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DAWSON METALLURGICAL LABORATORIES, INC.

P.O. Box 7685
5217 Major Street
Murray, Utah 84107-0685
Phone: 801-262-0922

June 3, 1988

A.F. Budge Mining LTD.
7340 East Shoeman Lane
Suite 111-B-(E)
Scottsdale, Arizona 85251

Attn: Carole A. O'Brien

Subject: Results of Cyanide Leach Testing United Verde Extension Sample UVX-902-W. Our Project No. P-1534.

Dear Ms. O'Brien:

Pursuant to discussions with Mr. Frank Millsaps, cyanide leach testing was performed on a sample of United Verde Extension ore. These tests were performed to determine the variation in gold and silver extraction with increasing grind fineness. Previous testing on this highly siliceous, oxide iron-bearing sample, as referenced in an attached letter from Mr. Don White, indicated significant gold encapsulation through at least 200 mesh.

Specific testwork performed included:

- Bottle roll cyanidation tests at feed sizes ranging from minus 3/4 inch to 99 percent minus 200 mesh.

- Assay screen analyses of selected leach residues.

I. - Sample Description and Head Analyses

Four boxes of sample weighing 24 kilograms each were received at our laboratory April 13, 1988 and assigned Our Lot No. P-1534. Each box contained minus 6 inch material identified as UVX 902-W. The contents of each box were thoroughly mixed into one sample and stage crushed through 3/4 inch. One-half of the sample was stored at minus 3/4 inch, while the other half of the sample was stage crushed through 20 mesh and a head sample split out for gold and silver assay. Head assay results are presented on the following page and compared with back-calculated head assays from testwork.

P-1534: A.F. Budge
Head Assay Results: UVX - 902-W

	Assay, oz/Ton	
	Gold	Silver
Assay Head	0.089	7.45
Back-Calc. Head*	0.111	8.25

* Avg. 4 tests

The sample appeared siliceous with significant iron oxides, and was a chocolate brown color.

II. - Test Results

Gold and silver extraction from this sample increase as the grind fineness increases. However, even at an extremely fine grind of 99 percent minus 200 mesh (89 percent minus 325 mesh) a relatively high leach residue assaying 0.036 oz/ton Au and 3.50 oz/ton Ag was obtained from a 0.109 oz/ton Au, 8.11 oz/ton Ag calculated head. Leach extraction results at increasing grind fineness are summarized below:

P-1534: A.F. Budge
Cyanidation Test Results Summary

Test	Grind	Assay, oz/Ton				NaCN
		Residue		Calc Head		Consumed
No.	%-200	Au	Ag	Au	Ag	lb/Ton Ore
2	-3/4"	0.105	8.03	0.117	8.32	2.10
1	47.4	0.051	5.37	0.104	8.16	2.55
3	83.4	0.046	4.91	0.114	8.41	10.53
4*	99.4	0.036	3.50	0.109	8.11	6.64

* 5 lb NaCN/ton solution used in this test, all others used 10 lb/ton

An assay screen analysis of the leach residue from Test No. 3 indicated significant unleached gold in all size fractions through 400 mesh. Results are summarized below:

P-1534: A.F. Budge
Residue Assay Screen Analysis: Test No. 3

Size Fraction	Weight	Assay, oz/Ton	
Mesh	Percent	Au	Ag
+200	17.1	0.080	6.40
200/325	32.3	0.065	6.06
325/400	3.5	0.074	5.51
-400	47.1	0.039	3.76
Total	100.0	0.056	5.02

These results are presented in a detailed summary table and individual test data sheets attached to the end of this report.

A high cyanide consumption of 10.5 lb NaCN per ton of ore was calculated for Test No. 3. Solution analyses indicated approximately 750 ppm iron and 233 ppm copper. Based on these analyses approximately 75 percent of the cyanide consumption is due to complexation with iron, while almost 10 percent of the cyanide consumption is due to complexation with copper.

III. - Test Procedures

Test procedures summarized in this section are presented in detailed test sheets attached to the end of this report.

A. - Cyanidation Tests

A generalized test procedure consisted of ball mill grinding 1000 grams of minus 20 mesh ore for a measured amount of time at 50 percent solids. The ground pulp was adjusted to pH 11-11.5 with hydrated lime, cyanide added to provide an initial solution concentration of 10 lb NaCN/ton, and the slurry bottle rolled for 72 hours. The leach residue from test No. 3 was releached for 72 hours with a 10 lb/ton NaCN solution because the cyanide in original leach solution was almost completely depleted.

At Mr. Millsaps request the leach solution in Test No. 4 was maintained at 5 lb NaCN per ton solution for 72 hours by periodic titration and reconstitution.

Three kilograms of minus 3/4 inch ore was used for the coarse ore leach in Test No. 2.

B. - Leach Residue Assay Screen

Leach residues from selected tests were assay screened by wet screening the leach residue at the required screen sizes, drying each fraction, weighing, and submitting each fraction for gold and silver analysis by standard fire assay.

If you have any questions or comments concerning this testwork, please call.

Sincerely,
DAWSON METALLURGICAL LABORATORIES, INC.

Philip Thompson

Philip Thompson,
Vice President

cc: Mr. Frank Millsaps

PT-cac

P-1534: A.F. Budge Mining, LTD.
Cyanide Leach Results: Sample UVX -902 W

Test No.	Grind, %-200	Product	Assay, oz/T Au	Assay, oz/T Ag	Dist., % Au	Dist., % Ag	NaCN Consumed, lb/Ton Ore
2	-3/4"	Solution	0.012	0.34	10.5	4.2	2.10
		Residue	0.105	8.03	89.5	95.8	
		Total (calc)	0.117	8.32	100.0	100.0	
		Total (assay)	0.089	7.45			
1	47.4	Solution	0.051	2.67	51.3	34.4	2.55
		Residue	0.051	5.37	48.7	65.6	
		Total (calc)	0.104	8.16	100.0	100.0	
		Total (assay)	0.089	7.45			
3	83.4	Solution	0.038	2.03	34.2	24.8	10.53
		Releach Sol'n	0.012	1.17	25.4	16.0	
		Residue	0.046	4.91	40.4	59.2	
		Total (calc)	0.114	8.41	100.0	100.0	
		Total (assay)	0.089	7.45			
4	99.4	Solution	0.067	4.22	67.0	56.9	6.64
		Residue	0.036	3.50	33.0	43.1	
		Total (calc)	0.109	8.11	100.0	100.0	
		Total (assay)	0.089	7.45			

Leach Residue Assay Screen Analyses

Test No.	Mesh Size	WGT - %	Assay, oz/Ton Au	Assay, oz/Ton Ag	Distribution, % Au	Distribution, % Ag
2	+1/4"	56.4	0.112	9.15	60.3	64.2
	1/4"/10	24.4	0.101	7.94	23.6	24.1
	10/35	7.2	0.122	6.98	8.4	6.3
	35/100	3.5	0.104	4.58	3.5	2.0
	-100	8.5	0.052	3.17	4.2	3.4
	Total	100.0	0.105	8.03	100.00	100.0
3	+200	17.1	0.080	6.40	24.6	21.8
	200/325	32.3	0.065	6.06	37.7	39.0
	325/400	3.5	0.074	5.51	4.7	3.9
	-400	47.1	0.039	3.76	33.0	35.3
	Total (calc)	100.0	0.056	5.02	100.0	100.0

Test No. 2: 72 hour Leach, 50% Solids, 10 lb/ton NaCN Solution
Test No. 1: 72 hour Leach, 50% Solids, 10 lb/ton NaCN Solution
Test No. 3: 72 hour Leach, 50% Solids, 10 lb/ton NaCN Solution, Releach 72 hours.
Test No. 4: 72 hour Leach, 50% Solids, 5 lb/ton NaCN Solution (maintained)

DAWSON METALLURGICAL LABORATORIES, INC.

P. O. BOX 7685
5217 Major Street
Murray, Utah 84107
Phone: 801-262-0922

PROJECT NO. P-1534
DATE 4/18/88
BY LA
Comp #1

TEST NO. 1 NAME United Verde Extension

72 hour Leach on 20' Ball Mill Grind with 10 lb/ton NaCN Solution

Product	Weight	Assay Au	Assay Ag	Units Au	Units Ag	Distribution Au	Distribution Ag
Leach Solution	1051.0	0.051	2.67	0.5360	28.062	51.32	34.39
Leach Residue	997.0	0.051	5.37	0.5085	53.539	48.68	65.61
Head Calculated	1000.0	0.104	8.16	1.0445	81.601	100.00	100.00

V1C

Approximate Work Index: 150 Mesh: 29
200 Mesh: 28
Average : 28

OPERATION	BM		Start		Off
TIME	20'		8:30		8:30
REAGENTS - LBS PER TON			Leach		72 hrs
Ore gram	1000				
Water gram	1000				
Lime gram		2.0			
NaCN gram			5.0		
NaCN Titration, lb/T Sol'n					7.09
CaO Titration, lb/T Sol'n					0.2
NaCN Consumed, lb/T Ore					2.55
Lime Consumed, lb/T Ore					3.8
MACHINE					
R.P.M.					
pH	7.9	11.6			11.5
% SOLIDS					
TEMPERATURE					

MESH	GRINDING PRODUCT Leach Residue %	%
+10		
+14		
+20		
+28		
+35		
+48	0.0	
+65	3.6	
+100	11.9	
+150	19.4	
+200	17.7	
+325	18.2	
-325	29.2	
	100.0	

REMARKS:

DAWSON METALLURGICAL LABORATORIES, INC.

P. O. BOX 7685
5217 Major Street
Murray, Utah 84107
Phone: 801-262-0922

PROJECT NO. P-1534
DATE 4/18/88
BY LA
Comp #1

TEST NO. 2 NAME United Verde Extension

72 hour Leach on -3/4" Ore with 10 lb/ton NaCN Solution followed by Assay Screen

Product	Weight	% Wt.	Assay Au	Assay Ag	Units Au	Units Ag	Distribution Au	Distribution Ag	
+1/4" Leach Res.	1679.0	56.36	0.112	9.15	0.0631	5.157	60.31	64.22	V1G
-1/4"+10m Leach Res	727.1	24.41	0.101	7.94	0.0246	1.938	23.55	24.13	
-10+35m Leach Res.	215.8	7.24	0.122	6.98	0.0088	0.506	8.44	6.30	
-35+100m Leach Res.	104.0	3.49	0.104	4.58	0.0036	0.160	3.47	1.99	
-100m Leach Res.	253.4	8.51	0.052	3.17	0.0044	0.270	4.23	3.36	
Head Calculated	2979.3	100.00	0.105	8.03	0.1047	8.029	100.00	100.00	
Leach Solution	3068.7		0.012	0.34	0.3682	10.434	10.53	4.18	V1C
Leach Residue	2979.3		0.105	8.03	3.1283	239.238	89.47	95.82	
Head Calculated	3000.0		0.117	8.32	3.4965	249.671	100.00	100.00	

OPERATION			Start		Off								GRINDING PRODUCT	
TIME			8:10		8:10									
REAGENTS - LBS PER TON			Leach		72 hours									
Ore gram	3000											MESH	%	%
Water gram	3000											+ 10		
Lime gram		4.0										+ 14		
NaCN gram			15.0									+ 20		
NaCN Titration, lb/T Sol'n					7.72							+ 28		
CaO Titration, lb/T Sol'n					0.3							+ 35		
NaCN Consumed, lb/T Ore					2.10							+ 48		
Lime Consumed, lb/T Ore					2.4							+ 65		
												+ 100		
												+ 150		
MACHINE												+ 200		
R.P.M.												+ 325		
pH	8.3	11.8			11.8							-325		
% SOLIDS														
TEMPERATURE														

REMARKS:

DAWSON METALLURGICAL LABORATORIES, INC.

P. O. BOX 7685
5217 Major Street
Murray, Utah 84107
Phone: 801-262-0922

PROJECT NO. P-1534
DATE 4/26/88
BY LA

TEST NO. 3 NAME United Verde Extension
72 hour Leach on 40' Ball Mill Grind with 10 lb/ton NaCN Solution

Product	Weight	Assay Au	Assay Ag	Units Au	Units Ag	Distribution Au	Distribution Ag	
Leach Solution	1025.5	0.038	2.03	0.3897	20.818	34.20	24.76	V1
Leach Residue	999.5	0.075	6.33	0.7496	63.268	65.80	75.24	
Head Calculated	1000.0	0.114	8.41	1.1393	84.086	100.00	100.00	
Releach Solution	564.0	0.012	1.17	0.0677	6.599	22.81	21.25	V1
Releach Residue	498.0	0.046	4.91	0.2291	24.452	77.19	78.75	
Head Calculated	500.0	0.059	6.21	0.2968	31.051	100.00	100.00	

Test 3A Releach 5/4/88

OPERATION	BM		Start			Off		Releach	24hr	48hr	Off		GRINDING PRODUCT	
TIME	40'		2:20			2:20		11:10			11:10		Leach	
REAGENTS - LBS PER TON			Leach			72 hrs					72hrs		Residue	
Ore	1000							500.0				MESH	%	%
Water	1000							500.0				+10		
Lime		2.5						1.0				+14		
NaCN			5.0					2.5				+20		
NaCN Titration, lb/T Sol'n						0.37			8.70	8.56	8.06	+28		
CaO Titration, lb/T Sol'n						0.8					0.4	+35		
NaCN Consumed, lb/T Ore						9.62					0.91	+48	0.0	
Lime Consumed, lb/T Ore						4.2					3.5	+65	0.0	
				NaCN	Consumed, Total,	lb/Ton	Ore:	10.53				+100	0.3	
				Lime	Consumed, Total,	lb/Ton	Ore:	7.7				+150	3.8	
MACHINE												+200	12.5	
R.P.M.												+325	28.0	
pH	7.9	11.9				11.9	8.9	11.8	11.6		11.6	-325	55.4	
% SOLIDS													100.0	
TEMPERATURE														

REMARKS:

DAWSON METALLURGICAL LABORATORIES, INC.

P. O. BOX 7685
5217 Major Street
Murray, Utah 84107
Phone: 801-262-0922

PROJECT NO. P-1534
DATE 5/12/88
BY LA

TEST NO. 3A NAME United Verde Extension

Assay Screen on Test 3A Leach Residue

Product	Weight	% Wt.	Assay		Units		Distribution	
			Au	Ag	Au	Ag	Au	Ag
+200mesh Leach Res.	70.1	17.12	0.080	6.40	0.0137	1.096	24.61	21.84
200/325m Leach Res.	132.2	32.28	0.065	6.06	0.0210	1.956	37.71	39.00
325/400m Leach Res.	14.5	3.54	0.074	5.51	0.0026	0.195	4.71	3.89
-400mesh Leach Res.	192.7	47.06	0.039	3.76	0.0184	1.769	32.98	35.27
Head Calculated	409.5	100.00	0.056	5.02	0.0557	5.016	100.00	100.00
Head Assay			0.046	4.91				

													GRINDING PRODUCT	
OPERATION														
TIME														
REAGENTS - LBS PER TON														
Ore	411.4											MESH	%	%
												+ 10		
												+ 14		
												+ 20		
												+ 28		
												+ 35		
												+ 48		
												+ 65		
												+ 100		
												+ 150		
MACHINE												+ 200		
R.P.M.												+ 325		
pH												-325		
% SOLIDS														
TEMPERATURE														

REMARKS:

DAWSON METALLURGICAL LABORATORIES, INC.

P. O. BOX 7685
5217 Major Street
Murray, Utah 84107
Phone: 801-262-0922

PROJECT NO. P-1534
DATE 5/23/88
BY LA

TEST NO. 4 NAME United Verde Extension

72 hour Leach on 90' Ball Mill Grind with 5 lb/ton NaCN Solution

Product	Weight	Assay		Units		Distribution	
		Au	Ag	Au	Ag	Au	Ag
Leach Solution	1092.7	0.067	4.22	0.7321	46.112	67.04	56.85
Leach Residue	1000.0	0.036	3.50	0.3600	35.000	32.96	43.15
Head Calculated	1000.0	0.109	8.11	1.0921	81.112	100.00	100.00

OPERATION	BM		Start	5/24	5/24	5/25	Off						GRINDING PRODUCT	
TIME	90'		11:38	24hr	10:30	48hr	11:35						Leach	
REAGENTS - LBS PER TON			Leach				72hrs						Residue	
Ore gram	1000											MESH	%	%
Water gram	1000											+10		
Lime gram		0.5		0.2	0.3							+14		
NaCN gram			2.5	2.5		0.56						+20		
NaCN Titration, lb/Ton Sol'n				0.34		3.88	4.10					+28		
CaO Titration, lb/Ton Sol'n						0.3	0.4					+35		
NaCN Consumed, lb/Ton Ore							6.64					+48	0.0	
Lime Consumed, lb/Ton Ore							1.6					+65	0.0	
												+100	0.0	
												+150	0.0	
MACHINE												+200	0.6	
R.P.M.												+325	10.0	
pH	7.8	10.9		10.0	10.4	11.0	10.9					-325	89.4	
% SOLIDS													100.0	
TEMPERATURE														

REMARKS:

Don White
521 E. Willis St.
Prescott, AZ 86301
602-778-3140

April 12, 1988

Mr. Harmel A. Dawson
DAWSON METALLURGICAL LABORATORIES, INC.
P.O. Box 7685
5217 Major St.
Murray, Utah 84107

Dear Mr. Dawson;

Shipped separately via U.P.S. to your 5217 Major St. address are 4 boxes totalling over 200 pounds of rock. Please blend the four separate lots (over 50 pounds each) to produce one uniform sample. That sample we refer to as U.V.X.-902-W.

Following a head assay, please perform a cyanide leach amenability test and then an assay screen analysis. With those results reported, we will decide whether to proceed with a column leach, for which the large sample may be used.

By way of warning and a sort of check, we expect the sample to run in the range of .15 to .25 oz/t Au, 5. to 8. oz/t Ag, 20. wt % Fe, 4,000-5,000 ppm combined base metals and at least 75% SiO_2. It is the ferruginous and highly siliceous nature of this material that differentiates it from many other samples you likely deal with. Those characteristics worry us as to cyanide leach amenability. We have early indications from a bottle roll on a very tight, even more siliceous sample, that at least 200 mesh grinding will be necessary. We would like to confirm that for this particular lithology and perhaps take it even finer it the assay screen analysis so mandates.

If any questions arise, do not hesitate to phone me, Carole A. O'Brien, or Frank W. Millsaps. Please send the bill and a copy of the results to Carole A. O'Brien (A.F. Budge (Mining) Ltd., 7340 East Shoeman Lane, Suite 111-B-(E), Scottsdale, Arizona 85251).

Sincerely,

Don White

Don White
Geologist, C.P.G.

DW:sk

cc: Carole A. O'Brien
Frank W. Millsaps

Carole

U.V.X. Cyanide Leachability Testing Summary - Don White, April, 1988

1) Silica grit; low Fe

Sampled in S-2 dog-hole (901-W X-cut, N. Gold Stope)
Tested by I.K. & reported April 9, 1987)
1 kg composit: Head $\frac{.23}{1.0}$
Ball mill grind to 80% − 200 mesh
NaCN bottle roll for 72 hours

95% Au recovery in first 24 hrs.
20% Ag recovery in 72 hrs.

2) Tight silica breccia, not gritty, not very Cu or Fe rich

Sampled in Gold Stope H.W. exposed in 901-W X-cut
Tested by Dawson, and reported June 29, 1987

200 pound composit: Head $\frac{.11}{3.2}$

Head screen assay
Evenly distributed Au & Ag by size though higher grade in negligible volume fines (4% - 100 mesh)
Bottle roll CN leach for 72 hrs., -1½" ore

46% Au recovery
5% Ag recovery

Only significant recovery was ~80% of Au from the fine (-100 mesh) fraction

Tentative conclusion is that at least -100 mesh grind is necessary to achieve gold extractions exceeding 50%

Should have taken test onward with grind and test.

3) Tight silica breccia, & mixture

Tight - Florencia area drill sample composit
D.D.H. 1104-1 240'-250' Head $\frac{.11}{0.5}$

Mixture - Morgan area drill sample composit
D.D.H. 806-1 541'-578' Head $\frac{.16}{1.0}$

About 15 pounds (7 kg) each
Standard amenability tests by Dawson, reported April 9, 1986

Both samples provided ~86% Au recoveries and ~40% Ag recoveries when ball mill ground to ~70% -200 mesh. But only 30-40% Au recoveries on -¼ inch rock.

4) <u>Very Ferruginous, very tight siliceous, high Au & Ag</u>.

Composit from M-11 high grade, 198'-210' Head assay .40 / 7.0

Reported by I.K. June 17, 1987
and followup Aug. 7, 1987

1 kg composit of coarse rejects (~10 mesh)

13% Au recovery, ~ 20% Ag recovery with CN bottle roll

If then ball mill ground to 99% − 60 mesh, 50% Au and 40% Ag recoveries with few + 10 mesh particles exhibiting much higher Au & Ag values, still unrecovered.

5) <u>Ferruginous, saccharoidal</u> (but not gritty) modest Au and Ag

902-W X-cut rib sample of 200 pounds shipped to Dawson April 12, 1988 for amenability and assay screen analyses.

DAWSON
METALLURGICAL
LABORATORIES, INC.

P.O. Box 7685
5217 Major Street
Murray, Utah 84107-0685
Phone: 801-262-0922

April 9, 1986

DMEA LTD.
APR 11 1986
RECEIVED

DMEA LTD.
7340 East Shoeman Lane
Suite 111B East
Scottsdale, Arizona 85251

Attn: Mr. Ben F. Dickerson, III

Subject: Results of Cyanide Leach Amenability Tests on Two Gold-Bearing Composite Samples. Our Project No. P-1226.

Gentlemen:

In accordance with arrangements made with Mr. Don White, formalized in his letter of March 3, 1986 (attached), cyanide leach amenability tests were performed on two gold-bearing composite samples received at our laboratory March 6, 1986. The following tests were performed on each sample:

1 - Bottle roll cyanide leach for 48 hours after ball mill grinding sample to approximately 70 percent minus 200 mesh.

2 - Bottle roll cyanide leach minus 1/4 inch sample for 48 hours followed by assay-screen of leach residue.

I. Sample Description and Head Analyses

Thirteen individual samples were received at our laboratory March 6, 1986 and were composited in accordance with instructions from Mr. Don White in his letter of March 3, 1986 (copy attached). Approximately 2 kilograms of each as-received composite sample (minus 1/4 inch) was carefully split out and crushed through 20 mesh prior to splitting out a head sample. Head assay results are presented as follows:

Sample		Head Assay, oz/Ton	
DML No.	DMEA No.	Gold	Silver
P-1226#1	1104-1: 240-250	0.111	0.52
P-1226#2	806-1: 541-578	0.162	0.97

II. Test Results

Test results indicate that these samples require grinding to at least 28 mesh in order to obtain a leach residue which assays less than approximately 0.030 oz/ton gold. Results are summarized below and presented in individual test sheets attached to the end of this report.

P-1226: Ben Dickerson
Cyanide Leach Test Results: Ball Mill Ground Samples

Product	Assay, oz/Ton Au	Assay, oz/Ton Ag	Distribution % Au	Distribution % Ag	Reagents Consumed lb/Ton Ore NaCN	Reagents Consumed lb/Ton Ore Lime
Sample P-1226 #1 (1104-1: 240-250)						
Leach Solution	0.104	0.27	85.6	48.5		
Leach Residue	0.019	0.31	14.4	51.5		
Total (calc)	0.132	0.60	100.0	100.0	3.8	1.5
Grind: 68.1% Minus 200 Mesh						
Sample P-1226 #2 (806-1: 541-578)						
Leach Solution	0.118	0.32	86.8	34.5		
Leach Residue	0.020	0.68	13.2	65.5		
Total (calc)	0.152	1.04	100.0	100.0	2.5	1.7
Grind: 77.7% Minus 200 Mesh						

Cyanide Leach Test Results: Minus 1/4 Inch Samples

Product	Weight Percent	Assay, oz/Ton Au	Assay, oz/Ton Ag	Distribution,% Au	Distribution,% Ag
Sample P-1226 #1 (1104-1: 240-250)					
Leach Solution		0.030	0.04	29.8	10.4
Leach Residue		0.068	0.33	70.3	89.6
Total (calc)		0.097	0.37	100.0	100.0
+8 Mesh Leach Residue	64.9	0.078	0.41		
8/28 Mesh Leach Residue	20.2	0.067	0.13		
28/48 Mesh Leach Residue	5.2	0.020	0.16		
48/100 Mesh Leach Residue	2.7	0.046	0.36		
-100 Mesh Leach Residue	7.0	0.017	0.23		
NaCN Consumed: 3.4 lb/Ton Ore					
Lime Consumed: 2.5 lb/Ton Ore					
Sample P-1226 #2 (806-1: 541-578)					
Leach Solution		0.048	0.78	43.5	57.6
Leach Residue		0.061	0.56	56.5	42.4
Total (calc)		0.108	1.32	100.0	100.0
+8 Mesh Leach Residue	69.4	0.071	0.60		
8/28 Mesh Leach Residue	12.9	0.065	0.63		
28/48 Mesh Leach Residue	3.5	0.024	0.44		
48/100 Mesh Leach Residue	2.0	0.042	0.79		
-100 Mesh Leach Residue	12.2	0.014	0.28		
NaCN Consumed: 2.2 lb/Ton Ore					
Lime Consumed: 2.5 lb/Ton Ore					

No attempts were made to optimize cyanide addition in these preliminary tests.

III. Test Procedures

Cyanide leach amenability tests on ball mill ground samples were performed as follows: 1000 grams of minus 20 mesh sample was ball mill ground at 50 percent solids to approximately 70 percent minus 200 mesh. The ground slurry was subsequently leached for 48 hours at 50 percent solids with an initial solution concentration of 10 pounds NaCN per ton of solution.

Cyanide leach amenability tests on as-received (minus 1/4 inch) samples were performed as follows: 3000 grams of minus 1/4 inch sample was bottle roll leached at 50 percent solids for 48 hours with an initial solution concentration of 10 pounds NaCN per ton of solution. After leaching, the filtered and washed leach residue was screened on 8, 28, 48 and 100 mesh and the individual screen fractions submitted for assay.

If we can be of further service, please call.

Sincerely,
DAWSON METALLURGICAL LABORATORIES, INC.

Philip Thompson

Philip Thompson,
Vice President

cc: Mr. Frank Millsaps

PT-cac

DAWSON METALLURGICAL LABORATORIES, INC.

P. O. BOX 7685
5217 Major Street
Murray, Utah 84107-0685
Phone: 801-262-0922

PROJECT NO. P-1226-#1
DATE 3/10/86
BY MT
#1 Sample

TEST NO. 1 NAME Ben Dickerson

48 hour NaCN Leach with 10 lbs/ton NaCN Solution

Product	Weight	Assay Au	Assay Ag	Units Au	Units Ag	Distribution Au	Distribution Ag
Leach Solution	1025.6	0.104	0.27	1.0666	2.769	85.56	48.53
Leach Residue	947.4	0.019	0.31	0.1800	2.937	14.44	51.47
Head Calculated	947.4	0.132	0.60	1.2466	5.706	100.00	100.00

V1C

					3/12/86						
OPERATION	BM		Leach								
TIME	20'		11:30		11:30						
REAGENTS - LBS PER TON			Start		Off						
Ore	1000										
Water	1000										
Lime, gram		1.0									
NaCN, gram			5.0								
NaCN Titration, lb/Ton Sol'n					6.0						
CaO Titration, lb/Ton Sol'n					0.5						
NaCN Consumed, lb/Ton Ore					3.8						
Lime Consumed, lb/Ton Ore					1.5						
MACHINE											
R.P.M.											
pH	8.3		11.6		11.5						
% SOLIDS											
TEMPERATURE											

REMARKS:

GRINDING PRODUCT	
	Leach Residue
MESH	%
+10	
+14	
+20	
+28	
+35	
+48	0.0
+65	0.9
+100	5.4
+150	10.7
+200	14.9
+325	18.3
-325	49.8
	100.0

DAWSON METALLURGICAL LABORATORIES, INC.

P. O. BOX 7685
5217 Major Street
Murray, Utah 84107-0685
Phone: 801-262-0922

PROJECT NO. P-1226-#2
DATE 3/10/86
BY MT
#2 Samples

TEST NO. 1 NAME Ben Dickerson

48 hour NaCN Leach with 10 lbs/ton NaCN Leach solution

Product	Weight	Assay Au	Assay Ag	Units Au	Units Ag	Distribution Au	Distribution Ag	
Leach Solution	1085.1	0.118	0.32	1.2804	3.472	86.84	34.49	V1C
Leach Residue	969.9	0.020	0.68	0.1940	6.595	13.16	65.51	
Head Calculated	969.9	0.152	1.04	1.4744	10.068	100.00	100.00	

3/12/86

OPERATION	BM			Leach								
TIME	20'			11:35		11:35						
REAGENTS - LBS PER TON				Start		Off						
Ore	1000											
Water	1000											
Lime, gram		1.0										
NaCN, gram				5.0								
NaCN Titration, lb/Ton Sol'n						6.9						
CaO Titration, lb/Ton Sol'n						0.3						
NaCN Consumed, lb/Ton Ore						2.5						
Lime Consumed, lb/Ton Ore						1.7						
MACHINE												
R.P.M.												
pH			11.5			11.6						
% SOLIDS												
TEMPERATURE												

REMARKS:

GRINDING PRODUCT	
	Leach Residue
MESH	%
+10	
+14	
+20	
+28	
+35	
+48	0.0
+65	0.3
+100	2.9
+150	7.0
+200	12.1
+325	18.9
-325	58.8
	100.0

DAWSON METALLURGICAL LABORATORIES, INC.

P. O. BOX 7685
5217 Major Street
Murray, Utah 84107-0685
Phone: 801-262-0922

PROJECT NO. P-1226-#1
DATE 3/22/86
BY MT
Sample #1

TEST NO. 2 NAME Ben Dickerson

48 hour NaCN Leach on As Received Sample with 10 lbs/ton NaCN Solution (-1/4")

Product	Weight	% Wt.	Assay Au	Assay Ag	Units Au	Units Ag	Distribution Au	Distribution Ag	V1G
+8mesh Leach Res.	1380.7	64.92	0.078	0.41	0.0506	0.266	74.88	81.50	
-8+28m Leach Res.	428.7	20.16	0.067	0.13	0.0135	0.026	19.97	8.02	
-28+48m Leach Res.	111.5	5.24	0.020	0.16	0.0010	0.008	1.55	2.57	
-48+100m Leach Res.	57.9	2.72	0.046	0.36	0.0013	0.010	1.85	3.00	
-100mesh Leach Res.	148.1	6.96	0.017	0.23	0.0012	0.016	1.75	4.90	
	0.0	0.00	0.000	0.00	0.0000	0.000	0.00	0.00	
Head Calculated	2126.9	100.00	0.068	0.33	0.0676	0.327	100.00	100.00	
Leach Solution	2974.0		0.030	0.04	0.8922	1.190	29.75	10.42	V1C
Leach Residue	3098.0		0.068	0.33	2.1066	10.223	70.25	89.58	
Head Calculated	3098.0		0.097	0.37	2.9988	11.413	100.00	100.00	

OPERATION			Leach											GRINDING PRODUCT
TIME			8:00		48hrs									Leach
REAGENTS - LBS PER TON			Start		Off									Residue
													MESH	%
Ore As Received	3000												+8	64.9
Water	3000												+14	
Lime, gram		4.0											+20	
NaCN, gram			15.0										+28	20.2
NaCN Titration, lb/T Sol'n					6.5								+35	
CaO Titration, lb/T Sol'n					0.1								+48	5.2
NaCN Consumed, lb/T Ore					3.4								+65	
Lime Consumed, lb/T Ore					2.5								+100	2.7
													+150	
MACHINE													+200	
R.P.M.													+325	
pH	8.5		11.4		11.3								-325	
% SOLIDS													-100	7.0
TEMPERATURE														

REMARKS:

DAWSON METALLURGICAL LABORATORIES, INC.

P. O. BOX 7685
5217 Major Street
Murray, Utah 84107-0685
Phone: 801-262-0922

PROJECT NO. P-1226-2
DATE 3/22/86
BY MT
Sample #2

TEST NO. 2 NAME Ben Dickerson III

48 hour NaCN Leach with 10 lbs/ton NaCN Solution on As-Received Sample (-1/4")

Product	Weight	% Wt.	Assay Au	Assay Ag	Units Au	Units Ag	Distribution Au	Distribution Ag	V1G
+8mesh Leach Res.	1441.5	69.38	0.071	0.60	0.0493	0.416	80.69	73.93	
-8+28m Leach Res.	268.8	12.94	0.065	0.63	0.0084	0.082	13.77	14.48	
-28+48m Leach Res.	72.0	3.47	0.024	0.44	0.0008	0.015	1.36	2.71	
-48+100m Leach Res.	41.6	2.00	0.042	0.79	0.0008	0.016	1.38	2.81	
-100mesh Leach Res.	253.7	12.21	0.014	0.28	0.0017	0.034	2.80	6.07	
	0.0	0.00	0.000	0.00	0.0000	0.000	0.00	0.00	
Head Calculated	2077.6	100.00	0.061	0.56	0.0611	0.563	100.00	100.00	
Leach Solution	2997.0		0.048	0.78	1.4386	23.377	43.46	57.64	V1C
Leach Residue	3068.0		0.061	0.56	1.8715	17.181	56.54	42.36	
Head Calculated	3068.0		0.108	1.32	3.3100	40.557	100.00	100.00	

OPERATION			Leach											GRINDING PRODUCT
TIME			8:05		48 hrs									Leach
REAGENTS - LBS PER TON			Start		Off									Residue
													MESH	%
Ore As Received	3000												+8	69.4
Water	3000												+14	
Lime, gram		4.0											+20	
NaCN, gram			15.0										+28	12.9
NaCN Titration, lb/T Sol'n					7.8								+35	
CaO Titration, lb/T Sol'n					0.1								+48	3.5
NaCN Consumed, lb/T Ore					2.2								+65	
Lime Consumed, lb/T Ore					2.5								+100	2.0
													+150	
MACHINE													+200	
R.P.M.													+325	
pH	8.3		11.5		11.4								-325	
% SOLIDS													-100	12.2
TEMPERATURE														

REMARKS:

Don White
521 E. Willis St.
Prescott, AZ 86301
602/778-3140

March 3, 1986

Mr. Harmel A. Dawson
DAWSON METALLURGICAL LABORATORIES, INC.
5217 Major St.
Murray, Utah 84107

Dear Mr. Dawson,

Following our phone conversation this morning, I have put together the two accompanying samples. Please blend the components listed for each to make up the two samples, obtain a head assay, and then perform both a "standard amenability test" and "assay screen analysis" for each.

The two samples are:

		COMPONENTS
P 1226-1	1) 1104-1 240-250 (~ 6.6 kilograms total)	240-245 245-250 (Total two intervals)
P-1226-2	2) 806-1 541-578 (~ 7.4 kilograms total)	541-543 543-544 544-546 546-548 548-550 550-552 (552-565 - not included) 565-568 570-572 572-574 574-576 576-578 (Total twelve intervals)

Both samples are expected to run a little over 0.1 oz/t Au and between 0.5 and 1.0 oz/t Ag. Both samples are coarse rejects from earlier standard assay preparations.

If any questions arise, do not hesitate to phone me or Carole A. O'Brien of Ben Dickerson's office. Please send the bill and a copy of the results to Ben Dickerson's office.

Sincerely,

Don White

Don White
Geologist, C.P.G.

DW:sk

Enclosures

cc: Ben F. Dickerson, III
Frank W. Millsaps

ASSAY REPORT SHEET

ASSAY LAB, INC.
1376 W. 8040 So. Unit #4
West Jordan, Utah 84084

Date Received _____

Date Reported 3-17-86

Client Dawson Metallurgical Labs

Sample Identification	Oz / Ton Au	Oz / Ton Ag	Remarks
			* Ounces per ton of 2000 lbs.
P-1226 Ben Dickerson			
P-1226 T-1 Sample #1			
Head Sample	.114	.56	
	.107	.48	
Leach Residue	.019	.31	
	.019	.30	
Cyn Soln	.108	.25	
	.100	.28	
P-1226 T-2			
Head Sample Sample #2	.160	1.02	
	.163	.92	
Leach Residue	.019	.72	
	.021	.64	
Cyn Solns (To Follow)			

Ronald Bianchi

ASSAY REPORT SHEET

ASSAY LAB, INC.
1376 W. 8040 So. Unit #4
West Jordan, Utah 84084

Date Received _____ **Date Reported** 3-19-86

Client Dawson Metallurgical Labs

Sample Identification	Oz / Ton Au	Oz / Ton Ag	Remarks
			* Ounces per ton of 2000 lbs.
P-126 #2 T-1 Ben Dickerson Leach Soln	.118	.31	
	.118	.33	

Ronald Bianchi

ASSAY REPORT SHEET

ASSAY LAB, INC.
1376 W. 8040 So. Unit #4
West Jordan, Utah 84084

Date Received _____ **Date Reported** 3-31-86

Client Dawson Metallurgical Labs

Sample Identification	Oz / Ton Au	Oz / Ton Ag	Remarks
			* Ounces per ton of 2000 lbs.
P-1226 Ben Dickerson			
P-1226#1 T-2 #1 Leach Res.	.062	.31	
	.067	.34	
P-1226#1 T-2 #1 Cyn Soln	.030	.04	
	.031	.04	
P-1226#2 T-2 #2 Leach Residue	.081	.77	
	.086	.78	
P-1226#2 T-2 #2 Cyn Soln	.047	.05	
	.048	.06	

Ronald Bianchi

ASSAY REPORT SHEET

ASSAY LAB, INC.
1376 W. 8040 So. Unit #4
West Jordan, Utah 84084

Date Received _____ **Date Reported** 4-8-86

Client Dawson Metallurgical Labs

Sample Identification	Oz / Ton Au	Oz / Ton Ag	Remarks
			* Ounces per ton of 2000 lbs.
P-1226 Ben Dickerson 111			
P-1226-1 T-2 Sample #1			
+8 Mesh	.077	.41	
	.078	.40	
-8 + 28	.069	.15	
	.065	.11	
-28 + 48	.018	.18	
	.021	.13	
-48 + 100	.043	.35	
	.049	.37	
- 100	.017	.26	
	.016	.19	
P-1226-2 T-2 Sample #2			
+8 mesh	.068	.60	
	.073	.60	
- 8 + 28	.064	.66	
	.066	.59	
- 28 + 48	.023	.47	
	.024	.40	
- 48 + 100	.038	.80	
	.045	.78	
- 100	.014	.26	
	.013	.30	

Ronald Bianchi

DAWSON METALLURGICAL LABORATORIES, INC.

P.O. Box 7685
5217 Major Street
Murray, Utah 84107-0685
Phone: 801-262-0922

June 29, 1987

Millsaps Mineral Service, Inc.
3865 Wasatch Blvd.
Room 2021
Salt Lake City, Utah 84109

Attn: Mr. Frank W. Millsaps

Subject: Results of Screening and Cyanide Leach Testing a Sample of United Verde Extension ore. Our Project No. P-1377.

Gentlemen:

In accordance with discussions with Mr. Frank Millsaps, several laboratory tests were performed on a sample of United Verde Extension ore to determine both gold occurence and gold extraction by cyanide leaching. Testwork performed included:

- Assay Screen of Minus 1 1/2 Inch Head Ore Sample
- Bottle Roll Agitation Leach of Minus 1 1/2 Inch Ore Sample for 72 Hours Followed by Assay Screen of Leach Residue.

I. Sample Description and Head Analysis

Four boxes of minus 4 inch ore sample were recieved at our laboratory May 28, 1987 and assigned Our Lot No. P-1377. The contents of each box were combined to produce a 200 pound sample which was crushed through 1 1/2 inch. Twenty-five kilograms of this sample was split out for a head assay screen and 5 kilograms was split out for a 72 hour bottle roll cyanide leach test. Back-calculated head assays from these tests are presented below:

P-1377: Millsaps Mineral Service
Back-Calculated Head Assays: -1 1/2 Inch Sample

Test No.	Head Assay, oz/Ton	
	Au	Ag
1 (Assay Screen)	0.102	3.18
2 (72 hr. Bottle Roll)	0.110	3.24

II. Test Results

Results summarized in this section are presented in detailed test data sheets attached to the end of this report.

A. Head Assay Screen

A significant increase in gold assay occurs in the minus 100 mesh fraction of this sample: The minus 100 mesh fines assayed 0.183 oz/ton gold, while the overall calculated head assayed 0.102 oz/ton gold. However, only 7 percent of the gold in the sample was contained in this fraction. Results are presented below:

P-1377 Millsaps Mineral Service
Head Assay Screen Results: -1 1/2 Inch Sample

Size	Weight Percent	Assay, oz/Ton Au	Assay, oz/Ton Ag
+3/4"	32.7	0.099	3.00
-3/4 + 1/4"	35.3	0.105	3.30
-1/4" +6 Mesh	10.6	0.091	3.21
-6 +20 Mesh	12.5	0.089	3.22
-20 +48 Mesh	3.5	0.087	3.22
-48 +100 Mesh	1.6	0.082	3.13
-100 Mesh	3.8	0.183	3.40
Total	100.0	0.102	3.18

No upgrading of silver was noted in any size fraction.

B. Bottle Roll Cyanide Leach

Almost 50 percent of the gold and less than 5 percent of the silver was leached from minus 1 1/2 inch ore in a 72 hour bottle roll test. Results are summarized below:

P-1377: Millsaps Mineral Service
Cyanide Leach Results: -1 1/2 Inch Sample

Product	Assay, oz/Ton Au	Assay, oz/Ton Ag	Distribution, % Au	Distribution, % Ag
Leach Solution	0.050	0.11	46.3	3.4
Leach Residue	0.059	3.14	53.7	96.6
Total (calc)	0.110	3.24	100.0	100.0

NaCN Consumed: 2.48 lb/ton Ore
Lime Consumed: 1.80 lb/ton Ore

An assay screen analysis of the leach residue indicated that a significant decrease in gold assay was observed in the minus 100 mesh fraction of the leach residue only. This fraction assayed 0.025 oz/ton gold. Residues are summarized as follows:

P-1377: Millsaps Mineral Service
Cyanide Leach Residue Assay Screen Results

Size	Weight Percent	Assay, oz/Ton Au	Ag
+3/4"	24.9	0.052	2.64
-3/4 +1/4"	47.8	0.070	2.96
-1/4" +6 Mesh	11.2	0.061	3.14
-6 +20 Mesh	7.1	0.058	2.97
-20 +48 Mesh	1.7	0.050	2.91
-48 +100 Mesh	0.7	0.041	2.42
-100 Mesh	6.6	0.025	2.08
Total	100.0	0.060	2.84

Based on the results obtained on this particular sample, a fine grind of at least 100 mesh is required to obtain gold extractions exceeding approximately 50 percent.

III. Test Procedures

A. Head Assay Screen

Twenty-five kilograms of minus 1 1/2 inch ore was wet screened at 6 mesh. The 6 mesh undersize was further wet screened on 20, 48 and 100 mesh, while the 6 mesh oversize was dried and dry screened on 3/4 and 1/4 inch. Each size fraction was dried, weighed, crushed through 20 mesh, samples split out, pulverized, and submitted for gold and silver assay.

B. Bottle Roll Cyanide Leach

Five kilograms of minus 1 1/2 inch ore was mixed with 5 liters of water, and the pH adjusted to 11.5 with hydrated lime. The pulp slurry was leached for 72 hours in a rolling bottle with a leach solution containing 10 pounds NaCN per ton of solution (initial concentration). After leaching the slurry was weighed, filtered, and the filter cake washed three times with fresh water. One half of the dried leach residue was crushed and a sample split out for assay. The other half of the sample was assay screened as described in A) above.

All gold and silver assays were performed in duplicate by standard fire assay.

If you have any questions or comments regarding this testwork, please call.

Sincerely,
DAWSON METALLURGICAL LABORATORIES, INC.

Philip Thompson

Philip Thompson,
Vice President

PT-cac

DAWSON METALLURGICAL LABORATORIES, INC.

P. O. BOX 7685
5217 Major Street
Murray, Utah 84107-0685
Phone: 801-262-0922

PROJECT NO. P-1377
DATE 6/1/87
BY MT

TEST NO. 1 NAME DMEA - (United Verde Extension)

Assay Screen on -1 1/2 inch Head Sample

Assay Screen

Product	Weight	% Wt.	Assay Au	Assay Ag	Units Au	Units Ag	Distribution Au	Distribution Ag
+3/4" Head	8092.0	32.72	0.099	3.00	0.0324	0.982	31.90	30.86
-3/4"+1/4" Head	8739.0	35.34	0.105	3.30	0.0371	1.166	36.54	36.66
-1/4"+6mesh Head	2628.0	10.63	0.091	3.21	0.0097	0.341	9.52	10.72
-6+20mesh Head	3080.0	12.45	0.089	3.22	0.0111	0.401	10.92	12.61
-20+48mesh Head	855.0	3.46	0.087	3.22	0.0030	0.111	2.96	3.50
-48+100mesh Head	391.0	1.58	0.082	3.13	0.0013	0.049	1.28	1.56
-100mesh Head	945.0	3.82	0.183	3.40	0.0070	0.130	6.89	4.08
Head Calculated	24730.0	100.00	0.102	3.18	0.1016	3.181	100.00	100.00

V

OPERATION													GRINDING PRODUCT	
TIME														
REAGENTS - LBS PER TON														
												MESH	%	
												+ 10		
												+ 14		
												+ 20		
												+ 28		
												+ 35		
												+ 48		
												+ 65		
												+ 100		
MACHINE												+ 150		
R.P.M.												+ 200		
pH												+ 325		
% SOLIDS												-325		
TEMPERATURE														
REMARKS:														

DAWSON METALLURGICAL LABORATORIES, INC.

P. O. Box 7685
5217 Major Street
Murray, Utah 84107
Phone: 801-262-0922

PROJECT NO. P-1377
DATE 6/8/87
BY LA

TEST NO. 2 **NAME** DMEA

72 hour Leach on -1 1/2" Ore with 10 lb/ton NaCN Solution

PRODUCT	Weight	PERCENT WEIGHT	ASSAY					UNITS			DISTRIBUTION				
				Au	Ag				Au	Ag		Au	Ag		
Leach Residue	4987.0			0.059	3.14				2.9423	156.5918		53.7	96.6		
Leach Solution	5075.0			0.050	0.11				2.5375	5.5825		46.3	3.4		
Total (calc)	5000.0			0.110	3.24				5.4798	162.1743		100.0	100.0		
Total (assay)				0.102	3.18										

OPERATION			Start	Off									GRINDING PRODUCT	
TIME			3:40	72hr										
REAGENTS - LBS PER TON														
Ore gm	5000												MESH	%	%
Water gm	5000														
Lime gm		5.0											+10		
NaCN gm			25.0										+14		
NaCN Titration, lb/T Sol'n				7.41									+20		
CaO Titration, lb/T Sol'n				0.2									+28		
NaCN Consumed, lb/T Ore				2.48									+35		
Lime Consumed, lb/T Ore				1.80									+48		
													+65		
													+100		
													+150		
MACHINE													+200		
R.P.M.													+325		
pH	7.9	11.5		11.0									-325		
% SOLIDS															
TEMPERATURE															

REMARKS:

DAWSON METALLURGICAL LABORATORIES, INC.

P. O. BOX 7685
5217 Major Street
Murray, Utah 84107-0685
Phone: 801-262-0922

PROJECT NO. P-1377
DATE 6/19/87
BY LA

TEST NO. 2 NAME DMEA

Assay Screen on Leach Residue from Test #2

Product	Weight	% Wt.	Assay		Units		Distribution	
			Au	Ag	Au	Ag	Au	Ag
+3/4"Leach Res.	857.7	24.92	0.052	2.64	0.0130	0.658	21.55	23.18
-3/4+1/4" Leach Res	1645.0	47.79	0.070	2.96	0.0335	1.415	55.64	49.84
-1/4"+6m Leach Res.	386.1	11.22	0.061	3.14	0.0068	0.352	11.38	12.41
-6+20mesh Leach Res	243.6	7.08	0.058	2.97	0.0041	0.210	6.83	7.41
-20+48m Leach Res.	57.5	1.67	0.050	2.91	0.0008	0.049	1.39	1.71
-48+100m Leach Res.	22.3	0.65	0.041	2.42	0.0003	0.016	0.44	0.55
-100mesh Leach Res.	229.9	6.68	0.025	2.08	0.0017	0.139	2.78	4.90
Residue Calculated	3442.1	100.00	0.060	2.84	0.0601	2.838	100.00	100.00
Residue Assay			0.059	3.14				

OPERATION											
TIME											
REAGENTS - LBS PER TON											
MACHINE											
R.P.M.											
pH											
% SOLIDS											
TEMPERATURE											

REMARKS:

	GRINDING PRODUCT	
MESH	%	
+ 10		
+ 14		
+ 20		
+ 28		
+ 35		
+ 48		
+ 65		
+ 100		
+ 150		
+ 200		
+ 325		
-325		

ASSAY REPORT SHEET

ASSAY LAB, INC.
1376 W. 8040 So. Unit #4
West Jordan, Utah 84084

Date Received _____

Date Reported 6/5/87

Client Dawson Metallurgical

Sample Identification	Oz / Ton Au	Oz / Ton Ag	Remarks
P-1377			* Ounces per ton of 2000 lbs.
Dmea			
Test #1			
+3/4"	.099	2.99	
	.098	3.00	
-3/4"+¼"	.108	3.29	
	.102	3.30	
-¼"+6mesh	.090	3.20	
	.092	3.21	
-20+48mesh	.087	3.21	
	.086	3.23	
-6+20mesh	.089	3.21	
	.088	3.22	
-48+100mesh	.080	3.12	
	.083	3.13	
-100mesh	.181	3.40	
	.184	3.40	

ASSAY REPORT SHEET

ASSAY LAB, INC.
1376 W. 8040 So. Unit #4
West Jordan, Utah 84084

Date Received _____

Date Reported 6/17/87

Client Dawson Metallurgical

Sample Identification	Oz/Ton Au	Oz/Ton Ag	Remarks
P-1377 Dmea Leach Sol'n.			* Ounces per ton of 2000 lbs.
Test #2	.049	.11	
	.051	.11	

Randy Bianchi

ASSAY REPORT SHEET

ASSAY LAB, INC.
1376 W. 8040 So. Unit #4
West Jordan, Utah 84084

Date Received _____

Date Reported 6/17/87

Client Dawson Metallurgical

Sample Identification	Oz / Ton Au	Oz / Ton Ag	Remarks
P-1377 Dmea Leach Res.			* Ounces per ton of 2000 lbs.
Test #2	.058 .060	3.13 3.15	

Ronald Bianchi

ASSAY REPORT SHEET

ASSAY LAB, INC.
1376 W. 8040 So. Unit #4
West Jordan, Utah 84084

Date Received _____

Date Reported 6/24/87

Client Dawson Metallurgical

Sample Identification		Oz / Ton Au	Oz / Ton Ag	Remarks
P-1377				* Ounces per ton of 2000 lbs.
Dmea				
Leach Res.				
Test #2	+3/4"	.053	2.53	
		.052	2.75	
	-3/4+¼"	.069	2.90	
		.071	3.01	
	-¼+6 mesh	.061	3.04	
		.060	3.24	
	-6+20mesh	.058	3.04	
		.058	2.90	
	-20+48mesh	.050	2.97	
		.050	2.85	
	-48+100mesh	.031mg	1.85mg	
	-100 mesh	.025	2.15	
		.025	2.01	

Ronald Bianchi

Carole

 17-Jun-87

LAB JOB #: AFB01571 ATTN: Carole A. O'Brien

Client name: A. F. Budge (Mining) Ltd. No. Samples: 1
Date Received: 05-19-87
Billing address: 7340 E. Shoeman Lane Submitted by: Don White
Suite #111-B-E
Scottsdale, AZ 85251
Phone number: 945-4630 / 778-3140 INVOICE ATTACHED

ANALYTICAL REPORT

CN Bottle Roll Test*

Client ID	Lab ID	Au oz/ton	Au ppm	Ag oz/ton	%
AFB01571					
UVX BATCH #49					
HOLE #M-11 / Composite					
198-210' Heads	1571- 1	0.402		7.04	
198-210' Tails		0.332		5.53	
Recovery		0.051			12.69
Soln. 24 hrs.			0.8		
Soln. 48 hrs.			0.8		
Soln. 72 hrs.			0.8		

* Sample weight = 1 kilogram
pH = 11.5
+ Lime = 5 grams
+ NaCN = 4 grams

Sample run was 1 kg of coarse rejects (~10 mesh) from assays; no additional crushing or grinding.

Recovery will undoubtedly come up with grinding to ~200 mesh

Resulting slime problem would likely preempt heap leaching, even with agglomeration, and require CIP treatment

IRON KING ASSAY INC.

07-Aug-87

LAB JOB #: AFB01826

Client name: A. F. Budge (Mining) Ltd.

Billing address: 7340 E. Shoeman Lane
Suite #111-B-E
Scottsdale, AZ 85251

Phone number: 945-4630 / 778-3140

No. Samples: 1
Date Received: 08-06-87
Submitted by: Don White

NO CHARGE

ANALYTICAL REPORT

Client ID AFB01826	Lab ID	CN Bottle Roll Test Au oz/ton	Ag oz/ton	
M-11 Composite	1571- 1	(Tails from previous CN Test)		
Head Assay		0.332	5.53	(previous tails assay)
Tails Assay		0.165	3.28	
Recovery %		50.30	40.69	

The sample was subjected to grinding in a laboratory ball mill at approximately 50% solids using a 60% ball charge (mill volume).

After grinding for 20 minutes, there was approximately 10% of the material >10 mesh. It was decided further grinding was necessary. After 40 minutes of total grinding time, the ore began to slime so the grinding was discontinued at this point. >10 mesh particles were still present at this time.

After the NaCN test cycle was completed, the tail pulps were screened through a 60 mesh screen and <60 mesh fraction and the >60 mesh fraction were assayed seperately. The results of these assays is as follows:

	Au oz/ton	Ag oz/ton
< 60 mesh	0.165	3.28
> 60 mesh	0.387	6.54

REGISTERED ASSAYER
CERTIFICATE NO. 15583
JIM ROY WEATHERBY
Date signed
ARIZONA, U.S.A.

P.O. Box 56 • Humboldt, Arizona 86329 • Phone (602) 632-7410

U.V.X. VERDE TARGET AREA DRILLING/ASSAY SUMMARY

Drill Fence	D.D.H.	Initial inclination of hole	Ratio of true thickness to drill intercept	High grade intercepts: Drill intercept (feet)	High grade intercepts: True thickness (feet)	High grade intercepts: Grade (oz/t) Au	High grade intercepts: Grade (oz/t) Ag	Low grade intercepts: Drill intercept (feet)	Low grade intercepts: True thickness (feet)	Low grade intercepts: Grade (oz/t) Au	Low grade intercepts: Grade (oz/t) Ag
	806-1	-4°	.87	514-527 568-578	11 9	.24 .18	2.2 0.9	504-594	78	.09	1.4
Fence 5 Morgan DDS	M-1	+42°	.87	122-138 157-176	14 16	.24 .23	1.5 1.6	122-176	47	.17	1.1
Fence 5 Morgan DDS	M-2	+60°	1.00	124-136	12	.16	1.5	118-150	32	.10	1.4
Fence 3 Morgan DDS	M-3	+20°	.70	151-185	24	.88	32.5	146-233+	61+	.41	14.6
Fence 3 Morgan DDS	M-4	+50°	.50	107-130 190-203	12 7	.14 .29	3.4 2.1	107-235	64	.09	1.8
Fence 3 Morgan DDS	M-5	+10°	.70	None	--	--	--	None	--	--	--
Fence 3 Morgan DDS	M-6	+30°	.70	158-178	14	.40	5.2	148-195+	33+	.26	6.7
Fence 5	M-7	+25°	.87	None	--	--	--	None	--	--	--
Fence 4	M-8	+40°	.87	90-94 107-118	4 10	.22 .17	3.7 0.6	90-144	47	.10	1.0
S15°W	M-9	+20°	.77	104-121	13	.39	1.8	104-157	41	.19	1.6
S17°E	M-10	+23°	Deflected(?)	None	--	--	--	None	--	--	--
S7°E	M-11	+25°	.70	168-177 190-210+	6 14+	.32 .33	9.7 7.4	168-210+	29+	.26	7.3

Compiled by Don White

May, 1987

M E M O

TO: Carole A. O'Brien, Anthony Budge

FROM: Don White

DATE: June 16, 1987

SUBJECT: Most likely area to contain more gold at U.V.X.

We now have all the more understanding of what controls the U.V.X. gold mineralization and with that, an ever better idea as to where to look. Thus the exploration priorities evolve continually.

To review, we see the key controls on mineralization as:

a) Chert stratigraphy
b) Specific setting stratigraphically above silica (Cu-Au) ore
c) Proximity to diorite pluton
d) Preference for juxtaposition to structural complexities in the margin of the diorite

Beyond that, certain types of mineralization preferentially occur in limonitic versus hematitic facies and porous (silica grit) versus imporous chert types. But high grade can be any combination of porosity or iron facies and hence these are not classified as "controls."

We have now drilled various portions of the northern Verde target area from the 809 and Morgan diamond drill stations. The entire strike length of the Verde area tested to date (400 feet from 809-1 thru M-11) is mineralized, substantial portions with likely economic grades. What remains unexplored is about 800 feet of strike length further south. Scattered along that entire length are old reports of high grade (0.3 to 1.2 oz/t Au) in chert. All of it should be explored but I want to highlight the southern extremity for its particularly great potential.

That area is about 300 feet in length, extends from a little above the 1100 level to the 800 level, and has a middle portion on the 950 level with three reported assays (.2, .3, .3 oz/t Au) averaging 0.25 oz/t Au over 20 to 30 feet in thickness. It lies in the middle of the chert stratigraphy, above silica ore stopes, and laterally from the main massive sulfide body. It's just off the end of the diorite wedge and at the junction of the three major chert lobes earlier dubbed the Verde, Gold Stope, and Florencia areas. As far as I am concerned this has all the geographic "pluses" and should be our priority target after drilling the south end of the M-3 zone from the station now being drifted to beyond the Morgan D.D.S.

The area I'm interested in lies south of the Florencia Fault and is best reached by continuing SW from the already rehabilitated 901-S drift on the 950 level. If the "990" crosscut to the SW can be utilized as far as its tight cave S of the Gold Stope, then a turnout due S along the 7650E grid line would constitute 300 feet of new drifting to cross the Florencia Fault and put us in an ideal position to drill. Holes from such a station, collared in chert, would only be 100-180 feet in length.

This target will be discussed with Carole at the upcoming "strategy" session and I shall highlight it on the soon-to-be revised plans.

DW:sk

Comments: Number of tons required to breakeven, to recover $1.58 mm to date, and additional $0.90 mm in exploration and development;

Inspiration Smelter pays 85% of gold minus $4/ounce; 85% of silver minus $0.35/ounce; $7.50/ton for silica.

GRADE gold oz/t silver oz/t	NUMBER OF TONS at $400/oz gold $7.00/oz silver	at $450/oz gold $7.50/oz silver
0.15 1.50	too low grade	1423122
0.20 2.00	149239	89798
0.25 2.50	62401	46362
0.30 3.00	39448	31247
0.35 3.50	28840	23565

Comments: Number of tons required to breakeven, to recover $1.58 mm to date, additional $0.90 mm in exploration and development, and $1.0 mm capital for CIP Plant

Recovery in plant: 90% for gold, 75% for silver

GRADE gold oz/t silver oz/t	NUMBER OF TONS at $400/oz gold $7.00/oz silver	at $450/oz gold $7.50/oz silver
0.15 1.50	too low grade	too low grade
0.20 2.00	200762	104099
0.25 2.50	67727	48670
0.30 3.00	40734	31759
0.35 3.50	29126	23570

A.F. Budge (Mining) Limited

United Verde Extension Mine

Summary Report

July, 1987

Introduction

On April 1, 1985, an lease agreement was executed between A.F. Budge (Mining) Limited and Verde Exploration, Ltd. to explore for minerals at the U.V.X. Mine in Jerome. Brooks Minerals, Inc. of Lakewood, Colorado was retained as mining contractor in June, 1986 to prepare certain areas of the mine for underground drilling. During the period August, 1985 to January, 1986, the Longyear Company drilled a total of 3,517 feet in seven drill holes: three from the 1100 level; three, including one abandoned before reaching its target, from the 950 level; and one hole from the 800 level. The latter hole, 806-1, succeeded in reaching the Verde area and intersected a broad zone of mineralization from 504 ft. to 578 ft. which averaged 0.102 oz/ton gold and 1.28 oz/ton silver. Within this zone was a 13 ft. interval, from 514 ft. to 527 ft. which averaged 0.236 oz/ton gold and 2.24 oz/ton silver.

Brooks Minerals was dismissed as contractor and A.F. Budge (Mining) Limited began a second phase of exploration in June, 1986. At this time, the hoisting facilities at the Edith Shaft were purchased from Phelps Dodge. Brooks Minerals' equipment on site was also purchased.

Based on the results of the 806-1 intercept, a program was initiated to provide access for drilling the Verde area from a point near the Morgan Winze on the 950 level. From the 901 Drill Station used in the 1985, rehabilitation of the 901-W drift advanced approximately 400 ft. through and beyond the Gold Stope. When drift rehabiliation costs became prohibitive, a new cross-cut was driven approximately south 55 degrees west for a distance of 270 feet. The Morgan Drill Station was excavated and during the period January, 1987 to May, 1987, the Longyear Company drilled a total of 2,398 feet in eleven holes. During this time, drift rehabiliation advanced on the 800 level from the old 806 Drill Station, approximately 450 feet west along the 806 drift. The 809 Drill Station was excavated and drilling commenced in May, 1987. To date, Longyear has drilled 946 feet in 3 holes. Hole 809-4 was stopped temporarily at 247 feet while modifications were made to the headframe and a new skip/cage hung.

Summary & Conclusions

Results from drilling from the Morgan Drill Station indicate a zone of chert over 100 ft. thick in contact with the hanging

wall of the Verde Fault. The cherts range in variety from tan, red-brown and purple massive and banded cherts with light grey clasts, through matrix and clast supported chert breccias, to very fine grained, yellow and tan silica grit, to very ferruginous chert. Gold and silver mineralization occurs in all varieties, notably in the silica grit with values up to 1.54 oz/ton gold and 65.1 oz/ton silver. Values in the ferruginous chert with almost 30 weight percent iron can range to 0.46 oz/ton gold and 3.4 oz/ton silver.

Cherts encountered in the drilling from the 809 Drill Station appeared slightly more homogenous and were variously brecciated and silica-healed cherts. Silver values were notably lower (averaging less than 1.5 oz/ton) and gold values ranged from nil to a a high of 0.54 oz/ton.

The M-3 Zone

The M-3 zone is defined by drilling from the Morgan Drill Station in holes M-1 through M-11, 806-1 and 809-3 which passed through the zone at an oblique angle. Various summaries and reserve estimates have been attempted for this zone. Based on the numbers contained in the May 15, 1987 memo by Don White and Bob Hodder, but using a grade of 0.40 oz/ton gold and 8.0 oz/t silver for the M-3 intercept, the zone of high gold, low iron material contains approximately 14,000 tons of 0.26 oz/t gold and 3.~~75~~ 3.6 oz/ton silver.

Economic assumptions are: $450/ounce gold and $7/ounce silver; mining costs of $60/ton; transportation to Inspirations's smelter at $12/ton; processing at a C-I-P plant in Cottonwood of $9/ton; smelter pay of 85 percent of gold minus $4/ounce, 85 percent of the silver minus $0.35/ounce and $7.50 per ton for silica; recovery in C-I-P of 90 percent for gold and 75 percent for silver.

UVX Drilling Summary

Morgan Drill Station: Mine grid 11565N, 7080E

Hole No.	Total Length		From	To	Width	True Width	Gold oz/t	Silver oz/t
M-1	262		122	176	54	47	0.168	1.24
		Includes:						
			122	138	16	14	0.235	1.52
Bearing S60°W @ +42°			157	176	19	17	0.226	1.56
M-2	226		118	146	28	28	0.106	1.47
		Includes:						
			124	136	12	12	0.162	1.53
Bearing S60°W @ +60°								
M-3	233		146	230	84	59	0.425	15.10
		Includes:						
			146	185	39	27	0.777	28.77
Bearing S2°E			185	204	19	13	0.147	3.63
@ +20°			204	230	26	18	0.101	2.97
M-4	295		107	206	99	50	0.101	2.07
		Includes:						
			107	130	23	12	0.142	3.42
Bearing S2°E			190	206	16	8	0.244	1.88
@ +50°								
M-5	198 no mineralized intercepts							
Bearing S2°E @ +10°								
M-6	195		148	195	47	33	0.257	6.67
		Includes:						
			155	167.5	12.5	9	0.376	7.57
Bearing S2°E			167.5	195	27.5	19	0.235	4.27
@ +30°								
M-7	129 no mineralized intercepts							
Bearing S60°W @ +25°								

UVX Drilling Summary

M-8	187	90	144	54	47	0.097	0.97
		Includes:					
		90	98	8	7	0.144	2.38
Bearing S30°W @ +40°		107	118	11	10	0.174	0.58
M-9	183	100	157	57	44	0.180	1.59
		Includes:					
		104	131	27	21	0.303	1.87
Bearing S15°W @ +20°							
M-10	278 no mineralized intercepts (no chert)						
Bearing S17°E @ +23°							
M-11	210	165	210	45	32	0.249	7.04
		Includes:					
		168	190	22	15	0.202	7.17
Bearing S7°E @ +25°		190	210	20	14	0.334	7.39

809 Drill station: mine grid 11790N, 6905E

809-1	336	183	237	54	38	0.138	1.45
		Includes:					
Bearing S25°W @ +23°		200	214	14	10	0.218	0.77
809-2	240	156	209	53	37	0.202	1.49
		Includes:					
		173	200	27	19	0.331	1.43
Bearing S5°W @ +23°							
809-3	370	50	68	18	10	0.171	0.39
		287	343	56	32	0.150	1.04
		Includes:					
		326	343	17	10	0.196	1.19
Bearing S15°E @ -5°							
	Averages	Low Grade			40	0.172	2.68
		High Grade			15	0.267	3.31

Target: The 901-Florencia Zone

Potential: 40,000 tons of 0.20 oz/ton gold and 2.00 oz/ton silver flux quality material

Probability/Risk: Requires additional $250,000 in exploration and development. Probability factor: 50%

Reward:

	Sending ore to Inspiration smelter	Processing ore at C-I-P plant
"Gross" per ton	$94.63	$91.50
Mining	($60.00)	($60.00)
Transporation	($12.00)	$0.00
Processing	$0.00	($9.00)
"Net" per ton	$22.63	$22.50
"Net" on 901 zone	$905,000	$900,000