

1610 Elmar Way San Jose, Ca. 95129 (408) 257 8714

Mr. J. P. Elwell Engineering Limited Suite 1026 510 West Hastings Vancouver, B. C. Canada, V6B1L8 Dear Mr. Elwell,

Per your request for written information on the Double Eagle Gold Mine, we are enclosing the following material: Note, the upper right hand corners of the pages have the numbers circled as referenced below.

1. LEACHING TEST by the Nevada Bureau of mines and Geology on low grade ore from the dump at the Double Eagle Mine.

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- 2. ASSAY SAMPLES, 3 each. #1 face of vein, width 1 ft, to 6 ft., #10 was from dump, #20 was from a surface prospect.
- 3. FLOTATION TEST REPORT (5 pages) indicate a 60% recovery can be made.
- 4. OFFICIAL REPORT 7381, I. C. 7093 Pages 20 and 21. Note, "Gold Ledge Group" is the earlier name of the Double Eagle Mine.
- 5. PRODUCTION of Double Eagle Mine (Gold Ledge Group), from 1936 to 1940: 2, 767 tons containing Gold, Silver and Lead.
- 6. REPORT by Bureau of Mines, W. O. Vanderburg, Mining Engineer. (Essentially a repeat of '4" above. Gold averaged 0.91 ozs per ton in volume and silver was 13.44 ozs per ton. (52 tons.)

We are open to any reasonable offer of cash and or stock in addition to the FIVE PER CENT (5%) net smelter return as a royalty. We had been offered \$20,000 cash with a 10% royalty by people last year but we did not feel that was sufficient. We now feel that with the smaller royalty you may be able to arrange something satisfactory to all involved. We do feel that a minimum royalty of \$250 per month should be paid until the property is put into production depending upon the amount of cash and or stock is paid initially. We are open for negotiation and will accept any reasonable offer.

Sincerely yours,

Jack W. Wilson -- ikon



**NEVADA BUREAU OF MINES AND GEOLOGY** 

MACKAY SCHOOL OF MINES UNIVERSITY OF NEVADA • RENO RENO, NEVADA 89557

July 23, 1980

(702) 784-6691

Mr. Robert Chittenden Middlegate via Fallon, NV 89406

Dear Mr. Chittenden:

I am sorry to have taken so long to obtain results on the leach test made on the sample of gold ore you brought here at the end of May. However, power for our assay furnaces was disrupted for several weeks by excavation for a new building.

As shown by the enclosed assay sheet, the head sample contained 0.080 oz gold and about 1.47 oz of silver per ton. These values were sufficient to justify making a leach test, which I did on a portion of the pulverized ore prepared for assay.

The sample of pulverized ore was agitated by rolling in a bottle with cyanide solution for a total of about 42 hours. The leach was started with 0.10% sodium cyanide solution, but this had decreased to 0.017% after one day. More cyanide was added resulting in a final concentration of 0.026%. This is probably adequate for the leaching of gold, but may be too weak for good silver recovery.

Assay of the leach residue showed that it retained 0.010 oz gold and about 0.82 oz of silver per ton. Thus the indicated recovery of gold is 87.5% and that of silver 44.2%. I should point out that these recoveries are probably close to the maximum obtainable because pulverized ore and agitation were used. Recovery by leaching a heap of lump ore may be considerably less.

I trust that this may be helpful to you, and would be interested in hearing how your project turns out.

Sincerely yours,

Frank W. Bowdish

Mineral Technologist

FWB: ja

Enclosure



## Testing Engineers, Incorporated

October 20, 1980

Job No. 02554 Lab No. M09018

Mr. Jack Wilson 1610 Elmira Way San Jose, CA 95129

Dear Mr. Wilson,

Following your instructions, a chemical analysis has been performed on the samples you submitted to us on September 11, 1980.

Results are as follows:

#### CHEMISTRY ANALYSIS

Sample No.	Gold, per ton of 2,000 lbs.			
#1	0.525 Troy 02,			
#10	0.070			
#20	2.350			

Very truly yours,

JESTING ENGINEERS, INCORPORATED

Dushyant Manmohan Materials Engineer

/mc



# Western Testing ( Laboratories

1080 Linda Way Sparks, Nevada 89431 (702) 331-3600

REPORT

on

FLOTATION TESTS (Laboratory No. 101-4)

to

Jack Wilson 1610 Elmar Way San Jose, CA 94129

#### SUMMARY

Preliminary flotation tests were made on minus 65-mesh ore to obtain information regarding the possiblity of concentrating the gold and silver from this dump ore by the conventional bulk flotation method. A little over 60 percent of the precious metal values was recoverable by conventional flotation treatment.

#### ORE SAMPLE PREPARATION

The submitted sample of dump ore was crushed to a nominal 3/8-inch feed. Then, a 5-pound sample was split out, using a riffle-type sampler. The 5-pound charge was pulverized to about 65 mesh and then riffled down to a 1-pound sample. This material was pulverized to minus 100 mesh, mixed by rolling, and used as the heads for assaying.

Report Flotation Tests (Laboratory No. 101-4) May 5, 1980--Page 2

#### ANALYSIS OF ORE SAMPLE

The head sample was analyzed for gold and silver, using the conventional fire-assay procedure. Results were:

Gold 0.114 Ounce per Ton of Ore Silver 2.06 Ounce per Ton of Ore

#### FLOTATION

The flotation was conducted on a 600-gram batch of minus 65-mesh ground ore in a Denver Sub-A laboratory flotation machine at a pulp density of about 22 percent solids. Because the dump ore contained only very samll amounts of sulfides, a bulk flotation was made to recover as much of the gold- and silver-bearing minerals as possible. Three increments of the combination of 0.03 pound per ton each of Aero 3477 promoter, sodium isobutyl Xanthate, and Aerofloat 208 promoter were used as collector, and Dowfroth 250 was used as the frother.

After the bulk flotation step in Test 1, the pulp was conditioned with sodium sulfide to sulfidize base metal oxide minerals. The pulp was conditioned with one pound of soda ash per ton of feed to improve the sulfidizing action of the sodium sulfide. Then, one pound of technical-grade sodium sulfide per ton of ore was added to the pulp. Collectors used in the attempt to float the sulfidized oxide minerals were 0.03 pound each of the Xanthate and Aero 3744 promoter (as above per ton of ore). Frother was Cresylic Acid. Three stages, or increments, of sodium sulfide and collectors were employed. Examination of the froth, during flotation, revealed that very little, if any, sulfidization or concentration of minerals had occurred.

A second flotation test was made--mainly as a check on the first one; a change was made in the manner of conditioning the pulp, after the bulk flotation had been completed, to obtain further information on the flotation characteristics of this ore. In this test, the bulk flotation tails were conditioned with one pound of  $\text{CuSO}_4.5\text{H}_2\text{O}$  per ton or ore, instead of Na<sub>2</sub>S used above. No sulfides were observed in the resulting rougher concentrates.

A screen analysis test was conducted on each rougher tailings to determine if finer grinding might enhance the recovery of the gold and silver. Report Flotation Tests (Laboratory No. 101-5) May 5, 1980--Page 4

TABLE 2

FLOTATION RESULTS
SHOWING DISTRIBUTION OF GOLD/SILVER

Product	Distribution, Percent of Total		
	Weight	Gold	Silver
Test 1:			
Ro Concentrates #1 Ro Concentrates #2 Ro Tails	2.0 5.2	60.2 5.6	55.2 5.7
+100 Mesh -100 +200 Mesh -200 Mesh Composite	22.2 20.2 50.4 100.0	8.3 7.4 18.5 100.0	8.2 8.8 22.1 100.0
Test 2:			
Ro Concentrates #1 Ro Concentrates #2 Ro Tails	1.8 1.4	61.7	60.1 1.9
+100 Mesh -100 +200 Mesh -200 Mesh Composite	16.7 21.8 58.3 100.0	6.5 8.4 21.5 100.0	6.2 7.6 24.2 100.0

These results indicate that recoveries of 60 percent of the silver and gold can be made from the dump ore by flotation treatment of the minus 65-mesh feed. The screen analysis of the rougher tailings further indicate that finer grinding would not enhance the recovery of either silver or gold. The results also indicate that flotation concentrates of good economic grade can be produced. In both tests, the rougher concentrates contained over 50 ounces of silver and 3 ounces of gold per ton. In continuous operation, the concentrates (produced) should be higher in grade with recoveries equal to those reported herein. The flotation operator in plant practise may have a problem trying to control the flotation conditions visually, because the dump ore contains too little sulfides to produce a heavy laden froth.

Report Flotation Tests (Laboratory No. 101-4) May 5, 1980--Page 3

Results of the flotation tests (1 and 2) are shown in Table 1 and 2. Table 1 presents gold/silver assay results. Table 2 shows the distribution (percent of total) of gold and silver in the ore sample tested.

TABLE 1

FLOTATION RESULTS
SHOWING GOLD/SILVER PER TON

Product	Assay of Products		
	Oz of Gold/T	Oz of Silver/T	
<u>Test</u> <u>1</u> :			
Ro Concentrates #1 Ro Concentrates #2 Ro Tails	3.25 0.12	53.68	
+100 Mesh -100 +200 Mesh -200 Mesh	0.04 0.04 0.04	0.72 0.82 0.85	
Composite	0.108	1.94	
Test 2:			
Ro Concentrates #1 Ro Concentrates #2 Ro Tails	3.69 0.15	70.35 2.63	
+100 Mesh -100 +200 Mesh -200 Mesh	0.044 0.042 0.040	0.77 0.73 0.88	
Composite	0.107	2.11	

Report Flotation Tests (Laboratory No. 101-4) May 5, 1980--Page 5

#### CONCLUSIONS

Flotation treatment of minus 65-mesh dump ore by the conventional bulk flotation technique gave a recovery of a little over 60 percent of the silver and gold in a rougher concentrate containing 53 to 70 ounces of silver and about 3.4 ounces of gold per ton. Rougher concentrates represented only 2 percent of the feed by weight.

Harold Heinen

Projects Manager

Harold Heinen

HH/dj

### EASTGATE DISTRICT

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The Eastgate district is on the west side of the Desatoya Range in southeastern Churchill County about 50 miles east-southeast of Fallon, the nearest railroad point. No information is available concerning the first mining activity in this area, although it is known that a number of gold and silver properties have been prospected in a desultory manner for at least 40 years. The production of the district is estimated at about \$25,000 in shipping ore, most of which was derived from the Gold Ledge group of claims. In the first part of 1939 the only activity was at the Gold Ledge property.

## Gold Ledge Group

The Gold Ledge group of unpatented claims, owned by W. H. Schweis, of Reno, Nev., is situated on a mountain spur off the west side of the Desatoya Range about 56 miles east southeast of Fallon, the nearest rail—road point. It can be reached by automobile over an unimproved desert road 5 miles in length, which leaves the Lincoln Highway about 1 mile west of Eastgate. The last 2 miles of the road is in a narrow, steep canyon with a number of sharp turns. First locations in this area were made by E. W. Baker in 1906. The Gold Ledge property has been worked intermittently by individuals and small companies. In 1934 the property was operated for a short time by the Monarch Gold Ledge Mining Co., which erected a 50-ton smalgamation—concentration mill several miles northwest of the mine, but it was unsuccessful; the mill equipment was sold in 1939. About \$20,000 in

Development consists of an adit 350 feet in length along the ledge, an inclined shaft 200 feet in depth with levels at 150 and 200 feet below the surface, a vertical shaft 110 feet deep, and other workings, totaling about 1,500 feet. Mining equipment includes a 7 by 6-inch Sullivan air compressor, belt-driven by an automobile engine; a West Coast, 5-horsepower, gasoline geared hoist; rock drills and other mining tools; a blacksnith shop; and camp accommodations for a crew of four men. Although there is no water at the mine, it can be obtained in Eastgate Wash, several miles northwest of the mine. In 1939 the property was being worked by Schweis with a crew of two men. In 1938 he shipped about 100 tons of ore, averaging approximately \$30 per ton, to the Dayton custom mill at Silver City, Nev. The truck haul to the Dayton mill, a distance of about 160 miles over hard-surfaced roads, cost \$5 per ton and milling was \$4 per ton. The shipper was paid for 90 percent of the assay value of the ore.

Ore containing gold and silver occurs in a fault fissure vein striking N. 30° E. and dipping about 65° easterly. The formation is altered rhyolite. The vein ranges in width from 1 to 6 feet, with no well-defined walls. The gangue is composed largely of crushed and iron-stained rhyolite showing little silicification. At the south end of the workings the vein has been intercepted by a number of faults that cut it at right angles; to the north, a fault striking N. and S. and dipping 70° E. apparently has displaced the vein several hundred feet north, as indicated by workings on a vein east of the fault.

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The smelter returns on a shipment of ore made by W. H. Schweis to International Smelting Co. at Tooele, Utah, on March 20, 1936, furnished the following data:

	•		
Metal quotations:	Gold	\$35.00 per ou	nce.
	Silver	۳ 77	<b>4</b>
	Lead	4.6 cts. p	er lb.
	•	Ounces	
Settlement assay:	Gold	•91	•
	Silver	13.44	
		Percent	
	Copper	•07	
	Lead	2.0	
	Zinc	Nil	•
	Bulfur	•5	•
	Iron	1.8	• • •
	Insoluble	90.2	
	Lime	•7	
	2 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Pounds	
Net weight	•	107.500	
Moisture 2.64 per	cent	2,838	
rozovac c.o. per	Cent		•
Dry weight		104,662	52.331 tons
	cead, 50 percent 0.01075 per pou 31 ver, 95 percent 0.77 per ounce. 101d, 91 percent 35 per ounce. 170ss value per	andant at	•
Charge, 10 per	t charge, per to reent of gross t over \$25	·	
Treatment char	rge	5.403	5.403
Net value per 52.331 tons at \$	ton		33.627 • • • • • \$1,759.73
Deductions:	Freight, \$4.70	per ton	252.62
N	et proceeds		1,507.11

## Buffalo Hump Group

The Buffalo Hump group of six unpatented claims, owned by W. H. Schweis is in the Desatoya Range about 14 miles by road southeast of Eastgate. It can be reached by automobile over a short road that leaves the Ione Road 10 miles south of the Lincoln Highway. The property was discovered by Thomas Wilson and Robert North some years ago, and although considerable prospecting has been done, the only production has been several carloads of shipping ore. In the first part of 1939 the property was inactive.

## (GOLD LEDGE GROUP)

# Nevada Metals Mineral Production 1859 - 1940 inclusive University of Nevada Bulletin 37

#### EASTGATE

GOLD	SILVER	LEAD
•	TONS	•
1936	295	, \$10,229
1937	93	3,185
1938	90	2,341
1939	492	7,320
1940	1,797	37,912
	2,767	\$60,987

Above totals were for the combined Gold, Silver and Lead,

## Eastgate Mining District

Gold Ledge Group

by

W.O. VANDERBURG - Mining Engineer Mining Division - Bureau of Mines

The gold ledge group of unpatented claims is situated on a mountain spur off the west side of the Desatoya Range about 56 miles east south east of Fallon, Nevada, the nearest railroad point.

It can be reached by automobile over an unimproved desert road 5 miles in length, which leaves the Lincoln Hi-Way about 1 mile west of Eastgate. The last 2 miles of the road is in a narrow, steep canyon with a number of sharp turns.

First locations in this area were made by E. W. Baker, in 1906. The Gold Ledge Property has been worked intermittently by individuals and small companies.

In 1934, the property was operated for a short time by the Monarch Gold Ledge Mining Co., which erected a 50 ton amalgamation-concentration mill several miles north west of the mine, but it was unsuccessful. The mill equipment was sold in 1939; about \$20,000 in shipping ore had been produced.

Development consists of an adit 350 feet in length along the ledge, an incline shaft 200 feet deep, with levels at 150 and 200 feet below the surface, a vertical shaft 110 feet deep and other workings totalling about 1,500 feet. Mining equipment includes a 7 by 6 inch Sullivan Air Compressor belt driven by an automobile engine. A west coast 5 horsepower gasoline geared hoist, rock drills and other mining tools, a blacksmith shop and camp accomedations for a crew of four men.

Although there is no water at the mine, it can be obtained in Eastgate Wash several miles northwest of the mine.

In 1939 the property was being worked by W. H. Schweis with a crew of two men. The Gold Ledge Group of unpatented claims was owned by W. H. Schweis of Reno, Nevada. In 1938, he shipped about 100 tons of ore averaging approximately \$30 per ton to Dayton mill, a distance of about 160 miles, over hard surface roads, at a cost of \$5 per ton and milling was \$4 per ton. The shipper was paid for 90% of the assay value of the ore.

Ore containing gold and silver occurs in a fault fissure vein striking north 30 defrees east and dipping 65 degrees easterly.

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The formation is altered rhyolite. The vein ranges from 1 to 6 feet, with no well defined walls. The gangue is composed largely of crushed and iron stained rhydite showing little silicification.

At the south end of the workings the vein has been intercepted by a number of faults that cut at right angles.

To the north, a fault striking N and S, and dipping 70 degrees east apparently has displaced the vain several hundred feet north as indicated by workings on a vein east of the fault.

The smelter returns on a shipment of ore made by W. H. Schweis to the International Smelting Co., at Tooele, Utah, on March 20th, 1936, furnished the following data.

## Metal Quotations

Gold \$35 per ounce Silver .77 per ounce Lead 4.6 cents per 1b.

## Settlement assays:

	ounces		percent
Gold	.91		
Silver	13.44		
Copper			.07%
Lead		•	2.0%

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## Settlement assays:

•	Ounces	percent	•
Gold	.91		
Silver	13.44		. 0.7
Copper		.07%	• • 0 7 .
Lead		2.0 %	2.0
Zinc		Nil	5
Sulfur		. 5%	<b>-</b> 5.
Iron		1.8%	19.
Insoluable		90.2%	1 , 0
Lime	•	. 7%	• /
			$ \sim$ 7
			5,0

Net Weight In	Pounds		
	107,500		
Moisture 2.6%	- 2,838		
Dry Weight	104,662	=52 <b>•</b> 331	tons

Metal payment lead 50 percent \$0.01075 per lb. =	.215
Silver 95% at \$0.77 per ounce	9.831
Gold 91% at \$35.00 per ounce	28.984
Gross value per ton	\$39.034

\$39,034 <u>5.403</u> treatment chg. 33.627 net <u>x 52.331</u> tons \$1,759.73

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### GOLD LEDGE GROUP

by

#### R. L. GERISH

GOLD

SILVER

LEAD

The Gold Ledge Group of unpatented claims are owned by Richard L. Gerish of 275 Bret Harte Avenue, Reno, Nevada and is situated in the Eastgate Mining District, Churchill County, Nevada.

The potential of this mine is unlimited. It is going to cost very little to make a profitable operation.

The Gold Ledge Mine was operating on a small scale from 1936 to 1940, when closed down by Public Orders, because of World War 2, and never reopened because of market prices. You would have to look for a great many years to find an opportunity as promising as this one. I offer to you the following information.

With Good Luck.

Behard Herich

Richard L. Gerish

dollained this Engerty 1967 & om asping 1,000,000 and price on a Poyear Leave Option; With a guarantied rayabily of \$250 00 per month. In on 150% of one production

Frank Mode Box 65

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