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## EVALUATION REPORT

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ON THE

SHERWOOD GOLD MINE AREA

ALBERNI MINING DIVISION

VANCOUVER ISLAND, BRITISH COLUMBIA

# by

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#### SUMMARY

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The Sherwood Mine property, controlled by Casamiro Resource Corporation, Sherwood Mines Ltd. (N.P.L.) and Cinta Resource Colp. is comprised of 19 contiguous Crown granted mineral claims situated within Strathcona Provincial Park, Alberni Mining Division, British Columbia.

Previous exploration and development work suggests a geologically inferred reserve of 51,632 tonnes at an average grade of 40.97 grams per tonne gold and 72.02 grams per tonne silver.

Using this base tonnage and grade, a mine evaluation study of the Sherwood Mine was completed. The results of the study indicate that a net cash flow of 7.43 million dollars could be generated. Additional tonnage enhances the return to the owners. If 275,000 tonnes of comparable grade material can be mined, then the net cash flow generated could be 94.16 million dollars.

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C) 100,000 Tonne Reserve Case

D) 175,000 Tonne Reserve Case

E) 275,000 Tonne Reserve Case

#### INTRODUCTION

At the request of Casamiro Resource Corporation, the authors of this report have assessed available data pertaining to previous exploration and development work on the Sherwood mine property situated near the southern boundary of Strathcona Provincial Park.

Information used in preparing this evaluation of the Sherwood gold-silver deposit includes results of detailed underground sampling by Dr. H. Sargent of the B.C. Department of Mines in 1940 complemented by more recent sampling of accessible workings which includes work by one of the authors.

The senior author, R.T. Heard, P. Eng., carried out a two-day examination of the Sherwood property on behalf of Casamiro Resource Corporation in mid-November of 1986. An assessment of the property's potential with recommendations for additional work are contained in a report entitled "Evaluation Report of the Sherwood Gold Mine Area, Alberni Mining Division, Vancouver Island, British Columbia" dated December 1, 1986.

N.C. Carter, Ph.D., P. Eng., advised the Company during 1987 and made a brief visit to the Sherwood property December 11, 1987. In addition, he has examined several other mineral prospects in the west coast region of Vancouver Island including the You gold prospect in the Bedwell River area.

George Heard, B.Sc., M.B.A., has prepared economic analyses based on information provided by the other two authors.

Published and unpublished reports pertaining to the property and the geological settings of similar deposits on Vancouver Island and elsewhere have been reviewed in preparing this evaluation of the Sherwood Mine.

#### LOCATION, ACCESSIBILITY AND PHYSIOGRAPHY

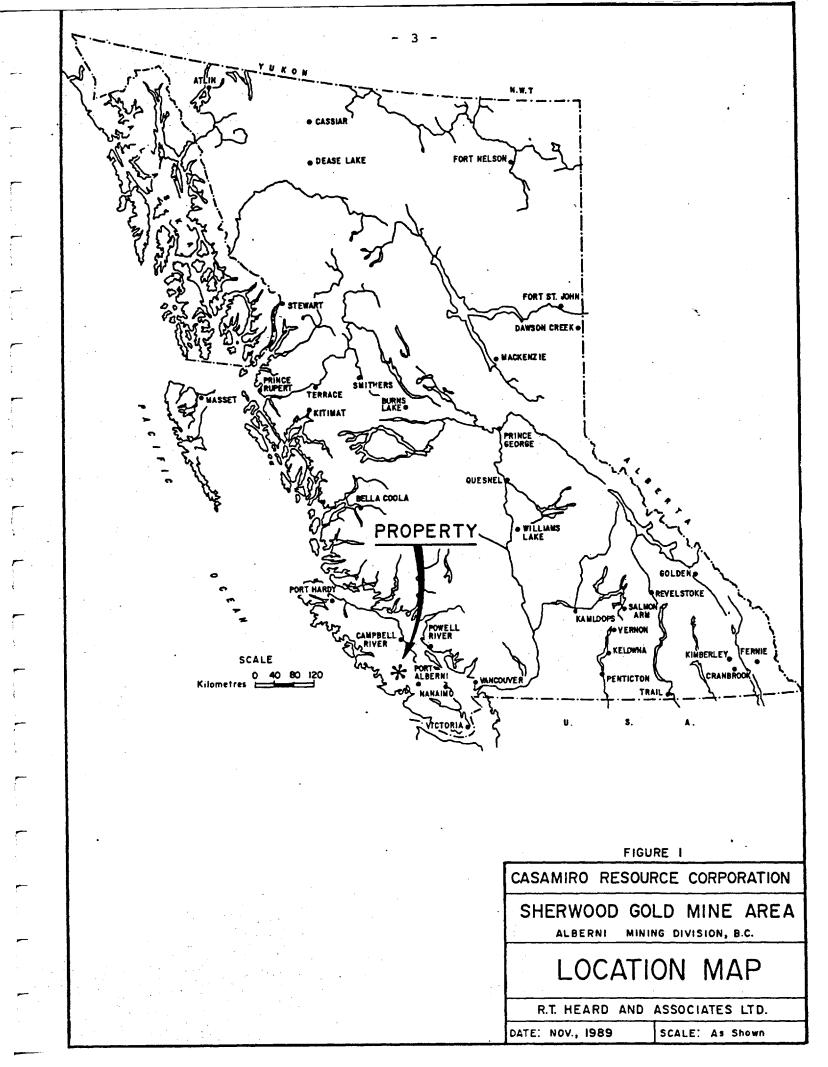
The property is located approximately 45 kilometers west and slightly north of Port Alberni. It lies within Strathcona Provincial Park on the headwaters of Drinkwater Creek. Geographical coordinates are 49° 28' north latitude and 125° 31' west longitude. See Figure 1, Location Map, Page 3.

Access is presently by helicopter. Logging roads are within three kilometers of connecting with the Great Central Lake terminus of an old logging railway grade that was converted into a truck road in 1946 and which extended 8.8 kilometers up the creek valley. It is today only a hiking trail, maintained by the Parks Service, which provides access to Della Falls located across the valley from the Sherwood Mine some 14.5 kilometers from the lake.

The area is rugged and mountainous with maximum relief on the property in excess of 1000 meters from 350 meters at Drinkwater Creek to 1370 meters at the portal of No. 1 level. Slopes are very steep. The portals for the mine levels are located in a talus slide area that extends nearly vertically from the camp area to Drinkwater Creek.

Precipitation is heavy, being in excess of 100 inches per year, with heavy snows in the winter months. The climate is temperate, from  $-18^{\circ}$ C in winter to  $+25^{\circ}$ C in summer.

Timber on the lower slopes is mature and commercially valuable. Red cedar, hemlock, balsam, fir, spruce, Douglas fir and yellow cedar grow in the area. Trees large enough for mining purposes are found locally to the 1250 meter elevation.



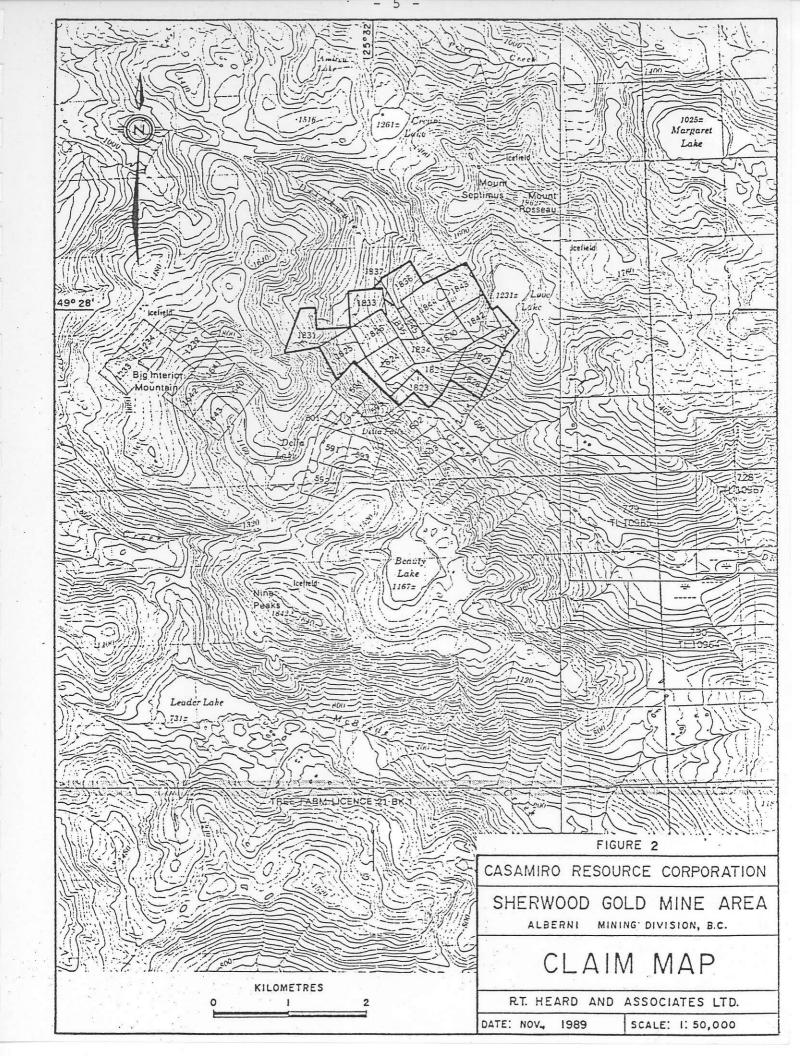
# PROPERTY

The Sherwood Gold Mine property consists of 19 contiguous Crown - granted mineral claims as follows:

Lot No.	Claim Name	Acres
1823	Black Bear No.2	34.47
1824	Black Bear No.4	43.51
1825	Black Bear No.5	48.16
1826	Black Bear No.6	50.19
1827	P.M. No.4 Fraction	47.83
1828	P.M. No.5 Fraction	21.24
1829	Pluto No.1	43.86
1830	Patullo No.1	48.03
1831	P.M. No.3 Fraction	51.21
1833	Black Bear No.8	39.83
1834	Patullo Fraction	26.02
1835	Hamber No.1	21.83
1836	Hamber No.3	43.95
1837	Hart	5.99
1841	Pluto No.3	31.18
1842	Patullo No.3	45.57
1843	Patullo No.4	48.61
1844	Patullo No.2	51.03
1845	Hamber No. 2	13.44

Total Acreage = 715.95

All claims are shown on National Topographic Series Sheet 92F/5, Bedwell River, Alberni Mining Division, British Columbia. See Figure 2, Claim Map, Page 5.



#### HISTORY

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The gold-bearing veins on upper Drinkwater Creek were discovered in 1938. In July 1939, the first claims of the Sherwood property were staked following the discovery of the Sherwood vein, a mineralized shear zone, by W.J. Sherwood.

In 1940 and 1941 the property was operated under option by Pioneer Gold Mines of B.C. Limited. Between March 1 and November 15 when operations were indefinitely suspended Pioneer completed underground development work on three levels which included: drifting, 760 feet; crosscutting, 90 feet; and raising, 270 feet.

In 1942, the property was operated by W.J. Sherwood. Two men were employed on development work between June 1 and October 1. They produced 22 tons of ore having an average grade per ton of 3.25 ozs gold and 5.75 ozs silver. This was shipped to the smelter at Tacoma.

Cangold Mining and Exploration Co. Ltd., optioned the property in early 1945. They converted the 5 1/2 mile railway grade to a truck road and surveyed a location line 19,500 feet from the end of the railway grade to the bottom of the hill below the mine. Work on the property between May 25 and October 30 consisted of camp rehabilitation, surface stripping, surveys for camps, millsites, tramline and powersite and Crown grant surveys. Repair work was carried on in the lower adit, the raise from the No. 7 level to the No. 5 level and the sub-level off No. 5 level; the raise and sub-level were also surveyed and sampled. Surface prospecting above the present mine workings located several new gold-bearing quartz veins. The 1945 work was sufficiently encouraging for Cangold to announce plans for a 50 TPD mill and surface plant to be constructed in 1946. In 1946, Cangold completed an 18,000 foot road from the end of the old logging grade to the millsite. A sawmill was built and a quantity of lumber was cut in preparation for camp and mill construction. Adverse weather closed the operations October 10. No references to any work on the property after 1946 can be found.

On June 7, 1950, Sherwood Mines Limited (N.P.L.) was incorporated. W.J. Sherwood is reported to have high graded a portion of the better reserves in the 50's but no records exist of the quantity or grade.

On July 12, 1984, Mrs. Merna Tattersall became the president and a director of Sherwood Mines, having purchased the controlling interest in the company.

Casamiro Resource Corporation controls the property under terms of a "Letter of Intent" dated November 19, 1984.

During the 1985 and 1986 seasons Casamiro reopened the No. 7 and No. 3 levels. Access Geological Services were retained during 1986 and this firm mapped and sampled the No. 7 level and the raise between No. 7 and No. 5 levels.

Following an examination and additional sampling of the underground workings in late 1986, R.T. Heard, P. Eng., recommended a program of underground rehabilitation and development to further assess the potential of the property at an estimated cost of \$600,000.

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Funding to carry out the recommended program was arranged in early 1987 and necessary permits were applied for through the various agencies of the Provincial Government. These included an application for a Resource Use Permit from the then Ministry of Environment and Parks which was necessary because of the property's location in a newly-created Recreation Area at the south end of Strathcona Provincial Park.

Lease arrangements for mining and camp equipment were made and because of the sensitivity of the property location, a preliminary environmental study including water quality and hydrology measurements was undertaken by Norecol Environmental Consultants Limited.

A Notice of Work was approved by the Ministry of Energy, Mines and Petroleum Resources in early October, 1987, subject to a \$10,000 reclamation bond which was posted by the Company. Some of the leased mining and camp equipment was transported to the property in early November just prior to a heavy snowfall.

A Resource Use permit for the project was not issued by the Ministry of Environment and Parks; consequently, the only work completed on the property in 1987 included the aforementioned environmental study and partial establishment of survey control.

A Provincial Government moratorium on mineral exploration in Strathcona Provincial Park in early 1988 and the adoption by the Government of recommendations proposed by the Strathcona Provincial Park Advisory Committee to prohibit mining and exploration in the Park effectively precluded additional work on the Sherwood Mine property.

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# PROPERTY DEVELOPMENT

The Sherwood Gold Mine has been developed by three main levels, a system of two compartment raising and two sub-levels. Total development work has been scaled off of available plans, whose accuracy has not been determined, and breaks down as follows:

Level	Drifting (ft)	Crosscut (ft)	<u>Raise (ft)</u>	Total ft
. · 1	470			470
3	450	260		710
5	300			300
6	40			40
7	775	285		1060
7 to 5		<b></b>	<u>270</u> 270	2580

# Value of Previous Work

Skoda International Mining Services were consulted as to mining costs to duplicate the present underground workings in terms of today's dollar value. They provided the following costs:

i)	Drifting and Crosscutting	: 2580 ft. x \$300/ft	= \$774,000
ii)	Raising	: 270 ft. x \$600/ft	= 162,000
iii)	Portals & Dumps	: 3 x \$20,000 each	= 60,000

## \$996,000

Future reclamation and restoration work may involve expenditures of \$10,000 (value of bond posted by Casamiro).

## GEOLOGY

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### Regional Geological Setting

Vancouver Island makes up the southern part of the Insular belt, the westernmost tectonic subdivision of the Canadian Cordillera. The southern Insular belt is dominated by Paleozoic and Mesozoic volcanicplutonic complexes overlain on the east coast of Vancouver Island by clastic sedimentary rocks of Cretaceous age. Tertiary basic volcanic rocks are prevalent in the south Island area and granitic intrusions of equivalent age are widespread along the west coast.

Oldest rocks underlying Vancouver Island include the Paleozoic Sicker Group which is exposed in two principal structural uplifts in the central and southern part of the Island, the area between Port Alberni and Duncan, and the Buttle Lake area which includes the Sherwood mine. Sicker Group comprises a 2,000 - 3,000 metre thickness of mafic to felsic volcanic rocks, intrusive equivalents and lesser sedimentary rocks which has been subdivided by Muller (1980) into three principal formations. These include the basal Nitinat Formation of pre-Devonian age which is exposed only in the Port Alberni-Duncan area and which consists of basaltic flows and flow breccias. Myra Formation of similar age overlies the Nitinat Formation and includes 900 - 1800 metres of intermediate to felsic volcaniclastic and lesser sedimentary rocks. Pennsylvanian to Permian limestones of the Buttle Lake Formation form the upper unit of the Sicker Group.

Much of the Sicker Group exposed in the Buttle Lake uplift is Myra Formation volcanic and lesser sedimentary rocks. Buttle Lake Formation limestones overlie the Myra Formation and are exposed on the flanks of the structural uplift immediately north of the Sherwood property. Sicker Group in the Buttle Lake area is overlain unconformably by late Triassic Karmutsen Formation basalts and is intruded by diorites related to Karmutsen flows and by granitic rocks of the mid-Jurassic Bedwell batholith. A major west-northwest fault extends from Love Lake on the Sherwood mine property along the headwaters of Drinkwater Creek to Bedwell Lake, a distance of 6 km. The eastern contact of the Bedwell batholith has been displaced more than a kilometre eastward along this fault and is 3 km west of the principal workings on the Sherwood property.

Vancouver Island is noted for a variety of mineral deposit types including gold-bearing quartz vein deposits and occurrences. These are best developed along the west coast of the island where they occur in three principal areas including, from north to south, the Zeballos, Bedwell River and Kennedy River camps.

The quartz veins are of a similar character in all districts, generally not exceeding one metre in width and containing locally appreciable amounts of pyrite, chalcopyrite, galena and sphalerite.

In contrast, host rocks for the veins are variable and include Paleozoic Sicker Group rocks, late Triassic Karmutsen volcanic rocks and granitic rocks of Jurassic and Tertiary age.

Most commercial production from these gold-bearing quartz veins on Vancouver Island has come from the Zeballos camp. Between 1933 and 1953, cumulative producton from several deposits amounted to 8,857 kg gold and 3,737 kg silver from 651,657 tonnes milled. Camp recovered grades were 13.60 g/t gold, and 5.73 g/t silver.

Privateer Mine accounted for 60% of the Zeballos area gold production. Overall average grades were 18.78 g/t gold and 7.65 g/t silver, but as the following table demonstrates, twice the average recovered grades (and most of the gold-silver production) were encountered over a 6-year span between 1938 and 1943.

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Year	Tonnes Mined	Tonnes Milled	<u>Au (g)</u>	<u>Ag (g)</u>	<u>Au (g/t)</u>	<u>Ag (g/t)</u>
1938	41176	6562	498363	179682	75.95	27.38
1939	34710	24330	1025995	375258	42.16	15.42
1940	44677	27223	920462	389689	33.81	14.31
1941	50487	28444	874958	353797	30.76	12.44
1942	43799	22746	695463	275541	30.58	12.11
1943	17927	12797	419424	166463	32.78	13.01
Totals	3 232776	122102	4434665	1740430		
			Average	Grades	36.32	14.25
			Imperial	Units	1.053 oz/ton	0.41 oz/ton

Most of the Privateer production was derived from two principal veins developed in metamorphosed limey sediments and volcanics marginal to a Tertiary quartz diorite stock. Average vein widths were 0.3 metre or less; the main production vein included an ore shoot with more than a 300 metre strike length (Gunning, 1948).

More than 20 gold-bearing quartz veins are known in the Bedwell River area including the Sherwood Mine. Most are steeply dipping, north, northeast to east striking and range in width from 0.3 to 1 metre. Like the Zeballos area, quartz veins in the Bedwell area contain variable amounts of pyrite, chalcopyrite, galena and sphalerite and some native gold. Host rocks are mainly granitic rocks of the Bedwell batholith, although several vein deposits, including those on the Sherwood and Della properties, are hosted by Sicker Group volcanic rocks.

Commercial production from the Bedwell River area amounts to 227 kg gold and 103 kg silver from 13880 tonnes treated or shipped. Average recovered grades were 16.33 g/t gold and 7.42 g/t silver. More than 90% of the district production was from the adjacent Muskateer and Buccaneer properties on the lower Bedwell River. Productive veins on both properties did not exceed 0.3 metre in width.

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#### Sherwood Gold Mine Area

Much of the Sherwood Mine property is underlain by a "Paleozoic and Mesozoic complex" (Sargent, 1941). Predominant rock types are fine-grained volcanic and sedimentary rocks which are probably part of the Myra Formation of the Sicker Group.

Numerous irregular basic intrusive vocks cut the Sicker Group on the property and these are believed to be coeval with late Triassic volcanic flows. Dykes and irregular masses of quartz diorite, related to the Bedwell batholith, also cut the complex particularly in the western claims area which is within 1.5 km of the eastern margin of the batholith.

The most striking structural feature on the Sherwood Mine property is the east-northeast to east striking steeply north-dipping shear zone within which the principal gold-bearing quartz vein is developed. The shear zone has a known lateral extent of at least 365 metres between the underground workings and a series of open cuts to the northeast.

The width of the shear zone varies between one and two metres over its exposed length.

Quartz lenses and veins of variable width occur within the shear zone; in some instances, parallel veins are developed.

While the strike length of the main shear zone is imperfectly known, it is of interest to note that quartz veins west of Drinkwater Creek are more or less on trend with the zone as exposed in the underground workings.

Sargent (1941) suggests that the shear zone above and east of the underground workings assumes a more easterly strike; if correct, the two PDQ veins southeast of Love Lake adjacent to the Sherwood property may also be related to the major structure.

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No. 1 PDQ vein strikes north-northeast and was traced in open cuts over a 700 metre strike length. The northernmost 100 metres of exposed strike length has reported better mineralization over 0.15 - 0.50 metre widths. Sampling by Sargent (1941) yielded values of 63 grams gold per tonne and 89 grams silver per tonne over 0.46 metres.

No. 2 PDQ vein, parallel to and 300 metres south of the No. 1 vein, is exposed in open cuts over 100 metres of strike length. Several samples collected by Sargent (1941) included one over 0.38 metres which assayed 32.8 grams gold per tonne and 144.0 grams silver per tonne.

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#### Sherwood Vein

This is the main vein on the property. It has been developed by three main levels and two sub-levels connected by a raise from the loweror No. 7 level.

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The vein may best be described as a vein fault. It consists of mineralization in a shear zone. The vein can be traced in cuts just above the No. 1 level to well below the No. 3 level. It outcrops in the bottom of a very steep canyon which cannot be reached safely. The portal of No. 1 level is presently inaccessible but was reached in 1940 by a shelf cut along the side of the canyon. The No. 3 and No. 7 levels were reached by crosscuts driven under the steep floor of the canyon.

Part of Sargents description of the vein is quoted here. His "(Fig 6)" has been used as a base for the authors' Figure 3, Plan of Workings, Page 18.

"The shear-zone strikes north of east and dips a little less than 70 degrees northward as indicated by the underground workings. The width, from 3 or 4 to at least 6 feet, is rather indefinite, because branch-shears run off into the walls and the walls and the filling of the shear are greatly altered. In the outer part of No. 1 level the vein strikes about north 70 degrees east, it begins to curve to the right about 240 feet from the portal, and in the inner end of the working strikes about north 85 degrees east. About 280 feet from the portal vein-mineralization in the shear is offset a few feet to the south, on the north-eastern side of a north-westerly striking cross-back.

"Mineralization in the shear is in lenses or veins from a few inches to about 2 1/2 feet wide. Frequently two or more veins or lenses occur within the width of the shear-zone and are separated by wall-rock from a few inches to two or three feet wide, or by clay gouge a few inches thick. Narrow veins branch into the wall of the workings. The shear-zone cuts volcanic and granitic rocks and at some points follows along a contact. Some of the branch-shears, or branch fractures containing mineralization, follow contacts. "Almost all the material in the shear-zone, exposed when the writer examined the property, is greatly altered. The width of the zone, open fracturing, and the precipitous surface have favoured deep oxidation. Primary vein-mineralization includes quartz and sulphides. Most of this material has been reduced to a rusty, crumbly, and often porous, state. Some narrow harder sections contain recognizable sulphides and on No. 1 and No.3 levels, toward the faces indicated on (Fig. 6), more sulphide mineralization is recognizable. However, even here the alteration has gone far, and the primary sulphides have been destroyed in part. Sampling by the writer indicates that clay gouge and horses of wall-rock separating lenses or veins of mineralization are essentially barren, and that where sulphide minerals are found values in gold and silver are usually attractive. There is a wide range in assays from samples of rusty decomposed vein-matter.

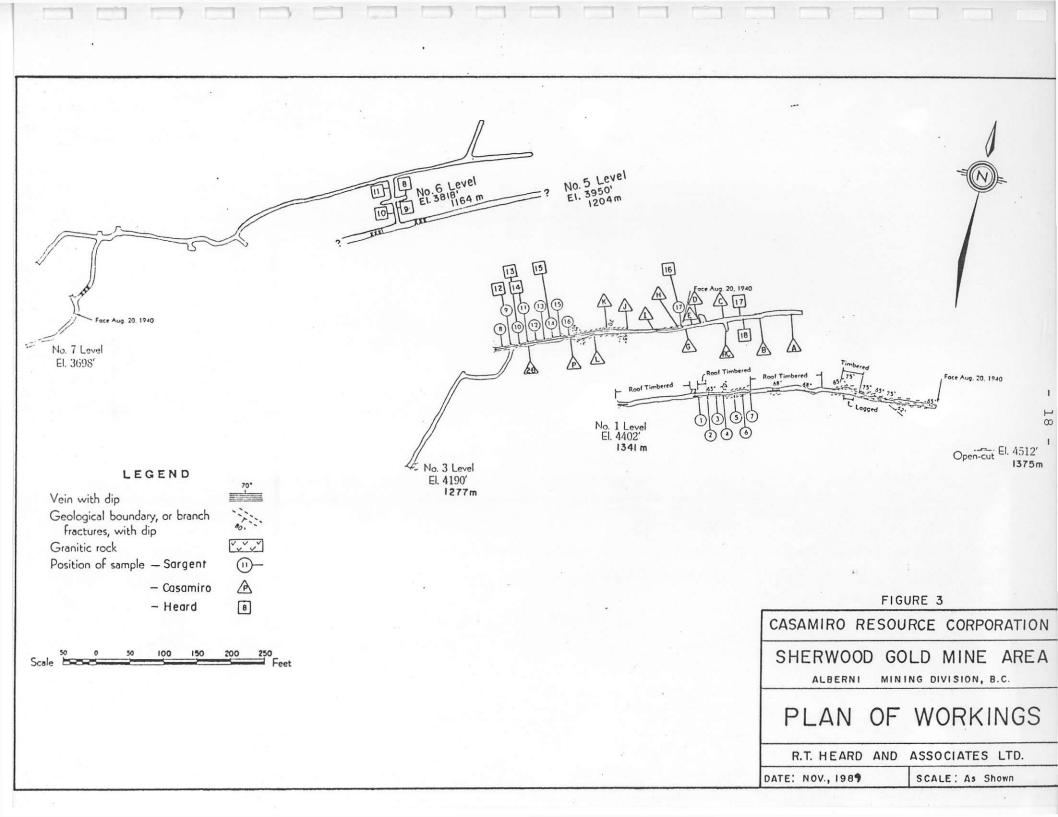
"Sulphides recognized in hand specimens included sphalerite, galena, chalcopyrite and covellite. Pyrrhotite and marcasite replacing it were recognized under the microscope. Selected samples of sulphide mineralization assayed several ounces of gold per ton. Several sections containing sulphides were polished for microscopic study. With the exception of pyrite, the sulphides in the sections are greatly altered, the margins of the grains are destroyed, and the primary minerals are partly, or almost completely, replaced by covellite, malachite, anglesite and possibly by other secondary minerals. For this reason the primary relationships are not clearly indicated. The range of the ratio of silver assays to gold assays is wide, probably in part because of secondary alteration; but it is probable that silver values are in part associated with galena and that galena and other sulphides are distributed irregularly in the primary mineralization."

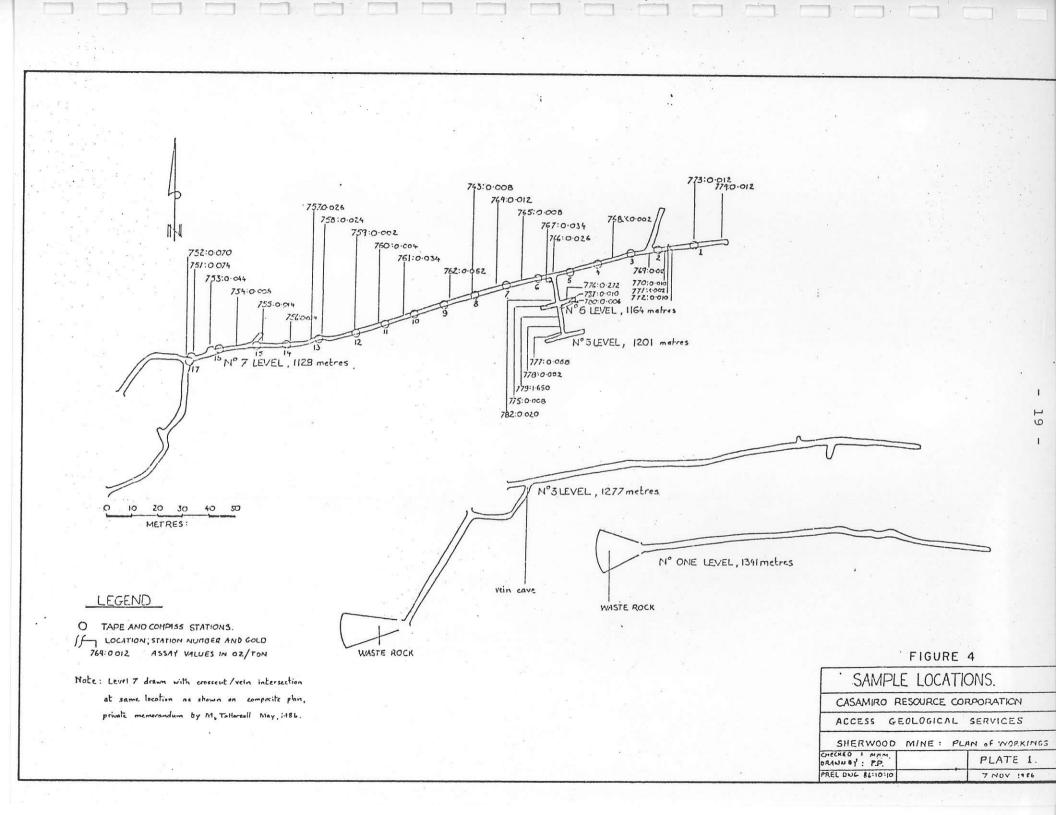
## ASSAY DATA

Detailed underground sampling was carried out on behalf of the British Columbia Department of Mines by Dr. H. Sargent in 1940 (B.C. Department of Mines Bulletin No. 13, 1941) and more recently by Casamiro Resource Corporation, Access Geological Services, and one of the undersigned (R.T. Heard). There is good correlation between the various sample results and weighted averages of all results have been used in determining average gold and silver grades.

These four sets of sample data are plotted on plans reproduced from Sargent and Access reports and include locations for samples cut by Sargent (S), 1940; Casamiro (C), 1982; Access (A), 1986; and Heard (H), 1986. See Figure 3, Plan of Workings, page 18, and Figure 4, Sample Locations, page 19.

The individual sets of sample data are listed on Tables one through four, pages 20 to 24.





# SARGENT SAMPLING

# LEVEL 1

		Distance from		As	say	······································	
Sample	Width	hanging-wall	_			-	d Average*
No.	Inches	Inches	Description	Au O/T	Ag O/T	Au O/T	Ag O/T
1	26	0 - 26	Soft vein-matter	0.90	1.1		
2	24	0 - 24	Decomposed vein-matter	1.50	3.0		
	9	24 - 33	Hard siliceous section	0.56	6.3	1.02	3.2
	10	33 - 43	Soft rusty material	0.28	0.9		
3	10	0 - 10	Rusty rather hard vein- matter	1.30	1.9		
	18	10 - 28	Decomposed vein-matter	1.10	5.5	1.17	4.2
1 4	10	0 - 10	Quartz and 2 inches of gouge	0.02	Trace		
	16	10 - 26	Quartz with sulphides	2.38	13.5	1.47	8.3
~ <sup>5</sup>	11	0 - 11	Decomposed vein-matter, quartz and some sulphides	9.58	0.2		
-	8	11 - 19	Rusty vein-matter, quartz and some sulphides	1.00	1.0	5.97	0.5
6	9	0 - 9	6 inches soft vein matter plus 3 inches gouge	Trace	1.6		
	11	9 - 20	Soft rusty vein-matter, largely quartz	9.16	NIL	4.58	0.7
	2	20 - 22	Grey gouge at footwall	0.02	NIL		
r 7	9	0 - 9	Soft vein-matter	0.34	0.5		

Calculated by Heard

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# - 21 - TABLE 1 (Continued)

# SARGENT SAMPLING

# LEVEL 3

		Distance from		As	say		
Sample	Width Inches	hanging-wall Inches	Description	Au O/T	Ag O/T	Weighted Au O/T	l Average* Ag O/T
8	14	0 - 14	Mostly soft vein-matter includes 3 inch hard rib	0.60	2.1		······································
9	9	0 - 9	7 inches quartz and 2 inches gouge at foot-wall	4.00	5.0		
10	11	0 - 11	Soft rusty vein-matter and 1 1/2 inches gouge at foot-wall	1.10	2.3		
11	15	0 - 15	Rusty decomposed vein- matter, 1 1/2 inches gouge at foot-wall	0.28	1.3	-	
12	21	0 - 21	0-9 inches porous black vein-matter 9-15 inches rusty vein matter 15-21 inches gouge at foot-wall	0.02	Trace		
13	17	0 - 17	Decomposed mineralized vein-matter	0.50	1.1		
	17	17 - 34	A little quartz, chiefly crushed wall rock and gouge	Trace	Nil	0.25	0.6
14	21	0 - 21	Rusty decomposed vein- matter, ground is crushed for 3 feet to foot-wall of sample	1.46	3.6		
15	19	0 - 19	Rusty decomposed vein- matter, ground is crushed for 22 inches to foot- wall of sample	0.32	3.6		
16	12	0 - 12	Soft vein-matter	0.30	0.3		•
-	21	12 - 33	Crushed wall rock	Trace	1.6	0.11	1.1
17	24	0 - 24	Full width of vein-matter from face August 20, 1940 This sample also assayed: copper, 0.1 per cent,				
			lead 3.9 per cent	3.40	4.0		—

C Loulated by Heard

	ASSAY	RESULTS	· · · · · · · · · · · · · · · · · · ·
SAMPLE NO.	Au O/T	Ag O/T	Cross Reference
2 <b>-</b> B	5.700	10.10	S # 11 & 12, H # 14
A	.013	.03	
В	.003	.01	
с	.004	.01	
R.C.	.004	.01	
D	.001	.01	
E	.041	•09	
G	.005	•13	
н	•335	1.13	S # 17, H #16
I	.790	1.09	
J	1.830	3.45	
K	.840	•26	
L	.089	•36	
P	1.260	.96	

# CASAMIRO SAMPLING

ACCESS	SAMPLING
NCCD00	OWITTING

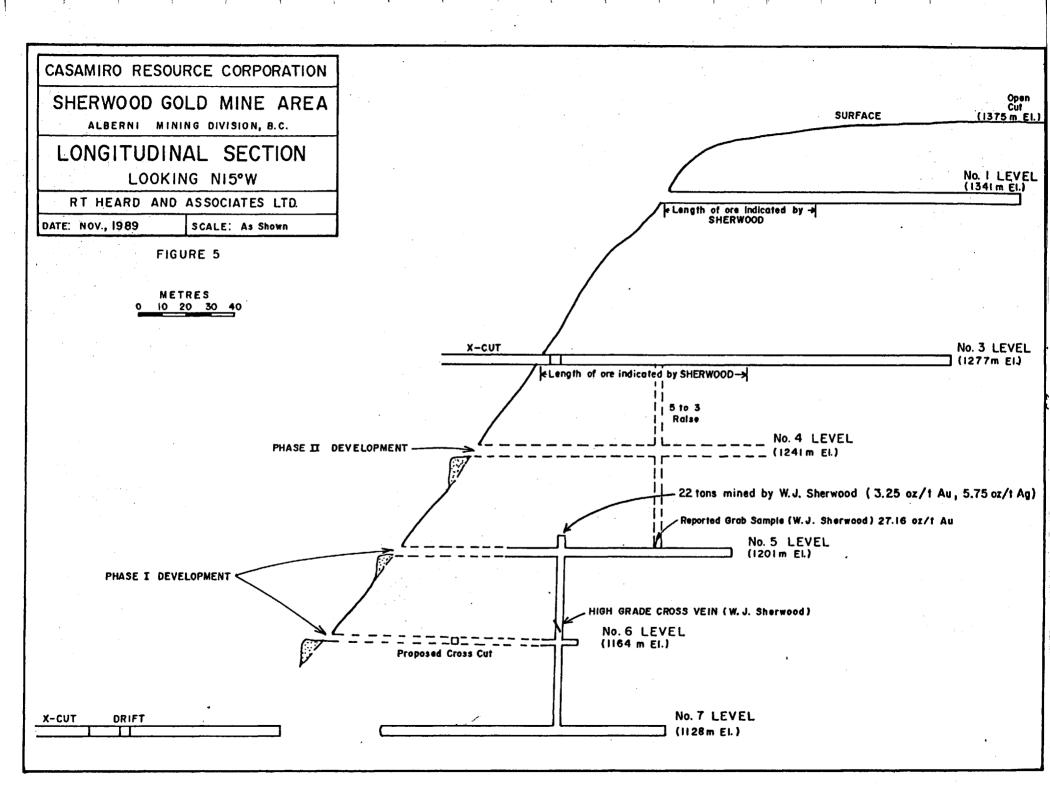
Sample	Width	Width of vein	Total shear		
. – 1	WIGCH	1		Composito -	- <i>, ,</i> , , , , , , , , , , , , , , , , ,
No.		material	zone width	Comments	Au (oz/ton)
751	0.9 (3ft)	0.27 (11 in)	2.7		0.074
752	0.9 (3 ft)	0.23 (9 in)	2.7	Parallel to vein 751	0.074
753	0.5	0.01 (4 in)	2.1	Parallel to vern 751	
753	0.15 (6 in)	0.15 (6 in)		Vein	0.044
755		1			0.006
~756	0.05 (2 in)	0.05 (2 in)	0.25	Soft, sericitied	0.014
· · ·	0.33 (13 in)	1	1.5	1 inch calcite vein	0.034
757	1.5 (5 ft)	4 x 0.03	1.5	Calcite veins - no sulphides	0.026
758	0.76 (30 in)	0.08 (3 in)		h/w and f/w: andesite prophyry	
-				oxidised at f/w	0.024
759	0.6	0.3		Silicifaction in h/w	0.002
• 760	0.67	0.13			0.004
761	0.2	0.2		Andesite dike in f/w	0.034
762	0.25	0.25+	1.25	Quartz vein with pyrite	0.052
763	1.0	1.0			0.008
764	0.33	0.33		Breccia and gouge	0.012
765	0.3				0.008
766	0.65	-	1.25	4 m up raise in west wall	
· · ·				(south half)	0.026
767	0.6	-	1.25	4 m up raise in west wall	
	1			(north half)	0.034
768	0.4	0.4			less than
					0.002
769	0.73	0.73	}		0.012
170	0.65			Footwall sample	0.010
771	0.50	0.50	0.50	Vein and shear zone	less than
-					0.002
172	0.84			Hanging wall sample	0.010
773	0.43	0.43		Roof fall from vein	0.012
274	0.3	0.3		East end of level 7	0.012
175	0.55	0.55	0.55	West end of level 6	
ł,				sericitized, some calcite	
				veins, no sulphides	0.008
176	0.6	0.28		East end of level 6	
				sericitized, no sulphides	0.272
777	0.04	0.04		West side of raise 4.5 m below	
- I				level 5 quartz vein	0.068
'78	0.15	0.15		West side of raise top of	• •
- I	-			ladder 5, above level 6	0.002
_779	0.3	0.3	1.0	Gouge with malachite, top of	
			-	ladder 1 above level 6	0.006
/80	1.0	0.5		West wall, top of ladder 1	
			• •	Above level 6	1.650
81	1.0	·	2.0	Same, north half	0.010
82	0.3	0.3		top of ladder 5, above level 7	0.020
				top or induct 3, above level /	0+020

- 23 -

HEARD	SAMPLING
ncard.	SWIFTING

Sample No.	Location	Description	Width (Ft)	-		Cross Reference
80808	E. face No. 6 level	Rep Chip Vein	2.0	.020	.07	A#776
9	40' above level 6	Rep Chip Vein	1.7	•794	•62	
10	60' above level 6	Grab Vein material		•018	•05	
11	50' above level 7	Rep Chip Gouge, Vein?	1.4	•068	.14	
12	No. 3 level	Rep Chip	0.8	3.121	3.77	S # 9
13	No. 3 level	Rep Chip	0.9	1.418	2.59	S # 10
14	No. 3 level	Rep Chip	1.4	1.357	2.19	S # 11
15	No. 3 level	Rep Chip	1.8	.306	1.95	S # 14
16	No. 3 level	Rep Chip	1.0	•025	•13	S # 17
17	No. 3 level	@368' Rep Chip	0.8	.008	<.02	
18	No. 3 level	Vein material	0.2	•015	<.02	
	No. 80808 9 10 11 12 13 14 15 16 17	No.         Location           80808         E. face No. 6 level           9         40' above level 6           10         60' above level 6           11         50' above level 7           12         No. 3 level           13         No. 3 level           14         No. 3 level           15         No. 3 level           16         No. 3 level           17         No. 3 level	No.LocationDescription80808E. face No. 6 levelRep Chip Vein940' above level 6Rep Chip Vein1060' above level 6Grab Vein material1150' above level 7Rep Chip Gouge, Vein?12No. 3 levelRep Chip13No. 3 levelRep Chip14No. 3 levelRep Chip15No. 3 levelRep Chip16No. 3 levelRep Chip17No. 3 levelRep Chip	No.LocationDescription(Ft)80808E. face No. 6 levelRep Chip Vein2.0940' above level 6Rep Chip Vein1.71060' above level 6Grab Vein material1150' above level 7Rep Chip Gouge, Vein?1.412No. 3 levelRep Chip0.813No. 3 levelRep Chip0.914No. 3 levelRep Chip1.415No. 3 levelRep Chip1.816No. 3 levelRep Chip1.017No. 3 level0368' Rep Chip0.8	No.         Location         Description         (Ft)         Au O/T           80808         E. face No. 6 level         Rep Chip Vein         2.0         .020           9         40' above level 6         Rep Chip Vein         1.7         .794           10         60' above level 6         Grab Vein material          .018           11         50' above level 7         Rep Chip Gouge, Vein?         1.4         .068           12         No. 3 level         Rep Chip         0.8         3.121           13         No. 3 level         Rep Chip         0.9         1.418           14         No. 3 level         Rep Chip         1.9         1.357           15         No. 3 level         Rep Chip         1.8         .306           16         No. 3 level         Rep Chip         1.0         .025           17         No. 3 level         @368' Rep Chip         0.8         .008	No.         Location         Description         (Ft)         Au O/T         Aq O/T           80808         E. face No. 6 level         Rep Chip Vein         2.0         .020         .07           9         40' above level 6         Rep Chip Vein         1.7         .794         .62           10         60' above level 6         Grab Vein material          .018         .05           11         50' above level 7         Rep Chip Gouge, Vein?         1.4         .068         .14           12         No. 3 level         Rep Chip         0.88         3.121         3.77           13         No. 3 level         Rep Chip         0.8         3.121         3.77           14         No. 3 level         Rep Chip         0.9         1.418         2.59           14         No. 3 level         Rep Chip         1.4         1.357         2.19           15         No. 3 level         Rep Chip         1.8         .306         1.95           16         No. 3 level         Rep Chip         1.0         .025         .13           17         No. 3 level         @368' Rep Chip         0.8         .008         <.02

In addition to the sample data above, it should be noted that in 1942, W.J. Sherwood shipped 22 tons of ore to a smelter in Tacoma, Washington. Smelter receipts confirm an average grade of 111.49 grams/tonne gold and 197.14 grams/tonne silver. See Figure 5, Longitudinal Section, Page 25 for the location of this sample.



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#### RESERVES

#### Sherwood Vein Proper

From examinations of the extensive underground workings (R.T. Heard) and from sampling of mineralized zones there is one and possibly two steeply plunging ore shoots which contain significant gold and silver values. These are ore shoots within the developed portion of the mine.

In an attempt to qualify and quantify reserves, we have taken the ore shoot nearest to the exposed southwestern limits of the shear zone and assigned the following:

## Assumptions

- Vertical range = 247 metres, from surface to the lowermost underground workings.
- Strike length is variable with the vertical point at which it is measured. We define this below in our calculations for each level.
- 3. The average one metre width of the mineralized zone is corroborated by Sargent's (1941) description of the main shear zone width ranges from 3 or 4 (0.91 - 1.22 metres) to at least 6 feet (1.83 metres). Mineralization within the shear zone consists of lenses or veins; frequently two or three more veins or lenses occur within the width of the shear zone.
- 4. Assigned average grade these were obtained by calculating weighted average grades from all of the available assay values obtained by various authors. Again, these are defined below by level.
- 5. Discussion of assay values the best assays from Level 1 yielded results up to 328.46 grams gold per tonne and 462.86 grams silver per tonne. Level 3 returned best results of 197.43 grams gold per tonne and 346.29 grams silver per tonne. These data point to a reduction in grade between levels, but this is an assumption only as the highest values obtained were from samples taken by W.S. Sherwood from the 5th level which returned an assay of 931.21 grams gold per tonne or in Imperial units, 27.16 ounces per ton.

When sampled by Sargent in 1940, much of the drift back was timbered, precluding sampling of much of the first 55 metres reported by Sherwood Mines as indicating commercial values over an average width of one metre.

Sargent collected seven samples along a 19.2 metre section of untimbered back. Weighted average grades of these samples are:

Gold - 70.45 grams per tonne Silver - 104.92 grams per tonne

Strike length:60 metresAverage Width (Sherwood Mines):1 metreVertical Range (surface tomidway between No's 1 and 3levels:66 metres

Specific Gravity:

2.8

Calculated Reserve:

#### 11,088 tonnes

#### Level 3

Twenty-two samples, collected by Sargent in 1940, Casamiro and Heard in 1985 and 1986, over an exposed strike length of 80 metres were used to calculate weighted average values, which are:

> Gold - 32.91 grams per tonne Silver - 63.02 grams per tonne

Grades reported by Sherwood Mine in the early 1940's were greater than those for the No. 1 level but were over a lesser width. Therefore, in view of the lower grades indicated by available sample results, an average width of one metre is assumed.

Strike Length: Average Width: Vertical Range (Midway between No's 1 and 3	80 metres 1 Metre
Levels to No. 7 Level):	181 metres
Specific Gravity:	2.8
Calculated Reserve:	40,544 tonnes
Total Inferred Tonnage:	51,632 tonnes

Weighted Average Grade: Imperial Units: Gold - 40.97 grams per tonne Silver - 72.02 grams per tonne 56,914 tons grading Gold - 1.19 ounces per ton Silver - 2.10 ounces per ton

The Province of British Columbia, Ministry of Energy, Mines and Petroleum Resources, Geological Survey Branch, has prepared Preliminary Map 65, "1987 Producers and Potential Producers, Mineral and Coal", which was issued in January 1988.

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This document shows the Sherwood as having possible/inferred reserves of 45,000 tonnes at a grade of 51 grams per tonne gold. For Imperial units, this equates to 49,500 tons having a grade of 1.49 ounces per ton gold.

#### Sherwood Vein - Extensions

Within the main shear zone, which hosts the Sherwood vein, there are indications and suggestions that an additional ore shoot is developing to the east along strike. If this is true, then it is probably safe to assume that it will contain an equal quantity of reserves as the Sherwood Vein Proper, or at least an additional 50,000 tonnes.

There is also some suggestion that the No. 7 level of the Sherwood Mine has been driven along a separate, parallel vein to the Sherwood vein. Heard's interpretation is that the character of the vein material appears to differ somewhat between the two structures which leads him to believe in this premise.

If this is true, then the ore shoots within the Sherwood vein may be expected to extend to depth below the No. 7 Level and indeed below the level of Drinkwater Creek in the valley bottom some 400 feet below No. 7. There are two vein outcrops mapped on Lot 1831 which are along the strike of the Sherwood vein to the west and approximately 1.5 kilometres away. If these are indeed true extensions of the Sherwood vein, then the reserve possibilities may be expected to be some multiple of the 50,000 tons inferred within the mine area proper.

The P.D.Q. No. 1 and No. 2 veins are additional mineralized structures located 1.5 km east of the main Sherwood vein Mine area. Although the P.D.Q. claims and showings do not form part of the Sherwood Gold Mine claims area, they do however point out that the Sherwood Vein could be expected to run fully 3.0 km from boundary to boundary. If only 10% makes ore then 300 metres of strike length by a one metre width by a vertical component of say 300 metres, and a specific gravity of 2.8 could yield in excess of 250,000 tonnes.

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# Sherwood Gold Mine Area - Geological

In the British Columbia Minister of Mines Annual Report for 1945, page 115, the following statement is made:

"Surface prospecting above the present mine-workings found outcrops of several new gold-bearing quartz veins."

These veins have not been mapped or sampled to the knowledge of the authors but if only one of them has reserves comparable to those suggested for the Sherwood Vein structure (i.e. 250,000 tonnes), then a total of 500,000 tonnes could very well be the "order of magnitude" reserve potential of this area.

# Summary

. . . . .

All of the reserves contained within the Sherwood Gold Mine area are subjective and they shall remain so until a very definitive geological and engineering evaluation of them is conducted.

A possible geological reserve based on the discussions above could be as shown on the following table:

Area	Tonnes
Sherwood Vein - Proper	50,000
Sherwood Vein - Extensions	250,000
Sherwood Gold Mine Area - Geological	500,000

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#### MINE EVALUATION AND ECONOMICS

### Introduction & Methodology

The following report summarizes pre-feasibility studies conducted on the Sherwood Mine Property. These studies were developed with the aid of the GemCom Mine Evaluation Program. This mine development and evaluation software package was developed by M.S.S. Consultants Ltd. The program is based on prior data developed by Mr. T. Alan O'Hara, P.Eng., and it provides the engineer with a thorough mine development and evaluation technique for mines in Canada. Because each mine operation is unique, adjustmente were made to reflect local and regional conditions. At each step in the evaluation process, the author endeavoured to be prudent and somewhat conservative in his approach to evaluating this mine. It is the author's opinion that this approach is the best available, given that access to the property for purposes of due diligence is denied at this time.

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Base Case Assumptions and Financial Analysis

case:

The following table lists the assumptions used for the base

Base Case Reserves (tonnes) 51,632 Gold g/mt 40.97 Silver g/mt 72.02 Gold (Cdn\$/oz) 564.80 Silver (Cdn\$/oz) 8.43 Average Stoping Width (m) 1.0 Dip of the Ore (Degrees) 70 Mining Method Shrinkage Stoping Process Cyanidation Power Generation Diesel Generator

Road Construction

Twelve Kilometres

Table 1: List of Assumptions

### Gold and Silver Price

The gold and silver price used in the evaluation was the eighteen-month forward rate on the date of expropriation, November 25, 1988. The price per troy ounce was \$564.80 Canadian for gold and \$8.43 per troy ounce Canadian for silver. This assumes that the mine operator would forward sell (hedge) their production to eliminate the risk in metal price fluctuations.

### Reserves and Grade

The base case reserves were 51,632 tonnes at 40.97 g/mt gold and 72.02 g/mt silver. These are the reserve numbers as calculated by two of the authors, Heard and Carter.

### Mining Considerations

The average stoping width of the ore on the two metre shear zone was assumed to be one metre. Using shrinkage stoping, 36.6% dilution can be expected in conjunction with an 80% overall in place recovery. This yields a recoverable ore reserve of 56,413 tonnes at 30.0 g/mt for gold and 52.73 g/mt for silver. The calculated annual mine capacity is 16,495 tonnes/year which translates to a 3.0 year mine life.

### Milling Considerations

Cyanidation was chosen as the probable ore treatment process. This assumes that the mill input will be a siliceous gold ore. Mill recovery is expected to be in the order of 95%. This compares favourably to Placer Dome's Sigma operation where recovery through cyanidation equals 96.6%. Other properties recovering gold through cyanidation include the Kerr Mine with 97% recovery and the Golden Patricia at 95% recovery. (Source: Metals Economics Group, November 1988)

- 34 -

Daily milled tonnage in the base case averaged 45 tonnes/day, 7 days/week.

# Personnel

Manpower calculations yielded the following:

Shrinkage Stope Mining

People Required

Development	5
Stoping	15
Mine Service	14
Maintenance	9
Mine Staff	6
sub-total	49

Productivity - 14,495 tonnes/year : 49 men/year = 336.63 tonnes/man/year

Assume 250 days/year

1.35 tonnes/man/day

15

<u>64</u>

Milling	5
Electrical Services	2
Plant Service and Roads	2
Mine site	2
General Administration	_4

Total Personnel:

### **Operating Costs**

Labour Cost (Shrinkage Stoping) Supplies \$106.64/tonne 8.41/tonne

Sub-total

Milling Labour Cost Milling Supplies Cost \$115.05/tonne

\$ 22.27/tonne

7.65/tonne

\$ 29.92/tonne

\$204.34/tonne

\$ 59.37/tonne ore

Administration and General Service

Total cost/ton

16,495 tonnes/year x \$204.34/tonne = \$3,370,355/year

In comparing this cost to other operations in Canada, the author reviewed statistics on 53 active gold mining operations. The average cost per tonne is \$71.73 in Canada with the minimum being \$25.11/tonne and the maximum equal to \$177.74/tonne. The computed cost/tonne for the Sherwood Mine is 15% higher than the highest cost operation in Canada. The author hesitates to project lower costs in line with other operations because of the relatively low tonnage output computed for the Sherwood Mine.

### Capital Costs

The capital cost estimation for the process plant is as follows:

Plant Site Clearing and Mass Excavation (relatively flat site) \$ 233,535 Concrete Foundations and Slabs 460,735 Crushing Plant, Coarse Ore Storage and Conveyors 575,919 Concentrator Building 383,946 Grinding Section and Fine Ore Storage 336,656 Flotational Cyanidation Process Section 70,137 Thickening and Filtering Section 191,973 Sub-total \$2,252,900 The capital cost estimation for the mine is as follows:

Mine Development	\$	296,221
Compressor Installation Cost Purchase		<b>44,</b> 504 190,876
Equipment and Installation		696,771
Maintenance Facilities		212,293
Sub-total	<b>\$ 1</b>	,440,665

Plant utilities and general services are computed to be:

Diesel generator	\$1,153,630
Tailings Storage and General	
Plant Services	514,751
12 km of Access Road	1,079,340
Townsite/Accommodation Costs	231,171
Sub-total	\$2,978,892

Project Overhead Costs:

.

Feasibility Studies, Designate	533,797
Project Supervision, etc.	667,246
Admin., pre-production employment	467,071

Sub-total	\$1,668,114
-----------	-------------

Working Capital Costs:

Three	months'	operating	\$	842,	589
		- F J	•	,	

# Summary

Capital Cost of Mill	2,252,900
Capital Cost of Mine	1,440,665
Capital Cost of Utilities/Services	2,978,892
Project Overhead	1,668,114
TOTAL PRE-PRODUCTION CAPITAL COST	\$8,340,571
Working Capital	842,589

Sustaining Capital/Year

189,686

## Pro Forma Results

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Table 2 - summarizes the pro forma results for the base case.

Base Case

Capital Costs (millions)

Mill	2.2
Mine	1.3
Utilities	3.0
Engineering and Overhead	1.7
Pre-production Cost Total	8.3
Working Capital (millions)	•8
Annual Revenue (millions)	8.54
Annual Operation Costs (millions)	3.4
Pre-production (years)	1
Payback (years)	2
Net cash flow (millions)	7.43
DCFROR	38.83
Mine Production (TPD)	63
Mill Production (TPD)	45

Table 2: Pro Forma Results - Base Case

Using the prior mentioned assumptions, the net cash flow for the Sherwood Mine was computed to be 7.43 million dollars. Sensitivity analysis was conducted on several of the input variables and the results are tabled below.

# Table 3 - Capital & Operating Cost Sensitivity Analysis

	Investment	Net Cash Flow	DCFROR
	(millions)	(millions)	8
		•	
Base Case	8.3	7.43	38.83
	•		
Plus 20% on capital costs	10.01	5.72	25.89
		•	
Minus 20% on capital costs	6.67	9.06	57.26

	Annual Operating Costs		
	(millions)	· ·	
Base Case	3.37	7.43	38.83
Plus 20% Operating Costs	4.04	5.4	28.80
Minus 20% Operating Costs	2.70	9.45	48.59

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In addition, the sensitivity to the gold price was calculated and this is presented below.

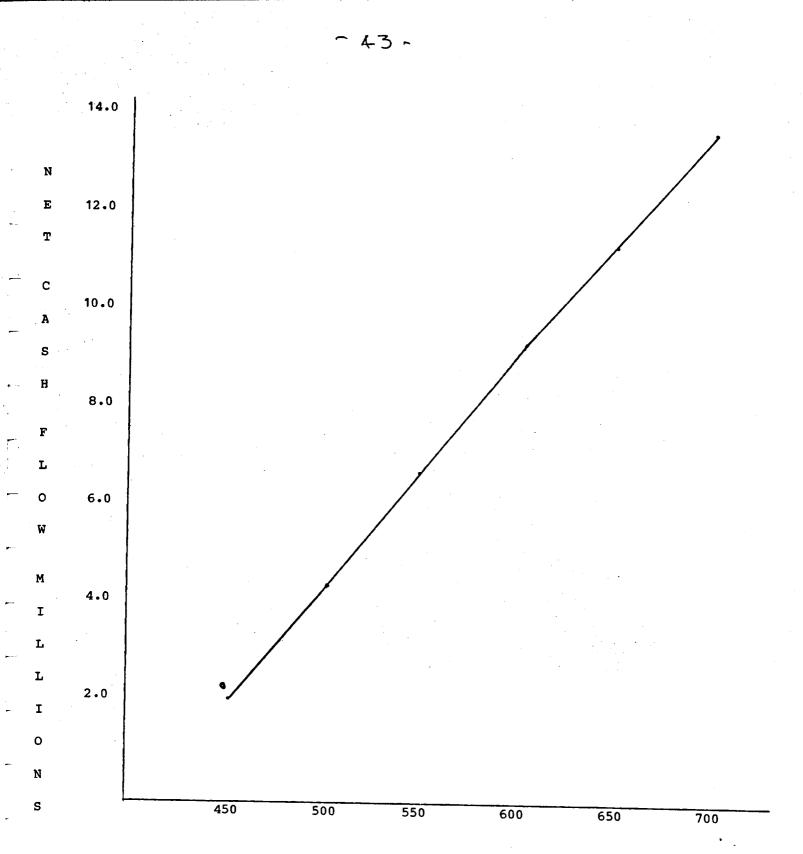
Gold Price \$/0z Cdn	Annual Revenue Millions	Net Cash Flow <u>Millions</u>	DCFROR
450	6.8	2.23	12.29
500	7.5	4.49	24.15
550	8.3	6.67	35.54
564.80*	8.5	7.43	38.83
600	9.1	9.03	46.55
650	9.8	11.29	57.29
700	10.6	13.56	67.79

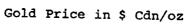
Table 4: Gold Price Sensitivity Analysis

\* Base Case

Table 4 is presented graphically on graphs 1, 2 and 3, pages 43 to 45.

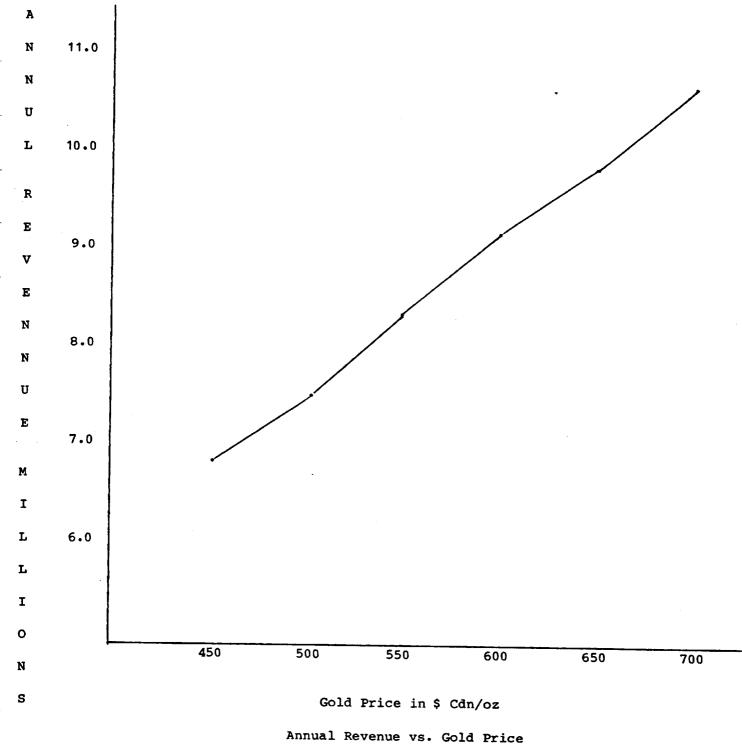
The base case pro forma was also completed using the London Gold Price fixing on the date of expropriation. On this date, gold was trading at \$504.28/ounce and silver was trading at \$7.30/ounce. The net cash flow computed was 4.69 million dollars and the DCFROR was 25.15%.





Net Cash Flow in Millions v. Gold Price





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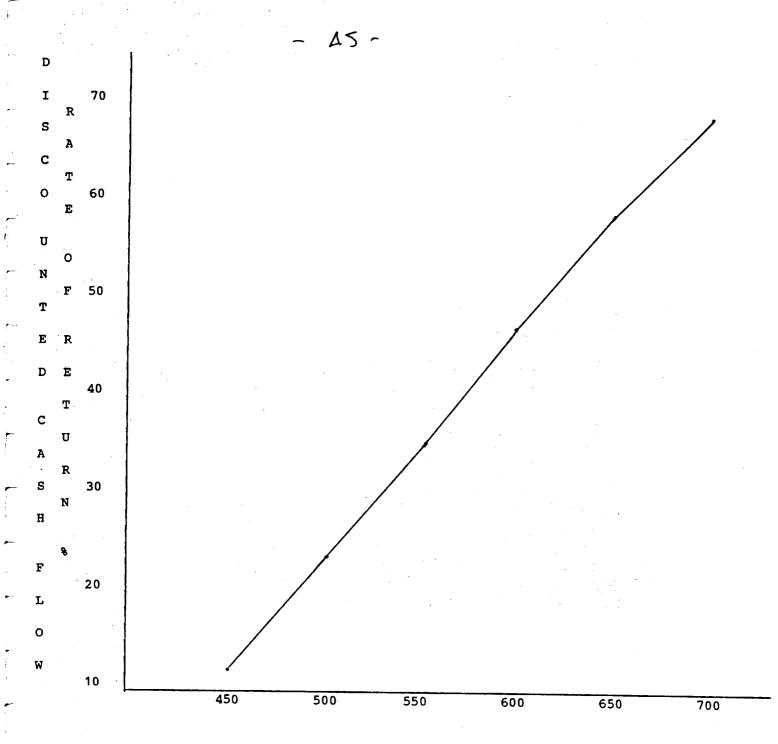
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Gold Price in \$ Cdn/oz

DCFROR vs. Gold Price

### Additional Tonnage Pro Forma Results

Employing Bayesian probability techniques, the author computed pro formas for ore reserves of 100,000, 175,000 and 275,000 tonnes. To arrive at the additional tonnage levels above the base case, the author used subjective probability numbers to assign tonnages to reserve numbers calculated by Heard and Carter.

The 100,000 tonne case used the approximately 50,000 tonnes in the base case plus an additional 50,000 tonnes in the Sherwood vein extension. The 175,000 tonne case employed the 50,000 tonnes in the base case plus the additional 250,000 tonnes mentioned by Heard/Carter at a .50 probability of discovery (i.e. 50 + 125 = 175).

For the 275,000 tonne case, the tonnage equalled 50,000 tonnes plus 250,000 tonnes at .50 probability plus 500,000 tonnes at .20 probability (i.e. 50 + 125 + 100). The results of this analysis are contained in the following two tables. The following table lists the assumptions used for each case:

	Case 1*	Case 2	Case 3	Case 4
Reserves (tonnes)	51,632	100,000	175,000	275,000
Gold g/mt	40.97	40.97	40.97	40.97
Silver g/mt	72.02	72.02	72.02	72.02
Gold (Cdn\$/oz)	564.80	564.80	564.80	564.80
Silver (Cdn\$/oz)	8.43	8.43	8.43	8.43
Avg. stoping width (m)	1.0	1.0	1.0	1.0
Dip of the Ore (Degrees)	70	70	70	70
Mining Method:	Shrinkage	Stoping	· .	

Process: Cyanidation

Power Generation: Diesel Generator

Road Construction: Twelve Kilometres

\* Base Case

Table 5 - Additional Tonnage Pro Forma Assumptions

The following table lists the assumptions used for each case:

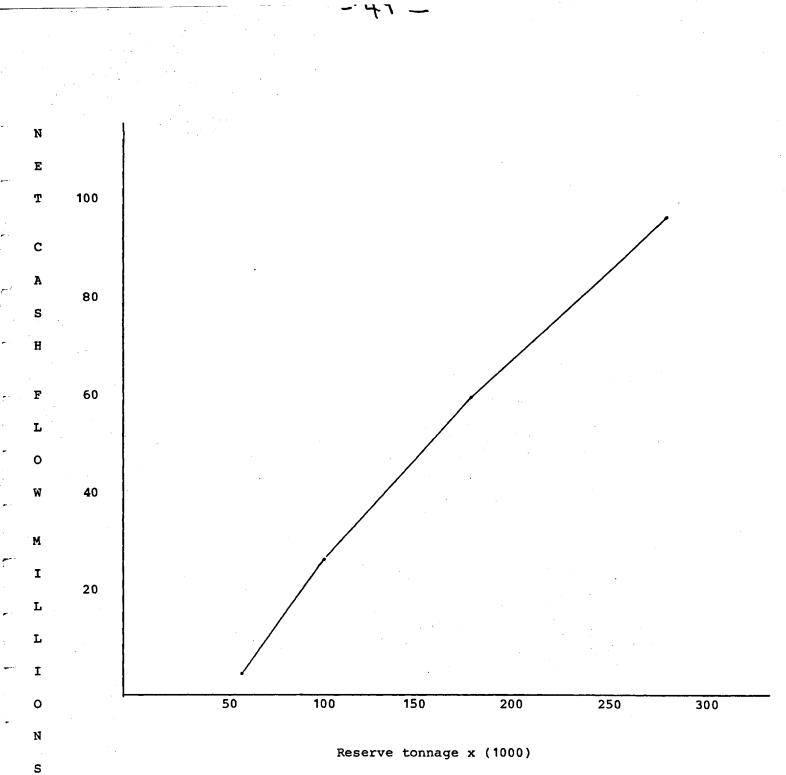
	Case 1*	Case 2	Case 3	Case 4
Capital Costs (Millions)				•
Mill	2.2 1.4	2.9 2.1	3.6 3.1	4.4
Mine Utilities	3.0	3.6	4.3	4.0 5.0
Engineering	1.7	2.2	2.8	3.3
Pre-Production Co	st			
Total	8.3	10.8	13.8	16.7
Working Capital				
(Millions)	•8	1.2	1.6	2.0
Annual Revenue				
(Millions)	8.54	14.1	21.5	30.2
Annual Operation	2.4	. 7	<b>6 2</b>	
Costs (millions)	3.4	4.7	6.3	8.0
Pre-production				
(years)	1	1	1	2
Payback (years)	2	1	1	1
Net cash flow				
(millions)	7.43	26.60	61.72	94.16
DCFROR	38.83	75.70	104.27	87.09
Mine Production				
(TPD)	63	105	160	225
Mill Production				
(TPD)	45	74	114	160

\* Base Case

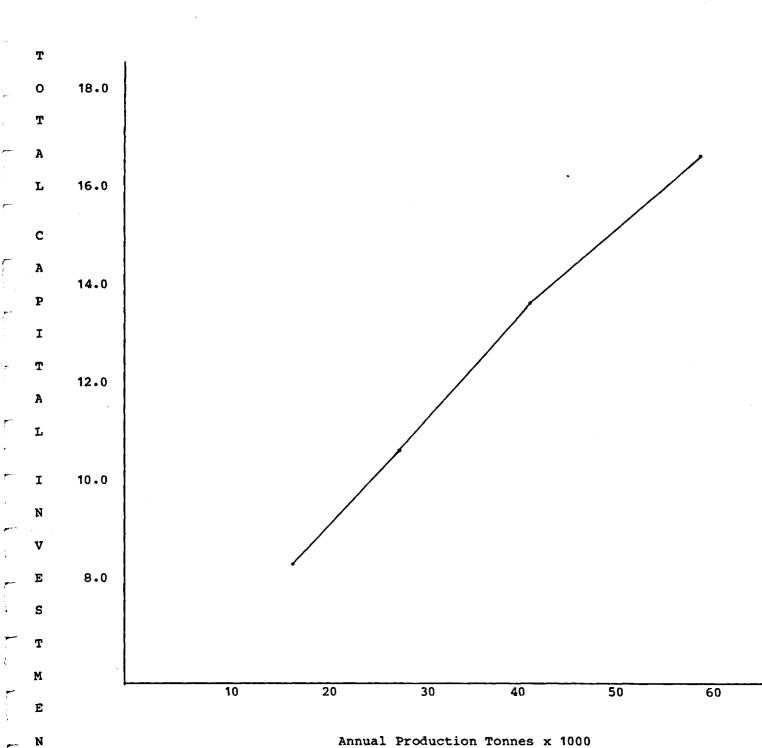
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Table 6 - Summary of Pro Forma Results for Additional Tonnages



Net Cash Flow vs. Reserve Tonnage



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Capital Investment vs. Annual Production Tonnes

#### REFERENCES

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# (1986):

Report on Underground Rock Sampling, Sherwood Mine, Vancouver Island, for Casamiro Resource Corporation by Acces Geological Services.

## APPENDIX I

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# Certificates of Authors

### CERTIFICATE

I, RICHARD TERRENCE HEARD, with business address at 708 - 1155 West Pender Street, Vancouver, British Columbia, certify that:

- I am a registered Professional Engineer in good standing in the Association of Professional Engineers of Yukon Territory, a registered Professional Engineer in good standing in the Association of Professional Engineers, Geologists and Geophysicists of Alberta, and a registered Professional Engineer in good standing in the Association of Professional Engineers of the Province of British Columbia.
- I am a graduate of Haileybury School of Mines, Haileybury, Ontario 1958 and of the Montana College of Mineral Science and Technology, Butte, Montana (Bachelor of Science in Geological Engineering in 1971).
- 3. I have been practicing my profession as an Exploration Geologist for 30 years and as a Professional Engineer for the past 16 years.
- 4. I have not, directly or indirectly, received or expect to receive any interest, direct or indirect, in the property of Casamiro Resource Corporation, Sherwood Mines Ltd. (N.P.L.) and Cinta Resource Corp., or any of their affiliates, nor do I beneficially own, directly or indirectly any securities of Casamiro Resources Corporation, Sherwood Mines Ltd. (N.P.L.), and Cinta Resource Corp. or any of their affiliates.
- 5. I have conducted an independent analysis of all data available for this property, and am the author of the report, "Evaluation Report on the Sherwood Gold Mine Area, Alberni Mining Division, Vancouver Island, British Columbia", dated December 1, 1986.
- 6. I grant permission to Casamiro Resource Corporation, Sherwood Mines Ltd. (N.P.L.), and Cinta Resource Corp. to use this report for any purposes in connection with the business of Casamiro Resource Corporation, Sherwood Mines Ltd. (N.P.L.) and Cinta Resource Corp. including its use in arbitral or litigation proceedings to recover damages for property injuriously affected.

Dated at Vancouver, British Columbia this 20th day of November, 1989.

R.T. Heard, P.Eng.

### CERTIFICATE

I, NICHOLAS C. CARTER, with business address at 1410 Wende Road, Victoria, British Columbia, certify that:

- 1. I am a Consulting Geologist registered with the Association of Professional Engineers of British Columbia since 1966.
- I am a graduate of the University of New Brunswick with B.Sc. (1960), Michigan Technological University with M.S. (1962) and the University of British Columbia with Ph.D. (1974).
- 3. I have practiced my profession in eastern and western Canada and in parts of the United States for more than 25 years.
- 4. I have not, directly or indirectly, received or expect to receive any interest, direct or indirect, in the property of Casamiro Resource Corporation, Sherwood Mines Ltd. (N.P.L.) and Cinta Resource Corp., or any of their affiliates, nor do I beneficially own, directly or indirectly any securities of Casamiro Resources Corporation, Sherwood Mines Ltd. (N.P.L.), and Cinta Resource Corp., or any of their affiliates.
- 5. My contribution to the foregoing report is based on a thorough review of the data pertaining to the Sherwood Mine property and on my background knowledge of similar deposits on Vancouver Island and elsewhere in North America.
- 6. I grant permission to Casamiro Resource Corporation, Sherwood Mines Ltd. (N.P.L.), and Cinta Resource Corp. to use this report for any purposes in connection with the business of Casamiro Resource Corporation, Sherwood Mines Ltd. (N.P.L.) and Cinta Resource Corp. including its use in arbitral or litigation proceedings to recover damages for property injuriously affected.

Dated at Vancouver, British Columbia this 20th day of November, 1989.

N.C. Carter, Ph.D., P.Eng.

#### CERTIFICATE

I, GEORGE WARREN HEARD, with business address at 349 East 21st Street, North Vancouver, British Columbia, certify that:

- I am a graduate of the Montana College of Mineral Science and Technology, Butte, Montana (Bachelor of Science in Mining Engineering in 1975).
- I am a graduate of the University of Hawaii (Master of Business in 1988).
- 3. I have been practicing my profession as a Mining Engineer in Canada, the United States and South Africa for the past fourteen years.
- 4. I have not, directly or indirectly, received or expect to receive any interest, direct or indirect, in the property of Casamiro Resource Corporation, Sherwood Mines Ltd. (N.P.L.) and Cinta Resource Corp., or any of their affiliates, nor do I beneficially own, directly or indirectly any securities of Casamiro Resources Corporation, Sherwood Mines Ltd. (N.P.L.), and Cinta Resource Corp. or any of their affiliates.
- 5. I have conducted a completely independent analysis of all data for the purpose of preparing mine evaluation and economics reports for this document.
- 6. I grant permission to Casamiro Resource Corporation, Sherwood Mines Ltd. (N.P.L.), and Cinta Resource Corp. to use this report for any purposes in connection with the business of Casamiro Resource Corporation, Sherwood Mines Ltd. (N.P.L.) and Cinta Resource Corp. including its use in arbitral or litigation proceedings to recover damages for property injuriously affected.

Dated at Vancouver, British Columbia this 20th day of November, 1989.

G.W. Heard, B.Sc., M.B.A.

# APPENDIX II

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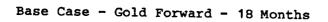
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# Mine Evaluation and Financial Analysis



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# A "MINE - FORECAST" EVALUATION

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NAME OF PROPERTY: SHERWOOD MINE REPORT PREPARED BY: GEORGE HEARD DATE OF REPORT PREPARATION: 11/16/89

### SECTION I - INTRODUCTION

This worksheet was prepared by: GEORGE HEARD The property being evaluated is known as:SHERWOOD MINE Date that this worksheet was prepared: 11/16/89 Metals present and prices chosen(Cdn.\$!)

> Gold(Cdn\$/oz) Silver(Cdn\$/oz) \$564.80 \$8.43

### Tonnage estimate:

51,632 Tonnes

Grade estimate:

\* \* \* \* \*

Gold	4	10.97	g/mt.
Silver			g/mt.
Copper		0.00	00
Lead	<b>x</b>	0.00	8
Zinc		0.00	8
Moly		0.00	%MoS2
****	*******	****	*****

# These are the basic parameters chosen to describe the property under evaluation.

SECTION II - MINING PARAMETERS:		
Average stoping width of the ore zone	1.00	metres
General dip of the ore zone	70 Degrees	
Maximum depth below surface	0 metres	
Relatively competent rocks	2	
SHRINKAGE STOPING UNDERGROUND MINING CASE:	•	
Calculated dilution factor:	36.6	%
Assumed recovery factor:	80	8
Recoverable ore reserves:	56,413	Tonnes
With a grade of:	Au	Ag gmt
	30.00	
	Cu%	Pb%
	0.00	0.00
	Zn%	MoS2%
	0.00	0.00
Calculated annual mine capacity:	16,495	Tonnes/year
Hence mine lifetime is:	3.0	Years
*********	*******	*****

The mining method has been chosen and the main characteristics of the ore zone of relevance to mine operation defined.A recoverable grade and tonnage is arrived at and an optimum mining rate is suggested.

SECTION III-MILLING PARAMETERS Gold in	siliceous ores	
GOLD RECOVERY FROM SILICEOUS ORES	BY CYANIDATION	
Calculated gold Recovery:	95.00	%
Recoverable gold per year -	470,091	Gms of gold
VALUE	\$18.16	/Gm produced
ANNUAL REVENUE AT THE MINE SITE	\$8,536,058	-
***************************************	*********	*****

Based on the ore type selected the metal recoveries are defined and the Annual Revenue at the mine site is calculated.

SECTION IV - ESTIMATION OF OPERATING COSTS		
Daily mined tonnage (5d/wk)-	63	Tns/day(Ore)
Daily milled tonnage (7d/wk) -		Tns/day
Mine operating costs:		
Labour Cost - (Shrinkage stoping)	\$106.64	/Tonne
Supplies Cost - (Shrinkage stoping)	\$8.41	/Tonne
Mill Operating Costs:	·	
Labour Cost	\$22.27	/Tonne
Supplies Cost	-	/Tonne
EMPLOYEES REQUIRED: -	+···	,
Operating Personell - (Mine):		
Shrinkage Stope Mining:		
Development	4	
Stoping	15	
Mine Service	14	
Maintenance	9	
Mine Staff	6	
TOTAL	49	
Operating Personell - (Mill)		
gold mills	5	
Administration and Gnl. Services:		
Electrical Services	2	
Plant Serv. & Roads	2	
Townsite	2 2 4	
Gnl. Admin.	4	
TOTAL EMPLOYEES REQUIRED:	64	
Admin & Gnl Services -Operating Costs/dy.		
Electrical Services	\$264	
Surface Plant Services	\$214	
Camp Employees Wages	\$194	
Fringe Benefits	\$235	
Supplies	\$86	
Camp Operating Cost	\$874	
Gnl Admin Expenses	\$389	
Electric Power	\$427	
TOTAL	\$2,683	
Admin & GnlServ Cost	•	/Tonne(Ore)
TOTAL ANNUAL OPERATING COSTS:	\$3,370,355	
*****	******	*****

Based on the selected mining method and type of ore an estimate is made of operating costs and number of employees required.

SECTION V - PROCESS PLANT, CAPITAL COST ESTIMATION: Plant-Site Clearing and Mass Excavation	
Relatively flat site:	\$233,535
Concrete Foundations and detailed excavations Concrete slabs on compact gravel/sand:	\$460,735
Crushing Plant,Coarse Ore Storage and Conveyors:	\$575,919
Concentrator Building Mild climate:	\$383,946
Grinding Section and Fine Ore Storage	
Medium ores (70% -200#): Flotation and/or Processing Section	\$336,656
Cyanidation-simple gold ores Thickening and filtering Section	\$70,137
Cyanided gold ores	\$191,973
CAPITAL COST OF PROCESS PLANT: \$	2,252,900
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Taking into account the climatic and site conditions an appropriate estimate is made for the mill capital cost.

# SECTION VI - MINE, CAPITAL COST ESTIMATION. UNDERGROUND MINE CASE

Preproduction Mine Development costs:		
Drifts,ramps,raises(as drifting equiv.)	353	metres
Cost of Mine Development	\$296,221	
Compressor capacity	1,180	CFM
Compressor installation cost	\$44,504	
Compressor purchase price	\$190,876	
Equipment cost & installation	\$696,771	
Cost of Maintenance Facilities	\$212,293	
CAPITAL COST OF UNDERGROUND MINE	\$1,440,665	
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Based on the mining method selected and the daily mining rate,pre-production capital costs for the mine itself are estimated.

SECTION VII-PLANT UTILITIES AND GENERAL SERVICES, CAPITAL COST ESTIMATION

Diesel Generator		
Peak	421	KW
Cap cost	\$1,017,909	
Loc Dist.	\$135,721	
Tailings Storage	\$102,386	
Water Supply		
Reclaim water required	3	GPM
Cost of reclaim water pumps	\$10,191	
Cost of General Plant Services	\$402,174	
Kms of road to be constructed	12	
Cost of access road construction	\$1,079,340	
Townsite/Accommodation costs	\$231,171	
UTILITIES AND GENERAL SERVICES CAPITAL COST	\$2,978,892	
***************************************	* * * * * * * * * * * * * * * * * *	**********

Depending on information provided on power availability, need for road provision, commuting distance from nearest community and the determined daily milling rate, an appropriate estimate is made for the cost of providing mine utilities and general services.

SECTION - VIII PROJECT OVERHEAD COSTS	
Feasibility studies, design engineerin	g
and technical planning	\$533,797
Project supervision, contract manageme	nt, expediting
and general construction facilitie	s, including
camp costs:	\$667,246
Administration, accounting, legal and	
pre-production employment of key	
operating staff:	\$467,072
TOTAL PROJECT OVERHEAD COSTS	\$1,668,114
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SECTION IX - SUSTAINING CAPITAL COSTS	
Mill Sustaining capital cost	\$8,876 /Year
Mine Sustaining Capital Cost	\$180,810 /Year
TOTAL SUSTAINING CAPITAL COST	\$189,686
******	*****

Project overhead costs are taken to be a fixed percentage of direct project costs.

Annual sustaining capital costs are those required to keep mine and mill equipment in good order during the production period.

**************************************		
Property Name:	- SHERWOOD MINE	
Ore Type	Gold in siliceous ore	
Mining Method used	Shrinkage stoping	
Recoverable Ore Reserves	56,413 Tonnes	
Mining Rate (of ore) per day	63 Tonnes	
Milling Rate per day	45 Tonnes	
Mine Lifetime	3.0 Years	
Annual Revenue at the Minesite	\$8,536,058	
Annual Operating Costs	\$3,370,355	
Capital Cost of Mill	\$2,252,900	
Capital Cost of Mine	\$1,440,665	
Capital Cost of Utilities and Services	\$2,978,892	
Project Overhead Costs	\$1,668,114	
Working Capital Required (3 mos operating)	\$842,589	
Total Pre-Production Capital Cost	. \$8,340,571	
Preproduction (yrs)	• 1	
Payback (years)	• 2	

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		SHER	WOOD MINE	·		
YEAR #> ANN.REV> OP.COSTS> CAPITAL> SUST.CAP> WORK.CAP> CASH FLOW->	$ \begin{array}{r} 1\\ 0.00\\ 0.00\\ 8.34\\ 0.00\\ 0.00\\ (8.34) \end{array} $	2 8.54 3.37 0.00 0.19 0.00 4.98	3.37 0.00 0.19	4 8.54 3.37 0.00 0.19 0.84 5.82	5 0.00 0.00 0.00 0.00 0.00 0.00	
YEAR #> ANN.REV> OP.COSTS> CAPITAL> SUST.CAP> WORK.CAP> CASH FLOW->	6 0.00 0.00 0.00 0.00 0.00 0.00	7 0.00 0.00 0.00 0.00 0.00	8 0.00 0.00 0.00 0.00 0.00	9 0.00 0.00 0.00 0.00 0.00	10 0.00 0.00 0.00 0.00 0.00	
YEAR #> ANN.REV> OP.COSTS> CAPITAL> SUST.CAP> WORK.CAP> CASH FLOW->	11 0.00 0.00 0.00 0.00 0.00	12 0.00 0.00 0.00 0.00 0.00	13 0.00 0.00 0.00 0.00 0.00	14 0.00 0.00 0.00 0.00 0.00	15 0.00 0.00 0.00 0.00 0.00	
YEAR #> ANN.REV> OP.COSTS> CAPITAL> SUST.CAP> WORK.CAP> CASH FLOW->	16 0.00 0.00 0.00 0.00 0.00	17 0.00 0.00 0.00 0.00 0.00	18 0.00 0.00 0.00 0.00 0.00	19 0.00 0.00 0.00 0.00 0.00	0.00 10 8 0.00 0 0.00 0	AL .61 .11 .34 .57 .84 .43

CASH FLOW DISTRIBUTION SUMMARY SHERWOOD MINE

### SUMMARY FINANCIAL STATISTICS

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Net Present Values of the Cash Flow at various discount rates:

NPV@4%> NPV@8%->	\$5.98 Million \$4.77 Million
NPV@12%->	\$3.76 Million
NPV@14%->	\$3.32 Million
NPV@16%->	\$2.91 Million

The "Internal Rate of Return" or Discounted Cash Flow Rate of Return:

DCFROR--> 38.83 %(IRR)

Base Case - November 25, 1988, Gold Price

(B)

A "MINE - FORECAST" EVALUATION

NAME OF PROPERTY: SHERWOOD MINE REPORT PREPARED BY: GEORGE HEARD DATE OF REPORT PREPARATION: 11/16/89

#### SECTION I - INTRODUCTION

This worksheet was prepared by: GEORGE HEARD The property being evaluated is known as:SHERWOOD MINE Date that this worksheet was prepared: 11/16/89 Metals present and prices chosen(Cdn.\$!)

> Gold(Cdn\$/oz) Silver(Cdn\$/oz) \$504.28 \$7.30

### Tonnage estimate:

#### 51,632 Tonnes

Grade estimate:

Gold	40.97	g/mt.
Silver	72.02	g/mt.
Copper	0.00	
Lead	0.00	8
Zinc	0.00	8
Moly	0.00	%MoS2
*******	*******	*****

#### These are the basic parameters chosen to describe the property under evaluation.

SECTION II - MINING PARAMETERS:	
Average stoping width of the ore zone 1.	00 metres
General dip of the ore zone	70 Degrees
Maximum depth below surface	0 metres
Relatively competent rocks	2
SHRINKAGE STOPING UNDERGROUND MINING CASE:	
	.6 %
	80 %
Recoverable ore reserves: 56,4	13 Tonnes
With a grade of:	Au Ag gmt
30.	00 52.73
C	u% Pb%
0.	0.00
Z	n% MoS2%
0.	0.00
Calculated annual mine capacity: 16,4	95 Tonnes/year
	.0 Years
***************************************	*****

The mining method has been chosen and the main characteristics of the ore zone of relevance to mine operation defined.A recoverable grade and tonnage is arrived at and an optimum mining rate is suggested.

SECTION III-MILLING PARAMETERS Gold in	siliceous ores	
GOLD RECOVERY FROM SILICEOUS ORES	BY CYANIDATION	
Calculated gold Recovery:	95.00	<b>%</b>
Recoverable gold per year -	470,091	Gms of gold
VALUE	\$16.21	/Gm produced
ANNUAL REVENUE AT THE MINE SITE	\$7,621,394	-
******	* * * * * * * * * * * * * * * * * * * *	******

### Based on the ore type selected the metal recoveries are defined and the Annual Revenue at the mine site is calculated.

SECTION IV - ESTIMATION OF OPERATING COSTS		
Daily mined tonnage (5d/wk)-	63	Tns/day(Ore)
Daily milled tonnage (7d/wk) -		Tns/day
Mine operating costs:		ino, ddj
Labour Cost - (Shrinkage stoping)	\$106.64	/Tonne
Supplies Cost - (Shrinkage stoping)	•	/Tonne
Mill Operating Costs:	90141	/101116
Labour Cost	°\$22.27	/Tonne
Supplies Cost		/Tonne
EMPLOYEES REQUIRED: -	\$7.0J	/ Ionne
Operating Personell - (Mine):		
Shrinkage Stope Mining:		
Development	4	
Stoping	15	
Mine Service	14	
Maintenance	9	
Mine Staff	9	
TOTAL	49	
Operating Personell - (Mill)	49	
gold mills		
Administration and Gnl. Services:	5	
Electrical Services	•	
	2 2 2 4	
Plant Serv. & Roads	2	
Townsite	2	
Gnl. Admin.		
TOTAL EMPLOYEES REQUIRED:	64	
Admin & Gnl Services -Operating Costs/dy.		
Electrical Services	\$264	
Surface Plant Services	\$214	
Camp Employees Wages	\$194	
Fringe Benefits	\$235	
Supplies	\$86	
Camp Operating Cost	\$874	
Gnl Admin Expenses	\$389	
Electric Power	\$427	
TOTAL	\$2,683	
Admin & GnlServ Cost		/Tonne(Ore)
TOTAL ANNUAL OPERATING COSTS:	\$3,370,355	
***************************************	******	******

Based on the selected mining method and type of ore an estimate is made of operating costs and number of employees required.

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SECTION V - PROCESS PLANT, CAPITAL COST ESTIMATION: Plant-Site Clearing and Mass Excavation	
Relatively flat site:	\$233,535
Concrete Foundations and detailed excavations	
Concrete slabs on compact gravel/sand:	\$460,735
Crushing Plant,Coarse Ore Storage	
and Conveyors:	\$575,919
Concentrator Building	
Mild climate:	\$383,946
Grinding Section and Fine Ore Storage	
Medium ores (70% -200#):	\$336,656
Flotation and/or Processing Section	
Cyanidation-simple gold ores	\$70,137
Thickening and filtering Section	
Cyanided gold ores	\$191,973
CAPITAL COST OF PROCESS PLANT: \$2	2,252,900
***************************************	****

Taking into account the climatic and site conditions an appropriate estimate is made for the mill capital cost. SECTION VI - MINE, CAPITAL COST ESTIMATION. UNDERGROUND MINE CASE

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Preproduction Mine Development costs:	•	
Drifts,ramps,raises(as drifting equiv.)	353	metres
Cost of Mine Development	\$296,221	
Compressor capacity	1,180	CFM
Compressor installation cost	\$44,504	
Compressor purchase price	\$190,876	
Equipment cost & installation	\$696,771	
Cost of Maintenance Facilities	\$212,293	
CAPITAL COST OF UNDERGROUND MINE	\$1,440,665	****

Based on the mining method selected and the daily mining rate,pre-production capital costs for the mine itself are estimated.

SECTION VII-PLANT UTILITIES AND GENERAL S	SERVICES, CAPITAL COST ESTIMATION
Diesel Generator	
Peak	421 KW
Cap cost	\$1,017,909
Loc Dist.	\$135,721
Tailings Storage	\$102,386
Water Supply	
Reclaim water required	3 GPM
Cost of reclaim water pumps	\$10,191
Cost of General Plant Services	\$402,174
Kms of road to be constructed	12
Cost of access road construction	\$1,079,340
Townsite/Accommodation costs	\$231,171
UTILITIES AND GENERAL SERVICES CAPITAL CO	DST \$2,978,892
*****	******

Depending on information provided on power availability, need for road provision, commuting distance from nearest community and the determined daily milling rate, an appropriate estimate is made for the cost of providing mine utilities and general services. SECTION - VIII PROJECT OVERHEAD COSTS Feasibility studies, design engineering and technical planning \$533,797 Project supervision, contract management, expediting and general construction facilities, including \$667,246 camp costs: Administration, accounting, legal and pre-production employment of key operating staff: \$467,072 TOTAL PROJECT OVERHEAD COSTS \$1,668,114 \*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\* \*\*\*\*\*\*\*\*\*\*\*\*\*\*

SECTION IX - SUSTAINING CAPITAL COSTS	
Mill Sustaining capital cost	\$8,876 /Year
Mine Sustaining Capital Cost	\$180,810 /Year
TOTAL SUSTAINING CAPITAL COST	\$189,686
*************	*****

Project overhead costs are taken to be a fixed percentage of direct project costs.

Annual sustaining capital costs are those required to keep mine and mill equipment in good order during the production period.

**************************************			
Property Name:	SHERWOOD MINE		
Ore Type	Gold in silic	eous ore	
Mining Method used	Shrinkage sto	ping	
Recoverable Ore Reserves	56,413	Tonnes	
Mining Rate (of ore) per day	63	Tonnes	
Milling Rate per day	45	Tonnes	
Mine Lifetime	3.0	Years	
Annual Revenue at the Minesite	\$7,621,394		
Annual Operating Costs	\$3,370,355		
Capital Cost of Mill	\$2,252,900		
Capital Cost of Mine	\$1,440,665		
Capital Cost of Utilities and Services	\$2,978,892		
Project Overhead Costs	\$1,668,114		
Working Capital Required (3 mos operating)	\$842,589		
Total Pre-Production Capital Cost	. \$8,340,571		
Preproduction (yrs)	. 1		
Payback (years)	. 2		

## CASH FLOW DISTRIBUTION SUMMARY SHERWOOD MINE

YEAR #> ANN.REV> OP.COSTS> CAPITAL> SUST.CAP> WORK.CAP> CASH FLOW->	0.00 8.34 0.00 0.00	2 7.62 3.37 0.00 0.19 0.00 4.06	3.37 0.00 0.19 0.00	0.19 0.84	0. 0. 0. 0.	00 00 00
YEAR #> ANN.REV> OP.COSTS> CAPITAL> SUST.CAP> WORK.CAP> CASH FLOW->	0.00 0.00	0.00	8 0.00 0.00 0.00 0.00 0.00	9 0.00 0.00 0.00 0.00 0.00	$ \begin{array}{c} 10\\ 0.00\\ 0.00\\ 0.00\\ 0.00\\ 0.00\\ 0.00\\ \end{array} $	
YEAR #> ANN.REV> OP.COSTS> CAPITAL> SUST.CAP> WORK.CAP> CASH FLOW->	0.00 0.00 0.00	0.00	0.00		15 0.00 0.00 0.00 0.00 0.00	
YEAR #> ANN.REV> OP.COSTS> CAPITAL> SUST.CAP> WORK.CAP> CASH FLOW->	0.00 0.00 0.00	0.00	18 0.00 0.00 0.00 0.00 0.00	19 0.00 0.00 0.00 0.00 0.00	20 0.00 0.00 0.00 0.00 0.00	TOTAL 22.86 10.11 8.34 0.57 0.84 4.69

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## SUMMARY FINANCIAL STATISTICS

Net Present Values of the Cash Flow at various discount rates:

NPV@4%>	\$3.54 M	illion
NPV@8%->	\$2.59 M	illion
NPV@12%->	\$1.80 M	illion
NPV@14%->	\$1.45 M	illion
NPV@16%->	\$1.14 M	illion

The "Internal Rate of Return" or Discounted Cash Flow Rate of Return:

DCFROR-->

25.15 %(IRR)

100,000 Tonne Reserve Case

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# A "MINE - FORECAST" EVALUATION

NAME OF PROPERTY: SHERWOOD MINE REPORT PREPARED BY: GEORGE HEARD DATE OF REPORT PREPARATION: 11/16/89

#### SECTION I - INTRODUCTION

This worksheet was prepared by: GEORGE HEARD The property being evaluated is known as:SHERWOOD MINE Date that this worksheet was prepared: 11/16/89 Metals present and prices chosen(Cdn.\$!)

> Gold(Cdn\$/oz) Silver(Cdn\$/oz) \$564.80 \$8.43

Tonnage estimate:

100,000 Tonnes

Grade estimate:

\*\*\*\*

Gold	40.97	g/mt.
Silver	72.02	g/mt.
Copper	0.00	20
Lead	0.00	8
Zinc	0.00	×
Moly	0.00	%MoS2
***************************************	*********	*****

These are the basic parameters chosen to describe the property under evaluation.

SECTION II - MINING PARAMETERS:		
Average stoping width of the ore zone	1.00	metres
General dip of the ore zone	70	Degrees
Maximum depth below surface		metres
Relatively competent rocks	2	
SHRINKAGE STOPING UNDERGROUND MINING CASE:		
Calculated dilution factor:	36.6	8
Assumed recovery factor:	80	8
Recoverable ore reserves:	109,261	Tonnes
With a grade of:	Au	Ag gmt
	30.00	
	Cu%	Pb%
	0.00	0.00
	Zn%	MoS2%
	0.00	0.00
Calculated annual mine capacity:	27,189	Tonnes/year
Hence mine lifetime is:	4.0	Years
***************	******	****

The mining method has been chosen and the main characteristics of the ore zone of relevance to mine operation defined.A recoverable grade and tonnage is arrived at and an optimum mining rate is suggested. SECTION III-MILLING PARAMETERS Gold in siliceous ores GOLD RECOVERY FROM SILICEOUS ORES BY CYANIDATION Calculated gold Recovery: 95.00 % Recoverable gold per year - 774,845 Gms of gold VALUE \$18.16 /Gm produced ANNUAL REVENUE AT THE MINE SITE \$14,069,889

> Based on the ore type selected the metal recoveries are defined and the Annual Revenue at the mine site is calculated.

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SECTION IV - ESTIMATION OF OPERATING COSTS		
Daily mined tonnage (5d/wk)-	105	Tns/day(Ore)
Daily milled tonnage (7d/wk) -	74	Tns/day
Mine operating costs:		-
Labour Cost - (Shrinkage stoping)	\$91.79	/Tonne
Supplies Cost - (Shrinkage stoping)	\$8.00	/Tonne
Mill Operating Costs:		
Labour Cost	\$17.34	/Tonne
Supplies Cost	\$6.58	/Tonne
EMPLOYEES REQUIRED: -	•	
Operating Personell - (Mine):		
Shrinkage Stope Mining:		
Development	6	
Stoping	22	
Mine Service	20	
Maintenance	13	
Mine Staff	9	
TOTAL	70	·
Operating Personell - (Mill)		
gold mills	6	
Administration and Gnl. Services:		
Electrical Services	3	
Plant Serv. & Roads	3	
Townsite	3	
Gnl. Admin.	5	
TOTAL EMPLOYEES REQUIRED:	90	
Admin & Gnl Services -Operating Costs/dy.		
Electrical Services	\$372	
Surface Plant Services	\$301	
Camp Employees Wages	\$273	
Fringe Benefits	\$331	
Supplies	\$110	
Camp Operating Cost	\$1,230	
Gnl Admin Expenses	\$547	
Electric Power	\$606	•
TOTAL	\$3,769	
Admin & GnlServ Cost	\$50.59	/Tonne(Ore)
TOTAL ANNUAL OPERATING COSTS:		
***********	*****	*********

Based on the selected mining method and type of ore an estimate is made of operating costs and number of employees required.

SECTION V - PROCESS PLANT, CAPITAL COST ESTIMATION: Plant-Site Clearing and Mass Excavation	
Relatively flat site:	\$271,308
Concrete Foundations and detailed excavations Concrete slabs on compact gravel/sand:	\$5.91,518
Crushing Plant,Coarse Ore Storage and Conveyors:	\$739,397
Concentrator Building	
Mild climate: Grinding Section and Fine Ore Storage	\$492,931
Medium ores (70% -200#): Flotation and/or Processing Section	\$477,650
Cyanidation-simple gold ores	\$99,510
Thickening and filtering Section Cyanided gold ores	\$246,466
CAPITAL COST OF PROCESS PLANT: \$	2,918,779 ********

Taking into account the climatic and site conditions an appropriate estimate is made for the mill capital cost. \* \* \* \*

SECTION VI - MINE, CAPITAL COST ESTIMATION. UNDERGROUND MINE CASE

Preproduction Mine Development costs:		,
Drifts, ramps, raises (as drifting equiv.)	775	metres
Cost of Mine Development	\$651,011	
Compressor capacity	1,515	CFM
Compressor installation cost	\$53,010	
Compressor purchase price	\$233,112	
Equipment cost & installation	\$940,394	
Cost of Maintenance Facilities	\$272,554	
CAPITAL COST OF UNDERGROUND MINE	\$2,150,082	
	- <u></u>	~ ~ ~ ~ ~ ~ ~ ~ ~ ~ ~ ~ ~ ~

Based on the mining method selected and the daily mining rate,pre-production capital costs for the mine itself are estimated.

SECTION VII-PLANT UTILITIES AND GENERAL SE	ERVICES, CAPITAL COST ESTIMATION
Diesel Generator	
Peak	597 KW
Cap cost	\$1,346,628
Loc Dist.	\$179,550
Tailings Storage	\$131,448
Water Supply	
Reclaim water required	5 GPM
Cost of reclaim water pumps	\$14,604
Cost of General Plant Services	\$528,399
Kms of road to be constructed	12
Cost of access road construction	\$1,079,340
Townsite/Accommodation costs	\$325,176
UTILITIES AND GENERAL SERVICES CAPITAL COS	
*******	******

Depending on information provided on power availability, need for road provision, commuting distance from nearest community and the determined daily milling rate, an appropriate estimate is made for the cost of providing mine utilities and general services. SECTION - VIII PROJECT OVERHEAD COSTS Feasibility studies, design engineering and technical planning \$693,921 Project supervision, contract management, expediting and general construction facilities, including camp costs: \$867,401 Administration, accounting, legal and pre-production employment of key operating staff: \$607,180 TOTAL PROJECT OVERHEAD COSTS \$2,168,502

SECTION IX - SUSTAINING CAPITAL COSTS	
Mill Sustaining capital cost	\$11,702 /Year
Mine Sustaining Capital Cost	\$253,869 /Year
TOTAL SUSTAINING CAPITAL COST	\$265,571
****************	*****

Project overhead costs are taken to be a fixed percentage of direct project costs.

Annual sustaining capital costs are those required to keep mine and mill equipment in good order during the production period.

*****	*****	******
SECTION X - SUMMARY		
**********	*	*****
Property Name:	SHERWOOD MINE	
Ore Type	Gold in silice	eous ore
Mining Method used	Shrinkage stop	ping
Recoverable Ore Reserves	109,261	Tonnes
Mining Rate (of ore) per day	105	Tonnes
Milling Rate per day	74	Tonnes
Mine Lifetime	4.0	Years
Annual Revenue at the Minesite	\$14,069,889	
Annual Operating Costs	\$4,739,132	
Capital Cost of Mill	\$2,918,779	
Capital Cost of Mine	\$2,150,082	
Capital Cost of Utilities and Services	\$3,605,145	
Project Overhead Costs	\$2,168,502	
Working Capital Required (3 mos operating)	\$1,184,783	
Total Pre-Production Capital Cost	. \$10,842,508	
Preproduction (yrs)	. 1	
Payback (years)	. 1	

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## CASH FLOW DISTRIBUTION SUMMARY SHERWOOD MINE

YEAR #> ANN.REV> OP.COSTS> CAPITAL> SUST.CAP> WORK.CAP> CASH FLOW->	10.84 0.00 0.00	2 14.07 4.74 0.00 0.27 0.00 9.07	4.74 0.00 0.27 0.00	4.74 0.00	14.0 4.7 0.0 0.2	4 0 7 8
YEAR #> ANN.REV> OP.COSTS> CAPITAL> SUST.CAP> WORK.CAP> CASH FLOW->	6 0.00 0.00 0.00 0.00 0.00 0.00	7 0.00 0.00 0.00 0.00 0.00	8 0.00 0.00 0.00 0.00 0.00	9 0.00 0.00 0.00 0.00 0.00	$ \begin{array}{c} 10\\ 0.00\\ 0.00\\ 0.00\\ 0.00\\ 0.00\\ 0.00\\ \end{array} $	
YEAR #> ANN.REV> OP.COSTS> CAPITAL> SUST.CAP> WORK.CAP> CASH FLOW->		12 0.00 0.00 0.00 0.00 0.00	0.00	14 0.00 0.00 0.00 0.00 0.00	15 0.00 0.00 0.00 0.00 0.00	
YEAR #> ANN.REV> OP.COSTS> CAPITAL> SUST.CAP> WORK.CAP> CASH FLOW->	16 0.00 0.00 0.00 0.00 0.00	17 0.00 0.00 0.00 0.00 0.00	18 0.00 0.00 0.00 0.00 0.00	19 0.00 0.00 0.00 0.00 0.00	20 0.00 0.00 0.00 0.00 0.00	TOTAL 56.28 18.96 10.84 1.06 1.18 26.60

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#### SUMMARY FINANCIAL STATISTICS

Net Present Values of the Cash Flow at various discount rates:

 NPV@4%-->
 \$22.19 Million

 NPV@8%->
 \$18.57 Million

 NPV@12%->
 \$15.58 Million

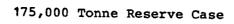
 NPV@14%->
 \$14.27 Million

 NPV@16%->
 \$13.08 Million

The "Internal Rate of Return" or Discounted Cash Flow Rate of Return:

DCFROR-->

75.70 %(IRR)



(D)

# A "MINE - FORECAST" EVALUATION

NAME OF PROPERTY: SHERWOOD MINE REPORT PREPARED BY: GEORGE HEARD DATE OF REPORT PREPARATION: 11/16/89

#### SECTION I - INTRODUCTION

This worksheet was prepared by: GEORGE HEARD The property being evaluated is known as:SHERWOOD MINE Date that this worksheet was prepared: 11/16/89 Metals present and prices chosen(Cdn.\$!)

> Gold(Cdn\$/oz) Silver(Cdn\$/oz) \$564.80 \$8.43

> > 175,000 Tonnes

#### Tonnage estimate:

# Grade estimate:

	Gold	40.97	g/mt.
	Silver		g/mt.
	Copper	0.00	
	Lead	0.00	<b>%</b>
	Zinc	0.00	96 96
	Moly	0.00	%MoS2
* * * * * * * * * * * * * * * * * * * *	******	*****	* * * * * * * * * * * * *

### These are the basic parameters chosen to describe the property under evaluation.

SECTION II - MINING PARAMETERS:		
Average stoping width of the ore zone	1.00	metres
General dip of the ore zone	70	Degrees
Maximum depth below surface		metres
Relatively competent rocks	. 2	
SHRINKAGE STOPING UNDERGROUND MINING CASE:		
Calculated dilution factor:	36.6	20
Assumed recovery factor:	80	%
Recoverable ore reserves:	191,206	Tonnes
With a grade of:	Au	Ag gmt
	30.00	52.73
	Cu%	Pb%
	0.00	0.00
	Zn%	MoS2%
	0.00	
Calculated annual mine capacity:		Tonnes/year
Hence mine lifetime is:	5.0	Years
******	*****	*****

The mining method has been chosen and the main characteristics of the ore zone of relevance to mine operation defined.A recoverable grade and tonnage is arrived at and an optimum mining rate is suggested.

SECTION III-MILLING PARAMETERS Gold in	siliceous ores	
GOLD RECOVERY FROM SILICEOUS ORES	BY CYANIDATION	
Calculated gold Recovery:	95.00	8
Recoverable gold per year -	1,182,910	Gms of gold
VALUE	\$18.16	/Gm produced
ANNUAL REVENUE AT THE MINE SITE	\$21,479,661	-
*******	*****	*****

## Based on the ore type selected the metal recoveries are defined and the Annual Revenue at the mine site is calculated.

SECTION IV - ESTIMATION OF OPERATING COSTS		
Daily mined tonnage (5d/wk)-	160	Tns/day(Ore)
Daily milled tonnage (7d/wk) -		Tns/day
Mine operating costs:		······································
Labour Cost - (Shrinkage stoping)	\$80.85	/Tonne
Supplies Cost - (Shrinkage stoping)		/Tonne
Mill Operating Costs:	+ · · · ·	
Labour Cost	·\$14.04	/Tonne
Supplies Cost		/Tonne
EMPLOYEES REQUIRED: -	•	
Operating Personell - (Mine):		
Shrinkage Stope Mining:		
Development	8	
Stoping	29	
Mine Service	27	
Maintenance	17	
Mine Staff	12	
TOTAL	94	
Operating Personell - (Mill)		
gold mills	8	
Administration and Gnl. Services:		
Electrical Services	4	
Plant Serv. & Roads	4	
Townsite	4	
Gnl. Admin.	7	
TOTAL EMPLOYEES REQUIRED:	121	
Admin & Gnl Services -Operating Costs/dy.		
Electrical Services	\$496	
Surface Plant Services	\$401	
Camp Employees Wages	\$365	
Fringe Benefits	\$442	
Supplies	\$136	
Camp Operating Cost	\$1,642	
Gnl Admin Expenses	\$730	
Electric Power	\$814	
TOTAL	\$5,028	
Admin & GnlServ Cost	•	/Tonne(Ore)
TOTAL ANNUAL OPERATING COSTS:	\$6,332,549	
*****	*******	*****

Based on the selected mining method and type of ore an estimate is made of operating costs and number of employees required.

SECTION V - PROCESS PLANT, CAPITAL COST ESTIMATION:	
Plant-Site Clearing and Mass Excavation	
Relatively flat site:	\$308,023
Concrete Foundations and detailed excavations	
Concrete slabs on compact gravel/sand:	\$730,863
Crushing Plant,Coarse Ore Storage	
and Conveyors:	\$913,579
Concentrator Building	
Mild climate:	\$609,053
Grinding Section and Fine Ore Storage	
Medium ores (70% -200#):	\$642,282
Flotation and/or Processing Section	•
Cyanidation-simple gold ores	\$133,809
Thickening and filtering Section	·
Cyanided gold ores	\$304,526
	3,642,134
CAPITAL COST OF PROCESS PLANT: 5.	, v 4 4 , 1 3 4
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Taking into account the climatic and site conditions an appropriate estimate is made for the mill capital cost.

### SECTION VI - MINE, CAPITAL COST ESTIMATION. UNDERGROUND MINE CASE

Preproduction Mine Development costs:	
Drifts,ramps,raises(as drifting equiv.)	1,479 metres
Cost of Mine Development	\$1,242,325
Compressor capacity	1,872 CFM
Compressor installation cost	\$61,470
Compressor purchase price	\$276,096
Equipment cost & installation	\$1,212,137
Cost of Maintenance Facilities	\$336,761
CAPITAL COST OF UNDERGROUND MINE	\$3,128,790 *****

Based on the mining method selected and the daily mining rate,pre-production capital costs for the mine itself are estimated. SECTION VII-PLANT UTILITIES AND GENERAL SERVICES, CAPITAL COST ESTIMATION

Diesel Generator		
Peak	803	KW
Cap cost	\$1,706,634	
Loc Dist.	\$227,551	
Tailings Storage	\$162,414	
Water Supply		
Reclaim water required	9	GPM
Cost of reclaim water pumps	\$19,804	
Cost of General Plant Services	\$666,082	
Kms of road to be constructed	12	
Cost of access road construction	\$1,079,340	
Townsite/Accommodation costs	\$434,336	
UTILITIES AND GENERAL SERVICES CAPITAL COST	\$4,296,161	
*****	******	******

Depending on information provided on power availability, need for road provision, commuting distance from nearest community and the determined daily milling rate, an appropriate estimate is made for the cost of providing mine utilities and general services. SECTION - VIII PROJECT OVERHEAD COSTS Feasibility studies, design engineering and technical planning \$885,367 Project supervision, contract management, expediting and general construction facilities, includinc. camp costs: \$1,106,708 Administration, accounting, legal and pre-production employment of key operating staff: \$774,696 TOTAL PROJECT OVERHEAD COSTS \$2,766,771 \*\*\*\*\*\*\*\*\*

SECTION IX - SUSTAINING CAPITAL COSTS	
Mill Sustaining capital cost	\$14,810 /Year
Mine Sustaining Capital Cost	\$338,365 /Year
TOTAL SUSTAINING CAPITAL COST	\$353,175
*************	*********

Project overhead costs are taken to be a fixed percentage of direct project costs.

Annual sustaining capital costs are those required to keep mine and mill equipment in good order during the production period.

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\* SECTION X -SUMMARY \*\*\*\* Property Name:.... SHERWOOD MINE Ore Type..... Gold in siliceous ore Mining Method used..... Shrinkage stoping 191,206 Tonnes Recoverable Ore Reserves..... Mining Rate (of ore) per day..... 160 Tonnes Milling Rate per day..... 114 Tonnes Mine Lifetime..... 5.0 Years Annual Revenue at the Minesite ..... \$21,479,661 Annual Operating Costs..... \$6,332,549 Capital Cost of Mill..... \$3,642,134 Capital Cost of Mine..... \$3,128,790 Capital Cost of Utilities and Services..... \$4,296,161 Project Overhead Costs..... \$2,766,771 Working Capital Required (3 mos operating)... \$1,583,137 Total Pre-Production Capital Cost..... \$13,833,855 Preproduction (yrs)..... 1 Payback (years)..... 1

# CASH FLOW DISTRIBUTION SUMMARY SHERWOOD MINE

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YEAR #> ANN.REV> OP.COSTS> CAPITAL> SUST.CAP> WORK.CAP> CASH FLOW->	1 0.00 0.00 13.83 0.00 0.00 (13.83)	2 21.48 6.33 0.00 0.35 0.00 14.79	3 21.48 6.33 0.00 0.35 0.00 14.79	4 21.48 6.33 0.00 0.35 0.00 14.79	21.4 6.3 0.0 0.3 0.0 14.7	3 10 15 10
YEAR #> ANN.REV> OP.COSTS> CAPITAL> SUST.CAP> WORK.CAP> CASH FLOW->	6 21.48 6.33 0.00 0.35 1.58 16.38	7 0.00 0.00 0.00 0.00 0.00	8 0.00 0.00 0.00 0.00 0.00	9 0.00 0.00 0.00 0.00 0.00	$ \begin{array}{c} 10\\ 0.00\\ 0.00\\ 0.00\\ 0.00\\ 0.00\\ 0.00\\ \end{array} $	
YEAR #> ANN.REV> OP.COSTS> CAPITAL> SUST.CAP> WORK.CAP> CASH FLOW->	11 0.00 0.00 0.00 0.00 0.00	12 0.00 0.00 0.00 0.00 0.00	13 0.00 0.00 0.00 0.00 0.00	14 0.00 0.00 0.00 0.00 0.00	$ \begin{array}{r} 15\\ 0.00\\ 0.00\\ 0.00\\ 0.00\\ 0.00\\ 0.00\\ \end{array} $	
YEAR #> ANN.REV> OP.COSTS> CAPITAL> SUST.CAP> WORK.CAP> CASH FLOW->	16 0.00 0.00 0.00 0.00 0.00	17 0.00 0.00 0.00 0.00 0.00	18 0.00 0.00 0.00 0.00 0.00	19 0.00 0.00 0.00 0.00 0.00	20 0.00 0.00 0.00 0.00 0.00	TOTAL 107.40 31.66 13.83 1.77 1.58 61.72

# SUMMARY FINANCIAL STATISTICS

Net Present Values of the Cash Flow at various discount rates:

\$51.28	Million
\$42.88	Million
\$36.07	Million
\$33.14	Million
\$30.48	Million
	\$42.88 \$36.07 \$33.14

The "Internal Rate of Return" or Discounted Cash Flow Rate of Return:

DCFROR--> 104.27 %(IRR)

275,000 Tonne Reserve Case

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# A "MINE - FORECAST" EVALUATION

NAME OF PROPERTY: SHERWOOD MINE REPORT PREPARED BY: GEORGE HEARD DATE OF REPORT PREPARATION: 11/16/89

#### SECTION I - INTRODUCTION

This worksheet was prepared by: GEORGE HEARD The property being evaluated is known as:SHERWOOD MINE Date that this worksheet was prepared: 11/16/89 Metals present and prices chosen(Cdn.\$!)

> Gold(Cdn\$/oz) Silver(Cdn\$/oz) \$564.80 \$8.43

Tonnage estimate:

275,000 Tonnes

Grade estimate:

\*\*\*\*\*

Gold	40.97	g/mt.
Silver	72.02	
Copper	0.00	, So
Lead	0.00	<b>%</b>
Zinc	0.00	8
Moly	0.00	%MoS2
* * * * * * * * * * * * * * * * * * * *	*****	*****

These are the basic parameters chosen to describe the property under evaluation.

SECTION II - MINING PARAMETERS:		
Average stoping width of the ore zone	1.00	metres
General dip of the ore zone	70	Degrees
Maximum depth below surface		metres
Relatively competent rocks	2	
SHRINKAGE STOPING UNDERGROUND MINING CASE:		
Calculated dilution factor:	36.6	20
Assumed recovery factor:	80	8
Recoverable ore reserves:	300,467	Tonnes
With a grade of:	Au	Ag gmt
	30.00	52.73
	Cu%	Pb%
	0.00	0.00
	Zn%	MoS2%
	0.00	0.00
Calculated annual mine capacity:	58,415	Tonnes/year
Hence mine lifetime is:		Years
***************************************	*****	*****

The mining method has been chosen and the main characteristics of the ore zone of relevance to mine operation defined.A recoverable grade and tonnage is arrived at and an optimum mining rate is suggested.

SECTION III-MILLING PARAMETERS Gold in	siliceous ores	
GOLD RECOVERY FROM SILICEOUS ORES	BY CYANIDATION	
Calculated gold Recovery:	95.00	9 <sub>0</sub>
Recoverable gold per year -	1,664,756	Gms of gold
VALUE	\$18.16	/Gm produced
ANNUAL REVENUE AT THE MINE SITE	\$30,229,167	-
*******	*****************	*****

Based on the ore type selected the metal recoveries are defined and the Annual Revenue at the mine site is calculated.

SECTION IV - ESTIMATION OF OPERATING COSTS		
Daily mined tonnage (5d/wk)-	225	Tns/day(Ore)
Daily milled tonnage (7d/wk) -	160	Tns/day
Mine operating costs:		<b>_</b>
Labour Cost - (Shrinkage stoping)	\$72.97	/Tonne
Supplies Cost - (Shrinkage stoping)		/Tonne
Mill Operating Costs:		
Labour Cost	\$11.83	/Tonne
Supplies Cost		/Tonne
EMPLOYEES REQUIRED: -	, - ·	
Operating Personell - (Mine):		
Shrinkage Stope Mining:		
Development	11	
Stoping	37	
Mine Service	35	
Maintenance	21	
Mine Staff	15	
TOTAL	119	
Operating Personell - (Mill)		
gold mills	9	
Administration and Gnl. Services:		
Electrical Services	5	
Plant Serv. & Roads	5	
Townsite	5	
Gnl. Admin.	9	
TOTAL EMPLOYEES REQUIRED:	153	
Admin & Gnl Services -Operating Costs/dy.		
Electrical Services	\$627	
Surface Plant Services	\$507	
Camp Employees Wages	\$461	
Fringe Benefits	\$559	
Supplies	\$162	
Camp Operating Cost	\$2,076	
Gnl Admin Expenses	\$923	
Electric Power	\$1,034	
TOTAL	\$6,349	
Admin & GnlServ Cost		/Tonne(Ore)
TOTAL ANNUAL OPERATING COSTS:	\$8,009,758	
*******	********	*****

Based on the selected mining method and type of ore an estimate is made of operating costs and number of employees required.

SECTION V - PROCESS PLANT, CAPITAL COST ESTIMATION Plant-Site Clearing and Mass Excavation	1:
Relatively flat site:	\$341,273
Concrete Foundations and detailed excavation Concrete slabs on compact gravel/sand:	\$867,033
Crushing Plant, Coarse Ore Storage	•
and Conveyors:	\$1,083,791
Concentrator Building	
Mild climate:	\$722,527
Grinding Section and Fine Ore Storage	
Medium ores (70% -200#):	\$815,839
Flotation and/or Processing Section	
Cyanidation-simple gold ores	\$169,966
Thickening and filtering Section	
Cyanided gold ores	\$361,264
CAPITAL COST OF PROCESS PLANT:	\$4,361,693
***********	******

Taking into account the climatic and site conditions an appropriate estimate is made for the mill capital cost.

## SECTION VI - MINE, CAPITAL COST ESTIMATION. UNDERGROUND MINE CASE

Preproduction Mine Development costs:		
Drifts, ramps, raises (as drifting equiv.)	2,082 metres	
Cost of Mine Development	\$1,748,373	
Compressor capacity	2,221 CFM	
Compressor installation cost	\$69,279	
Compressor purchase price	\$316,534	
Equipment cost & installation	\$1,487,959	
Cost of Maintenance Facilities	\$399,504	
CAPITAL COST OF UNDERGROUND MINE	\$4,021,649	
***************************************	****************	

Based on the mining method selected and the daily mining rate, pre-production capital costs for the mine itself are estimated.

SECTION VII-PLANT	UTILITIES	AND	GENERAL	SERVICES, CAPITAL	COST	ESTIMATION	
Diesel Genera	ator						

1,020	KW
\$2,066,539	
\$275,539	
\$192,674	
13	GPM
\$25,328	
\$803,305	
12	
\$1,079,340	
\$548,929	
\$4,991,653	
*****	******
	\$275,539 \$192,674 13 \$25,328 \$803,305 12 \$1,079,340

Depending on information provided on power availability, need for road provision, commuting distance from nearest community and the determined daily milling rate, an appropriate estimate is made for the cost of providing mine utilities and general services.

SECTION - VIII PROJECT OVERHEAD COSTS	
Feasibility studies,design engineeri	ng
and technical planning	\$1,070,000
Project supervision, contract managem	ent, expediting
and general construction faciliti	es, including
camp costs:	\$1,337,500
Administration, accounting, legal and	
pre-production employment of key	
operating staff:	\$936,250
TOTAL PROJECT OVERHEAD COSTS	\$3,343,749
***********	*****

SECTION IX - SUSTAINING CAPITAL COSTS	
Mill Sustaining capital cost	\$17,933 /Year
Mine Sustaining Capital Cost	\$426,740 /Year
TOTAL SUSTAINING CAPITAL COST	\$444,673
************************************	******

Project overhead costs are taken to be a fixed percentage of direct project costs.

Annual sustaining capital costs are those required to keep mine and mill equipment in good order during the production period.

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Property Name:	SHERWOOD MINE	
Ore Type	Gold in silice	eous ore
Mining Method used	Shrinkage stop	ping
Recoverable Ore Reserves	300,467	Tonnes
Mining Rate (of ore) per day	225	Tonnes
Milling Rate per day	160	Tonnes
Mine Lifetime	5.0	Years
Annual Revenue at the Minesite	\$30,229,167	•
Annual Operating Costs	\$8,009,758	
Capital Cost of Mill	\$4,361,693	
Capital Cost of Mine	\$4,021,649	
Capital Cost of Utilities and Services	\$4,991,653	
Project Overhead Costs	\$3,343,749	
Working Capital Required (3 mos operating)	\$2,002,440	
Total Pre-Production Capital Cost	. \$16,718,744	
Preproduction (yrs)	. 2	
Payback (years)	. 1	

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# CASH FLOW DISTRIBUTION SUMMARY SHERWOOD MINE

YEAR #>	1	2	3	4	5
ANN.REV>	0.00	0.00	30.23	30.23	30.23
OP.COSTS>	0.00	0.00	8.01	8.01	8.01
CAPITAL>	8.36	8.36	0.00	0.00	0.00
SUST.CAP>	0.00	0.00	0.44	0.44	0.44
WORK.CAP>	0.00	0.00	0.00	0.00	0.00
CASH FLOW->	(8.36)	(8.36)	21.77	21.77	21.77
YEAR #>	6	7	8	9	10

	0	'	•	·		
ANN.REV>	30.23	30.23	0.00	0.00	0.00	
OP.COSTS>	8.01	8.01	0.00	0.00	0.00	
CAPITAL>	0.00		· · ·			
SUST.CAP>	0.44	0.44	0.00	0.00	0.00	
WORK.CAP>					0.00	
CASH FLOW->				0.00	0.00	
			•	• • •		
YEAR #>	11	12	13	14	15	
ANN.REV>	0.00	0.00	0.00	0.00	0.00	
OP.COSTS>			0.00		0.00	
CAPITAL>						
SUST.CAP>		0.00	0.00	0.00	0.00	
WORK.CAP>						
CASH FLOW->		0.00		0.00		
				· · · ·		
			,			
YEAR #>	16	17	18	19	20	TOTAL
ANN.REV>	0.00	0.00				151.15
OP.COSTS>		0.00	0.00	0.00	0.00	40.05
CAPITAL>		••••				16.72
SUST.CAP>	0.00	0.00	0.00	0.00	0.00	2.22
WORK.CAP>						2.00
CASH FLOW->		0.00				· · · · · · · · · · · · · · · · · · ·
			0.00	0.00	0.00	24.10

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# SUMMARY FINANCIAL STATISTICS

Net Present Values of the Cash Flow at various discount rates:

\$75.38	Million
\$60.80	Million
\$49.35	Million
\$44.56	Million
\$40.27	Million
	\$60.80 \$49.35 \$44.56

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The "Internal Rate of Return" or Discounted Cash Flow Rate of Return:

DCFROR--> 87.09 %(IRR)