



CONTACT INFORMATION
Mining Records Curator
Arizona Geological Survey
416 W. Congress St., Suite 100
Tucson, Arizona 85701
520-770-3500
<http://www.azgs.az.gov>
inquiries@azgs.az.gov

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Reconstruction Finance Corporation Arizona Records

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DEPARTMENT OF MINERAL RESOURCES
STATE OF ARIZONA
FIELD ENGINEERS REPORT

Granted

Mine PAPAGO CHIEF. Cu., SiO₂ Date July 19, 1943
District Barboquivari Engineer Earl F. Hastings
Subject: Reconstruction Finance Corporation Mine Loan

N.

Docket No. ND-8192
Date Application Received July 16, 1943
Date of Field Examination March 5, 1943
Date of Report July 19, 1943

1. Name and address of applicant (correspondent):
George H. Harford, Box 1892, Tucson, Arizona.
Sherwood Owens, Box 769
2. Character of Project and estimated cost thereof:
Cu. SiO₂. Prepare temporary camp, repair road, clean out open cut and ship silicious copper ore. \$4,100.00.
3. Location of property:
Barboquivari Mining District, Pima County, Arizona.
4. Applicant's interest in or ownership of property:
Applicant holds lease and option.
5. Loan requested:
\$4,100.00. *\$3,000 loan granted*
6. Loan recommended:
\$4,100.00.
7. Comments:
 - (a) 1. Added to the docket is memorandum of G. A. Ballam, Field Engineer, Department of Mineral Resources, dated June 2, 1943.
 2. Previous additions were made to the docket when the first application (Phx C-164) was reviewed March 29, 1943, to which reference is made.
 - (b) There is apparently 1,000 tons of desirable silicious ore on the dumps and other ore of the same general character available by breaking in the open cut. Little preparation need be made to commence shipments.
 - (c) On the basis of a previous thorough study of available evidence and resultant recommendation, coupled with subsequent communication, both written and verbal, with George A. Ballam it is considered that the present exposures warrant the operation and further rehabilitation of this property.

This operation will, admittedly, be of marginal profit but the quantity and character of the ore is such that its importance cannot be measured solely by commercial value.
 - (d) The revised program of work is more acceptable than that previously proposed and the cost estimates are within reason.

ARIZONA DEPARTMENT OF MINERAL RESOURCES

Earl F. Hastings, Projects Engineer

DEPARTMENT OF MINERAL RESOURCES
STATE OF ARIZONA
FIELD ENGINEERS REPORT

Mine PAPAGO CHIEF Cu. SiO₂ Date March 29, 1943
District Barboquivari Engineer Earl F. Hastings
Subject: Reconstruction Finance Corporation
 Mine Loan

Docket No. Phoenix C-164
Date Application Received March 19, 1943
Date of Field Examination (George A. Ballam) March 5, 1943
Date of Report March 29, 1943

1. Name and address of applicant (correspondent):
George H. Harford, Box 1892, Tucson, Arizona.
2. Character of project and estimated cost thereof:
Cu. SiO₂. Unwater and retimber 90 foot shaft, rehabilitate tunnel workings preparatory to production. \$5000.00.
3. Location of property:
Barboquivari Mining District, Pima County, Arizona.
4. Applicant's interest in or ownership of property:
Applicant holds option agreement at 10% royalty with a total purchase price of \$25,000.00.
5. Loan requested:
\$5000.00.
6. Loan recommended:
\$5000.00.
7. Comments:
 - (A) Added to the docket are:
 1. Letter from the applicant to the Department of Mineral Resources dated March 27, 1943.
 2. Copy of letter and sample settlement sheet from American Smelting and Refining Company to applicant dated March 9, 1943.
 3. Report and memorandum by George A. Ballam, Field Engineer, Department of Mineral Resources dated March 5, 1943
 4. Mine owners report form filed by Filiberto Verduzco, the owner, dated January 31, 1941.
 - (B) The sample smelter settlement sheet is based upon four shipments made to Magna and Douglas in 1936-37, and does not represent the dump material which the applicant proposes to ship.

Applicant's dump sample is comparable in dollar value; he does not state definitely, though questioned on this point, whether or not this sample is representative of the

dump material which he is capable of shipping. Inasmuch as the sampling was limited to the east end of the dump it can be assumed that it represents a limited and selected portion of the dump.

(C) Other than the dump sample there are two 12 foot and one 5 foot samples which, according to the applicant assay 6.7%, 7.4% and 16.2% copper. These are in a localized area and judging from the Tenney report do not represent an ore shoot of appreciable continuity.

(D) There is an exposed ore shoot which accounts for past production, according to Tenney, of 300 feet in length which lies in an ore zone that is possibly 1000 feet long. This zone is 25 to 75 feet wide and apparently offers development possibilities. Careful selection in mining can produce additional moderately high grade ore from the tunnel in the area of previous limited stoping. Tenney emphasizes careful hand mining, from which it can be assumed the ore is narrow or erratic or both.

(E) It is noticeable that the recommendation of the applicant written by Arthur M. Houle, E. M., does not mention the applicant's mining experience, but does indicate his promotional activities.

This application is further indicative of the indirect methods utilized by other than practical or technical mine operators or engineers.

(F) The proposed rehabilitation of the 90 foot shaft will not expose ore. This shaft is in the hanging wall and must be sunk an additional 60 feet to encounter the zone on its dip.

The 50 foot shaft is reported by Manuel Carrillo (who is considered reliable) to have important ore exposures and possible early production.

The tunnel level, judging from Tenney, has lateral development possibilities and can produce moderate quantities of remnant ores following rehabilitation.

The "lead" tunnel is insufficiently described, and is lacking development to the extent that its importance, if any, cannot be herein appraised.

The applicant is not a miner or mine operator and has avoided direct statements of facts. The applicant is not known either in person or by reputation and the above is based on docketed evidence.

(G) The comments above have been generally detrimental to favorable appraisal. As opposed to this the examination by the Field Engineer of this Department if evidence of an early, though not particularly profitable production of siliceous copper ores. Certain statements in the Tenney report and Carrillo letter offer further favorable evidence of production possibilities.

This loan is being reluctantly recommended on the above basis, the fact that a highly desirable siliceous ore can be shipped in an estimated amount of 2000 tons from the dump, and that rehabilitation of the tunnel and 50 foot shaft will expose shipping ore.

No expenditure should be allowed on the 90 foot shaft until all other workings have been reopened and thoroughly examined and a working plan outlined from that point.

ARIZONA DEPARTMENT OF MINERAL RESOURCES

Earl F. Hastings, Projects Engineer

325 Heard Bldg.
Phoenix, Arizona
June 21, 1944

TULLY - Asst. Chief - Mining Section RFC - Washington

Re: Owens & Freeland - Docket No. ND-8449

Enclosed please find my "Liquidation
Report", in duplicate, on the above
captioned project.

CAR
CHARLES A. RASOR
Supervising Engineer

CAR:MHV
Encs.
"Liquidation Report",
in duplicate

RECONSTRUCTION FINANCE CORPORATION
MINING SECTION
LIQUIDATION REPORT

Borrower: Messrs. Sherwood B. Owens
and John L. Freeland

Docket No: ND-8449

Date of Report: June 21, 1944

1. NAME AND ADDRESS OF APPLICANT:

Sherwood B. Owens and John L. Freeland
Box 769
Tucson, Arizona

2. LOCATION OF PROJECT:

In unsurveyed portions of T. 19 S., R. 7 E., Babogivari Mining District,
Pima County, Arizona, about 62 miles southwest from Tucson, Arizona.

3. AMOUNT OF LOAN AND DATE OF AUTHORIZATION:

A loan of \$3,000.00 was approved to the borrower on August 30, 1943.

4. PURPOSES FOR WHICH LOAN WAS EXPENDED:

Loan was expended in rehabilitating some of the underground working and
shipping siliceous copper ores from the dump.

5. EQUIPMENT:

a. Wheelbarrow)	
3 shovels)	\$40.35
1 pick)	
1 hatchet saw		6.02
Portable forge and wheelbarrow		15.00
Misc. hand tools		10.50
tools		11.72
1 tent		25.50
1 ore car		25.00

List of equipment and supplies removed from New Hope Mine -
James R. Gray - Docket No. ND-8315

2 pieces sheet steel (3' x 6')
3 pieces lumber 6" x 6" x 12'
25 pieces scrap lumber 2 x 12" x 4'
5 lbs. rail spikes
12 pair rail connection
1 ore car complete

Additional equipment and supplies removed - - 3/22/44

2 - 12' ladders
2 - 2" x 6" x 16'
6 - 2" x 12" x 6'
4 - 2" x 12" x 8'
2 - 2" x 4" x 10'
2 - 2" x 4" x 6'
6 - 2" x 4" x 4'

- 3 - 4" x 4" x 4'
- 3 - 4" x 4" x 10'
- 1 - 6" x 6" x 10'
- 7 - 1" x 12" x 16'
- 10 - pieces misc. blocking
- 4 - pieces 8' sheet iron
- 7 - joints rail
- 10 - rail connection
- 3# - rail spikes
- 1 - water tank
- 1 - ore bucket

All above equipment and supplies bought for \$40.00 and proceeds applied to indebtedness of James R. Gray, Docket No. ND-8315

b. List of equipment worth salvaging from Papago Chief Mine:

	<u>Purchase price</u>	<u>Estimated Resale Value</u>
2 - 7' ladders)		
1 - 13' ladder)		
1 - 1-1/2" x 4' pipe)		
2 - 1/2" x 12' pipe)	1.00	1.00
8 - joints 8# rail)	4.50	
8 - joints 12# rail)	5.50	
3 - rail switches)	4.00	10.00
2 - ore cars	35.00	20.00
1 - ore bucket w/clevis)		
1 - small water tank)	5.00	
50' - 1/2" well rope)	1.60	
1 - single sheave block)	1.50	5.00
1 - 9' x 12' tent	25.50	12.50
1 - 12' x 14' tent	30.60	15.00
1 - sheet iron stove w/5 joints	3.50	1.00
1 - anvil	5.00	3.00
1 - portable forge	7.50	5.00
6 - pieces drill steel	1.00	
1 - 4# hammer	1.50	
1 - 12# hammer	1.50	
2 - shovels	2.75	
4 - miners picks	8.00	
1 - hatchet	2.15	5.00
1 rubber tire wheelbarrow	30.60	15.00
1 steel wheel wheelbarrow	7.50	5.00

Lumber List

- 1 - 1" x 4" x 10')
- 3 - 1" x 10" x 7')
- 4 - 1" x 10" x 16')
- 8 - 2" x 4" x 7')
- 1 - 2" x 4" x 14')
- 1 - 2" x 6" x 14')
- 1 - 2" x 8" x 16')
- 2 - 2" x 10" x 5')
- 3 - 2" x 10" x 8')
- 3 - 2" x 12" x 6')
- 3 - 2" x 12" x 7')
- 1 - 2" x 12" x 9')

17 - 2" x 12" x 14'	}	
1 - 4" x 4" x 16'		
2 - 4" x 6" x 6'		
2 - 8" x 8" x 4'		
1 - 8" x 8" x 12'		
3 - pieces 3' x 8' sheet iron		
30 - pieces short misc. blocks		50.00

- c. All equipment bought for Papago Chief including material from New Hope Mine on hand.
- d. Borrower has removed all equipment and supplies from Papago Chief Mine to his equipment yard in Tucson, Arizona, according to his letter of June 4, 1944, to Mr. Gohring.

Borrower proposes to purchase the material listed at the valuation shown and use on his new operation, the Bulldozer Mine (Docket No. ND-5995).

6. PROPERTY:

The property is held by lease dated July 10, 1943. Borrower has notified lessor of cancellation of this lease and is removing equipment to a storage place.

7. COMMENTS:

Operations terminated May 31, 1944, following decline of applicants request for additional money. Applicant shipped 1358 tons of siliceous copper ore that averaged .02 ounces gold, 3.2 ounces silver and 1.4 percent copper. Property was last visited by Mr. Lane, Supervising Engineer, April 13, 1944. Any gas tax refunds and insurance refunds will be accounted for. Borrower has \$16.51 left in bank account.

8. CONCLUSION:

The proposed project failed to develop any material quantity of ore, and with the exception of the remaining equipment worth salvaging, the property apparently has no value at this time. Consequently, except for the salvage value of equipment, the loan should be considered a loss.

9. RECOMMENDATION:

It is recommended that this account be closed when the remaining equipment acquired, in whole or in part, with loan funds which is considered worth salvaging has been liquidated and proceeds applied on borrower's indebtedness.

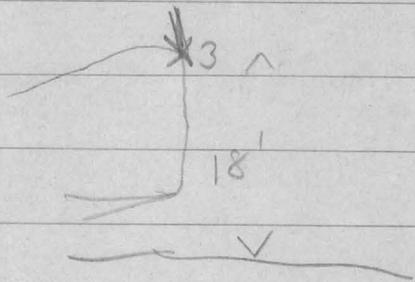
Charles A. Rasor
CHARLES A. RASOR
Supervising Engineer

Return Much

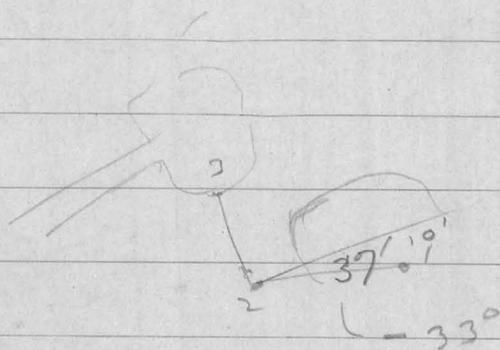
ND-8449

S 12 1/2 74' + 2 1/2

edge of precip.



Top of bluff is 7' above #2 and 7' in



26 - 13

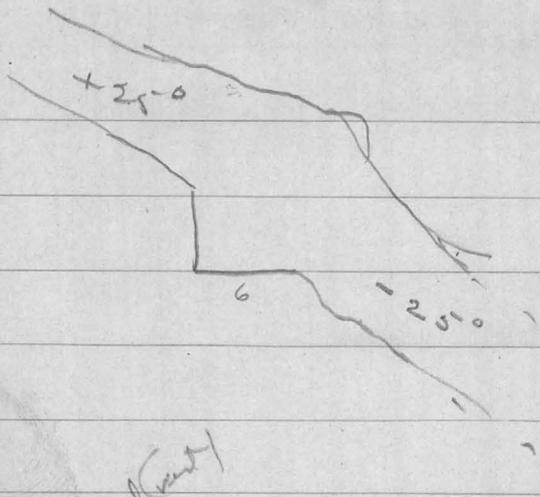
Prod. 1400 tons dump ore 1.5 cu - .025 - 3.25 Ag.
 Expect another 600 tons slightly higher (selective).
 Total past prod. ?

Camps tents Mex. No add'n required.

Egypt. hd tools 2 ore cras 200 ft rail extra Au. bin

Buy	Hot lead at	500
	Camp	1200
	Reh Drill	500
	Pipe etc	300
		<u>2500</u>
	Rehab. shaft 2 miles	4000
	100 at 40	
	Drift 100 @ 15	1500
	Continuum	1000
		<u>9000</u>

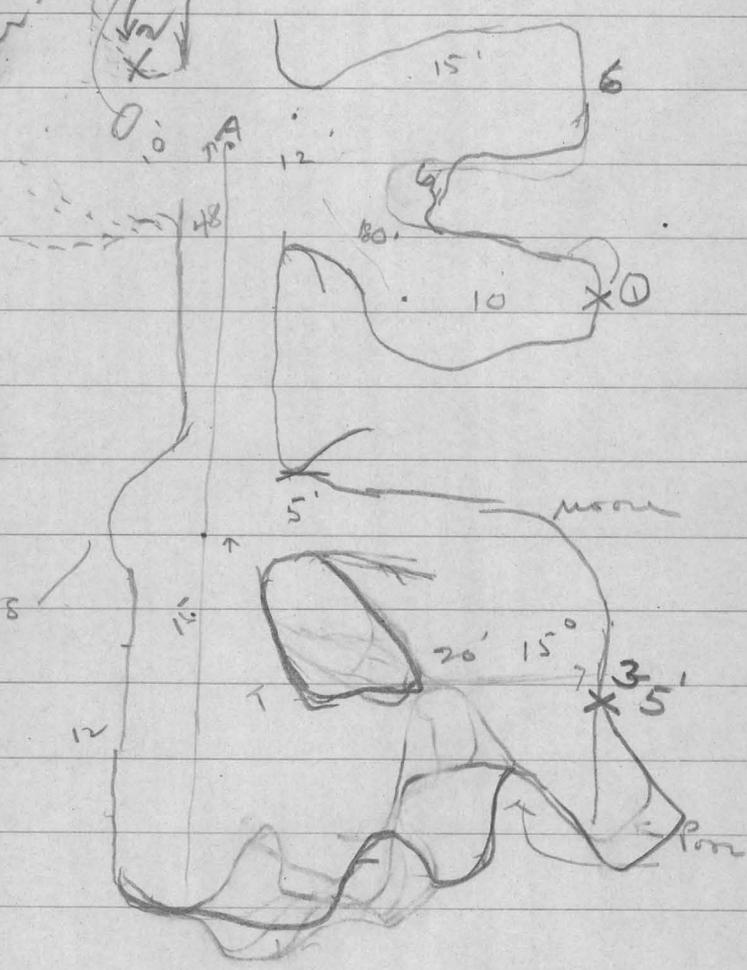
B-B



water abt. 18' below lamina (cont)
 said to be v. good below aunts
 stepped out to depth 25' (cont)
 loose room above
 under level toward post

16" wall
 Chalchicomula
 Point 2 white
 edge of the grade
 stop

S 30° W



15.2
 14.0

Pan

30-40'

20'

10' pillar
6 1/2" wh. qt. blue chert
about 1/2 way round.

72 1/2'
S17°W

Cut in road
out 20-40'
wide

S20W

24'

17.5'

v. little

38'

31'

51'

55'

37'

me

12'

N 46° E

+ 21°

38

23 1/2

S 20° W

18

38

SA

15'
15'
20'

22'

30'

20'

Docket No. ND-8449

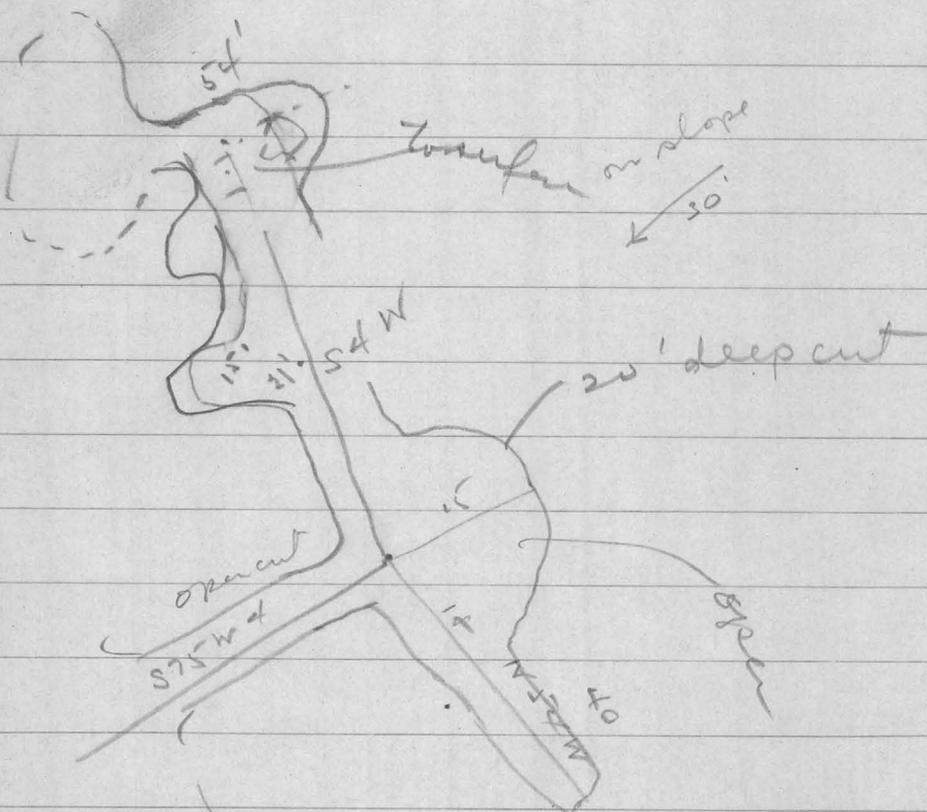
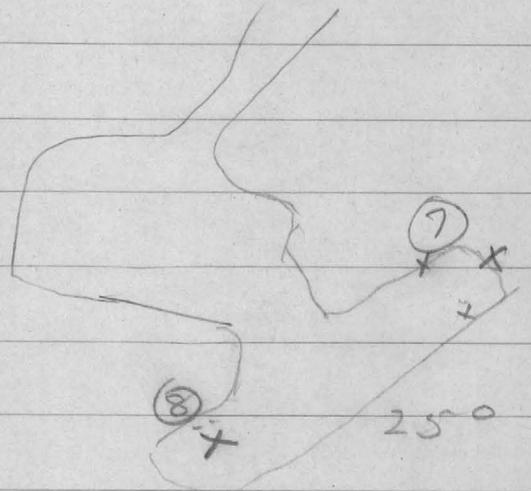
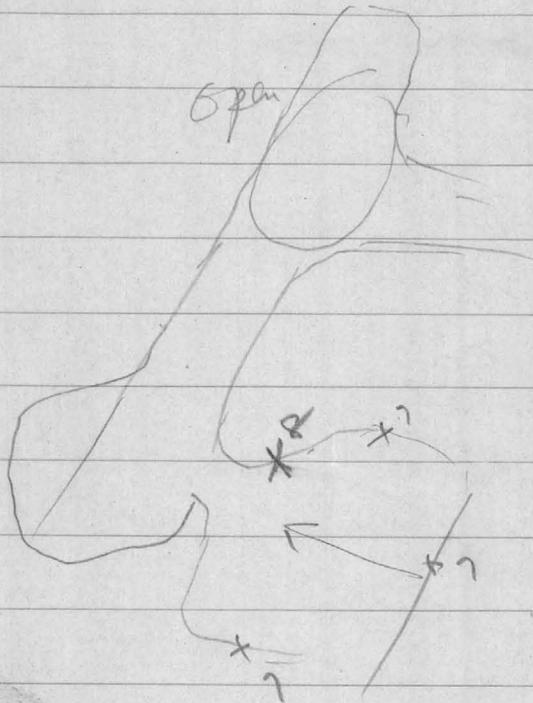
Date of Examination April 13 1944

Date of Report

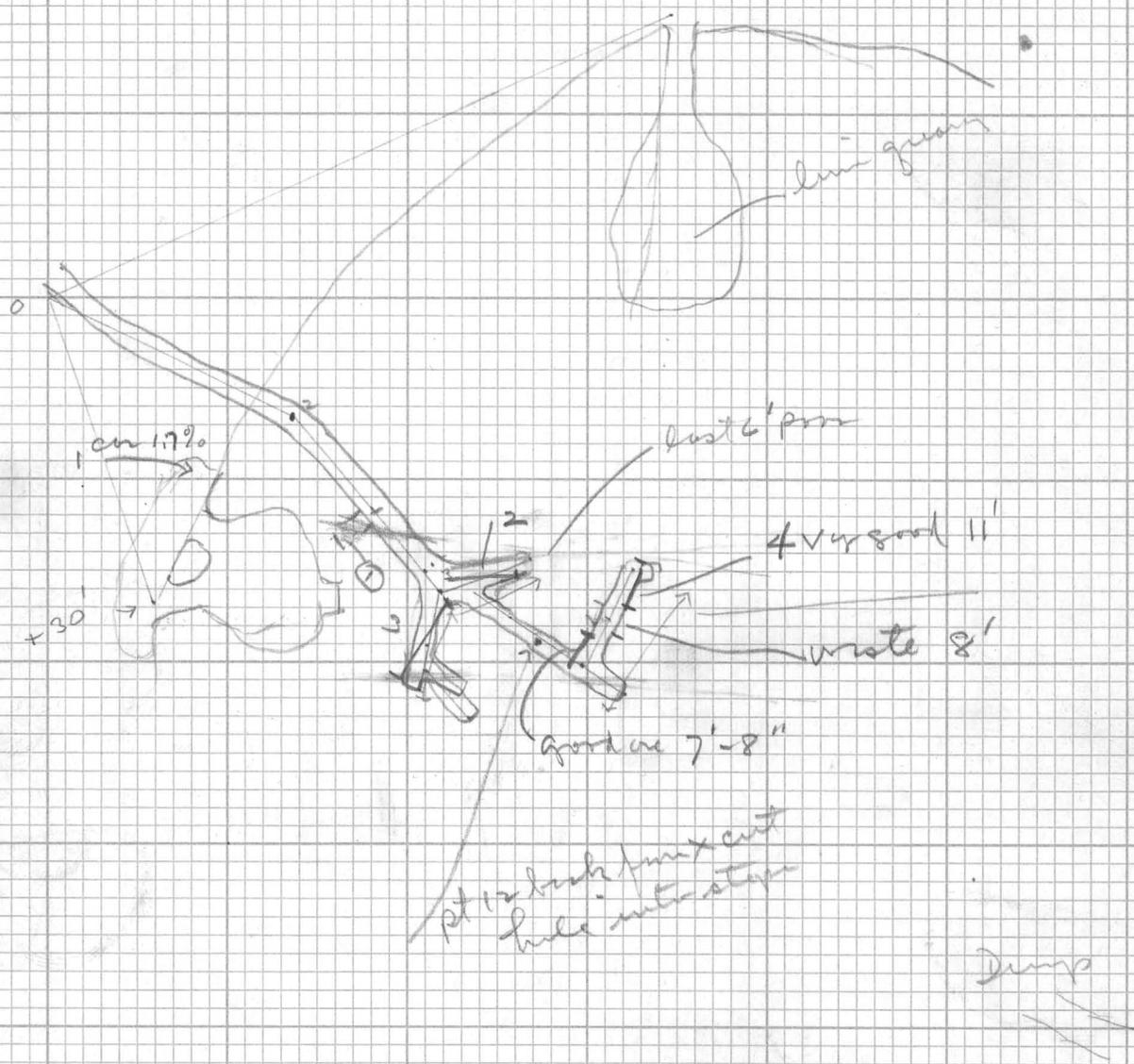
X The project was granted a ~~public~~ ^{dev.} ~~development~~ loan in the amount of \$3000 in 1943. The purpose of the loan was to provide working capital for shipping the main dump and to

178	146	300
66	14	
<hr/> 244	292	350
31		
<hr/> 279		
292		
<hr/> \$71		

Upper tunnel & mizula
other mizula openings



N



109.54
14.91
89.63

24.55
20.04
4.51

6.54
24.51
43.53

Dec 8, 1943 1200

Papago Chief - West of Tucson, Ariz.

13 Cents Bonus

47705
23125
4790

8 98.82
19.67
870.15

Date	No	Weight	Name	Au										Total Metal Cont			90% Pur	Bal. Payment	Total	Total		
				oz	gr	cu	Tons	SiO2	AlO3	S	Fe	Tons	value	De	Net	Cont					shipped	cont
10/5/43	1	✓ 672	Hayden	.02	4.16	1.62	93.1	90.7	3.1	1.4	47.5105	4.63	2.00	2.63	124.95	6502	1539	98	197.6	7465	30792	43537
10/29/43	2	✓ 733		.03	5.81	2.02	93.8	87.4	4.9	2.0	47.3815	2.43	2.01	3.42	256.81	19560	1914	114	275.3	9280		
11/15/43	3	✓ 783		.03	5.01	1.93	91.1	87.0	3.8	1.9	52.6050	6.72	2.01	4.71	247.77	18203	2031	158	2635	23047	4790	25610
11/22/43	4	✓ 801		.03	4.81	1.69	91.8	81.7	5.5	2.6	52.3010	5.82	2.01	3.81	199.27	13377	1968	157	254	20066		
12/1/43	5	✓ 845		.03	3.43	1.52	90.5	80.2	7.4	1.5	59.0725	4.93	2.00	2.93	173.08	9918	1726	177	202.6	20381	8287	82875
12/17/43	6	✓ 866		.03	3.97	1.58	91.4	86.2	4.8	1.9	57.1230	5.40	2.00	3.40	194.22	12290	1505	171	226.8	20489		
12/13/43	7	✓ 853		.03	3.23	1.52	89.0	78.6	7.2	2.0	57.3305	4.86	2.00	2.86	163.97	9152	1743	172	190.9	19784		
12-27-43	8	✓ 891		.02	2.58	1.26	90.0	77.0	8.7	1.5	45.1555	3.09	2.05	1.84	37.93	-19.67	1268	9.0	116.5	13936	5786	306054
											418.4795						13824	11.47	1698.6	74585		
1/14/44	9	✓ 8		.017	2.13	1.11	90.8	79.1	8.5	1.9	51.2005	2.35	2.17	1.18	92.2	-56.71	1137	8.7	109.1	12905		
1-7/44	10	✓ 20		.015	1.99	1.15	90.0	76.0	6.8	2.1	53.2100	2.32	2.00	1.32	16.26	-49.51	1169	8.0	105.9	12268		
1-18/44	11	✓ 55		.017	1.89	1.05	90.4	79.6	8.6	2.0	53.1080	2.08	2.16	1.08	-	-73.21	1117	9.0	100.5	12555		
1-18/44	12	✓ 56		.012	1.31	8.6	91.6	79.2	8.3	1.6	52.3650	1.35	2.10	1.75	-	406.62	901	6.3	68.6	10342		
1-25/44	13	✓ 94		.010	1.54	1.01	90.7	79.5	8.4	1.6	55.2090	1.77	2.11	1.34	-	-89.63	1115	5.5	85.0	12660		
1-31/44	14	✓ 97		.02	2.31	1.07	91.5	82.2	6.5	1.9	52.9245	2.44	2.00	1.4	23.29	-43.53	1154	10.6	122.3	13080		
1-31/44	15	✓ 98		.03	2.05	1.41	91.8	81.4	7.80	2.0	47.9210	4.47	2.00	2.47	118.49	-312	1353	14.4	146.3	15361		
2-11/44	16	✓ 139		.02	2.03	1.53	91.6	86.1	5.00	1.8	52.3430	3.63	2.00	1.63	38.46	-179	1402	10.4	158.6	18182		
2-17/44	17	✓ 164		.03	3.70	1.63	91.5	84.3	5.00	1.8	53.2915	5.29	2.00	3.29	175.19	-107.41	1735	10.0	177.0	19703		
2-28/44	18	✓ 190		.03	3.65	1.55	92.5	85.5	6.1	2.5	53.2630	5.13	2.00	3.13	166.71	-92.27	1651	14.0	180.4	18732		
3-7-44	19	216		.027	3.27	1.47	91.2	83.2	6.0	1.8	50.7645	3.61	2.00	1.61	88.84	-179	4989	4.24	542.00			
3-13-44	20	241		.027	3.34	1.46	90.1	83.3	5.8	2.0	53.2440	3.71	2.00	1.71	94.50	-24.07	1614	12.7	152.37			
3-18-44	21	253		.026	3.86	1.60	89.7	80.8	7.0	2.4	57.0155	4.36	2.00	2.38	121.92	-49.68	1633	13.27	181.63			
3-24-44	22	274		.03	3.68	1.63	91.6	85.0	4.7	1.6	49.192	5.28	2.00	1.61	125	-97.69	1604	14.76	181.03			
3-27	23	279		.03	3.16	1.46	91.7	82.7	5.4	1.4	53.5735	4.63	2.00	2.63	140.90	-73.54	1564	16.07	169.29			
3-31	24	289		.031	3.39	1.49	91.0	81.5	6.8	1.7	54.3900	4.82	2.00	2.82	153.88	-97.90	1610	16.32	182.84			
4-10-44	25	314		.018	3.09	1.28	91.3	82.5	6.1	2.0	52.110	3.24	2.00	1.24	68.58	-4.63	1374	9.66	141.07			
5-3-44	26	385		.01	2.96	1.31	85.0	72.3	8.4	1.6	46.4645	4.12	2.00	1.54	85.50	-27.08	1682	13.7	137.65			
				.024	3.20	1.386					1357.749						1113.14	3749	31.98	4340.8		3004.30
																						4268.42

Date	No	Weight	Name	Au										Total Metal Cont			90% Pur	Bal. Payment	Total	Total			
				oz	gr	cu	zn	Ca	SiO2	AlO3	S	Fe	Tons	value	De	Net					Cont	shipped	cont
7-23-43	2	2488		.28	2.55	1.0	2.8	6.6	45.3	5.9	7.8	10.9	52.023	11.72	3.46	8.27	480.23	37607	8090	14.566	122.66		
9-6-43	3	2534		.37	3.07	1.41	3.3	5.5	44.1	6.0	3.9	11.8	108.336	15.74	3.97	11.77	1275.11	1128.58	3055	40.084	332.59		
9-13-43	4	2541		.40	3.56	1.36	3.0	6.6	48.0	5.5	7.6	10.3	54.064	16.96	4.07	12.89	686.88	623.76	1471	21.626	192.47		
9-20-43	5	2552		.43	4.08	1.06	4.4	7.7	48.5	4.6	6.7	9.9	52.490	18.87	4.07	13.86	787.51	656.57	1113	22.571	261.40		
9-28-43	6	2566		.48	5.57	1.08	4.1	5.7	53.3	5.5	7.3	10.3	46.886	20.89	4.71	15.68	727.33	643.57	1002	22.265	255.59		
				.387	3.75	1.22							313.289					3428.43	7681	21.112	1174.71		372.55

A-69,
B-ND-7113 - 5000
B-ND-4726 15,000
10,000
30,000
Sept 9, 1942
Dec 10 42
Jan 10 42

325 Heard Building
Phoenix, Arizona
May 13, 1944

TULLY - Asst Chief - Mining Section - Washington DC

Re: Owens and Freeland - Docket No. ND-5978

I am enclosing herewith two copies of my supervising engineer's report upon the captioned project. Because of a delay in obtaining full information and, later, the press of more urgent business in this office I am late in getting this report to you. I am therefore air mailing it and would appreciate any early attention which might be given to the matter.

TRAVIS P. LANE
Supervising Engineer

TPL:ep
Encs.
Application
Copies Sup. Eng. Report
Letter from Applicant

RECONSTRUCTION FINANCE CORPORATION
MINING SECTION
REPORT OF SUPERVISING ENGINEER

Docket No. ND-5978 - Owens & Freeland
Date of Examination - April 13, 1944
Date of Report - May 12, 1944

The project was granted a loan in the amount of \$3000 in August 1943. The purpose of the loan was to provide working capital to ship the main ore dump, and to clean out the main tunnel and ship ore believed to be available above the tunnel level. The grade of the dump material was disappointing and although a substantial tonnage was shipped, the operation did not return a profit and the loan funds were entirely expended. Total production and grade of ore shipped to the date of the examination was as follows:

Dry Tons	Oz. Au.	Oz. Ag.	% Cu	Lbs. Cu
1359	.023	3.09	1.39	37,780

Shipping of dump ore is still in progress but the quantity of material yet available is quite limited and the operation is being conducted at a loss. The borrowers have drawn no compensation for their services and have carried recent operations at some financial loss to themselves, their only return being the satisfaction in making a considerable contribution of copper to the war effort.

The following report concerns an application for additional funds for the purpose of developing the mine.

1. NAME AND ADDRESS OF APPLICANT

Name: Sherwood B. Owens and John L. Freeland
Address: Box 769
Tucson, Arizona

Correspondent: Sherwood B. Owens, Box 769, Tucson, Arizona

2. CHARACTER OF PROJECT

Development of Copper-silver-gold deposit.

3. LOCATION OF MINE

The mine is located in the Baboquivari Mining District in Pima County, Arizona. The property is near the Mexican border and is 65 miles by road southwest from Tucson which is the nearest rail point and supply center. 24 miles of the road is level paved highway, the next 30 miles is mostly level gravelled road and the balance is good dirt road except the last 2 miles into the property. This last portion of the road follows in part the bed of a wash and is extremely rough in places with, however, no steep grades.

4. APPLICANT

The applicant is a partnership composed of two equal sharing partners, namely: Sherwood B. Owens and John L. Freeland. Both are comparatively young men. Mr. Owens, who directs the affairs of the partnership, conducts a trucking business in Tucson and is interested in a gravel

business owned by his partner, also of Tucson. He originally was engaged in oil field trucking and oil production in Texas and came to Tucson two years ago to undertake the construction of Government flying fields in the Tucson area. Neither of the partners is an experienced mining man. They have been successful in their own lines of work however, and the operations under the loan to date have been conducted in an efficient business-like manner.

5. LOAN REQUESTED

The applicant applies for a loan of \$12,000 which includes repayment of the outstanding loan in the amount of \$3,000.

6. DESCRIPTION OF PROJECT

A. General Features

1. There are no mine workings, mill or other appurtenances which are not confined within the applicant's ownership.
2. The proposed project would comply with state compensation and safety first statutes.
3. There are no apparent legal discrepancies in the application.
4. There are no impeded right-of-way facilities.
5. There is no likelihood of surface or sub-surface trespass during the project.

B. Existing Development

1. The mine is opened by tunnels and a shaft.
 - a. The applicant furnished with the application a rough general sketch of the workings. The sketch which accompanies this report is the result of a compass and tape survey made during the examination.
 - b. Vein samples were cut with pick and moil and gathered on canvass. The muck sample (No. 9) was a random grab sample.
 - c. The main tunnel was heavily caved at the portal but was accessible and in good condition except at the portal. The stopes above the tunnel were open but largely inaccessible. The underhand stope below the main level was inaccessible.
 - d. General features of deposit, etc.

The property known as the 'Papago Chief Mine comprises 4 unpatented claims and is being operated under a lease and option to purchase agreement with the owner. The early history of the mine is rather obscure. The first serious work was commenced in 1907 and the mine is reported to have produced a substantial amount of comparatively high grade ore during the succeeding several years. The work was done on a small scale and because of the remote location of the mine the material was closely sorted for shipment. During later years and until the present time the property was worked intermittently by leasers who "high graded" at various points on the surface and in the main tunnel workings above water level. No records are available regarding the period of greatest production, and only several settlements are available regarding shipments in recent years--some of these latter representing dump sortings. The size of the openings and the size and tenor of the discarded dump material lends credence to the reports of a substantial production having been made from the property.

The mine lies in a region of low hills near the Mexican border.

The country rock in the immediate vicinity is lime-shale and the mine development has been performed in a north-easterly trending shear zone in the lime-shale. The material in the shear zone is intensely silicified in places and contains numerous quartz lenses. The valuable mineral constituents are copper and gold and silver, contained in the lenses of hard grey quartz. The quartz lenses parallel the strike and dip (45° to 55° W) of the enclosing shear zone material.

Ore has been produced from surface cuts and several tunnels at various places in the shear zone but the principal workings consist of a tunnel driven some 300 feet southerly into the hill with stoping above and below the tunnel level. The main stope extends for a distance of about 125 feet from the portal and is caved to the surface in the first 50 feet and almost to the surface in the remaining 75 feet of length. This same shoot of ore is underhand stoped to a depth (reported) of 20 feet below the tunnel floor. The tunnel and cut is heavily caved at the entrance and accessible by climbing over the top of a large pile of debris (see map). The main stope above the level is open but inaccessible and apparently all the ore has been removed from here. The underhand stope is caved and filled with debris and is inaccessible. Further in the tunnel beyond this stope several small stopes were started on small ore showings and near the end of the tunnel an underhand stope was opened in the floor. This stope was caved and inaccessible but it could be seen to extend in both directions below the tunnel floor, and water could be seen standing at a depth of approximately 18 feet.

Samples 1,3,4 and 5 represent the better exposures in 3 small stopes in the inner part of the mine. The showings are low-grade and lack continuity.

No. 2 (.42 oz. Au., 24.5 oz. Ag., 6.41% Cu) was taken on the edge of the underhand stope near the end of the tunnel. It is said that a high grade shoot was mined below here. The sample contained chalcopyrite and bornite with some tetrahydride and chalcocite.

Sample No. 6 (.14 oz Au., 7.8 oz. Ag., 3.64% Cu) was cut in a pillar on the lower side of the drift. The vein here is a dense very hard gray quartz band containing a fair amount of chalcopyrite intermixed with some bornite. The stope above this point was mined some 5 to 7 feet wide and the underhand stope has about that same width.

Sample No. 10 was cut across a good showing of ore on the north edge of the shaft in the open cut at the entrance to the tunnel. The material was mostly oxidized and the ore was not continuous northward from this point. The cut was filled with a high pile of caved material and the shaft, said to be 45 feet deep, was open for only several feet. The operators had cleaned out to 20 ft. and stated that good ore was present in both ends to this depth but the walls had caved and filled the shaft again. A good showing of sulphide ore could be seen however in the south wall but could not be sampled because of the condition of the workings.

Sample No. 9 was taken from the material which was removed from the above described shaft.

About 60 ft. above the main tunnel and south from it an open cut with some drifting was made in the shear zone. A number

of random small lenses of ore were mined from here. The showings here were low grade however except as represented by sample No. 8 (.09 oz Au., 14.9 oz. Ag., 4.1% Cu), and lacked continuity. It is not clear that any of these showings are related to those obtaining in the south end of the main tunnel below and in any event the material is too low grade to be classed as ore.

There were no other exposures of interest upon the property.

C. PROPOSED DEVELOPMENT

The applicants propose to clean out and sink the shaft in the cut and sink an additional 55 feet and drift 100 feet south to develop the main ore shoot at that depth.

D. Equipment

There is no equipment at present upon the property. Complete mining equipment will have to be provided. Mexican labor is employed and the laborers live in tent houses at the property. Camp construction is not contemplated during the development program.

ORE RESERVES, VALUES, COST, ETC.

There are no reserves of blocked out ore in the mine. It is expected that the shaft and level development will make available a block of ore approximately 125 feet long by 70 feet high by 24" in width, or about 1500 tons of ore. The expectancy for developing ore is based upon the belief that the main ore shoot will be found to extend to 100 feet in depth in about the same size and grade as mined above the level. As noted previously in this report there are no records available regarding past production and no value therefore can be ascribed to the ore that was stoped nor that is expected to result from the proposed development except to say that the ore mined was probably "quite good". The pillar samples (Nos. 2 and 6) and the grade of the dump material affords the basis for the belief that good ore will be found in the deeper development of the ore shoot.

The fact that the underhand stoping stopped at about water level raises the question as to whether commercial values would be found to persist below water level. I am inclined to believe that they would since the predominant mineral is chalcopyrite, with occasional tetrahedrite, and therefore primary. The small amount of bornite which is present is intimately mixed with the chalcopyrite and appears also to be primary. Considerable azurite and some malachite is present but these minerals occur only as coatings on fractures and are not important ore minerals. Some secondary chalcocite is present but this also is not an important constituent of the ore.

The dump ore is presently being shipped to the Hayden smelter with treatment and transportation costs as follows:

Trucking	\$4.50
Freight	1.20
Treatment	<u>2.00</u>
	\$7.70

The truck haul is long (65 miles) and part of the road near the mine is very poor. The borrower has been trucking the ore with his own equipment and the above figure is his estimate of the cost. On a sustained operation it is probable that the contract trucking cost would be \$5.50 to \$6.00 per ton.

The clean mine ore is very high in silica (over 90%) and the Hayden smelter at the present time has a surplus of such material and has advised the borrower that it will not take over 200 tons of ore per month.

If marketed at the International Smelter at Miami, or at the El Paso smelter of A.S & R. additional freight and treatment charges would amount to upwards of \$2.00 per ton.

Mining and development cost would be high for a vein of this narrow width at this remote locality and is estimated at \$8.00 per ton.

Total cost therefore before royalty would be in the neighborhood of \$18.00 per ton, and it will be seen that the ore would need to assay about 3.5% Cu to cover costs (assuming the rather uniform gold-silver to copper ratios shown in the dump material). The property receives an 8¢ special copper premium.

ESTIMATED COST OF PROJECT

Hoist, bucket, etc.,	\$500
Compressor	1200
Rock Drill w/mountings, etc.,	450
Pipe & drill steel	400
Rehabilitate shaft and sink 55 ft @ 45¢	
per foot	4000
Drift 100 ft. at \$15 per ft.	1500
Contingencies	950
Repayment of 1st loan	3000

TOTAL \$12000

COMMENTS OF SUPERVISING ENGINEER

The vein is small and while the possibility for developing moderately high grade ore in the deeper development of the main ore shoot appears attractive there is not sufficient factual evidence available to warrant classing the proposed development as other than highly speculative.

An additional loan is not recommended.

TRAVIS P. LANE
Supervising Engineer

TPL:ep

No. 183 La

Phoenix, Arizona,

CHAS. A. DIEHL

April 15, 1944.

ARIZONA ASSAY OFFICE

Phone 3-4001

815 North First Street

P. O. Box 1148

This Certificate That samples submitted for assay by Mr. T. P. Lane.

contain as follows per ton of 2000 lbs. Avoir.

No.	OWEN MARKS Width	SILVER		VALUE (Oz.)	GOLD		VALUE (Oz.)	TOTAL VALUE Of Gold and Silver	PERCENTAGE		REMARKS
		Ounces	Tenths		Ounces	Hundths			%	%	
1	35"	10.7			.06	\$2.10			2.33		
2	16"	24.5			.42	\$14.70			6.41		
3	60"	2.1			.02	\$.70			1.70		
4	60"	2.5			.03	\$1.05			1.15		
5	28"	2.0			.07	\$2.45			1.45		
6	13"	7.8			.14	\$4.90			3.64		
7	24"	6.4			.14	\$4.90			2.32		
8	21"	14.9			.09	\$3.15			4.11		
9	Muck	5.6			.05	\$1.75			2.80		
10	rem 25"	18.4			.05	\$1.75			9.51		

Charges \$ 20.00

Assayer ARIZONA ASSAY OFFICE



Dear T P;

Got your message - thanks a lot. Does the enclosed letter cover the ground? If not, throw it away, advise, and I'll write another along whatever lines you suggest.

Since Washington takes so darned long to make up their minds on everything, I don't think it would be out of line to ask them for a definite commitment on this. Hayden advises that there is every chance of my getting this special. Scott has stopped shipping from Helvetia, Vreeland is hunting ore and not shipping, and McGee is running out. All of this opens up smelter market in good shape.

Since getting back under that ore in West end Bulldozer, believe would be very cheap operation to go ahead there and stope it out, then sink about thirty feet and stope again. This would save any dilution and would result in really high grade production.

Only problem this poses is whether to use shovel or Bulldozer on the stripping and loading at main mine. Experiments there show that lime cover shoots loose very easily from ore - would be very cheap to separate, bulldoze off down side of hill, then break ore and push over edge of dump into large bin with Bulldozer. One man could accomplish a lot this way. As I understand it - change from shovel to Bulldozer could be made right from Phoenix office without having to reopen or in any way change picture at Washington at this time.

If you can force an answer from Wash. on this will be greatly appreciated.

Best regds.

M.B.O.

RECONSTRUCTION FINANCE CORPORATION
MINING SECTION
PROGRESS REPORT OF SUPERVISING ENGINEER

Borrower: Sherwood B. Owens
Docket No: B-180
Date of Visit: December 15-18, 1946
Date of Report: December 24, 1946

The captioned project was visited on December 17 and progress of work to that date is commented upon as follows:

The property is located in a region of extremely rough topography. Proposed expenditures under the loan included the construction of a road up to the property from a county road at creek level. At the time of this visit some 1½ miles (the most difficult section) of the road had been completed in sufficiently good shape to permit a truck to pass that far, and the half mile of road beyond this point had been "roughed in" to the property with a bulldozer. A compressor and drills were in use near the end of the completed portion of the road widening turns and breaking out boulders in the road bed.

The road job has been a difficult one. In the central section the road climbs a steep rocky slope in a series of six switchbacks. The remainder of the road will not be difficult to construct and it was expected that supply trucks would be able to drive to the property within several days following this visit. The borrower estimated that the sum of \$3000.00 had been expended upon road construction and that an additional \$500.00 would be required to put it into shape usable for supply trucks. Some further small work on the turns will have to be done later to permit ore hauling. The borrower is a trucking and earth moving contractor and the performance here is quite creditable considering the extremely rugged terrain traversed by the road.

A bulldozer was on the property at work trenching in the northwest corner of the area in the neighborhood of the best ore showing (the 30-foot shaft). Three trenches had been made in an E-W direction at 50-foot intervals between the shaft and the granite contact north of the shaft. These trenches start some 120 to 200 feet east from the west contact and are driven toward this contact and reach their greatest depth at the contact with the overburden spilling onto lower ground outside and west of the area to be explored. The first trench whose center is 50 feet from the shaft is 20 feet wide and its floor is some 16 feet below the collar of the shaft which is the top of the ore in the shaft. The trench showed no ore except for a few scattered chunks in the loose dirt in the south wall of the trench. The two wide trenches north of this trench were not so deep and showed no ore. Some hard silicified material in the eastern portion of these trenches was of indeterminable character and it was planned to break into the material when the compressor was able to reach the property.

In addition to the above trenches a N-S trench was made 50 feet east from the shaft. The floor of this trench is 4 feet lower than the shaft collar at a point directly east of the shaft. It shows no ore. Also, trenching was in progress along the contact immediately south of the shaft. The surface slopes up slightly in a southerly direction from the shaft and the bottom of this trench, 5 feet deep, is about even with the collar of the shaft. While inspecting this work the dozer struck hard reddish silicified material resembling the shaft ore and too hard for the dozer to dig. The material will be drilled and broken into when the compressor is available.

Sherwood B. Owens
Docket No. B-180

Progress Report of Sup. Engr.
December 24, 1946

Summarizing: The 3 trenches north of the shaft are disappointing particularly since this was considered the most favorable portion of the area, and overburden here was expected to be very thin as at the shaft. The operators plan to dig somewhat deeper in the trench nearest the shaft and thus prove conclusively the continuity or discontinuity of the ore from the shaft to this point. No definite conclusion could be reached in the trenches east and south of the shaft. The former will be dug deeper, and the latter trench which seems to offer something worthwhile will be tested by drilling into the floor.

The borrower has promised to keep this office closely informed regarding the progress of work and probably another visit to the property will be required in the near future.

T. P. LANE
Supervising Engineer

TPL:gmk

RECONSTRUCTION FINANCE CORPORATION
MINING SECTION
PROGRESS REPORT OF SUPERVISING ENGINEER

Borrower: Sherwood B. Owens
Docket No: B-180
Date of Visit: January 6-7, 1947
Date of Report: January 17, 1947

Progress at the captioned project was noted in a report by this engineer, dated December 24, 1946. The results of the development to that time were altogether disappointing and some additional work consisting of further bulldozer trenching and the sinking of a number of shallow shafts, was laid out. This was done and the property was again visited on January 7, 1947, and the new work examined. The results continued unsatisfactory, and it was decided, with the borrower's consent, to sink a shallow test shaft in the one remaining likely area (NE) and if this did not expose something decidedly worthwhile the project would be abandoned. The attached letter received by this office from the borrower states that this pit was sunk with negative results and that the project is being abandoned.

Reference is made to the sketch attached to this report. All of the development is shown on the sketch together with a description of the working places and the results of the little sampling which seemed justified.

As indicated by the sketch the surface exploration was quite extensive and it tested the area in an entirely adequate manner. It will be recalled that granting of the loan was based upon the expectation that an area of considerable extent would be underlain, at shallow depth of overburden, by silicified mineralized limestone which at its base contacted granite on a more or less flat plane. Several old shallow shafts and trenches had shown economic gold values in fair thicknesses of silicified limestone. The material in which the gold content is of economic importance is a distinctively red colored semi-vitreous silicified limestone. The bulldozer trenching and the test shaft work which was performed with loan funds disclosed that the thicknesses of overburden and of limestone were extremely variable. The floors of the trenches show mostly silicified limestone except in the northwest corner of the area where the overburden extended to a greater depth than was practical to trench with the bulldozer. The test shafts all passed through overburden and limestone and bottomed in granite. The work did not develop any new ore nor any extensions of known ore exposures. The limestone was practically all grey-white in color and much of it was broken and intermixed with clay and gravel. Only occasional chunks and small thin patches of this limestone showed the reddish color and dense texture which is characteristic of ore in the area.

The several showings of ore upon which work was done in the past were quite evidently discovered by tracing surface float (there is evidence of small scale dry placering at several places on the property); and all the ore spots which existed in the area appear to have been uncovered in this early work.

The work performance with loan funds was remarkable in its amount, expedition and general quality, and it is unfortunate that the development offered no just reward. The shaft work was performed by contract by Mr. Wolfe, a former borrower for a project of his own (Docket No. B-ND-4793). He was assisted by his son and, for part of the time, by another man. Mr. Wolfe, who is 77 years

Sherwood B. Owens
Docket No. B-180

Progress Report of Sup. Engr.
January 17, 1947

old, contributed his full share of the heavy work, mucking most of the time. This crew worked on an average 12 hours a day and sank 158 feet of test shafts in 20 days using a windlass for hoisting and drilling and blasting hard sili-
cified limestone in much of this footage. They provided their own housing, pitching a tent on a high ridge, and the work continued without interruption despite extremely cold and stormy weather.

We expect to recover around \$1,500.00 of the \$10,000.00 disbursed to this project, and will soon be able to forward a liquidation report.

T. P. LANE
Supervising Engineer

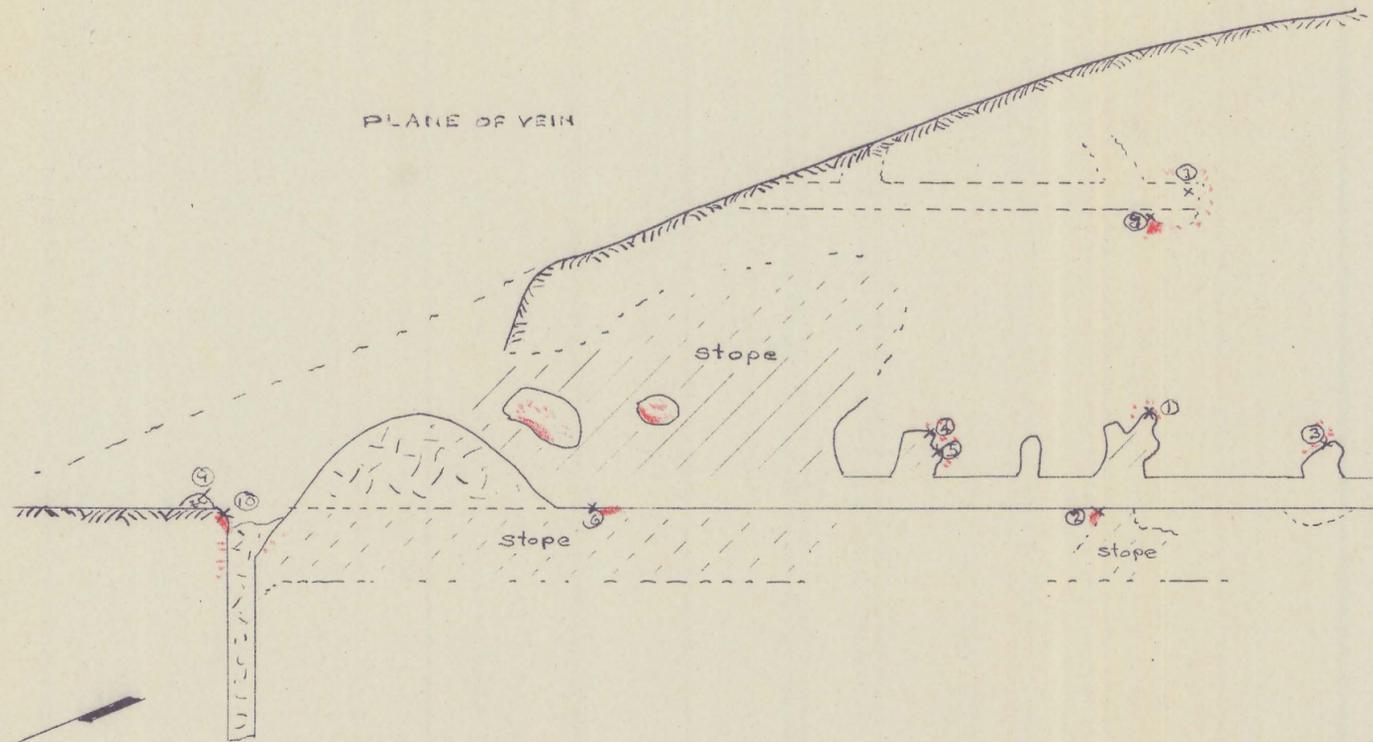
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Attachments:

- 1c - Letter from SBOwens, 1-10-47
- 1c - Assay Certificate
- 1c - Sketch

PLANE OF VEIN

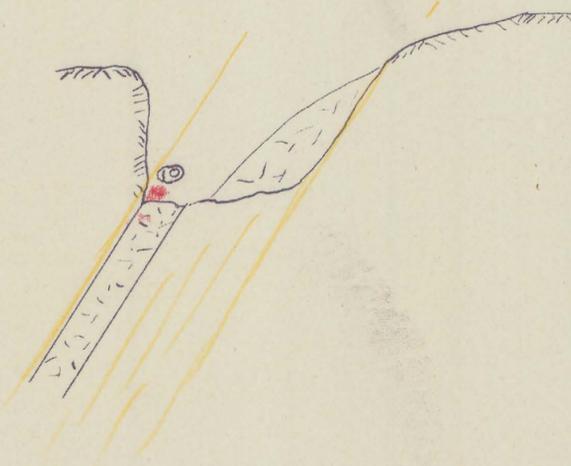
Sample No	Width	O ₂ Au	O ₂ Ag	%Cu
1	35"	.06	10.7	2.33
2	16"	.42	24.5	6.41
3	60"	.02	2.1	1.70
4	60"	.03	2.5	1.15
5	28"	.07	2.0	1.45
6	13"	.14	7.8	3.64
7	24"	.14	6.4	2.32
8	21"	.09	14.9	4.11
9	Muck	.05	5.6	2.80
10	25"	.05	18.4	9.51



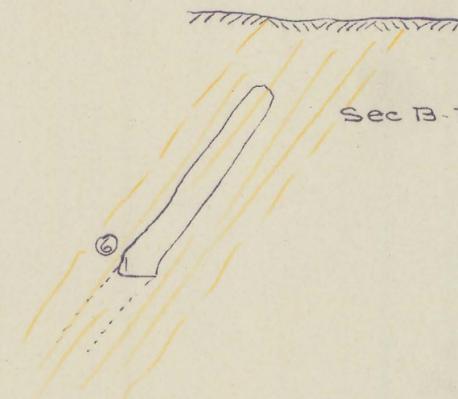
DOCKET NO. 5978
 PAPAGO CHIEF MINE
 Pima Co., Ariz.
 Scale: 1" = 30'
 samples: ⊙X -
 ore: ~~XXXX~~ ~~XXXX~~

April 13, 1944
 T.R. Lane

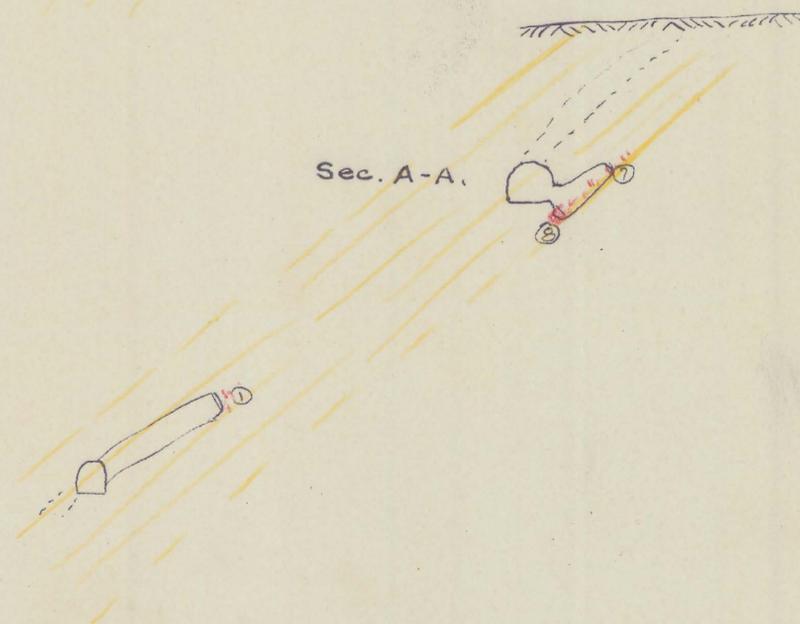
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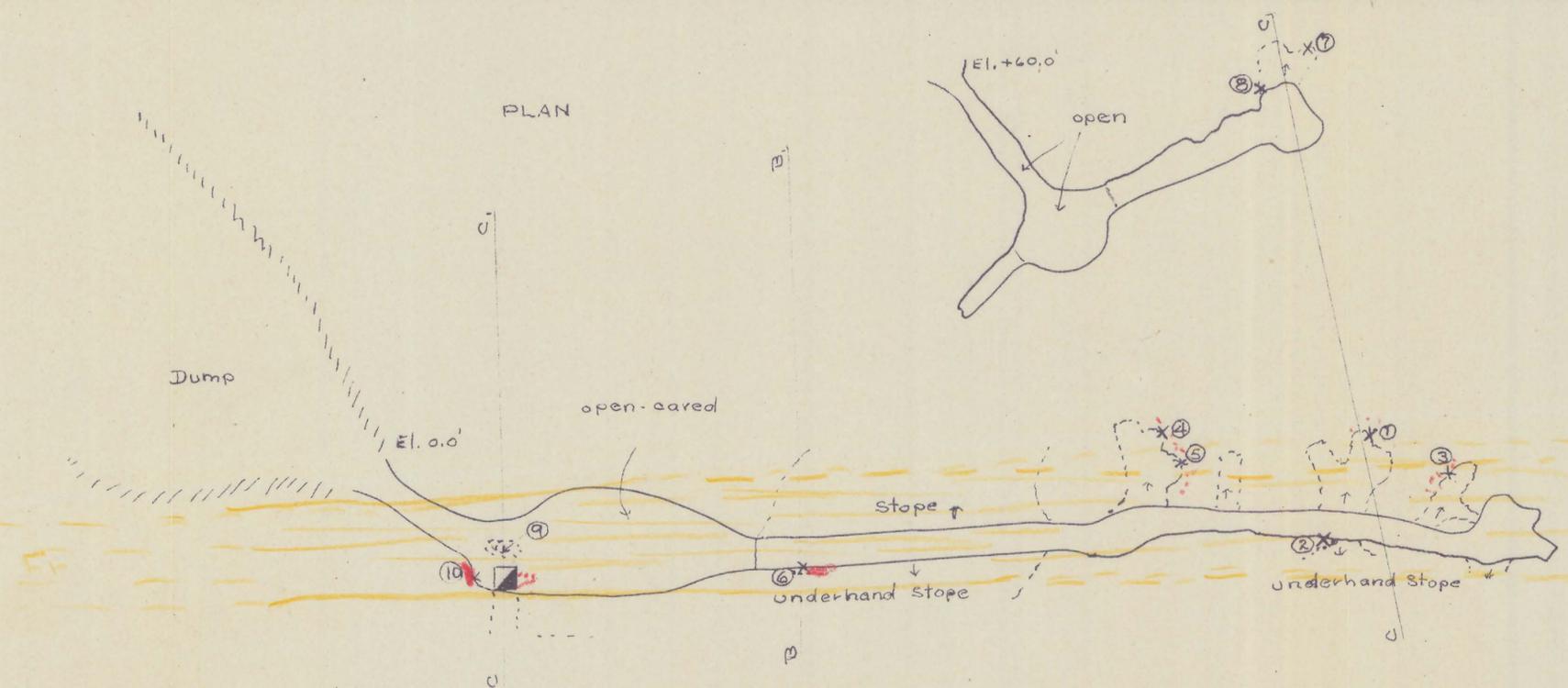
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PLAN



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