, reported on that property as follows:

"I estimated that approximately 700 feet of development work on these three ore bodies had proven 287,000 tons of ore of an average value of \$6.64 (gold) per ton."

Referring to the cross-vein on the Portland claim, Becker stated: "On the little ore body an inclined shaft had been sunk 100 feet with ore of grade similar in type and values to the south tunnel ore body. A series of assays taken at 95 feet ran 0.18 to 0.44 ounces gold. All carry silver in the approximate ration of 5 to 1 by weight. No other mineral (metallics) is present."

MAIN VEIN:

The main vein, which strikes north to south, is a wide flat vein dipping about 35 degrees easterly. The deepest work on mine is about 100 feet vertically, reaching the permanent water level.

The main vein mentioned is exposed on surface for around 1200 feet; but it is believed to extend 500 feet further to the south through a basin where the vein is covered by debris. This vein is wide, averaging 12 feet in thickness, but "bellies" out in places to 20 feet or more in ^{width} ~~thickness~~. The vein gangue is composed of quartz and calcite, with no deleterious metals present. Hence the ore is ideal for treatment by cyanidation, by which process around 97% of gold values should be recovered.

MINE WORKINGS:

The main workings of property consist of the following openings:

1. A 100-foot shaft sunk on the cross-vein, exposing the "Little Ore Body" mentioned by Becker.
2. The South Tunnel which develops the "South Tunnel Ore Body"; and
3. The North Tunnel, which develops the "North Tunnel Ore Body".

Also at the bottom of the 100-foot shaft on the cross-vein a drift 100 feet in length has been run on vein, which is from 4 to 6 feet wide of good milling ore. It will be noted that this ore, per Becker, assays from 0.18 to 0.44 ounces gold per ton.

The South Tunnel is about 200 feet in length connecting with the "Big Stope" at back end, which is now partly caved; but ore faces in stope are accessible for sampling.

The North Tunnel starts as an open cut about 100 feet in length on the main vein, and continues south as a tunnel partly on vein and partly in the foot wall to a point where it connects with the "Big Stope" workings. Also there is a shaft 100 feet deep on vein near the mouth of the open cut at north end of property; also a 100-foot drift running south on vein from the bottom of the said 100-foot shaft and connects with a raise to the open cut above. All of these workings are open and accessible for sampling.

MINE SAMPLED BY OTHER ENGINEERS:

After the Portland mine was abandoned by Gold Standard, it was sampled by engineers representing the Continental Mining Company of New York and also by Kette and Hamron of Los Angeles. The average results of both of these samplings gave better than \$7.00 gold per ton, according to records in McVicar's office, and which can be examined at any convenient time.

WATER:

Ample water for milling and domestic purposes could be secured from the Colorado River, six miles from property, by means of an application for a water right from the Arizona Water Commission.

MILLING PLANT:




Further work should be done on the Portland Mine in order to determine its ore reserves, average value of ore, and the capacity of a treatment plant that should be installed at a later time. As additional ore could be secured in quantity for such a plant from four or five other gold mines within a radius of 10 miles of Portland, it is believed that an operation could finally be developed that would result in supplying a mill of large capacity, say from 300 to 500 tons daily, with gold ore of goodly grade over a long period of years.



Elgin B. Holt

Elgin B. Holt,
Field Engineer.






EXPLANATION




ROCK CHIP SAMPLES

- 1.13  Horizontal sample or sample w/40° horizontal component.
- 0.76  Vertical sample or sample w/<10° horizontal component.
- 1.78  Underground sample (*values in italics*)

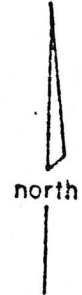
-  Main Vein Complex (projected under cover)
-  Footwall Breccia (projected under cover)

SILVER VALUES

-  + 1.5 oz/ton
-  1.0—1.5 oz/ton
-  0.5—1.0oz/ton
-  < 0.5oz/ton
-  Hanging wall sample, all values ≤ 0.22oz

-  Diamond Drill Hole
-  Rotary Drill Hole
-  Prospect Trench

I.07
I.06
Surface,
not U.G.

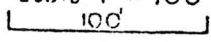


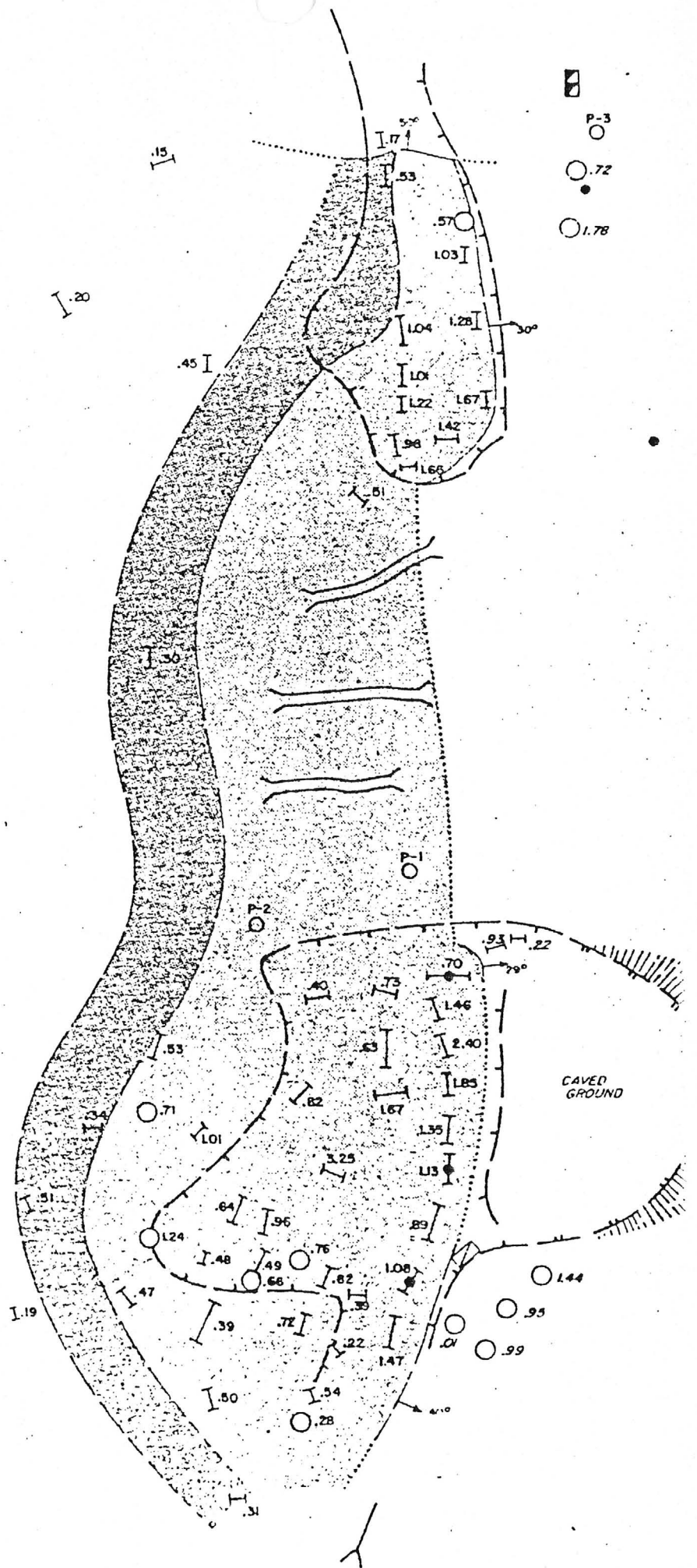
surface, not U.G.

ASSAY MAP—SILVER

PORTLAND GOLD MINE

MOHAVE COUNTY, ARIZONA

scale 1" = 100'




-
- P-3
- .72
- 1.78

CAVED GROUND

DEPARTMENT OF MINERAL RESOURCES
State of Arizona
FIELD ENGINEERS REPORT

MINE: PORTLAND DATE: March 5, 1944
DISTRICT: Minnesota-Weaver, Mohave Co. ENGINEER: Elgin B. Holt
SUBJECT: Gold Mine Survey

REPORT

OWNER: J. A. Potter, Kingman, Arizona

AGENT: E. A. McVicar, Kingman, Arizona

METALS: Gold with small amount of silver

AREA: LOCATION: This property, consisting of 3 patented and 5 unpatented claims, is situated in Mohave County, Arizona, 50 miles northwest of Kingman and six miles east of the Colorado River. From Kingman, the property is reached by following U. S. Highway 93 north 28 miles to Pleasant Valley Junction; thence west along the Searchlight road for 10 miles; thence southwesterly about 12 miles to the mine.

HISTORICAL:

Property was discovered about 1920. From 1935 to 1940 it was worked under a lease and option arrangement by the Gold Standard Mines Corporation. During this period approximately 132,000 tons of ore were milled averaging \$7.22 gold per ton, according to settlement sheets now on file in McVicar's office in Kingman. The said ore was treated in the Katherine cyanidation plant located 11 miles south-easterly from property, or about 16 miles over a very poor sandy road, over which the ore was hauled by trucks. The property was abandoned during 1940 by Gold Standard due mainly to the fact about that time this company secured control and started operating the Tyro mine, a much larger property and located only 7 miles from the Katherine mill.

GEOLOGY: Per F. C. Schrader, 1909, "The country rock", of that general area, "consists of the Tertiary volcanic rocks, with rhyolite and green chlorite andesite most abundant."

ORE RESERVES: During April, 1937, after the Gold Standard company had started work on the Portland mine, Mr. Clyde M. Becker, a very able geologist, reported on that property as follows:

"I estimated that approximately 700 feet of development work on these three ore bodies had proven 287,000 tons of ore of an average value of \$6.64 (gold) per ton."

Referring to the cross-vein on the Portland claim, Becker stated: "On the little ore body an inclined shaft had been sunk 100 feet with ore of grade similar in type and values to the south tunnel ore body. A series of assays taken at 95 feet ran 0.18 to 0.44 ounces gold. All carry silver in the approximate ratio of 5 to 1 by weight. No other mineral (metallies) is present."

MAIN VEIN: The main vein, which strikes north to south, is a wide flat vein dipping about 35 degrees easterly. The deepest work on mine is about 100 feet vertically, reaching the permanent water level. The main vein mentioned is exposed on surface for around 1200 feet; but it is believed to extend 500 feet further to the south through a basin where the vein is covered by debris. This vein is wide,

averaging 12 feet in thickness, but "bellies" out in places to 20 feet or more in width. The vein gangue is composed of quartz and calcite, with no deleterious materials present. Hence the ore is ideal for treatment by cyanidation, by which process around 97% of gold values should be recovered.

MINE WORKINGS: The main workings of property consist of the following openings: 1. A 100-foot shaft sunk on the cross-vein, exposing the "Little Ore Body" mentioned by Becker. 2. The South Tunnel which develops the "South Tunnel Ore Body"; and 3. The North Tunnel, which develops the "North Tunnel Ore Body." Also at the bottom of the 100-foot shaft on the cross-vein a drift 100 feet in length has been run on vein, which is from 4 to 6 feet wide of good milling ore. It will be noted that this ore, per Becker, assays from 0.18 to 0.44 ounces gold per ton.

The South Tunnel is about 200 feet in length connecting with the "Big Stope" at back end, which is now partly caved; but ore faces in stope are accessible for sampling.

The North Tunnel starts as an open cut about 100 feet in length on the main vein, and continues south as a tunnel partly on vein and partly in the foot wall to a point where it connects with the "Big Stope" workings. Also there is a shaft 100 feet deep on vein near the mouth of the open cut at north end of property; also a 100-foot drift running south on vein from the bottom of the said 100-foot shaft and connects with a raise to the open cut above. All of these workings are open and accessible for sampling.

MINE SAMPLED BY OTHER ENGINEERS: After the Portland mine was abandoned by Gold Standard, it was sampled by engineers representing the Continental Mining Company of New York and also by Motte and Hamron of Los Angeles. The average results of both of these samplings gave better than \$7.00 gold per ton, according to records in McVicar's office, and which can be examined at any convenient time.

WATER: Ample water for milling and domestic purposes could be secured from the Colorado River, six miles from property, by means of an application for a water right from the Arizona Water Commission.

MILLING PLANT: Further work should be done on the Portland Mine in order to determine its ore reserves, average value of ore, and the capacity of a treatment plant that should be installed at a later time. As additional ore could be secured in quantity for such a plant from four or five other gold mines within a radius of 10 miles of Portland, it is believed that an operation could finally be developed that would result in supplying a mill of large capacity, say from 300 to 500 tons daily, with gold ore of goodly grade over a long period of years.

/s/ Elgin B. Holt
Elgin B. Holt
Field Engineer

Approximate Sketch
PORTLAND MINE
Scale 1"=100'

N

Gulch

North Pt

Incline up 10'

Dike

Surface Cuts

Staged
Dip

Crest of hill

Hangar Wall

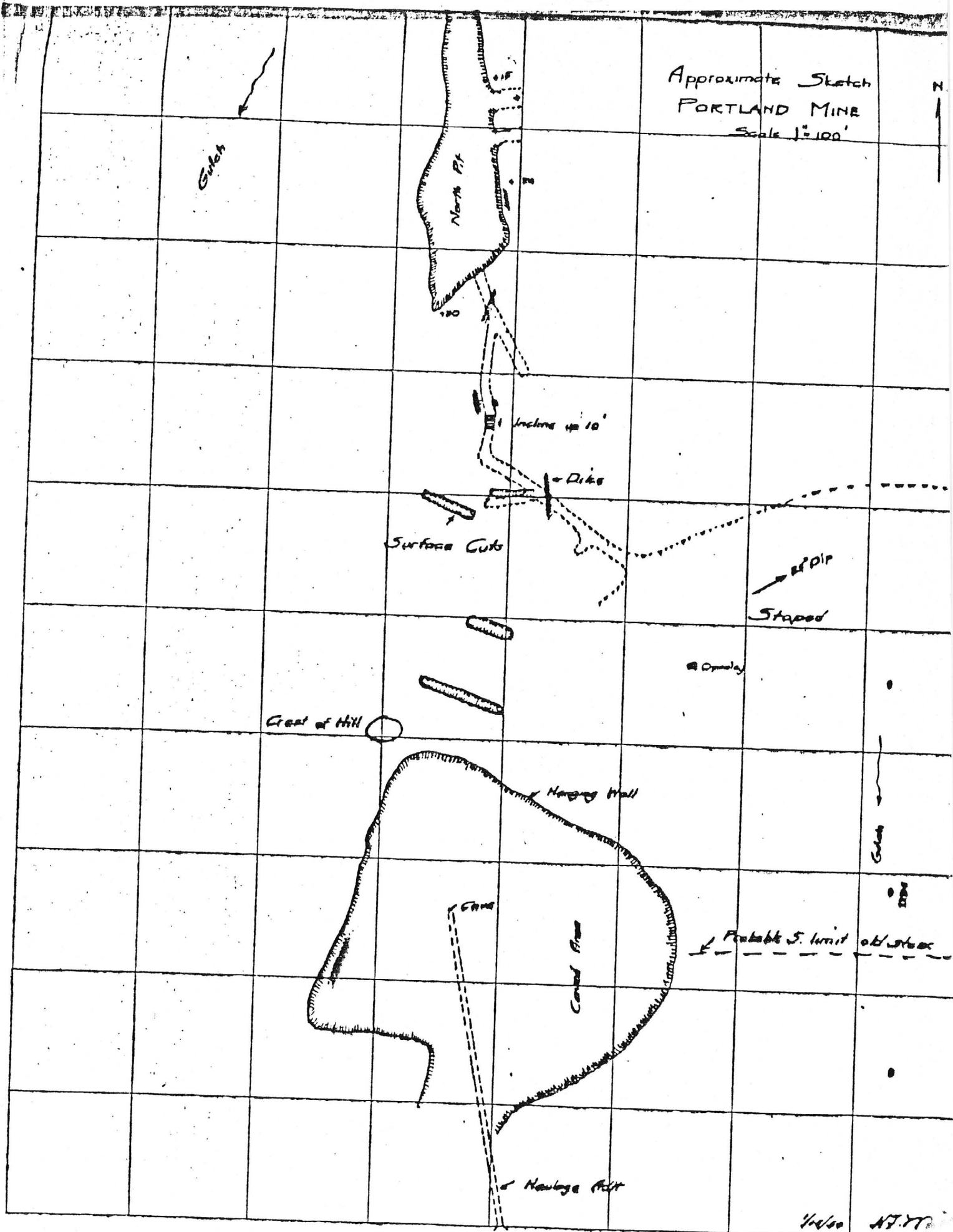
Gate

Coned Area

Probable S. limit of strata

Howley Pit

4/20/00 N.Y.C.



92807; that between September 1, 1978 and September 1, 1979, in excess of \$34,000.00 worth of work and improvements were done and performed for the benefit of each of the aforementioned claims (19). Work and improvements consisted of road work and drill site preparation performed by Freiday Construction, 3360 North Bank Street, Kingman, Arizona 86401, and air hammer drilling performed by Hugh M. Harris Drilling Company, 13636 Jack Rabbit Road, Poway, California 92064

Said labor was performed and improvements made at the expense of ASARCO Incorporated, for the benefit of each and all of said mining claims comprising said contiguous groups as part of a general plan of exploration, improvements, and development, and they tend to explore, improve and develop each and all of said mining claims. The amount expended for and the value of said labor and improvements is more than One Hundred Dollars (\$100.00) for each of the mining claims and at least said amount was allocated to each of the mining claims. Said expenditure was made in good faith for the purpose of exploring, improving and developing said contiguous groups of mining claims, and was intended as annual labor and improvements for each and all of the above-described unpatented lode mining claims for the assessment year ending at 12:00 o'clock meridian, September 1, 1979.

ASARCO Incorporated

By R. B. Crist
Agent

STATE OF ARIZONA)
) ss
County of Yuma)

The foregoing instrument was acknowledged before me this 10th day of August, 1979, by R. B. Crist.

Mildred C. Cain
Notary Public

My Commission Expires:

My Commission Expires Nov. 28, 1980

BOOK 564 PAGE 563

Ret Asarco Inc.
P.O. Box 5747
Tucson, Ar 85703

79-26557
 STATE OF ARIZONA } ss PROOFED
 County of Mohave }

I hereby certify that the within instrument was filed and recorded at the cost of Asarco

AUG 13 '79 - 8 00 AM
 in Book 564 of official records (562-563)

AFFIDAVIT OF LABOR PERFORMED AND IMPROVEMENTS MADE

STATE OF ARIZONA)
) ss
 County of Pima)



Witness my hand and official seal the day and year aforesaid.
 JOAN MCGALL
 Mohave County Recorder

By William Crave
 Deputy Recorder 310

R. B. Crist, being first duly sworn, deposes and says that he is a citizen of the United States and more than twenty-one (21) years of age, and resides in Tucson, County of Pima, State of Arizona, and is personally acquainted with the mining claims situated in the Weaver Mining District, Mohave County, Arizona, the names and books and pages of record in the office of the County Recorder of Mohave County, Arizona, and the Bureau of Land Management serial number of the Notices of Location whereof are as follows:

Name of Claim	Original		Relocated		BLM
	Book	Page	Book	Page	Serial No.
					A MC
Goodluck	3N	478	496	69/71	28157
Betterluck	"	479	"	75/77	" 58
Betterluck No.1	"	480	"	78/80	" 59
Sunshine No.3	3U	67	"	72/74	" 60
Portland No.1	"	66	"	81/83	" 61
Portland No.2	3Q	349	"	84/86	" 62
Portland No.3	3U	68	"	87/89	" 63
Portland No.4	496	90/92			" 64
Portland No.5	"	93/95			" 65
Portland No.6	"	96/98			" 66
Portland No.7	"	99/101			" 67
Portland No.8	"	102/104			" 68
Portland No.9	"	105/107			" 69
Portland No.10	"	108/110			" 70
Portland No.11	"	111/113			" 71
Portland No.12	"	114/116			" 72
Portland No.13	"	117/119			" 73
Portland No.14	"	120/122			" 74
Portland No.15	"	123/124			" 75

That all of said mining claims are held in ownership by ASARCO Incorporated, the mailing address for which is P. O. Box 5747, Tucson, Arizona 85703, and Mona Potter, L. M. and J. N. Wiscombe, and L. G. and S. L. Clark, who represents the group, at 3955 Maple Tree Drive, Anaheim, California

BOOK 564 PAGE 562

Notice of Mining Location

CRANE & CO., YORBA

LODE CLAIM

TO ALL WHOM IT MAY CONCERN:

This mining Claim, the name of which is the PORTLAND No. 3 Mining Claim, situate on lands belonging to the United States of America, and in which there are valuable mineral deposits, was entered upon and located for the purpose of exploration and purchase by PORTLAND LINES INCORPORATED AN ARIZONA CORPORATION,

(Locator must insert either "a citizen of the United States" or "who has declared his intention to become a citizen of the United States.") the undersigned, on the 4th day of April, 1939.

The length of this claim is HUNDRED & NO/100 feet, and it claims Hundred Fifty & No/100 feet in a Northwesterly direction and 750 feet in a Southeasterly direction from the center of the discovery shaft, at which this notice is posted, lengthwise of the claim, together with THREE HUNDRED & No/100 feet in width of the surface grounds, on each side of the center of said claim. The general course of the lode deposit and premises is from the Northwest to the Southeast.

The claim is situated and located in the Minnesota Mining District, in Lohave County, in the State of Arizona, about 1800 feet in a Southerly direction from Main workings of the Portland Line: The northerly side line of this claim is identical with the Southerly side line of the PORTLAND, patented lode claim.

The surface boundaries of the claim are marked upon the ground as follows: Beginning at _____ at a point in a _____ direction _____ feet from the discovery shaft (at which this notice is posted), being in the center of the _____ end line of said claim; thence _____ feet to a _____, being the _____ corner of said claim; thence _____ feet to a _____ being at the _____ corner of said claim; thence _____ feet to a _____ at the center of the _____ end of said claim; thence _____ feet to a _____, being at the _____ corner of said claim; thence _____ feet to a _____ at the _____ corner of said claim; thence _____ feet to the place of beginning.

Dated and posted on the ground, this 4th day of April, 1939.

C. W. Potter

PORTLAND LINES INCORPORATED

By E. J. DeVicari
Agent

Filed and recorded at request of _____ this 10th day of April, 1939, at 4:40 o'clock P.M., in Book 3 U at Page 66.

Larry D. Carrow
County Recorder.

No. 15038

By A. L. Jones
Deputy Recorder.

LAND BLDGS ETC PERSONAL PROPERTY	1979	1980	DIFFERENCE	PRIMARY TAX	
TOTALS	5327	5652		51698	
00986	2402	7034	4632		
02000	13002	15126	2124		
05011	18616	13966	-4650		
06100	15813	14147	-1666		
08150	4905	5111	206		
				SECONDARY TAX	3686
				SPECIAL DISTRICTS	00
				TOTAL TAX DUE	55384

CLARK SAMUEL & LA VONNE & POTTER JAMES A
 % MOND G POTTER
 % THE BIRD CAGE
 6750 HAWAII KPI DR NO 1005
 HONOLULU HI 91106
 SEC 15 23 21 PAT CLAIMS; SUNSHINE; SUNSHINE #2 40.00AC M/L

LAND BLDGS ETC PERSONAL PROPERTY	LIMITED VALUE	ASMT%	ASSESSED VALUE	EXEMPTION	1ST HALF PAID	2ND HALF PAID	
TOTALS	800	160	128	0	660	660	
LAND BLDGS ETC PERSONAL PROPERTY	FULL CASH VALUE	ASMT%	ASSESSED VALUE	EXEMPTION	PENALTY	1ST HALF	2ND HALF
TOTALS	800	160	128	0	0	0	0

CLARK SAMUEL & LA VONNE & POTTER JAMES A
 % MOND G POTTER
 % THE BIRD CAGE
 6750 HAWAII KAI DR NO 1005
 HONOLULU HI 91106
 SEC 15 23 21 PAT CLAIMS; PORTLAND 20.00AC M/L UNDIV INT

LAND BLDGS ETC PERSONAL PROPERTY	LIMITED VALUE	ASMT%	ASSESSED VALUE	EXEMPTION	1ST HALF PAID	2ND HALF PAID	
TOTALS	400	160	64	0	329	329	
LAND BLDGS ETC PERSONAL PROPERTY	FULL CASH VALUE	ASMT%	ASSESSED VALUE	EXEMPTION	PENALTY	1ST HALF	2ND HALF
TOTALS	400	160	64	0	0	0	0

HAC EHEN WALTER THOMPSON HELEN
 % JOHN B MARRON ATTY
 MAYER CTRL BLDG #504
 PHOENIX AZ 85012

LAND BLDGS ETC PERSONAL PROPERTY	LIMITED VALUE	ASMT%	ASSESSED VALUE	EXEMPTION	1ST HALF PAID	2ND HALF PAID	
TOTALS	533	160	85	0	421	421	
LAND BLDGS ETC PERSONAL PROPERTY	FULL CASH VALUE	ASMT%	ASSESSED VALUE	EXEMPTION	PENALTY	1ST HALF	2ND HALF
TOTALS	582	160	93	0	0	0	0

SEC 14 24 20 NE4 160AC

LAND BLDGS ETC PERSONAL PROPERTY	1979	1980	DIFFERENCE	PRIMARY TAX	
TOTALS	2000	3150	-274		
00986	150	401	251		
02000	814	850	46		
05011	1164	794	-370		
06100	989	804	-185		
08150	307	291	-16		
				SECONDARY TAX	3686
				SPECIAL DISTRICTS	00
				TOTAL TAX DUE	55384

TRANSAMERICA TITLE INS CO
 % INT & INV CO
 PO BOX 500
 PHOENIX AZ 85001

LAND BLDGS ETC PERSONAL PROPERTY	LIMITED VALUE	ASMT%	ASSESSED VALUE	EXEMPTION	1ST HALF PAID	2ND HALF PAID	
TOTALS	500	160	80	0	660	660	
LAND BLDGS ETC PERSONAL PROPERTY	FULL CASH VALUE	ASMT%	ASSESSED VALUE	EXEMPTION	PENALTY	1ST HALF	2ND HALF
TOTALS	500	160	80	0	0	0	0

SUGGS FAMILY TRUST
 SUGGS ELLIS & DOROTHY TRUSTEES
 5820 E ORANGE BLOSSOM LANE
 PHOENIX AZ 85018

LAND BLDGS ETC PERSONAL PROPERTY	LIMITED VALUE	ASMT%	ASSESSED VALUE	EXEMPTION	1ST HALF PAID	2ND HALF PAID	
TOTALS	100	160	16	0	178	160	
LAND BLDGS ETC PERSONAL PROPERTY	FULL CASH VALUE	ASMT%	ASSESSED VALUE	EXEMPTION	PENALTY	1ST HALF	2ND HALF
TOTALS	100	160	16	0	0	0	0

SUGGS FAMILY TRUST
 SUGGS ELLIS & DOROTHY TRUSTEES
 5820 E ORANGE BLOSSOM LANE
 PHOENIX AZ 85018

LAND BLDGS ETC PERSONAL PROPERTY	LIMITED VALUE	ASMT%	ASSESSED VALUE	EXEMPTION	1ST HALF PAID	2ND HALF PAID	
TOTALS	100	160	16	0	178	160	
LAND BLDGS ETC PERSONAL PROPERTY	FULL CASH VALUE	ASMT%	ASSESSED VALUE	EXEMPTION	PENALTY	1ST HALF	2ND HALF
TOTALS	100	160	16	0	0	0	0

SEC 14 24 20 NE4 160AC

LAND BLDGS ETC PERSONAL PROPERTY	1979	1980	DIFFERENCE	PRIMARY TAX	
TOTALS	5327	5652		51698	
00986	2402	7034	4632		
02000	13002	15126	2124		
05011	18616	13966	-4650		
06100	15813	14147	-1666		
08150	4905	5111	206		
				SECONDARY TAX	3686
				SPECIAL DISTRICTS	00
				TOTAL TAX DUE	55384

CLARK SAMUEL & LA VONNE & POTTER JAMES A
 % MOND G POTTER
 % THE BIRD CAGE
 6750 HAWAII KPI DR NO 1005
 HONOLULU HI 91106
 SEC 15 23 21 PAT CLAIMS; SUNSHINE; SUNSHINE #2 40.00AC M/L

LAND BLDGS ETC PERSONAL PROPERTY	LIMITED VALUE	ASMT%	ASSESSED VALUE	EXEMPTION	1ST HALF PAID	2ND HALF PAID	
TOTALS	800	160	128	0	660	660	
LAND BLDGS ETC PERSONAL PROPERTY	FULL CASH VALUE	ASMT%	ASSESSED VALUE	EXEMPTION	PENALTY	1ST HALF	2ND HALF
TOTALS	800	160	128	0	0	0	0

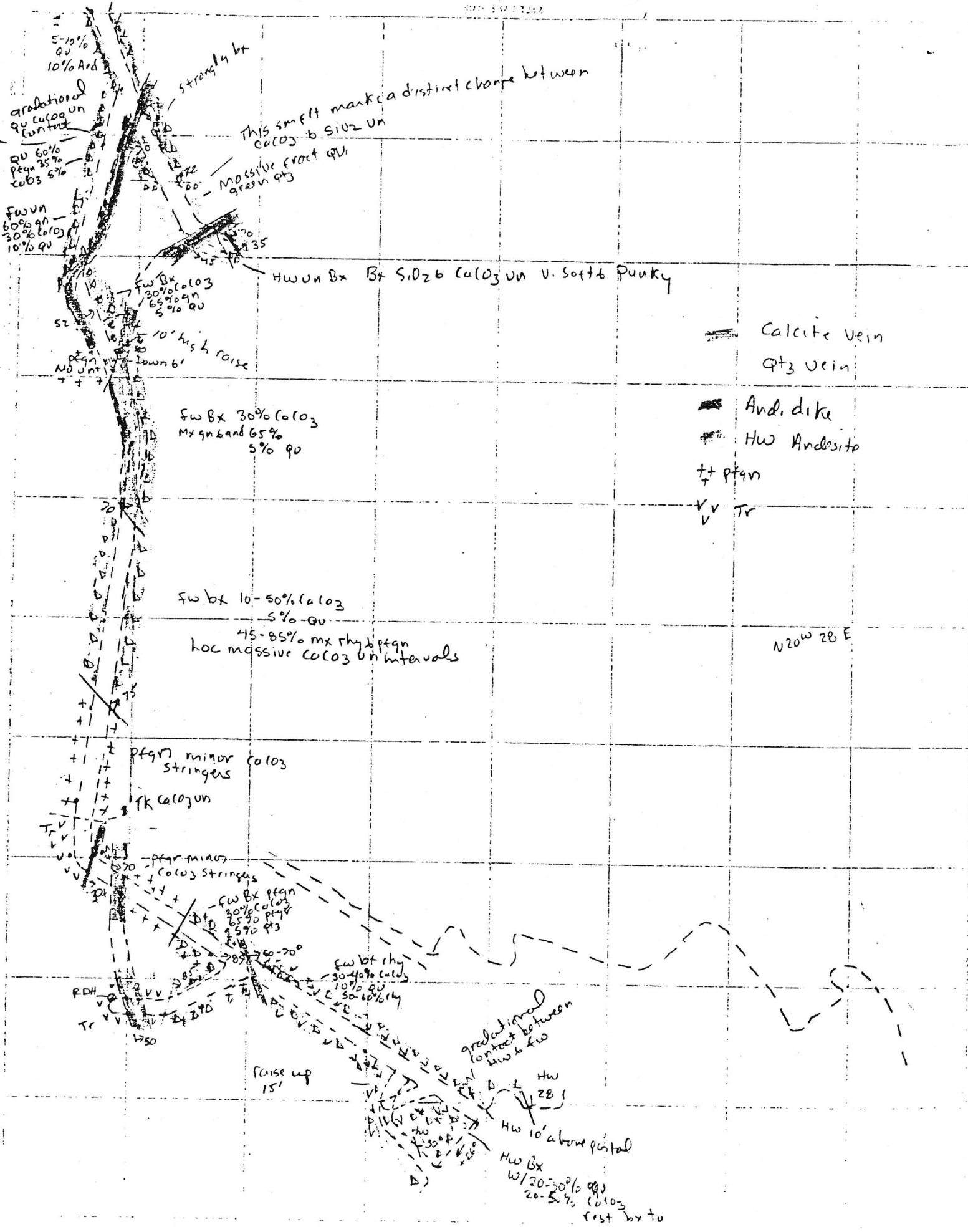
CLARK SAMUEL & LA VONNE & POTTER JAMES A
 % MOND G POTTER
 % THE BIRD CAGE
 6750 HAWAII KAI DR NO 1005
 HONOLULU HI 91106
 SEC 15 23 21 PAT CLAIMS; PORTLAND 20.00AC M/L UNDIV INT

LAND BLDGS ETC PERSONAL PROPERTY	LIMITED VALUE	ASMT%	ASSESSED VALUE	EXEMPTION	1ST HALF PAID	2ND HALF PAID	
TOTALS	400	160	64	0	329	329	
LAND BLDGS ETC PERSONAL PROPERTY	FULL CASH VALUE	ASMT%	ASSESSED VALUE	EXEMPTION	PENALTY	1ST HALF	2ND HALF
TOTALS	400	160	64	0	0	0	0

HAC EHEN WALTER THOMPSON HELEN
 % JOHN B MARRON ATTY
 MAYER CTRL BLDG #504
 PHOENIX AZ 85012

LAND BLDGS ETC PERSONAL PROPERTY	LIMITED VALUE	ASMT%	ASSESSED VALUE	EXEMPTION	1ST HALF PAID	2ND HALF PAID	
TOTALS	533	160	85	0	421	421	
LAND BLDGS ETC PERSONAL PROPERTY	FULL CASH VALUE	ASMT%	ASSESSED VALUE	EXEMPTION	PENALTY	1ST HALF	2ND HALF
TOTALS	582	160	93	0	0	0	0

SEC 14 24 20 NE4 160AC



5-10%
qu
10% And
gradational
qu calc
contact

qu 60%
ptgn 35%
calc 5%

Fw un
60% an
30% calc
10% qu

stringers

This smelt marks a distinct change between
calc b SiO2 un

massive fract qtz
green qtz

Hw un Bx Bx SiO2 b calc un v. soft & punky

Calcite vein
Qtz vein

And. dike
Hw Andesite

++ ptgn
VV Tr

Fw Bx
30% calc
65% an
5% qu

Fw Bx 30% calc
mx qn band 65%
5% qu

Fw Bx 10-50% calc
5% qu
45-85% mx rhy & ptgn
loc massive calc un intervals

N20W 28E

ptgn minor calc
stringers

TK calc un

ptgn minor
calc stringers

Fw Bx ptgn
30% calc
65% an
5% qu

Fw Bx rhy
30-40% calc
10% qu
30-40% rhy

gradational
contact between
hw & fw

raise up
15'

Hw
28'
Hw 10' above pointal

Hw Bx
w/ 20-30% qu
20-5% calc
rest by tr

RH
Tr

PORTLAND MINES, INC. Report of ore shipped to Gold Standard mill, Aug.13 to Aug.25, 1935.

LOT	AUG.	TONS	PORTLAND ASSAY		GOLD STD ASSAY		UMPIRE ASSAY		AVERAGE VALUE IN DOLLARS.
			GOLD	SILVER	GOLD	SILVER	GOLD	SILVER	
24	13	34.35	0.354	0.48	0.353	1.05			13.17
25	14	71.95	0.313	1.00	0.260	0.84	0.305	1.10	12.72
26	15	35.55	0.308	1.09	0.267	0.74	0.280	—	
27	20	70.75	0.464	1.76	0.427	1.50			
28	21	65.60	0.450	1.00	0.387	1.19			
29	22	75.00	0.356	1.57	0.300	1.05			
30	23	67.65	0.237	1.33	0.240	0.96			
31	24	68.15	0.254	1.00	0.226	0.77			
32	25	27.20	0.403	1.42	0.373	1.36			

516.24319

 .35

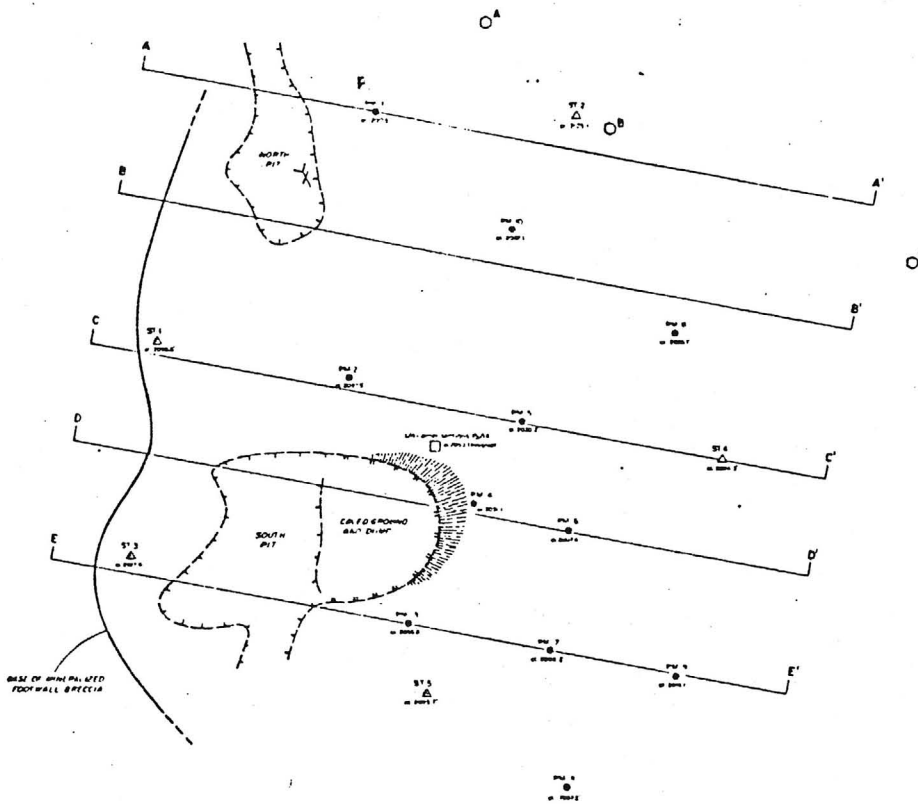
35
 33
 775
 105

 1021

12.72
 516
 736
 1272

 1360
 782.36

 132.3



EXPLANATION

- ASARCO DRILL HOLE - PM SERIES
- △ TRIANGULATION STATION
- PROPOSED DRILL HOLE
- PROPOSED DRILL HOLE (1978 6/27/79)

PORTLAND PROJECT
 DRILLING PROGRESS MAP
 MOHAVE COUNTY, ARIZONA

0 100
 FEET

5/8/79

TO ACCOMPANY Suppl.
 EXPL. AUTH. REQUEST
 DATED 6-7-79
 BY F.T. GRAYBEAL

No. 1

C O R E S

	AU.	AG.
0'	.10	1.28
	.18	1.06
	.03	1.03
	.03	0.90
25'	.03	0.87
	.03	0.95
	.02	0.70
	.05	0.57
	.02	1.36
50'	.03	1.59
	.05	1.60
	.02	1.14
	.03	1.02
	.07	0.71
75'	.12	0.78
	.33	0.79
	.03	0.34
	.09	0.53
	.05	0.21
	.03	0.03
100'	.50	0.75
	.24	1.12
	.02	0.91
	.05	0.80
	.02	0.24
125'	.01	0.00

No. 2

C O R E S

	AU.	AG.
0'	.10	0.83
	.05	2.60
	.05	1.45
	.05	0.83
25'	.02	0.47
	.03	0.30
	.12	0.88
	.05	1.13
	.05	1.11
50'	.01	0.72
	.02	0.30
	.04	0.76
	.05	0.71
	.03	0.77
75'	.23	0.84
	.06	0.50
	.09	0.85

No. 3

C O R E S

	AU.	AG.
0'	.09	0.30
	.11	0.41
	.40	0.71
	.31	0.41
25'	.06	0.10
	.05	0.20
	.07	0.51
	.25	0.30
	.24	0.37
50'	0.10	1.00
	.04	1.20
	.03	2.00
No. 4		
0'	.12	0.00
	.14	0.20
	.10	0.40
	.20	0.10
	.19	0.20
25'	.07	0.10
	.00	.02
	.41	0.10
	.02	1.50
	.20	0.50
50'	.10	0.00
	.23	0.20

PORTLAND MINE ASSAYS

No.	AU.
350	.05
175	.12
170	.25
521	.02
522	.02
523	.01
524	.03
525	.02
1031	.30
1030	.67
1028	.02
1564	.34
1565	.11
1568	.17
1569	.14
1570	.19
1467	.13
1468	.00
1469	.06
1470	.03
1478	.12
1479	.11
1480	.24
1481	.17

NOTICE OF RELOCATION
(Lode)

NOTICE IS HEREBY GIVEN that the PORTLAND No. 3 Lode Mining Claim was relocated by ASARCO Incorporated, whose address is P.O.Box 5747, Tucson, Arizona 85703, on SEPT. 20th, 1978.

This claim is 1,500 feet in length along the vein or deposit of mineral-bearing rock in place and 600 feet in width (300 feet on either side of the center line of the claim), forming a claim in the shape of a parallelogram. The general course of the claim is EAST & WEST. This notice is posted at the NORTHWEST corner of the claim, which location monument is in Section 15, Township 23 N., Range 21 W., G&SRM.

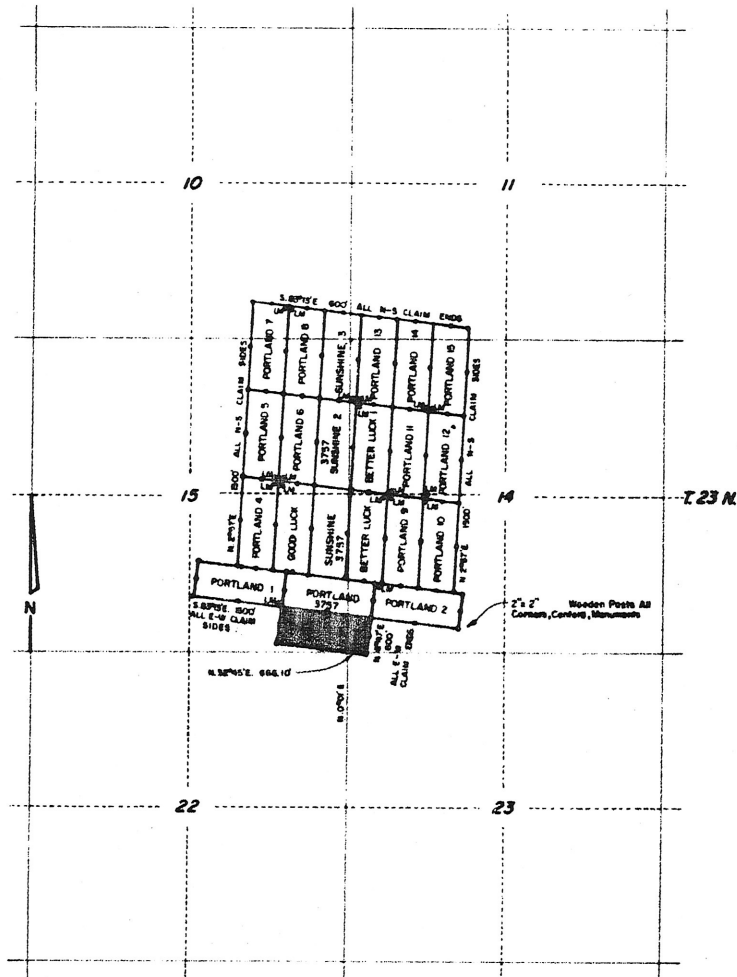
The claim is situated in the Weaver Mining District, the location notice is posted approximately 660' N. & 1100' W. of section corners common to 14-15-22 & 23, and falls within the SE 1/4 of Section(s) 15, Township 23 N., Range 21 W., G&SRM, Mohave County, Arizona.

This is intended as an original location of the PORTLAND No. 3 Lode Mining Claim, covering all of the same ground included in the PORTLAND No. 3 Lode Mining Claim, the Notice of Location of which is recorded in the Official Records, Book 30, Page(s) 68, of Mohave County, Arizona. All of the requirements of law relating to the location of mining claims will be complied with by this location, including the performance of new location work, but by this location, the locator does not intend to and does not waive or abandon any rights it has under and by virtue of the location of the said PORTLAND No. 3 Lode Mining Claim.

ASARCO Incorporated,

R. B. Cunt
Agent

William E. Johnson
Witness



LODE CLAIM	ORIG. LOCATOR	PRES. LOCATOR	ORIG. LOC. DATE	RELOC. / LOC. DATE
Portland 1, 2, 3 Good Luck Better Luck Better Luck 1 Sunshine 3 Portland 4-15	S.L. Clark 3950 Maple Tree Drive Anaheim, Ca. 92807	ASARCO Incorporated Box 5747 Tucson, Az 85703	011	Sept 20, 1978

LODE CLAIMS
IN
MOHAVE COUNTY
ASARCO Incorporated
1150 NORTH 7TH AVENUE
TUCSON, ARIZONA 85703

1" = 2000'

Indexed ~~Micro~~ PROOFED

FEE # 78-29965

Recorded at the Request of

Asmco One

on OCT 10 1978 - 8 00 AM

In Book 496 of T. A. RECORDS,

Page(s) 87-89

Records of Mohave County Arizona

John McCall County Clerk

Mohave County, Arizona



Accepted

34

BOOK 496 PAGE 89

T

A₄

A₅

.122

1.35 Port 36 → next to H-4 ^{→ .198} - 6.2' - goes deeper, more wh. c.c., locally coarse grained - br frags silc. wh. also < 5% ztz

.292

1.8 Port 37 → in decline ^{→ E} of N. pit - c. H-10 ^{→ .26} - 6' wide ^{not located prop. on map.} sample. not to h.w. or f.w. (3' from h.w. - f.w. buried). Att. - N25°E, Dip = 32°E
Sample = 70% c.c. - 20% ztz, 10% host (in part 15-15% ztz-host)

.444

1.4 Port 38 → 5' wide sample - 90% c.c. - 10% Qtz - in dry hole to N. in decline E. of N. Pit Att. - N15°W - 30°E

.005

.05 Port 39 → ^{next to H-9 → .33} 5' wide sample - 70% c.c. - 10% ztz - br frags - wh. locally banded - little hem., from h.w. down - f.w. not exposed
Att. = N15°W, 18°E (very undulating contact w/ h.w.)

.021

.10 Port 40 → 3.5' high - FACE drift - clay c.c. alt. wallrock. massive wh-bri. cc. in pods/splts slick - N75°E - 52°SE - normal here but is highly altered intrusive (?)
Major fault 15' from face: N40°E, 65°SE ^{-50°} - here porphy^{tic} dike (latite) 2-2½' wide - gouge (hem. stain) on hwt f.w. maj. structure - intrusive in f.w., in h.w. banded intr. wh. vein bx. General fault contact w/ vein / intrusive.
If fault is normal, vein is @ surface to W. or eroded.

.052

.75 Port 41 - decline from N. Pit - 5.7' high - vein goes another 2' higher - bottom not seen - Massive pink-wh-gtz-c.c. Top ½ is > 75% ztz - bottom mostly cc.

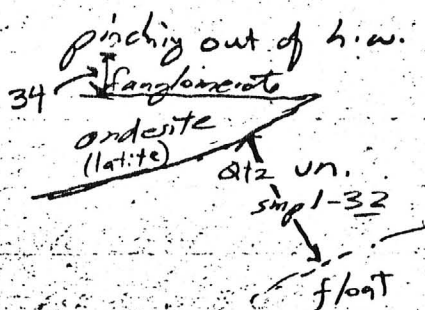
(FRI- Oct. 31) PORTLAND - Pete & I

Alu Ag

.009 1.05 Port 30 → 1.5' deepy fred- clay alt. andentis - s. 1mm
strogen white cc. on h.w. of vein - $N12^{\circ}W - 21^{\circ}E$

.032 .2 Port → 31 → 5.0' thick - mixed lim. + clay + Qtz, locally
ing c.c. - soft w/ clay to hard → ≈ 70% Qtz
 $N18^{\circ}W; 18^{\circ}N.E.$

.142 .8 Port. 32 → S. end of N. Pit 10' from top wall - un. #.
= ≈ N-S; $34^{\circ}E$ dip (note - just below latite H.W. near



Smp = 6.7' thick = 90+90

Qtz = 59% host + poss. 52acc.

some hem stain - does not go to f.w. (15-20# smp)

.196 2.8 Port 33 → 3.1' net. chip - 70-80% gran Qtz - white to pink clay,
smp doesn't go to f.w. AH. $N27^{\circ}W, 27^{\circ}NE$

.144 .80 Port- 34 → S. end of N. Pit - seeable - scotch - into overlying fangl.
for $3\frac{1}{2}'$ thick (true x- sect.) - very representative due
to soft nature of unit - ≈ 30-40% Qtz - rest is clay +
caliche matrix. AH of fangl ^{see} $N10^{\circ}W - 10^{\circ}E$ (rough
cont of latite general dip).

.020 .6 Port 35 - S end of N. Pit - 20' below 32 - here 90% Qtz - silica matrix, +
host - smp = 4' wide (overlain by $\frac{1}{2}'$ thick latite which is

1435 S. 10th AVE.

P. O. BOX 1889

DUPLICATE

Jacobs Assay Office

Registered Assayers



PHONE 622-0813

Certificate No. *60390*

TUCSON, ARIZONA 85702 *11.20* 19*80*

Sample Submitted by Mr. *Fisher Watt*

SAMPLE MARKED	Gold 125. per ten ORE		X	Silver 125. per ten ORE		SAMPLE MARKED	Gold 125. per ten ORE		X	Silver 125. per ten ORE	
<i>Part 1</i>	<i>1</i>	<i>282</i>		<i>2</i>	<i>85</i>	<i>Part 15</i>	<i>1</i>	<i>134</i>		<i>6</i>	<i>90</i>
<i>2</i>	<i>1</i>	<i>111</i>		<i>1</i>	<i>75</i>	<i>10</i>	<i>TRAC</i>			<i>50</i>	<i>15</i>
<i>3</i>	<i>1</i>	<i>102</i>		<i>1</i>	<i>15</i>						
<i>4</i>	<i>1</i>	<i>154</i>		<i>1</i>	<i>70</i>						
<i>5</i>	<i>1</i>	<i>114</i>		<i>1</i>	<i>115</i>						
<i>6</i>	<i>1</i>	<i>146</i>		<i>1</i>	<i>70</i>						
<i>7</i>	<i>1</i>	<i>116</i>		<i>1</i>	<i>75</i>						
<i>8</i>	<i>1</i>	<i>155</i>		<i>1</i>	<i>35</i>						
<i>9</i>	<i>1</i>	<i>139</i>		<i>1</i>	<i>55</i>						
<i>10</i>	<i>1</i>	<i>135</i>		<i>1</i>	<i>60</i>						
<i>11</i>	<i>1</i>	<i>134</i>		<i>1</i>	<i>30</i>						
<i>12</i>	<i>1</i>	<i>113</i>		<i>1</i>	<i>75</i>						
<i>13</i>	<i>1</i>	<i>131</i>		<i>1</i>	<i>70</i>						
<i>14</i>	<i>1</i>	<i>124</i>		<i>1</i>	<i>40</i>						

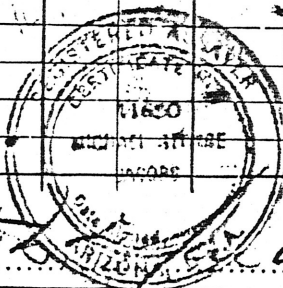
* Gold Figured \$35.00 per oz. Troy

Charges \$ *103.00*

< face value

Very respectfully,

[Signature]



1435 SOUTH 10TH AVENUE
TUCSON, ARIZONA 85713

Jacobs Assay Office

Registered Assayers

Since 1880



PHONE 622-0813

Certificate No. 60650

TUCSON, ARIZONA 85703 Nov. 4, 1980

Sample Submitted by Mr FISHER-WATT

SAMPLE MARKED	GOLD Ozs. per ton ore	GOLD Value per ton ore	SILVER Ozs. per ton ore	COPPER Per cent Wet Assay	LEAD Per cent Wet Assay	PERCENT Per cent Wet Assay	PERCENT Per cent Wet Assay
<u>PORT-17</u>	<u>0.258</u>		<u>1.00</u>				
<u>18</u>	<u>0.146</u>		<u>0.30</u>				
<u>19</u>	<u>0.230</u>		<u>0.55</u>				
<u>20</u>	<u>0.105</u>		<u>0.50</u>				
<u>21</u>	<u>0.206</u>		<u>1.10</u>				
<u>22</u>	<u>0.098</u>		<u>0.55</u>				
<u>23</u>	<u>0.071</u>		<u>0.40</u>				
<u>24</u>	<u>0.158</u>		<u>0.50</u>				
<u>25</u>	<u>0.174</u>		<u>0.25</u>				
<u>26</u>	<u>0.085</u>		<u>0.20</u>				
<u>27</u>	<u>0.494</u>		<u>0.35</u>				
<u>28</u>	<u>0.081</u>		<u>0.55</u>				
			<u>11</u>				

* Gold Figured \$300.00 per oz. Troy

Charges \$ 78.⁰⁰

Very respectfully,

[Signature]

1435 S. 10th AVE.

Jacobs Assay Office

Registered Assayers



PHONE 622-0813

Certificate No. 60704

TUCSON, ARIZONA 85713 Nov. 10 1980

Sample Submitted By Mr. FISHER-WATT

SAMPLE MARKED	GOLD		SILVER		LEAD	COPPER		
	Ozs. per ton ore	Value per ton ore *	Ozs. per ton ore	Percent Wet Assay	Percent Wet Assay	Percent Wet Assay	Percent Wet Assay	
PORT -30	0.009	\$	< 0.05					
-31	0.032		0.20					
32	0.142		0.80					
33	0.196		2.80					
34	0.144		0.80					
35	0.020		0.60					
36	0.122		1.35					
37	0.292		1.80					
38	0.444		1.40					
39	0.005		0.05					
40	0.021		0.10					
41	0.052		0.75					
42	0.167		0.85					
43	0.064		0.20					
44	0.117		0.60					
45	0.419		2.00					
46	0.027		0.50					
47	0.050		2.65					
48	0.198		1.20					
49	0.032		0.65					
50	0.015		0.30					
51	0.021		0.40					
52	0.043		0.70					
53	0.011		0.15					
Little or body < 54	0.317		1.40					
S.F.T. 55	0.035		0.20					
56	0.052		0.65					
57	0.055		0.70					
58	0.041		0.25					
59	0.007		0.80					
62	0.577		2.95					

< LESS THAN

*Gold figured \$100.00 per oz. assay

Very respectfully,

Charges 201.50

[Handwritten signature]

DEPARTMENT OF MINERAL RESOURCES
STATE OF ARIZONA
FIELD ENGINEERS REPORT

Mine PORTLAND
District Minnesota-Weaver, Mohave Co.
Subject: Gold Mine Survey

Date March 3, 1944
Engineer Elgin B. Holt

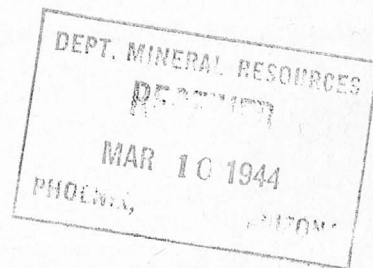
R E P O R T

OWNER: J. A. Potter, Kingman, Arizona.
AGENT: E. A. McVicar, Kingman, Arizona.
METALS: Gold with small amount of silver.

AREA: LOCATION: This property, consisting of 3 patented and 5 unpatented claims, is situated in Mohave County, Arizona, 50 miles northwest of Kingman and six miles east of the Colorado River. From Kingman, the property is reached by following U. S. Highway 93 north 28 miles to Pleasant Valley Junction; thence west along the Searchlight road for 10 miles; thence southwesterly about 12 miles to the mine.

HISTORICAL:

Property was discovered about 1920. From 1935 to 1940 it was worked under a lease and option arrangement by the Gold Standard Mines Corporation. During this period approximately 132,000 tons of ore were milled averaging \$7.22 gold per ton, according to settlement sheets now on file in McVicar's office in Kingman. The said ore was treated in the Katherine cyanidation plant located 11 miles southeasterly from property, or about 16 miles over a very poor sandy road, over which the ore was hauled by trucks. The property was abandoned during 1940 by Gold Standard due mainly to the fact about that time this company secured control and started operating the Tyro mine, a much larger property and located only 7 miles from the Katherine mill.



GEOLOGY:

Per F. C. Schrader, 1909, "The country rock", of that general area, "consists of the Tertiary volcanic rocks, with rhyolite and green chlorite andesite most abundant."

ORE RESERVES:

During April, 1937, after the Gold Standard company had started work on the Portland mine, Mr. Clyde M. Becker, a very able geologist, reported on that property as follows:

"I estimated that approximately 700 feet of development work on these three ore bodies had proven 287,000 tons of ore of an average value of \$6.64 (gold) per ton."

Referring to the cross-vein on the Portland claim, Becker stated: "On the little ore body an inclined shaft had been sunk 100 feet with ore of grade similar in type and values to the south tunnel ore body. A series of assays taken at 95 feet ran 0.18 to 0.44 ounces gold. All carry silver in the approximate ration of 5 to 1 by weight. No other mineral (metallics) is present."

MAIN VEIN:

The main vein, which strikes north to south, is a wide flat vein dipping about 35 degrees easterly. The deepest work on mine is about 100 feet vertically, reaching the permanent water level. The main vein mentioned is exposed on surface for around 1200 feet; but it is believed to extend 500 feet further to the south through a basin where the vein is covered by debris. This vein is wide, averaging 12 feet in thickness, but "bellies" out in places to 20 feet or more in ^{width} ~~thickness~~. The vein gangue is composed of quartz and calcite, with no deleterious metals present. Hence the ore is ideal for treatment by cyanidation, by which process around 97% of gold values should be recovered.

MINE WORKINGS:

The main workings of property consist of the following openings:

1. A 100-foot shaft sunk on the cross-vein, exposing the "Little Ore Body" mentioned by Becker. 2. The South Tunnel which develops the "South Tunnel Ore Body"; and 3. The North Tunnel, which develops the "North Tunnel Ore Body". Also at the bottom of the 100-foot shaft on the cross-vein a drift 100 feet in length has been run on vein, which is from 4 to 6 feet wide of good milling ore. It will be noted that this ore, per Becker, assays from 0.18 to 0.44 ounces gold per ton.

The South Tunnel is about 200 feet in length connecting with the "Big Stope" at back end, which is now partly caved; but ore faces in stope are accessible for sampling.

The North Tunnel starts as an open cut about 100 feet in length on the main vein, and continues south as a tunnel partly on vein and partly in the foot wall to a point where it connects with the "Big Stope" workings. Also there is a shaft 100 feet deep on vein near the mouth of the open cut at north end of property; also a 100-foot drift running south on vein from the bottom of the said 100-foot shaft and connects with a raise to the open cut above. All of these workings are open and accessible for sampling.

MINE SAMPLED BY OTHER ENGINEERS:

After the Portland mine was abandoned by Gold Standard, it was sampled by engineers representing the Continental Mining Company of New York and also by Mette and Hamron of Los Angeles. The average results of both of these samplings gave better than \$7.00 gold per ton, according to records in McVicar's office, and which can be examined at any convenient time.

WATER:

Ample water for milling and domestic purposes could be secured from the Colorado River, six miles from property, by means of an application for a water right from the Arizona Water Commission.

MILLING PLANT:

Further work should be done on the Portland Mine in order to determine its ore reserves, average value of ore, and the capacity of a treatment plant that should be installed at a later time. As additional ore could be secured in quantity for such a plant from four or five other gold mines within a radius of 10 miles of Portland, it is believed that an operation could finally be developed that would result in supplying a mill of large capacity, say from 300 to 500 tons daily, with gold ore of goodly grade over a long period of years.

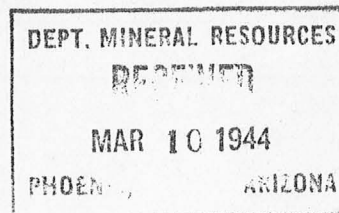
Elgin B. Holt

Elgin B. Holt,
Field Engineer.

March 9, 1944

MEMORANDUM

To: J. S. Coupal
From: Elgin B. Holt
Subject: Portland Gold Mine *23N, 21W*



Suggest you call Broadgate's attention to this mine

Some time ago, you and Charlie stated that Bill Broadgate had a client who was in the market for a gold mine that would supply a 400-ton mill. Later on I spoke to yourselves about the Portland gold mine, located 50 miles northwest of Kingman.

Without mincing words, the Portland is by far the best gold mine I have ever examined in Arizona, excepting Goldroad, and it can be secured on reasonable terms.

E. A. McVicar, of Kingman, represents the owners of this property and any deal should be negotiated through him. He is a reliable business man of this community and can be depended upon in every way.

I am herewith inclosing my report on Portland, mainly compiled from authentic records in McVicar's office, but partly from my own investigations, as I have inspected it a number of times. You will note that Portland was examined during 1937 by Clyde M. Becker, a geologist of high standing, now deceased. He estimated that the mine then contained 287,000 tons of ore averaging \$6.64 gold per ton.

It seems that Becker was very modest in this estimate, as Gold Standard actually mined and milled 132,000 tons averaging \$7.22 gold per ton, according to this company's own assays, used as a basis for figuring royalties to owners. It is a well-known fact that Gold Standard used an adequate safety factor in reporting assays. So I would say off-hand this 132,000 tons in all probabilities contained about \$8.00 gold per ton, not counting

the silver content, which seems to run around one ounce per ton in Portland ores. By cyanidation, a goodly portion of the silver values would be recovered along with the gold. Possibly the recoverable silver should at least equal 50 cents per ton, an item not to be sneezed at.

You will also note that this mine, after its abandonment by Gold Standard, was thoroughly sampled by the Continental Mining Company of New York and also by Mette & Hamron of Los Angeles; results of both samplings averaging around \$7.00 gold per ton.

The main Portland vein is wide, from 12 to 20 feet in thickness and crops for 1200 feet. I would say at least half of the ore mined by Gold Standard was quarried from the outcroppings of this huge vein. The managers of this company were chloriders, and not miners. They gutted the surface croppings of a half-score of mines surrounding the Katherine mill. They were not interested in the development of any mine in this or any other area.

Roughly I would estimate that if the Portland vein could be developed by sinking an inclined working shaft on vein and then blocked out by drifts on vein at 100-foot intervals, that each ^{100-foot} block below the present workings would yield at least 100,000 tons of ore, estimated to run around \$7.00 gold per ton, with a little silver. Furthermore, deducting the 132,000 tons mined by Gold Standard from the 287,000 tons originally reported by Becker, the Portland now has indicated about 155,000 tons, averaging about \$7.00 gold per ton, although this ore is not blocked out by any means, and should be considered as probable ore only. In the bottom of the "Big Stope" the vein is still at least 12 feet wide, with values holding to around \$7.00 gold per ton.

LAND	2612	160	418		
BLDG ETC	715	160	5234		
PERSONAL PROPERTY	0	00	0		
TOTALS	3327		5652		
TAX CODE	1979	1980	DIFFERENCE	PRIMARY TAX	
00986	2402	7034	4632	51698	
02000	13002	15126	2124	ADDITIONAL STATE AID	
05011	18616	13966	-4650	00	
06100	15813	14147	-1666	5% TAX REDUCTION	
08150	4905	5111	206	00	
				SECONDARY TAX	
				3686	
				SPECIAL DISTRICTS	
				00	
				TOTAL TAX DUE	
	54738	55384	646	55384	

CLARK SAMUEL & LA VONNE & POTTER JAMES A
% MOND G POTTER
% THE BIRD CAGE
6750 HAWAII KAI DR NO 1005
HONOLULU HI 91106
SEC 15 23 21 PAT CLAIMS; SUNSHINE; SUNSHINE #2 40.00AC N/L

TAX ROLL NO	CD	BOOK	MAP	PARCEL
101974	D8	307	43	001 9
AREA CODE	PRIMARY COMB RT	SECONDARY COMB RT		
1500	9.3331	.9622		

PRIMARY	LIMITED VALUE	ASMT%	ASSESSED VALUE	EXEMPTION	1ST HALF PAID	2ND HALF PAID	
LAND BLDGS ETC	800	160	128	0			
PERSONAL PROPERTY	0	00	0	0			
TOTALS	800		128		660	660	
SECONDARY	FULL CASH VALUE	ASMT%	ASSESSED VALUE	EXEMPTION	PENALTY	1ST HALF	2ND HALF
LAND	800	160	128	0			
BLDG ETC	0	00	0	0			
PERSONAL PROPERTY	0	00	0	0			
TOTALS	800		128				

TAX CODE	1979	1980	DIFFERENCE	PRIMARY TAX
00986	60	161	101	1196
02000	325	345	20	ADDITIONAL STATE AID
05011	493	376	-117	00
06100	395	322	-73	5% TAX REDUCTION
08150	123	116	-07	00
				SECONDARY TAX
				124
				SPECIAL DISTRICTS
				00
				TOTAL TAX DUE
	1396	1320	-76	1320

TRANSAMERICA TITLE INS CO
% INT & INV CO
PO BOX 500
PHOENIX AZ 85001

GATEWAY ACRES TR #6 LOT 55 SEC 1 24N 20E

TAX ROLL NO	CD	BOOK	MAP	PARCEL
101974	D8	307	43	001 9
AREA CODE	PRIMARY COMB RT	SECONDARY COMB RT		
1500	9.3331	.9622		

PRIMARY	LIMITED VALUE	ASMT%	ASSESSED VALUE	EXEMPTION	1ST HALF PAID	2ND HALF PAID	
LAND BLDGS ETC	500	160	80	0			
PERSONAL PROPERTY	0	00	0	0			
TOTALS	500		80				
SECONDARY	FULL CASH VALUE	ASMT%	ASSESSED VALUE	EXEMPTION	PENALTY	1ST HALF	2ND HALF
LAND	500	160	80	0			
BLDG ETC	0	00	0	0			
PERSONAL PROPERTY	0	00	0	0			
TOTALS	500		80				

TAX CODE	1979	1980	DIFFERENCE	PRIMARY TAX
00986	37	101	64	
02000	203	215	12	ADDITIONAL STATE AID
05011	290	198	-92	00
06100	240	201	-39	5% TAX REDUCTION
08150	76	73	-03	00
				SECONDARY TAX
				SPECIAL DISTRICTS
				TOTAL TAX DUE
	852	788	-64	

LAND	413	160	413		
BLDG ETC	0	00	0		
PERSONAL PROPERTY	0	00	0		
TOTALS	413		413		

CLARK SAMUEL & LA VONNE & POTTER JAMES A
% MOND G POTTER
% THE BIRD CAGE
6750 HAWAII KAI DR NO 1005
HONOLULU HI 91106
SEC 15 23 21 PAT CLAIMS; PORTLAND 20.00AC N/L UNDIV INT

TAX ROLL NO	CD	BOOK	MAP	PARCEL
101975	D8	307	43	002 2
AREA CODE	PRIMARY COMB RT	SECONDARY COMB RT		
1500	9.3331	.9622		

PRIMARY	LIMITED VALUE	ASMT%	ASSESSED VALUE	EXEMPTION	1ST HALF PAID	2ND HALF PAID	
LAND BLDGS ETC	400	160	64	0			
PERSONAL PROPERTY	0	00	0	0			
TOTALS	400		64		329	329	
SECONDARY	FULL CASH VALUE	ASMT%	ASSESSED VALUE	EXEMPTION	PENALTY	1ST HALF	2ND HALF
LAND	400	160	64	0			
BLDG ETC	0	00	0	0			
PERSONAL PROPERTY	0	00	0	0			
TOTALS	400		64				

TAX CODE	1979	1980	DIFFERENCE	PRIMARY TAX
00986	30	80	50	596
02000	165	172	07	ADDITIONAL STATE AID
05011	248	188	-60	00
06100	199	160	-39	5% TAX REDUCTION
08150	62	58	-04	00
				SECONDARY TAX
				62
				SPECIAL DISTRICTS
				00
				TOTAL TAX DUE
	704	658	-46	658

SUGGS FAMILY TRUST
SUGGS ELLIS & DOROTHY TRUSTEES
5820 E ORANGE BLOSSOM LANE
PHOENIX AZ 85018

GATEWAY ACRES TR #6 LOT 56 SEC 1 24N 20E

TAX ROLL NO	CD	BOOK	MAP	PARCEL
101976	D8	307	45	001 5
AREA CODE	PRIMARY COMB RT	SECONDARY COMB RT		
1100	9.1888	.6519		

PRIMARY	LIMITED VALUE	ASMT%	ASSESSED VALUE	EXEMPTION	1ST HALF PAID	2ND HALF PAID	
LAND BLDGS ETC	100	160	16	0			
PERSONAL PROPERTY	0	00	0	0			
TOTALS	100		16				
SECONDARY	FULL CASH VALUE	ASMT%	ASSESSED VALUE	EXEMPTION	PENALTY	1ST HALF	2ND HALF
LAND	100	160	16	0			
BLDG ETC	0	00	0	0			
PERSONAL PROPERTY	0	00	0	0			
TOTALS	100		16				

TAX CODE	1979	1980	DIFFERENCE	PRIMARY TAX
00986	08	20	12	
02000	43	44	01	ADDITIONAL STATE AID
05011	60	40	-20	00
06100	51	41	-10	5% TAX REDUCTION
08150	16	15	-01	00
				SECONDARY TAX
				SPECIAL DISTRICTS
				TOTAL TAX DUE
	178	160	-18	

LAND	413	160	413		
BLDG ETC	0	00	0		
PERSONAL PROPERTY	0	00	0		
TOTALS	413		413		

MAC EWEN WALTER THOMPSON HELEN
% JOHN B MARRON ATTY
MAYER CTRL BLDG #504
PHOENIX AZ 85012

TAX ROLL NO	CD	BOOK	MAP	PARCEL
101976	D8	307	45	001 5
AREA CODE	PRIMARY COMB RT	SECONDARY COMB RT		
1100	9.1888	.6519		

PRIMARY	LIMITED VALUE	ASMT%	ASSESSED VALUE	EXEMPTION	1ST HALF PAID	2ND HALF PAID	
LAND BLDGS ETC	533	160	85	0			
PERSONAL PROPERTY	0	00	0	0			
TOTALS	533		85		421	421	
SECONDARY	FULL CASH VALUE	ASMT%	ASSESSED VALUE	EXEMPTION	PENALTY	1ST HALF	2ND HALF
LAND	582	160	93	0			
BLDG ETC	0	00	0	0			
PERSONAL PROPERTY	0	00	0	0			
TOTALS	582		93				

TAX CODE	1979	1980	DIFFERENCE	PRIMARY TAX
00986	36	106	70	780
02000	198	230	32	ADDITIONAL STATE AID
05011	283	212	-71	00
06100	240	217	-23	5% TAX REDUCTION
08150	75	77	02	00
				SECONDARY TAX
				62
				SPECIAL DISTRICTS
				00
				TOTAL TAX DUE

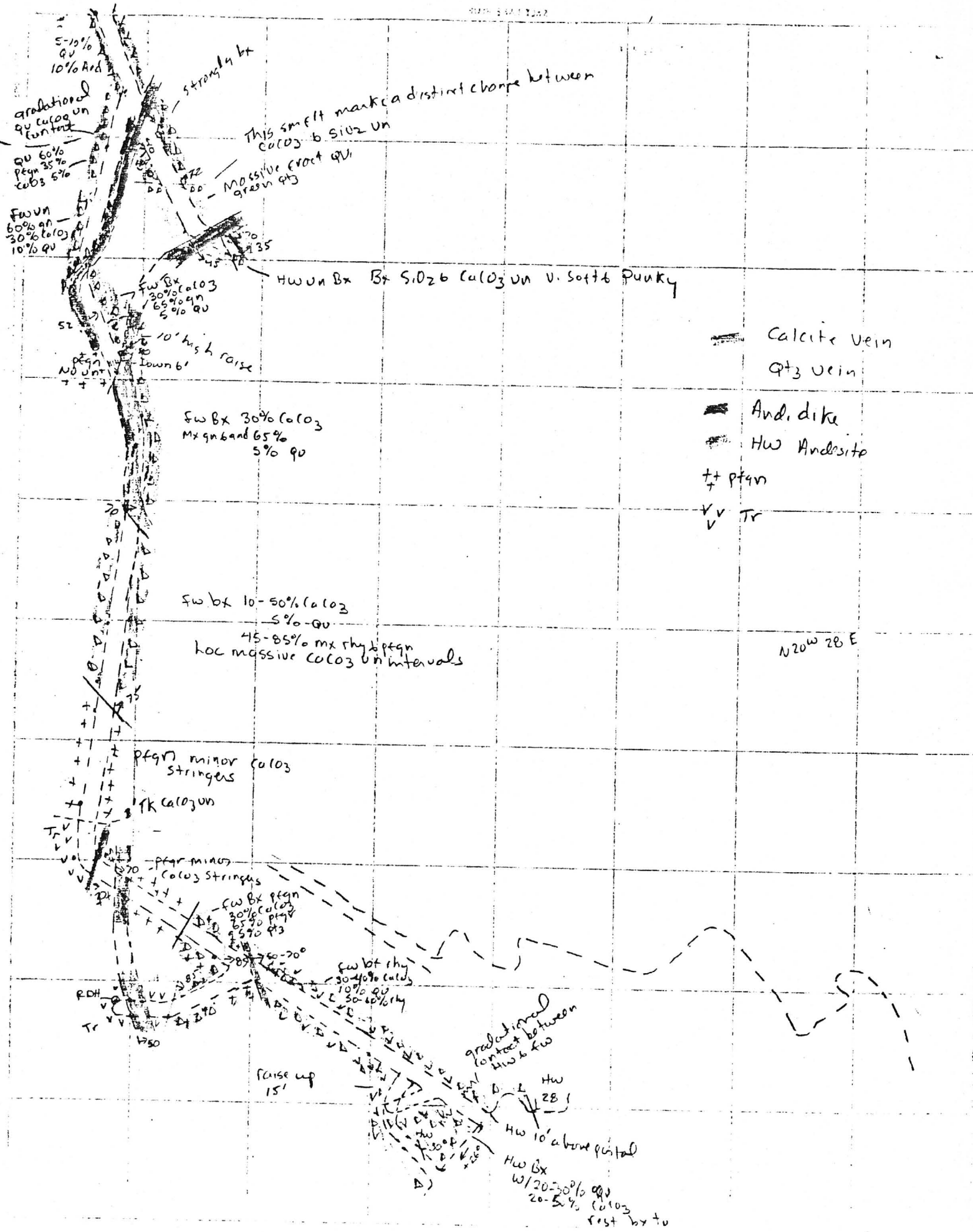
SUGGS FAMILY TRUST
SUGGS ELLIS & DOROTHY TRUSTEES
5820 E ORANGE BLOSSOM LANE
PHOENIX AZ 85018

GATEWAY ACRES TR #6 LOT 57 SEC 1 24N 20E

TAX ROLL NO	CD	BOOK	MAP	PARCEL
101976	D8	307	45	001 5
AREA CODE	PRIMARY COMB RT	SECONDARY COMB RT		
1100	9.1888	.6519		

PRIMARY	LIMITED VALUE	ASMT%	ASSESSED VALUE	EXEMPTION	1ST HALF PAID	2ND HALF PAID	
LAND BLDGS ETC	100	160	16	0			
PERSONAL PROPERTY	0	00	0	0			
TOTALS	100		16				
SECONDARY	FULL CASH VALUE	ASMT%	ASSESSED VALUE	EXEMPTION	PENALTY	1ST HALF	2ND HALF
LAND	100	160	16	0			
BLDG ETC	0	00	0	0			
PERSONAL PROPERTY	0	00	0	0			
TOTALS	100		16				

TAX CODE	1979	1980	DIFFERENCE	PRIMARY TAX
00986	08	20	12	
02000	43	44	01	ADDITIONAL STATE AID
05011	60	40	-20	00
06100	51	41	-10	5% TAX REDUCTION
08150	16	15	-01	00
				SECONDARY TAX
				SPECIAL DISTRICTS
				TOTAL TAX DUE



- Calcite Vein
- Qtz Vein
- And. dike
- HW Andesite
- ++ pgn
- V V Tr

N20W 28 E

PORTLAND MINES, INC. Report of ore shipped to Gold Standard mill, Aug.13 to Aug.25, 1935.

LOT	AUG.	TONS	PORTLAND ASSAY		GOLD STD ASSAY		UMPIRE ASSAY		AVERAGE VALUE IN DOLLARS.
			GOLD	SILVER	GOLD	SILVER	GOLD	SILVER	
24	13	34.35	0.354	0.48	0.353	1.05			13.17
25	14	71.95	0.313	1.00	0.260	0.84	0.305	1.10	12.72
26	15	35.55	0.308	1.09	0.267	0.74	0.280	—	
27	20	70.75	0.464	1.76	0.427	1.50			
28	21	65.60	0.450	1.00	0.387	1.19			
29	22	75.00	0.356	1.57	0.300	1.05			
30	23	67.65	0.237	1.33	0.240	0.96			
31	24	68.15	0.254	1.00	0.226	0.77			
32	25	27.20	0.403	1.42	0.373	1.36			

516.24319

 .35

35
 33
 775
 103

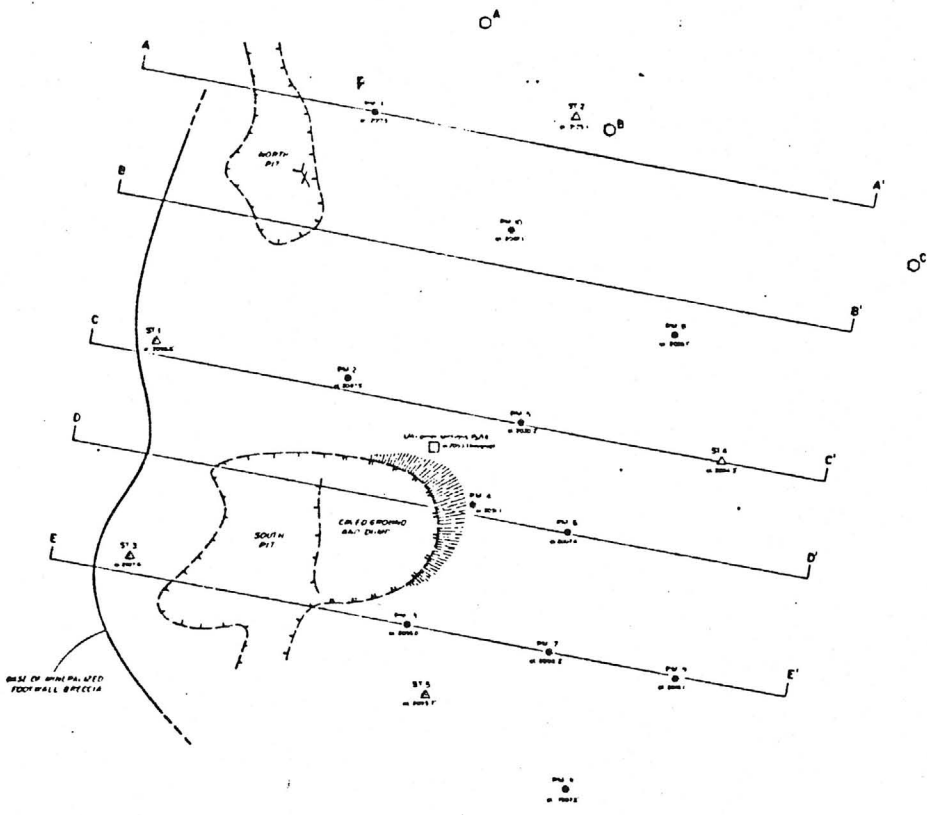
 1321

127.2
 516

 1363.2
 127.2

 1360
 162.3.6

 132.5



- EXPLANATION
- ASARCO DRILL HOLE - PU SERIES
 - △ TRANSLOCATION STATION
 - PROPOSED DRILL HOLE
 - PROPOSED DRILL HOLE (FTG 6/7/79)



PORTLAND PROJECT
 DRILLING PROGRESS MAP
 MOHAVE COUNTY, ARIZONA

0 500 1000
 1:50,000

TO ACCOMPANY Suppl.
 EXP. AUTH. REQUEST
 DATED 6-7-79
 BY F.T. GRAYBEAL

No. 1

C O R E S

	AU.	AG.
0'	.10	1.28
	.18	1.06
	.03	1.03
	.03	0.90
25'	.03	0.87
	.03	0.95
	.02	0.70
	.05	0.57
	.02	1.36
50'	.03	1.59
	.05	1.60
	.02	1.14
	.03	1.02
	.07	0.71
75'	.12	0.78
	.33	0.79
	.03	0.34
	.09	0.53
	.05	0.21
100'	.03	0.63
	.30	0.75
	.24	1.12
	.00	0.91
	.05	0.80
	.02	0.24
155'	.01	0.00

No. 2

C O R E S

	AU.	AG.
0'	.10	0.83
	.05	2.60
	.05	1.45
	.05	0.93
25'	.02	0.47
	.03	0.30
	.12	0.88
	.05	1.12
	.05	1.11
50'	.01	0.72
	.02	0.30
	.04	0.76
	.03	0.71
	.03	0.77
75'	.23	0.84
	.06	0.50
	.09	0.85

No. 3

C O R E S

	AU.	AG.
0'	.09	0.30
	.11	0.41
	.40	0.71
	.31	0.47
25'	.06	0.10
	.05	0.20
	.07	0.50
	.25	0.30
	.24	0.37
50'	0.10	1.00
	.04	1.20
	.03	2.00
No. 4		
0'	.12	0.20
	.14	0.20
	.10	0.40
	.20	0.10
25'	.19	0.30
	.07	0.10
	.00	.80
	.41	0.10
	.07	0.50
50'	.20	0.30
	.10	0.10
	.03	0.10

PORTLAND CEMENT ASSAYS

No.	AU.
350	.05
175	.12
170	.25
521	.02
522	.02
523	.01
524	.03
525	.02
1031	.30
1030	.67
1028	.02
1564	.34
1565	.11
1568	.17
1569	.14
1570	.19
1467	.13
1468	.00
1469	.06
1470	.03
1478	.12
1479	.11
1480	.24
1481	.17

NOTICE OF RELOCATION
(Lode)

NOTICE IS HEREBY GIVEN that the PORTLAND No. 3 Lode Mining Claim was relocated by ASARCO Incorporated, whose address is P.O.Box 5747, Tucson, Arizona 85703, on SEPT. 20th, 1978.

This claim is 1,500 feet in length along the vein or deposit of mineral-bearing rock in place and 600 feet in width (300 feet on either side of the center line of the claim), forming a claim in the shape of a parallelogram. The general course of the claim is EAST & WEST. This notice is posted at the NORTHWEST corner of the claim, which location monument is in Section 15, Township 23 N., Range 21 W., G&SRM.

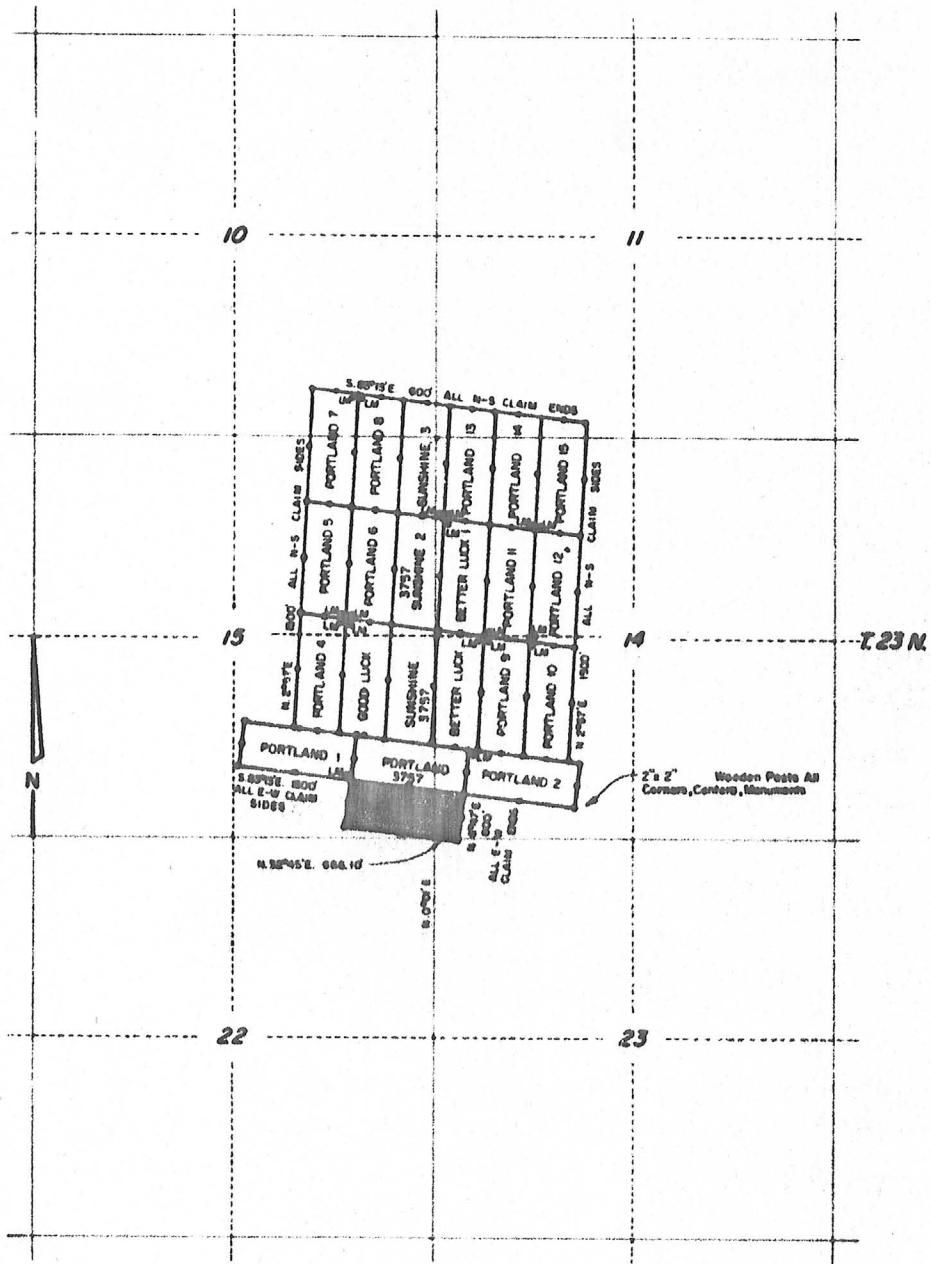
The claim is situated in the Weaver Mining District, the location notice is posted approximately 660' N. & 1100' W. of section corners common to 14-15-22 & 23, and falls within the SE 1/4 of Section(s) 15, Township 23N, Range 21W, G&SRM, Mohave County, Arizona.

This is intended as an original location of the PORTLAND No. 3 Lode Mining Claim, covering all of the same ground included in the PORTLAND No. 3 Lode Mining Claim, the Notice of Location of which is recorded in the Official Records, Book 3U, Page(s) 68, of Mohave County, Arizona. All of the requirements of law relating to the location of mining claims will be complied with by this location, including the performance of new location work, but by this location, the locator does not intend to and does not waive or abandon any rights it has under and by virtue of the location of the said PORTLAND No. 3 Lode Mining Claim.

ASARCO Incorporated,

R. B. Cunt
Agent

William E. Johnson
Witness



R.21W

LODE CLAIM	ORIG. LOCATOR	PRES. LOCATOR	ORIG. LOC DATE	RELOC / LOC DATE
------------	---------------	---------------	----------------	------------------

Portland 1, 2, 3
 Good Luck
 Better Luck
 Better Luck 1
 Sunshine 3
 Portland 4-15

S.L. Clark
 3955 Maple Tree Drive
 Anaheim, Ca. 92807

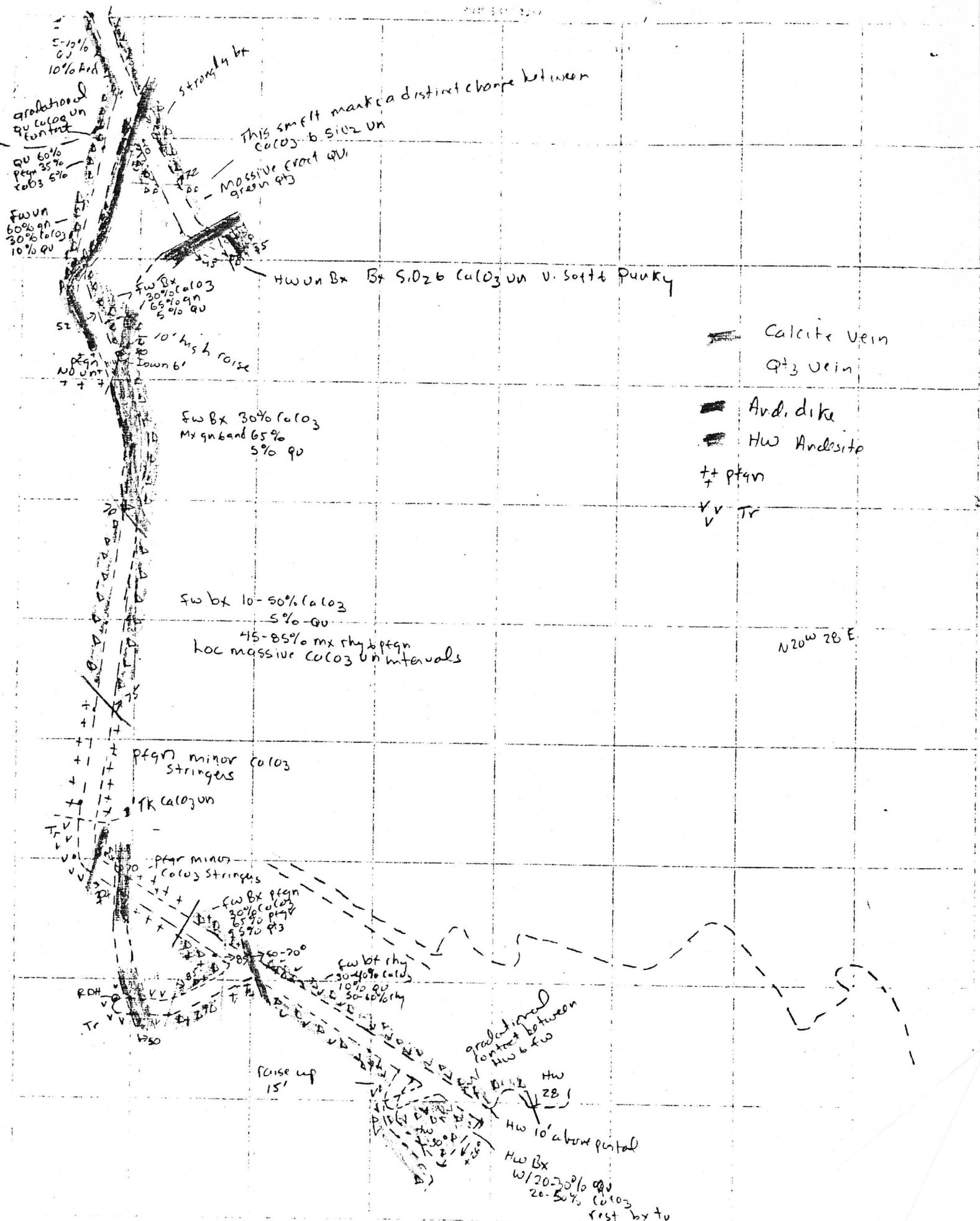
ASARCO Incorporated
 Box 5747
 Tucson, Az 85703

ASARCO Incorporated
 Box 5747
 Tucson, Az 85703

all Sept. 20, 1978

LODE CLAIMS
 IN
 MOHAVE COUNTY
ASARCO Incorporated
 1150 NORTH 7TH AVENUE
 TUCSON, ARIZONA 85703

1" = 2000'



5-15%
GJ
10% bed

gradational
qu caloz un
contact

Fw un
60% qn
30% caloz
10% qu

strongly bt

This smft marks a distinct change between
caloz b. SiO2 un

massive fract qn
green qtz

Hw un Bx Bx SiO2 b caloz un v. soft & punky

Fw Bx
30% caloz
65% qn
5% qu

Calcite vein
Qtz vein

And. dike
Hw Andesite

+ ptqn

v Tr

Fw Bx 30% caloz
Mx qn band 65%
5% qu

Fw Bx 10-50% caloz
5% qu
45-85% mx rhy b ptqn
loc massive caloz un intervals

N20W 28 E

ptqn minor
stringers

TK caloz un

ptqn minor
caloz stringers

Fw Bx ptqn
30% caloz
65% qn
5% qu

Fw Bx rhy
30-40% caloz
10% qu
50-60% rhy

gradational
contact between
Hw & Fw

Rise up
15'

Hw
28'
Hw 10' above pentad

Hw Bx
w/ 20-30% qn
20-50% caloz
rest by tu

Qty	Unit	Pa	201	Gross Value / Ton	Net Value / Ton	Forest	Shipping	Total	FL	S	Cost	Price
242	612	9859	5566	20.21	16.36	298.52	594.03	465.4	15.14	18.3	17	
235	287	9797	7353	17.80	14.56	300.92	573.94	52.8	27	4.2	18	
159	335	4431	7911	15.34	12.09	300.37	395.77	53.0	14.7	1.1	5	2119.51 ✓
232	598	6258	6417	18.99	2.24	386.65	386.65	62.0	14.4	12.5	15	1342.12 ✓
223	543	9900	6826	18.23	9.98	300.92	187.35	51.0	14.4	13.0	13	
699.26	1107	15617	6352	22.90.60		297.67	1352.53					1071.22 ✓
242.83	58	7133	7037	15.95.3		270.14	642.17					501.94 ✓
196.02	409	4319	5294	14.73	11.48	394.31	288.09	57.7	13.5	15.1	9	809.95 ✓
2320	4276	41015	52642				1487.92					6423
							4152.00					
	186.00											
	5886.02											
	224.21											
	531.79											

Qty	Unit	Pa	201	205	5102	10	Cost	S	Cost	26	Cost	Net Value
98.7	481	3702	3794	544	91.0	13.2	2.1	16.2	7.1	1.77	15.0	1749 228.00
213.2	6191	5207	5544	166	41.0	10.7	1	180	2.1	1.2	14.0	12.21 575
76.5	98	2664	3341	31.4	40.9	14.4	2.7	115	6.7	1.32	13.5	1003 120.37
170.6	280	2318	2508			8.2						31.0
389.5	1049	9778	4077			5.9						738.21
235.3	605	2702	10352			14.5						754.24
156.2	417	5107	9153			12.1						450.08
107.0	225	2205	4266			1.5						45.40
98.2	289	3194	5999			7.1						117.10
78.0	246	2862	2075									82.28
394.5	716	4610	8377			10.5						821.58
2588	422	9707	9584			11.7						1217 539.39
1718	180	5316	2010			11.3						481 912.3
85.9	140	2017	3018			10.2						224 154.61
107.9	980	3747	4046	51.6		11.2	1.47	13.5				10.16 7.38
972.0	429	6893	4701	51.2		11.1	1	16.6				15.59 244.10
2381.0	543	11516	9771			12.4						126.27
392.0	510	10320	9780			11.4						177.98
2665	520	9957	7976			15.8						720.07

Notice of Mining Location

CRANE & CO., TOPEKA

LODE CLAIM

TO ALL WHOM IT MAY CONCERN:

This mining Claim, the name of which is the PORTLAND No. 3 Mining Claim, situate on lands belonging to the United States of America, and in which there are valuable mineral deposits, was entered upon and located for the purpose of exploration and purchase by ---PORTLAND MINES INCORPORATED--- AN ARIZONA CORPORATION.

(Locator must insert either "a citizen of the United States" or "who has declared his intention to become a citizen of the United States.") the undersigned, on the 4th day of April, 1939.

The length of this claim is HUNDRED & NO/100 feet, and it Hundred Fifty & No/100 claims FIFTEEN/(1500') feet, and it claims SEVEN / (750') feet in a Northwesterly direction and 750 feet in a Southeasterly direction from the center of the discovery shaft, at which this notice is posted, lengthwise of the claim, together with THREE HUNDRED & No/100 feet in width of the surface grounds, on each side of the center of said claim. The general course of the lode deposit and premises is from the Northwest to the Southeast.

The claim is situated and located in the Minnesota Mining District, in Mohave County, in the State of Arizona, about 1800 feet in a Southerly direction from Main workings of the Portland line: The northerly side line of this claim is identical with the Southerly side line of the PORTLAND, patented lode claim.

The surface boundaries of the claim are marked upon the ground as follows: Beginning at _____ at a point in a _____ direction _____ feet from the discovery shaft (at which this notice is posted), being in the center of the _____ end line of said claim; thence _____ feet to a _____, being the _____ corner of said claim; thence _____ feet to a _____ being at the _____ corner of said claim; thence _____ feet to a _____ at the center of the _____ end of said claim; thence _____ feet to a _____, being at the _____ corner of said claim; thence _____ feet to a _____ at the _____ corner of said claim; thence _____ feet to the place of beginning.

Dated and posted on the ground, this 4th day of April, 1939.
PORTLAND MINES INCORPORATED
By E. J. McVicar
Agent

WITNESS
J. W. Potter

Filed and recorded at request of E. J. McVicar this 10th day of April, 1939, at 4:40 o'clock P.M., in Book 3 U at Page 68.

Lary E. Carrow
County Recorder.
By L. J. James
Deputy Recorder.

No. 15338