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PRINTED: 03/21/2002

ARIZONA DEPARTMENT OF MINES AND MINERAL RESOURCES AZMILS DATA

PRIMARY NAME: MORNING STAR

ALTERNATE NAMES:
BELMONT-EASTERN

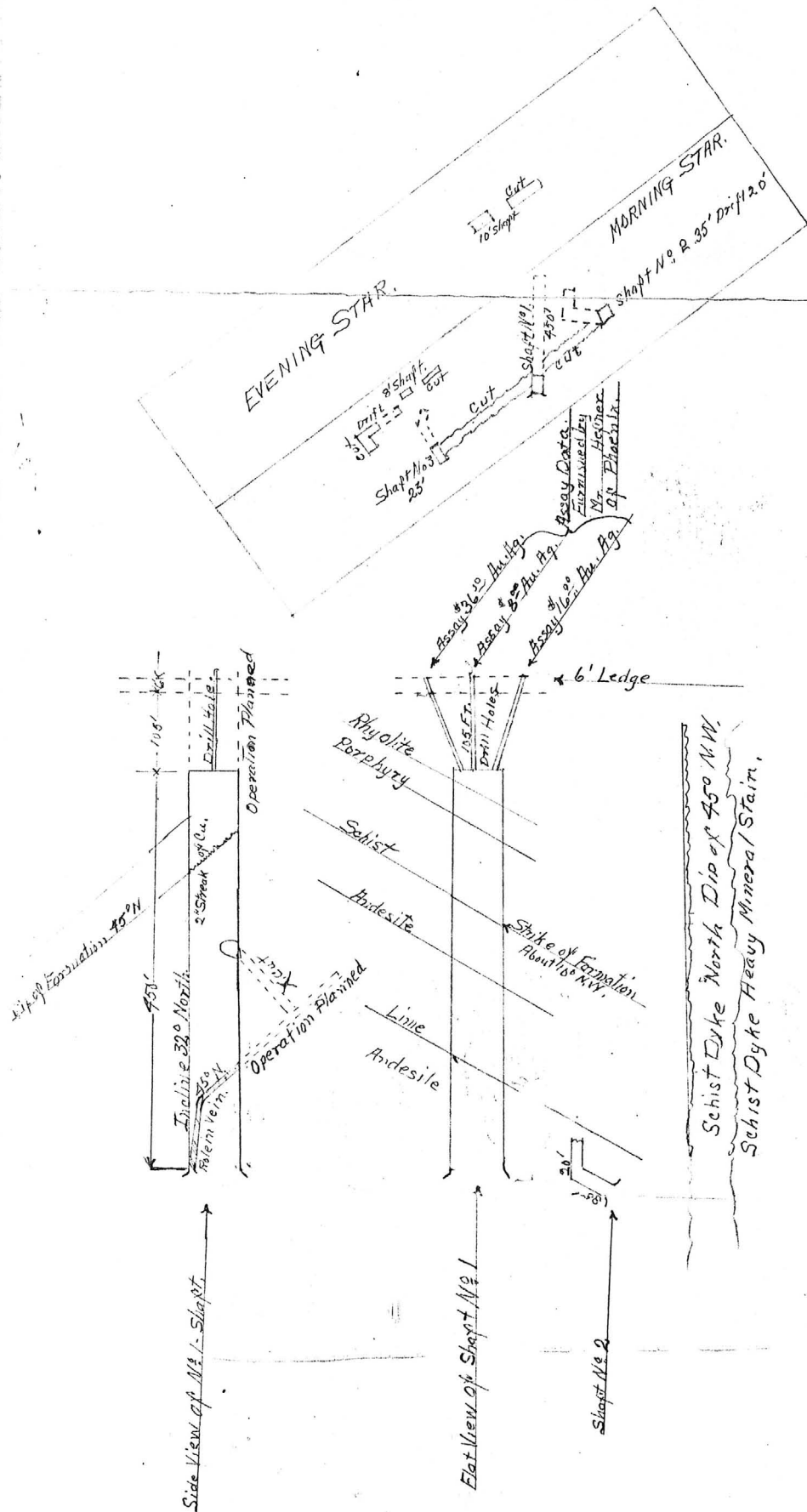
MARICOPA COUNTY MILS NUMBER: 70

LOCATION: TOWNSHIP 3 N RANGE 6 W SECTION 6 QUARTER NW
LATITUDE: N 33DEG 38MIN 18SEC LONGITUDE: W 112DEG 54MIN 34SEC
TOPO MAP NAME: BELMONT MTS - 15 MIN

CURRENT STATUS: PAST PRODUCER

COMMODITY:
COPPER SULFIDE
COPPER OXIDE
GOLD LODE
SILVER

BIBLIOGRAPHY:
ADMMR MORNING STAR MINE FILE
"PRODUCTION POSSIBILITIES OF THE MARGINAL
COPPER MINES IN ARIZONA", P 99; 1941



MORNING STAR MINE

MARICOPA COUNTY

KAP WR 4/29/83: Peter Maltz (head individual with the Portland Mine group in Mohave County) and a geologist, Stewart Winter were in and discussed the Tonopah Belmont Mine. Mr. Maltz explained they plan some exploration work on the property and the nearby Morning Star Mine. He plans to get the project under-written on the Vancouver Stock Exchange to raise money for drilling. The company will be the Belmont-Tonopah. The lead individual in the company is to be Norm Bellemare. Maltz said preliminary trenching showed 0.07 tr. oz/ton gold across 50 feet.

Morning Star mine (formerly Belmont-Eastern)
Belmont Mts. 15' Sec. 6, T. 3N, R. 6W.
Maricopa County

reference: Arizona Dept. of Mineral Resources
Morning Star mine (file)

present owner: ?

history of the mine:
the property was first worked in 1928 but was then idle until 1937 when it was relocated by L. R. Stitt who shipped 3 cars of ore. In 1940 the property was leased to William V. Thorpe who produced about 500 lbs. per day from exploitation and development work. Idle by 1946. Work consists of shaft (inclined + vertical), tunnel, and several surface cuts and benches.

minerals: copper, silver, gold

geology: the ore is in andesite and near the contact between andesite and rhyolite. The ore dips toward the contact. The veins strike N-S and E-W and are about 2 1/2 feet in width. The ore consists of chalcocite and copper carbonates

ore: (1937)

averages \$15.00 per ton in Au, Ag, Cu.

Cu 9.15%

Ag 2.30 oz.

Au 0.01 oz.

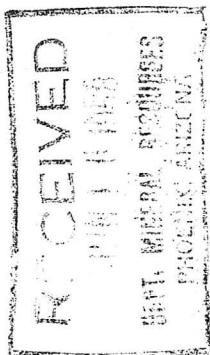
ARIZONA DEPARTMENT OF MINERAL RESOURCES
MINERAL BUILDING, FAIRGROUNDS
PHOENIX, ARIZONA

June 13, 1958

To the Owner or Operator of the Arizona Mining Property named below:

Morning Star, Evening Star & (Maricopa County) Copper
(Property) (ore)
North Star

We have an old listing of the above property which we would like to have



form with as complete detail
say returns, shipment returns
and which might interest a

Mr. LeRoy Stits
RR 4, Box 527
Phoenix, Arizona

BOX ON R4

Frank P. Knight

FRANK P. KNIGHT,
Director.



ARIZONA DEPARTMENT OF MINERAL RESOURCES
MINERAL BUILDING, FAIRGROUNDS
PHOENIX, ARIZONA

June 30, 1958

To the Owner or Operator of the Arizona Mining Property named below:

Morning Star, Evening Star & North Star
(Property)

Copper, silver, gold
(ore)

Phoenix Mining Co. (Maricopa Co.)

the property which we would like to have



Owner's Report form with as complete detail
reports, maps, assay returns, shipment returns
sent us before and which might interest a
the property.

Mr. Wm. V. Thorpe
Route 5, Box 150
Phoenix, Arizona

NO BOX RE-CD

Frank P. Knight

FRANK P. KNIGHT,
Director.

Enc: Mine Owner's Report

C O P Y

MAGMA COPPER COMPANY
Mine Assay Certificate

6-15-37

L. R. Stits
Phoenix, Arizona

No. 1	Morning Star Mine	Copper	9.15%	Silver	2.30 oz.	Gold	0.01 oz
No. 2	Evening Star Mine	"	10.75%	"	2.60 oz.	"	0.01 oz

I think this Work and Equipment can be Done for \$10,000⁰⁰ to \$12,000.00; We Would like to Contact Someone on this can make any Reasonable Deal,

In doing the Work we have done. We have encountered Lenses of high grade Bornite which Leads me to believe that with depth we will Encounter a Very Rich One.

We have a Very Liberal Lease and Bond on the property the only payments to be made on the Bond are taken care of by a 10% Royalty which applies on purchase price until property is paid for, Hoping you will find time to Come Out and Look us over and that you ^{will} be able to Get Some one Interested in the property. and That this letter finds you Enjoying the Best of Health I am

Yours Truly

E. L. Miller

90 W.V. Thayer

Rt 5 Box 150

Phoenix, Ariz

P. S.

I got a letter from Houghton saying he would be in Mammoth soon, if he comes to Phoenix will Rock you up.

Larry.

No 3

At the East End of the Ore Deposit we Sunk a Shaft 35' Deep, taking out good Ore until the Vein flattened out, then the Values left, as we were on a Contact of Shist and Andesite and the Shist heavily stained with Iron,

I decided to drift on Contact and have gone about 20' on the Contact encountering small deposits or Lenses of Copper and Lime. Not on the Contact but out in the Andesite hanging, the Contact Shows a strong drag to the South, This Dike cuts other formation at the West End, or about 120'

From the extreme East End workings, we Sunk Down 23' in Ore, while doing this prospecting and development we produced about 500* Ore a Day so I was in Dead Work most of the time where there went any Ore, This 60 Tons was taken out by 2 Men,

About 100ft North and West of this Shaft on another deposit we have about a 3' Vein of ore in an open cut and Drift assays show 5% Copper.

What I would like to do is to go down into the Main Shaft 100' from Surface and Cross Cut back to Vein and Drift both ways and if it looks justifiable go down another 100' and Cross Cut back, and go on down to the Bottom, Would then like to Sink the 105' to the 1' level to be done drilling

On the same Dip as the shaft, the Center Hole straight ahead for 105' the other two were fanned out, one East the other West, all 3 Holes cutting a 6 ft Ledge of Gold Silver & Copper Ore. Assays from Center was \$8.00 per Ton West Hole \$36.00 per Ton and East Hole \$16.00 per Ton, all these assays was at the old Gold Price.

Owing to the fact that Rains have washed in Surface Dirt and filled Shaft for about 10' from Bottom I am Unable to Verify the facts in Regards to the Diamond Drilling, But Mr. Hoepfner lives in Phoenix, and has a good Reputation and No Reason to tell us anything but the truth. We accept his Statements as facts. He also stated that after Drill Holes were put down and results known he tried to get his Stockholders to go the 105', but Not Being Mining Men they Decided to quit so Disincorporated paid all their Bills prorated Money in the Decouner and called it a Finished Mining Venture.

The Ground is Solid in Shaft and Require No Dintoring, We would have done our Work in Shaft had we had Equipment and Finances.

We worked along on the Surface and took out 2-30 Ton bars Both bars showing 5 1/2% Copper 2% Silver and .02% Gold. Last bar picked up to .03 of Gold and we got paid for our Gold,

Phoenix, Ariz Nov 29th 1940

Mr. J. S. Couper
Phoenix, Ariz.
Friend Sam,

I am Sending you by Mr. Hooper
a report on the Morning Star Mines, Situated
in the Tulture Mining District about 35
miles South and West of Wilcox

The only work done to any depth is by
an Engine Shaft about 450' deep There has been
No Prospecting done from this Shaft tho it Cuts
the different formations as shown by my Perce
map hereto attached, and there is several places
where a little drifting might Develop something
This work was done under the management of
Mr. Hoepfner of the Hoepfner Electric Co of Phoenix
he informs us the Company was made up of several
Phoenix Business Men who put up so much cash
Each month, The Shaft was started ~~one~~ on
one of the Ropes along the Vein and the Dip
at this point was about 32° to the North, the
Shaft kept in this pitch for the full 450' tho
the Vein started Straightening to a 45° Dip
and went Under the shaft at about 40ft. from
Surface, No further work done on the Vein
at the Bottom of the Shaft According to Mr. Hoepfner
There were 3 Diamond Drill Holes put Down,

About 100 ft. north and west of this shaft on another deposit we have about a 3 ~~feet~~ vein of ore in an open cut and drift assays show 5% copper. What I would like to do is to go down into the main shaft 100 ft. from surface and cross cut back to vein and drift both ways and if it looked justifiable go down another 100 ft. and cross cut back and so on down to the bottom, would then like to sink the 105 ft. to the 6 ft. ledge shown by diamond drilling.

I think this work and equipment can be done for \$10,000.00 to \$12,000.00 We would like to contact someone on this. Can make any reasonable deal.

In doing the work we have done we have encountered lenses of high grade ~~bormite~~ which leads me to believe that with depth we will encounter a very rich ore.

We have a very liberal lease and bond on the property the only payments to be made on the bond are taken care of by a 10% royalty which applies on purchase price until property is paid for. Hoping you will find time to come out and look us over and that you will be able to get some one interested in the property, and that this letter finds you enjoying the best of health, I am

Yours truly

✓ E. L. Miller
✓ c/o W. V. Thorpe
Route 5, Box 150
Phoenix, Arizona

P.S. I got a letter from Houghton saying he would be in Mammoth soon. If he comes to Phoenix will look you up.

Lany

COPY

Phoenix, Arizona
November 29, 1940

Mr. J. S. Coupal,
Phoenix,
Arizona.

Friend Sam:

I am sending you by Mr. Thorpe a report on the Morning Star Mines, situated in the Vulture Mining District about 35 miles south and west of Wickenburg.

The only work done to any depth is by an incline shaft about 450 ft. deep. There has been no prospecting done from this shaft tho it cuts the different formations as shown by my pencil map hereto attached, and there is several places where a little drifting might develop something this work was done under the management of Mr. Hoepfner of the Hoepfner Electric Co. of Phoenix. He informs us the company was made up of several Phoenix business men who put up so much cash each month. The shaft was started on one of the rolls along the vein and the dip at this point was about 32° to the north. The shaft kept on this pitch for the full 450 ft. tho the vein started straightening to a 45° ~~dip~~ dip and went under the shaft at about 40 ft. from surface. No further work done on the vein at the bottom of the shaft according to Mr. Hoepfner.

There were 3 diamond drill holes put down. on the same dip as the shaft. The center hole straight ahead for 105 ft. the other two were fanned out, one east the other west, all 3 holes cutting a 6 ft. ledge of gold, silver and copper ore. Assays from center was \$8.00 per ton, west hole \$36.00 per ton and east hole \$16.00 per ton. All these assays was at the old Gold price.

Owing to the fact that rains have washed in surface dirt and filled shaft for about 10 ft. from bottom I am unable to verify the facts in regards to the diamond drilling, but Mr. Hoepfner lives in Phoenix and has a good reputation and no reason to tell us anything but the truth. We accept his statements as facts. He also stated that after drill holes was put down and results known he tried to get his stockholders to go the 105 ft., but not being mining men they decided to quit so disincorporated, paid all their bills prorated money in the treasurer and called it a finished mining venture.

The ground is solid in shaft and requires no timbering. We would have done our work in shaft had we had equipment and finances. We worked along on the surface and took out two 30 ton cars. Both cars showing 5 1/2 per cent copper 2 oz silver and .02 oz gold. Last car picked up to .03 oz gold and we got paid for our gold.

At the east end of the ore deposit we sunk a shaft 35 ft., taking out good ore until the vein flattened out then the values left as we were on a contact of schist and andesite and the schist heavily stained with iron. I decided to drift on contact and have gone about 20 ft. on the contact encountering small deposits or lenses of copper and lime. Not on the contact but out in the andesite hanging. The contact shows a strong dip to the south. This dike cuts other formations at the west end or about 120 ft. from the extreme east end workings. We sunk down 23 ft. in ore, while doing this prospecting and development we produced about 500# ore a day. As I was in dead work most of the time where there wasn't any ore. This 60 tons was taken out by 2 men.

23. Geology & Mineralization The ore comes in the andesite or between andesite and breccia. Some faulting, but mostly roles along the strike as well as along the dip. Incline roles vary from about 30° to 60°. Best ore on 60° dip. Formation is mostly metamorphic. Believe the veining is a replacement ore mostly oxides with small deposits bonite occurring.
24. Ore: Positive & Probable, Ore Dumps, Tailings There is no way, owing to class of work done to determine the amount of ore in place or value. There is possibly 200 to 300 tons mill ore on dump with a value of possibly 2 1/2 per cent Cu. 1 oz. Ag. and .01 oz. Au.
- 24-A Vein Width, Length, Value, etc. The ore on surface explored by cut varies from 1 ft. up to 5 ft. in width for a distance of 120 ft. along the vein. Carload shipments averaged 5 1/2 per cent Cu. 2 oz. Ag. and .02 oz. Au.
25. Mine, Mill Equipment & Flow Sheet None
26. Road Conditions, Route In good condition to within 3/4 mile of mine. Can be put in good condition with small amount of work. Paved ~~xxx~~ road from Phoenix to Hassayampia then north 27 miles to mine on good dirt road kept up by Maricopa County. (25 miles from mine to Dixie siding on S. P. R. R.)
27. Water Supply No water at camp or mine. We are hauling water 22 miles, but water is available within 7 miles of mine and we think plenty of water can be developed within one mile of mine.
28. Brief History Property was first worked in 1928 at which time the 450 ft. shaft was sunk. No prospecting was done in the shaft altho indications at 2 points warranted prospecting. Property ~~was laid idle~~ laid idle for several years ~~was relocated~~ Was relocated in 1937 by present owner who shipped 3 cars of ore. We have shipped 2 cars of 30 tons each.
29. Special Problems, Reports Filed Our problem is lack of equipment and finances. We would like to sink shaft 125 ft. which would require 15 H P hoist Compressor and hammer and steel. 1200 ft. 16 # rails 4 in x 4 in x 3 ft. ties every 2 1/2 ft. 600 ft. 2 1/2 In. air line pipe installing shop equipment.
30. Remarks According to Mr. Hoepfner of Phoenix who had charge of first work. Three Diamond Drill holes was put down from bottom of shaft center hole 105 ft. encountering 6 ft. vein of copper, silver and gold ore \$8.00 per ton. Hole to right of center to down vein with values of \$16.00 per ton. Hole to left with values of \$36.00 per ton.
31. If property for sale: Price, terms and address to negotiate. I have lease on property with option to purchase. Price \$45,000.00 all to be paid out of royalties. No due dates of payments. 20 shifts per month labor requirements.
32. Signed Wm. V. Thorpe
Route 5, Box 150
Phoenix, Arizona
33. Use additional sheets if necessary.

MM-59
DEPARTMENT OF MINERAL RESOURCES
STATE OF ARIZONA
OWNERS MINE REPORT

Date November 29, 1940

1. Mine Morning Star
2. Mining District & County Vulture Mining District
3. Former name Interprise Mining Co.
Changed to Belmont Eastern in 1928
5. Owner L. R. Stits
6. Address (Owner) Route 4, Box 527
Phoenix, Arizona
7. Operator Lease Wm. V. Thorpe
8. Address (Operator) Route 5, Box 150
Phoenix, Arizona
9. President No.
10. Gen. Mgr. E. L. Miller
11. Mine Supt. E. L. (Laney) Miller
12. Mill Supt.
13. Principal Metals Copper, Silver, Gold
14. Men Employed Three
15. Production Rate All production from exploitation and development work. About 500 lbs. per day.
16. Mill: Type & Cap. None
17. Power: Amt. & Type Windlass
18. Operations: Present Opening up surface pockets by shaft and cuts. Also drifting on contact between schist footwall and andesite hanging wall. At the 35 ft. level of shaft sunk about 90 ft. NE of main shaft. Good ore showing in this drift.
19. Operations Planned The main shaft which is 450 ft. deep is sunk on about 32°, cutting through formation as shown by attached map. Shaft left the vein at 40 ft. from surface, the vein at this point dips at about 45°. plan to go down main shaft 100 ft. cut station and crosscut back to vein. Also plan to sink main shaft 125 ft. deeper to encounter known ledge.
20. Number Claims, Title, etc. Three claims, Legally located and all assessments, work in A 1 standing.
21. Description: Topography & Geography Elevation 1200 ft. at lowest point, raising about 500 ft. Is quite rugged, but not very steep. The mine is located about 15 miles southwest of Wagon Tanks and 11 miles NE of Sadel Mountain and about 15 miles due south of Vulture Mine.
22. Mine Workings: Amt. & Condition The main shaft is about 450 ft., sunk on an incline of 32°. Requires no timbering. Can get to within 10 ft. of bottom, rain having washed in surface dirt to that amount. Another shaft sunk about 90 ft. NE of main shaft is 35° deep incline about 60°. A 30 ft. drift to NE from bottom of shaft along schist footwall and andesite hanging wall with good ore. Another shaft 120 ft. S W about 25 ft. deep in ore. Ore is exposed between these two shafts by opencuts about 100 ft. N W. Ore is exposed by cut and shaft. (this last mentioned ore will ship over)

ENGINEER'S REPORT
on
MORNING STAR, EVENING STAR & NORTH STAR
Mining Claims

This property, consisting of three claims as named above, is in the Vulture Mining District, Maricopa County, Arizona, and about twenty miles northerly from Palo Verde, Arizona.

The claims are contiguous and each of standard measurement, 600' by 1500'. Title by location is clear, and all assessment work up to date and recorded in Phoenix, Arizona.

Geology

The ore, so far as developed, is in andesite and near the contact between andesite and rhyolite. Trend of the ore on its dip is toward this contact, and may be located there at greater depth.

The veins, two striking northerly and one easterly and westerly, will average about two and one-half feet in width and seem to dip toward and under the rhyolite, and enclosing the rhyolite on three sides, west, south and east. The rhyolite is quite altered, as is also the andesite adjoining the ore.

The ore is composed of chalcocite (copper glance) and copper carbonates, the latter being the result of oxidation of the glance. The glance, being a secondary mineral, is no doubt an alteration in place of the primary mineral chalcoprite.

Development

This consists of one 24 degree inclined shaft 425' in length, one 30' vertical shaft with a thirty-five foot drift from the bottom and all in ore, one tunnel 102' long and all in ore, and several surface cuts and trenches.

The 425' shaft passed into the hanging wall above the ore at a point 30' below collar and continued so to the bottom.

Future Development

Future operation should be confined mostly to cross cutting from the 240' level of main shaft, easterly and westerly, to intersect the east and west veins, drifting on said veins to develop the ore bodies. Also the proposed drifts should intersect the south vein, and this too should be developed. Later the same procedure should be carried out from the bottom of the shaft. This combined operation, conceding that veins are found to be continuous both downward and laterly, should produce about 12,000 tons of ore above the 240' shaft level, and a proportionate amount continuous to bottom of shaft level. Should such prove to be true, which I think very probable, the period of productive operation will be very satisfactory. In addition to the above development, minor expenditure may be advisable in the 102' tunnel.

Equipment

Other than living quarters and a few minor hand tools, there is no equipment. Hoist, compressor, drill equipment, track, pipe, tools and minor necessities will be necessary for above development. This cost should not be expensive and is justified.

General Facilities

There is no water at property and this must be trucked eight miles. Timber must also be obtained elsewhere and hauled in, though there seems no indication that much timber will be needed. There is a good road to the property and all transportation is economical.

Ore Market

The Magma Smelter at Superior, Arizona, has accepted production in the past and will continue to do so. The rates are conservative and sampling accurate. Trucking costs, twenty miles to railroad, is \$1.25 per ton, and railroad freight \$1.40 per ton. Smelter cost \$3.50 per ton. Total \$6.15 per ton.

Mining and Development Cost

The combined cost should be about \$3.50 per ton of ore landed on the surface. This figure does not include cost of equipment or setting of same.

Ore Values

As shown by smelter returns and sample values, the ore should average about \$15.00 per ton in gold, silver and copper. This grade may be increased at greater depth as less oxidation should prevail.

Conclusion

I think there is justification to develop this property. The geology is favorable and mineralization, as so far exposed, is continuous. Location is favorable for conservative costs, and expensive equipment is not essential. A few men can accomplish rapid development and ore extraction. A minimum of 25 tons per day should be very conservative, after crosscuts and drifts are completed. This should, on grade of ore as mentioned, produce a fair profit. Greater production should be in line when development is carried out at bottom of shaft. Properties of this type, when showings are favorable, should be conservatively developed and operated, and the general favorable aspects here found should be continuous.

Very truly

D. R. FINLEYSON
Mining Engineer

How long would it take, after financing has been provided for, before production on the above basis could be reached? Thirty days

Does your organization have the facilities for raising the necessary capital to increase production to the amount stated? No

If not, do you believe that your company would be amenable and agreeable to government financing? Yes

Do you believe that you could finance the capital investment yourself on some such basis as a guarantee of sale of output at a fixed price and for a definite period, with damages to cover unamortized portion of capital investment in the event the government failed to take the output for the agreed upon time - or some similar arrangement? Possibly

Please let us have your comments on the probability or possibility of your organization participating in such a program for national defense purposes. Upon completion of an additional fifty foot of development work it is our purpose to incorporate and our incorporation would participate in a program with the Government.

What would be your ideas on financing and carrying out such a plan as is indicated by these questions? Have Government agents inspect conditions at property and determine the best plan of financing.

Kindly list names and addresses of other potential copper producers in Arizona whose operations should be included within this survey. Tonapah Belmont 1 3/4 miles N. W. of Morning Star.

Date June 8th 1941 Signed W. V. Thorpe

Arizona Department of Mineral Resources, Capitol Building, Phoenix, Arizona

QUESTIONNAIRE

Relating to survey of potential copper production from Arizona small and marginal mines for national defense purposes;

Name of mining property..... MORNING STAR

Location..... Vulture Mining District - 1 3/4 miles S.E. Tonapah Belmont

Ownership..... L. R. STITS

Name of Manager..... William V. Thorps & lessee

Post Office address..... Rt. 5 Box 150, Phoenix, Arizona

Copper production (pounds) during each of the past five years:

1936..... 1937..... 2,382.60..... 1938.....

1939..... 4,569.20..... 1940..... 5,691.42.....

1941 rate of copper production based upon first four months.....

How much copper could this property produce annually

on a 14 cent price?..... 15,000

on a 16 cent price?..... 20,000

on an 18 cent price?..... 30,000

on a 20 cent price?..... 60,000

What price copper is necessary for this property?..... 16..... cents per pound?

What plant facilities would be required and how much is the estimated cost in the

event a 14 cent price could be assured?..... Compressor - Jack Hammer, Hoist, Rail,...

Cable, Ore Cars, Mine Timber - \$5,000.-

a 16 cent price could be assured?..... \$5,000

18 cent price?..... \$5,000

20 cent price?..... \$5,000

For what length of time would assurance of price and sale of full production be ne-

cessary?..... To be determined by development

(over)

Ore occurrence. Ore occurs as chalcocite, cornite, chalcopyrite, mixed with azurite, malachite and other oxidized ores.

Ore reserve (quantities and values).

Positive ore: None

Probable ore: 7,000 tons, 3 per cent copper.

Accessory metals of value.

Gold and silver.

Development work done.

Inclined shaft, 450; tunnel on vein, 89 feet;
36 foot shaft on contact, with drift from bottom
north 30; other work in mine totals about
300 feet.

Plants (with capacity) already on property.

No equipment now installed on property except hand tools, tents, etc.

Date June 21, 1941

Signed

W. V. Hooper

ARIZONA DEPARTMENT OF MINERAL RESOURCES
Capitol Building, Phoenix, Arizona

Page 3

Name of property. **Morning Star**

Location and accessibility of property. Located 25 miles from Dixie siding, on the Southern Pacific Railroad, where good loading facilities are now available. A good county maintained dirt road leads from Dixie siding to the mine, cost of trucking over which is \$1.25 per ton of ore.

History of ownership. Property was located by L. R. Stits, who still owns property, which is now under lease and option to purchase to William V. Thorpe, Route 5, Box 150, Phoenix, Ariz.

Production history.	<u>Year</u>	<u>Tons ore</u>	<u>Pounds Copper</u>
	1937	30.0	2,382.6
	1938	None	None
	1939	49.0	4,569.2
	1940	<u>61.6</u>	<u>5,691.4</u>
		140.6	12,643.2

General geology (brief) Country rock consists of andesite, andesitebreccia, rhyotite and schist; ore occurring mainly in the andesite and andesitebreccia, but also in contact vein form between schist foot wall and andesite hanging wall. Ore generally found in lenses from 8 inches to four feet wide and of unknown length.

Ore occurrence.

Ore occurs as chalcocite, bornite, chalcop-
pyrite, mixed with azurite, malachite and
other oxidized ores.

Ore reserve (quantities and values).

Positive ore: None
Probable ore: 7,000 tons, 3 percent copper.

Accessory metals of value. Gold and silver.

Development work done.

Inclined Shaft, 450; tunnel on vein,
89 feet; 36 foot shaft on contact, with drift
from bottom north 30; other work in mine
totals about 300 feet.

Plants (with capacity) already on property.

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ARIZONA DEPARTMENT OF MINERAL RESOURCES
Capitol Building, Phoenix, Arizona

Page 5.

Name of property.

Location and accessibility of property. Located 25 miles from
divine siding, on the Southern Pacific R.R., where
good loading facilities are now available. A good
county maintained dirt road leads from divine siding
to the mine, cost of trucking over which is \$1.25 per ton
of ore.

History of ownership.

Property was located by L. R. Stits, who
still owns property, which is now under lease
and option to purchase to William W. Thorpe,
Route 5, Box 150, Phoenix, Ariz.

Production history.

year	Tons ore	Pound copper
1937 —	30.0	2,382.6
1938 —	None	None
1939 —	49.0	4,569.2
1940 —	61.6	5,691.4
	<u>140.6</u>	<u>12,643.2</u>

General geology (brief)

Country rock consists of andesite, andesite
breccia, rhyolite and schist; ore occurring
mainly in the andesite and andesite breccia,
but also in contact vein form between schist
foot wall and andesite hanging wall. Ore
generally found in lenses, from 8-inches to
several feet wide and of unknown length.

June 18, 1941

Mr. William V. Thorps
Rt. 5, Box 150
Phoenix, Arizona

Dear Mr. Thorps:

I want to thank you for sending us the questionnaire regarding the Morning Star. It would appear that this property qualifies for inclusion in our survey, although I think that you are rather low on your estimated capital investment of \$5,000, because it apparently does not include operating costs until such time as smelter returns are obtained.

Included within this report we anticipate putting a brief description of the properties which will be listed as potential producers. In order to have these brief reports uniform in their contents we have gotten up another questionnaire showing the points we want to cover, and it will be greatly appreciated if you will fill in one of these questionnaires for the Morning Star and return it to us.

Thanking you, and with kindest personal regards, I am

Yours very truly,

Chairman, Board of Governors
Arizona Department of Mineral Resources

CFW:LP
Enc.

Geology & Mineralization

The veins, two striking northerly, and one easterly and westerly, will average one and one-half feet in width and dip toward west, south and east. The chrysolite, and enclosing the chrysolite on three sides -

Ore: Positive & Probable, Ore Dumps, Tailings

Enclosed find copy of mine assay certificate.

A. Dimensions and Value of Ore body

The vein is about 2 1/2' by 4'. The length is not determined.

Mine, Mill Equipment & Flow-Sheet

None.

Road Conditions, Route

Needs some work.

Water Supply

None.

Brief History

This mine is showing good prospects of being one of the better mines in this district.

Special Problems, Reports Filed

All deeds and assays are in recorder's office at Maricopa County Court House.

Remarks

Description: Topography & Geology. The ore so far as developed is in andesite and near the contact between andesite and rhyolite. The trend of the ore on its dip is toward this contact, and may be located there at greater depth.

If property for sale: Price, terms and address to negotiate.

I will lease or sell this property.

If lease, 10%. Outright sale, \$45,000.

32. Signature

L. R. Stits

Rt. 4, Box 527, Phoenix

Use additional sheets if necessary.

DEPARTMENT OF MINERAL RESOURCES

STATE OF ARIZONA

MINE OWNER'S REPORT

Date August 1945

Mine Morning Star & Evening Star

2. Location Vulture Mining Dist., 20 miles northerly from Palo Verde, Ariz.

Mining District & County Vulture Mining Dist., Maricopa County, Ariz.

Former name None

Owner L. R. Stitts 6. Address (Owner) Rt. 4, Box 527, Phoenix, Ariz.

Operator Same

8. Address (Operator) Same

President, Owing Co. L. R. Stitts

9A. President, Operating Co. L. R. Stitts

Gen. Mgr. None

14. Principal Minerals Copper

Mine Supt. None

15. Production Rate Can be brought to 25 tons per day.

Mill Supt. None

16. Mill: Type & Cap. None

Men Employed None

17. Power: Amt. & Type None

Operations: Present No

Operations: Planned Will lease or sell.

Number Claims, Title, etc. 3 claims. Title clear.

Description: Topography & Geography The ore so far as developed is in andesite and near the contact between andesite and rhyolite. The trend of the ore on its dip is toward this contact, and may be located there at greater depth.

Mine Workings: Amt. & Condition Work so far has been development of the 3 claims. All assessment has been brought to date. Some work on the approaches and road have to be done.

L. R. Stitts
Rt. 4, Box 527, Phoenix

Geology & Mineralization

Andesites and rhyolites with some shists appearing at places
Mineralization is in a small crushed zone between the
lava flow beds. Copper showing is from 2 inches thick to a spread
of 18 inches.

Ore: Positive & Probable, Ore Dumps, Tailings none

A. Dimensions and Value of Ore body

sample of the ore taken by the owner gave from
3% to 9% copper, gold .01 oz, silver 2.3 Ozs.

Mine, Mill Equipment & Flow-Sheet

Road Conditions, Route

Go west from Phoenix to Hassayampa Station thence north up the
county road toward Aguila to the forks of the road then take
left road to the mine. The road is all good to within about 3 miles of
the property and then not too bad.

Water Supply

Haul water for camp 5 mi distance

Brief History

Has shipped a few small shipments of copper

Special Problems, Reports Filed

Dan. Finlinson has made a report

Remarks

A prospect which will take a goodly sum of money/develop any
ore body.

1. If property for sale: Price, terms and address to negotiate.

Property can be bought or leased

32. Signature.....

A. C. Nebeker Engineer

3. Use additional sheets if necessary.

DEPARTMENT OF MINERAL RESOURCES

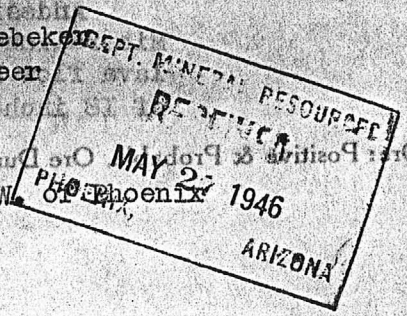
STATE OF ARIZONA

MINE OWNERS REPORT

Engineer

Date May 14th 1946

2. Location 65 miles N.W. of Phoenix



1. Mine Morning Star Group

3. Mining District & County South Vulture, Maricopa

4. Former name none

5. Owner L.R. Stits

6. Operator same as owner

7. President, Owning Co.

8. Gen. Mgr.

9. Mine Supt.

10. Mill Supt.

11. Men Employed none

12. Operations: Present

none

13. Operations: Planned

none

14. Number Claims, Title, etc.

3, the Morning Star, Even Star and North Star
Title by location and working assessment

15. Description: Topography & Geography

not rough

16. Mine Workings: Amt. & Condition

100 feet tunnel, and 240 feet 24 degree incline shaft which
has some loose rock near top, tunnel O.K.

A. G. Nebeker, Engineer

Signature

Use additional sheets if necessary.

12. Ore "Blocked Out" or "In Sight": This consists of one 2.4 degree inclined shaft 425' in length, one 30' Vertical shaft with a thirty-five foot drift from the bottom and all in ore, one tunnel 102' long and all in ore, and several surface cuts and trenches

Ore Probable: This should produce about 12,000 tons of ore above the 240' shaft level, and a proportionate amount continuous to bottom of shaft level.

13. Mine Workings—Amount and Condition:

No.	24°	Feet	Condition
Shafts inclined		425	Good rock formation not timbered
Shafts Vertical		30	" " " timber not necessary
Raises			" " " " " "
Tunnels	1	102	" " " " " "
Crosscuts	—	—	—
Stopes	—	—	—

14. Water Supply: No water supply on the ground — water available at a distance of four miles.

15. Brief History: This mine is on the same vein of the old Tonapah Belmont mine and is located two miles east.

Ten car loads of ore has been shipped to The magma Smelter at Superior, Arizona and American Smelting and Refining Co at Hayden, Arizona.

— mine assay certificate 6-15-37

W.P. Stitts
Phoenix Arizona

No. 1 morning Star mine Copper 9.10% Silver 2.30g. Gold 0.01g.
No. 2 Evening Star mine " 10.75% " 2.80g. " 0.01g.

16. Signature:

x Leroy Stitts

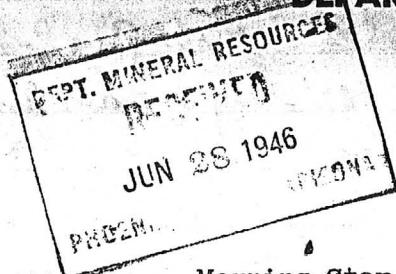
17. If Property for Sale, List Approximate Price and Terms:

For lease for 10% Royalty
or for sale at \$45,000.00 on terms.

DEPARTMENT OF MINERAL RESOURCES

State of Arizona

MINE OWNER'S REPORT



Date June 26 - 1946

1. Mine: Morning Star, Evening Star & North Star
2. Location: Sec. _____ Twp. _____ Range _____ Nearest Town _____
Distance _____ Direction _____ Road Condition _____
3. Mining District & County: Vulture Mining District, Maricopa County, Ariz.
4. Former Name of Mine: Morning Star, Evening Star & North Star
5. Owner: Le Roy Stits
Address: RR 4, Box 527, Phoenix, Arizona
6. Operator: Raymond Stits
Address: RR 4, Box 527, Phoenix, Arizona
7. Principal Minerals: Copper, Silver and Gold
8. Number of Claims: Three (3) Lode yes Placer no
Patented No Unpatented yes
9. Type of Surrounding Terrain: Rolling hills with a few peaks near by.

10. Geology & Mineralization: The ore, so far as developed, is in andesite and near the contact between andesite and rhyolite. Trend of the ore on its dip is towards this contact, and may be located there at greater depth. The ore is composed of chalcocite (copper glance) and copper carbonates. The glance, being a secondary mineral is no an alteration of place of the primary mineral
11. Dimension & Value of Ore Body: chalcopysite.

The veins, two striking northerly and one easterly and westerly. Will average about two and one-half feet in width and seem to dip toward and under the rhyolite, and enclosing the rhyolite on three sides, west, south & east. The rhyolite is quite altered, as is also the andesite adjoining the ore. as shown by smelter returns and sample values, the ore should average about \$15.00 per ton, in gold, silver and copper. This may be increased at greater