DIAMOND

TOWNSHIP: KEITH TWP. **REPORT NO:** 53

WORK PERFORMED FOR: Marshall Minerals Corp.

RECORDED HOLDER: SAME AS ABOVE (**xx**)

: OTHER ( )

CLAIM NO.	HOLE NO.	FOOTAGE	DATE	NOTE
P 752139	S135-5	497.0'	Aug/89	(1)

NOTES: (1) W9006.60316, filed May/90

REPORT

ON

THE JULY TO SEPTEMBER, 1989 DIAMOND DRILL PROGRAM (CONDENSED TO INCLUDE ONLY HOLE S135-5)

ON

THE SANGOLD PROPERTY

OF

MARSHALL MINERALS CORP.

NTS 42B/SE
PORCUPINE MINING DIVISION
KEITH TOWNSHIP
ONTARIO

TORONTO, ONTARIO
FEBRUARY 28, 1990

STEPHEN B. MEDD
CONSULTING GEOLOGIST

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DDH SECTION 200E (HOLE S135-5) - (1"=20')

VERTICAL PROJECTION OF DIAMOND DRILL HOLE TRACES - EAST GRID (SHOWING HOLE S135-5)

1.0 Introduction

During the period of July 21 to September 15, 1989 diamond drilling and geological trench mapping were undertaken on the Sangold property located withing the Foleyet area of norther Ontario. Thirty-six holes, totalling 17,257 feet, were drilled; 28 holes (14,837 feet) in and around the Patricia gold zone and 8 holes (2420 feet) in the S135 gold zone. Drilling of the Patricia zone was aimed at extending the quartz vein hosted gold mineralization, encountered by previous drilling, along strike and down dip below a vertical depth of 250 feet. The S135 zone was drilled in response to several high grade gold chip and grab samples taken from quartz veins at surface. Geologists, John Lill of Toronto and Frank Toews of Sudbury, were responsible for logging the drill core and on-site supervision

Several other interesting showings on the property were blasted and subsequently mapped and sampled to identify additional zones of anomalous gold and/or base metal mineralization. This trench mapping and sampling program was carried out by geologist Frank Toews.

Senior Vice President of Explorations for Marshall Minerals, Joe Hinzer undertook overall project preparation and supervision. The author was subsequently commissioned to organize the data, interpret results and make conclusions and recommendations based upon the outcome of this interpretation. This report includes only the data from hole S135-5 for the purpose of assessment work filing.

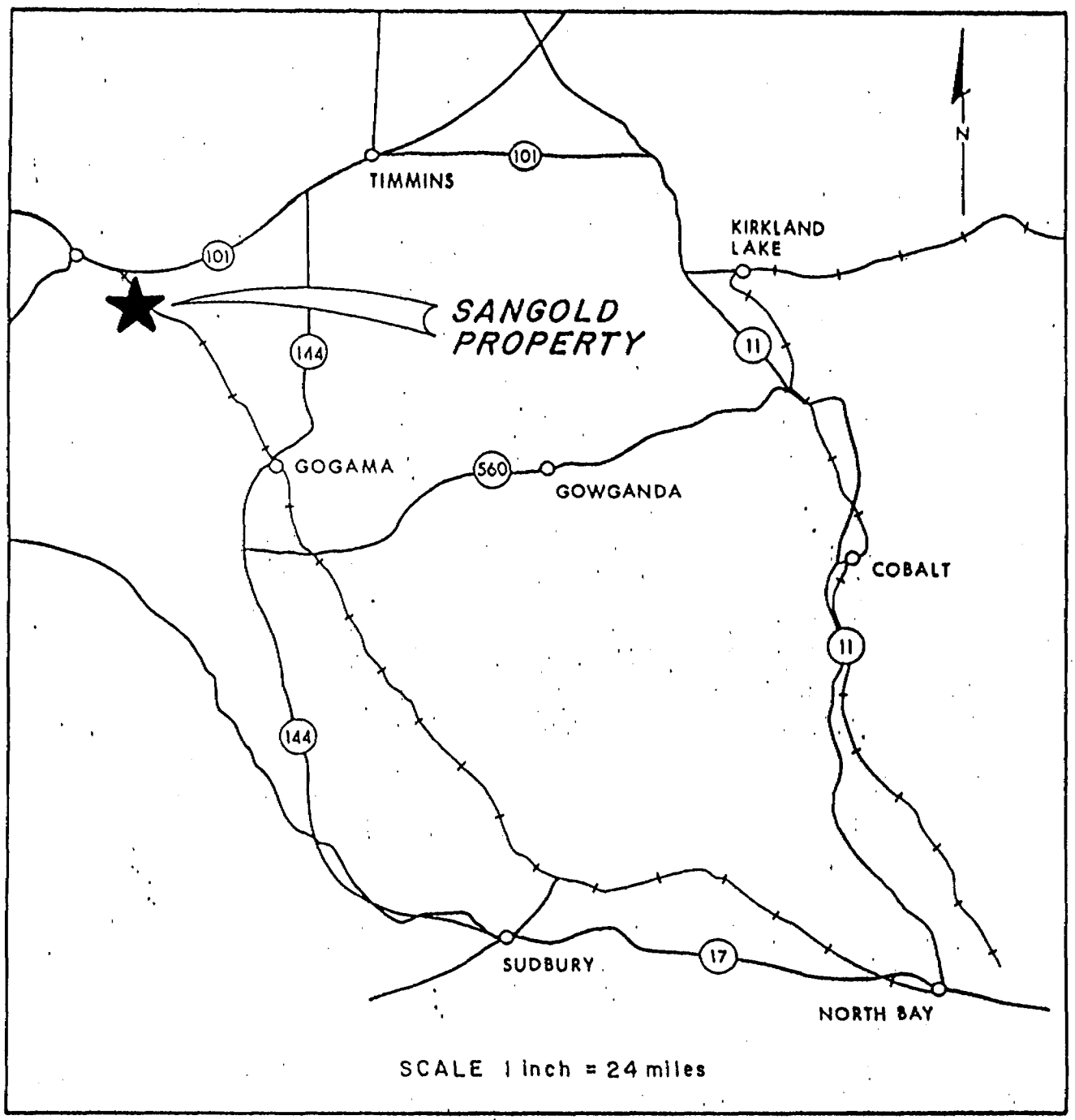
2.0 Location and access

The Sangold property is located in the northwestern corner of Keith Township, approximately 60 miles west of Timmins, Ontario and 10 miles east southeast of Foleyet (Figure 1). The property completely surrounds the former Joburke Gold Mine now held by Noranda.

Gravel access roads leading south from highway 101 traverse the eastern portion of the property. These roads include highway 616 (11 miles east of Foleyet), the Joburke Mine road and the Horwood Lake road.

The campsite and centre of operations are located approximately 4 miles south of highway 101 via these roads. Similar access is provided to the western property boundary by the Keith lumber road. Also, the Canadian National Railway line crosses the northeastern portion of the property.

The property is located within a favorable distance from an experienced labour force and well established mining infrastructure at Timmins. Rail and road access are in place. Water is readily available. Hydro-



MARSHALL MINERALS CORP
AND GOLD VESSEL INC.

SANGOLD PROPERTY, KEITH TWP.

PROPERTY LOCATION MAP

Figure 1

electric power lines are not presently available to the property, however, on-site power generation may be more cost effective for small scale mining operation.

3.0 Property Description

The Sangold property consists of 251 contiguous unpatented mining claims covering approximately 10,000 acres (Figure 2). A list of these claims and their recording dates, and ownership are presented in Appendix 1. The author has not conducted an independent search on the status of these claims. The address for the exploration office of Marshall Minerals Corp. is P.O. Box 356, Niagara Falls, Ontario, L2E 6T8. Phone (416) 356-9112.

MUSKEGO TWP.

Keith Lake

GROUNDHOG RIVER

PALOMAR LAKE

Road

LEGEND

- Sangold Property Claims
- Joburke Property Boundary
- Sanford Claims available to Marshall Minerals
- x Hole S135-5

GAIL RESOURCES INC.
MARSHALL MINERALS CORP.
GOLD VESSEL INC.

SANGOLD PROPERTY

KEITH TOWNSHIP, ONTARIO

MINROC MANAGEMENT LIMITED

S. Redd

SCALE 1" = 1/2 mile

Figure 2

4.0 Previous Work

Since 1947, several companies have explored for a variety of minerals including gold, silver, copper, zinc, nickel, asbestos and iron on or adjacent to the Sangold property. The exploration history of the Sangold property is provided in detail by Wahl (1988).

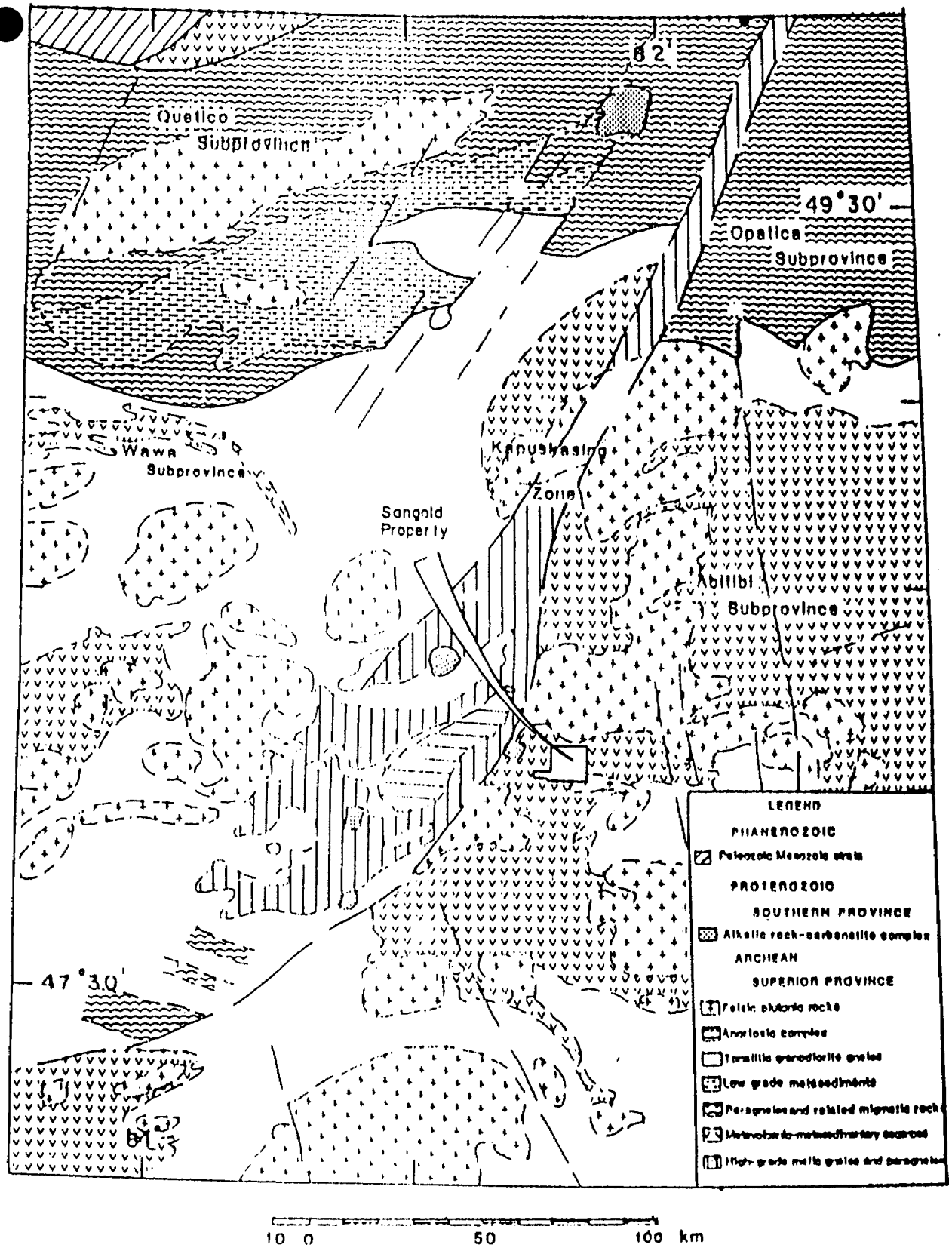
To summarize, in 1947 Joburke Gold Mines Limited completed a vertical, two compartment shaft to 425 feet with stations at the 125, 250 and 375 foot levels. The Joburke Gold Mine, as it is known, is located on the Joburke property which presently comprises 20 patented claims enclosed by the Sangold property. The Joburke property was subsequently worked by McIntyre Porcupine Mines Limited (1945-50) Denison Mines Limited (1964) and finally by Noranda (1973-76 and 1979-81). Total production from the mine by Noranda was 533,084 tons at a grade of 0.09 oz Au/ton. Since 1981, the mine has remained idle under Noranda's ownership.

Since 1947, various parts of the Sangold property itself, have been prospected, trenched and drilled by the following companies: Hoodoo Lake Mines (Dunvegan Mines) (1947), Palomar Gold Mines (1947), Alladin-Groundhog Mines Limited (1947), Nib-Yellowknife Mines (1947), Wejack Gold Mines (1947), Mining Oriented Investments (1969), Mining Corp. (1978-1980) and Marshall Minerals Corp. (1988-present).

Under the current ownership of Marshall Minerals Corp., a majority of work has concentrated on the area which hosts the Hoodoo East and West gold showings first discovered in 1947 by Hoodoo Lake Mines. These showings probably represent the southeastern extension of the auriferous quartz - carbonate vein system encountered at the Joburke Mine.

5.0 Regional Geological Setting

"The Sangold claim group lies within the northern part of the Precambrian Swayze-Deloro metavolcanic-metasedementary belt (Figure 3). This major zone is truncated to the west by the Kapuskasing structural zone, beyond which it continues as the Wawa greenstone belt. To the east the Swayze belt is split into northeasterly and southeasterly branches by the Kenogamissi batholith, continuing to the east as the Abitibi belt. The belt comprises a marginal zone of felsic to intermediate metavolcanics overlain by iron formation, graphitic sediments with intercalated ultramafic komatiitic and tholeitic flows and pyroclastics. These are succeeded by basaltic komatiitic and high-magnesium tholeitic flows which grade into iron-rich tholeites. The upper part of the sequence comprises calc-alkaline dacites to rhyolites, pyroclastics and volcanoclastics, agglomerates and flows interbedded with andesitic flows.



Regional geological setting of the Sangold property within the Abitibi subprovince (after Percival and Card, in press).

Figure 3

The volcanics are succeeded by epiclastic sediments comprising conglomerate, greywacke with minor arkose, argillite and iron formations. (Ireland, 1987)

Gold mineralization in the Swayze occurs primarily in quartz lodes, hosted by a variety of rock types but usually associated with shearing, fracturing, silicification and carbonatization, typical of other major greenstone belt deposits. Host rocks of known occurences include diorite, carbonate, silicified felsic porphyry, sheared metasediments, carbonatized basic volcanics, and granite. Iron formations of both the massive sulphide and oxide types and stratiform massive pyrite in volcanoclastic sequences also host gold in the Swayze. Representatives of all these rock types occur on the Sangold property in a variety of structural settings. (D. Patrick, 1987)" (Wahl, 1988)

6.0 Property Geology

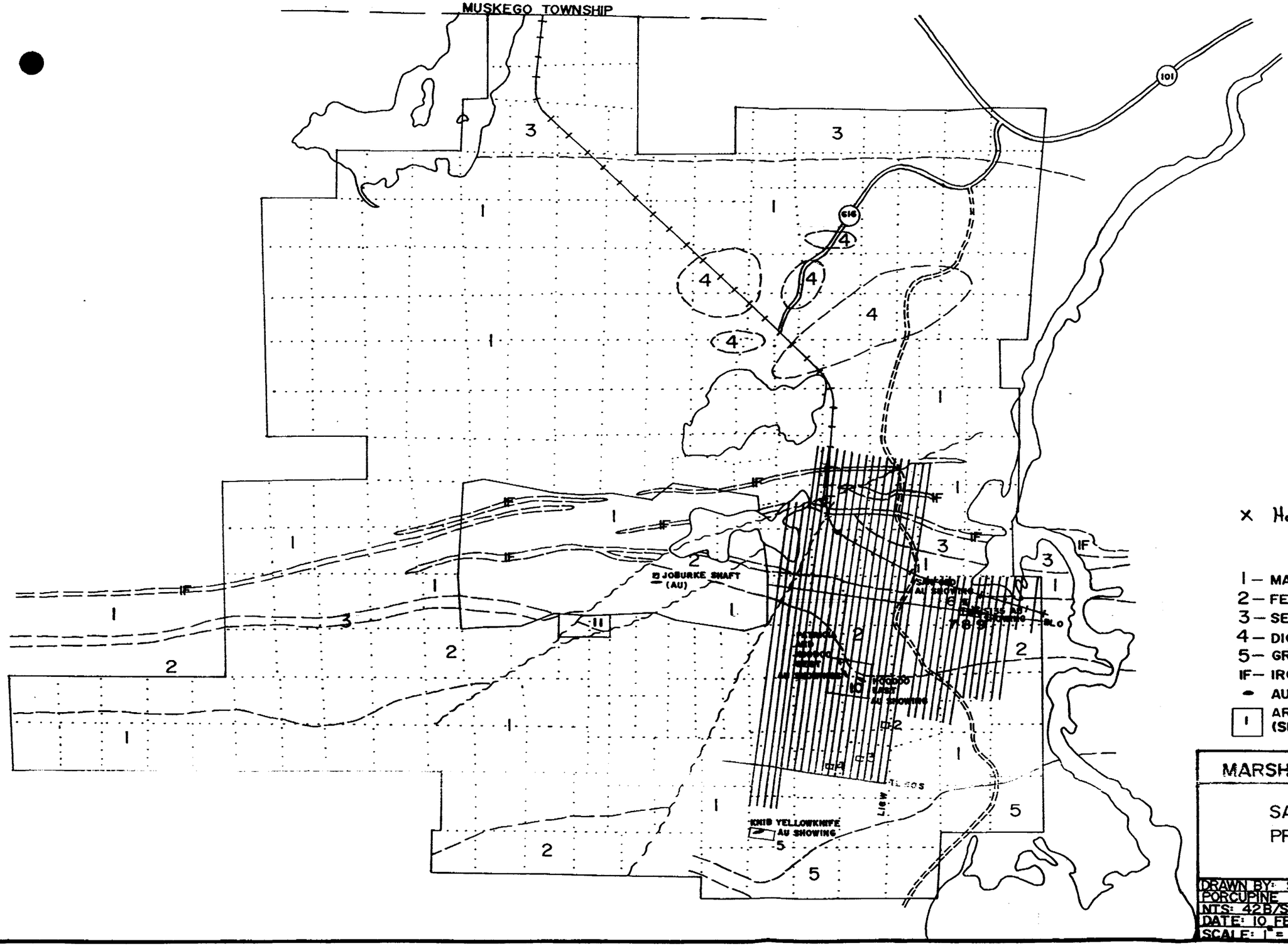
"ODM 1950 Geology Map of Keith and Muskego Townships is the only comprehensive property geology map available to date.

The most prolific rocks are mafic to ultramafic volcanics, primarily flows. The subparallel bands of oxide facies iron formation and a narrow sulphide facies band cross the south-central portion of the property.

Felsic volcanics are present as two eastwest trending bands up to 3000 feet wide traversing the southern third of the property. And a 2000 foot wide band of epiclastic sediments is centred on the northern property boundary.

A granite batholith occupies the southeast boundary area and several gabbroic intrusives are located in the northeastern portion.

These geological units are described in greater detail in the report by Wahl (1988)." (Hinzer, 1989)



× Hole S135-5 (CLAIM 752139)

LEGEND

1 – MAFIC VOLCANICS
2 – FELSIC VOLCANICS
3 – SEDIMENTS
4 – DIORITE, GABBRO INTRUSIVES
5 – GRANITE, GRANODIORITE
IF – IRON FORMATION
• AU SHOWING
[1] AREA MAPPED IN DETAIL (SHOWING MAP NO.)

MARSHALL MINERALS CORP

SANGOLD PROPERTY
PROPERTY GEOLOGY

S. Medd

DRAWN BY: S. MEDD
PORCUPINE M.D., KEITH TWP.
NTS: 42B/SE
DATE: 10 FEB. 90
SCALE: 1" = 1/2 MILE

FIG. 4

7.0 Drilling and Assaying Procedures

During the periods of July 21 to August 31 and September 6 to September 15, 1989, Longyear Canada Inc. of North Bay was commissioned to drill 28 holes for 14,837 feet of BQ core in and around the Patricia gold zone and 8 holes for 2420 feet in the S135 gold zone. Drill hole parameters and coordinates are provided in Tables 1A and 1B. Drill hole collar locations and elevations were surveyed by T.E. Rody Limited of Timmins.

A total of 1345 drill core samples were taken from the area of the Patricia gold zone and analyzed for gold by atomic absorption by Swastika Laboratories. Significant assays (> 0.025 oz Au/ton) from the Patricia gold zone totalled 133. Those samples that initially yielded 1000 ppb (Au 0.029 oz Au/ton) were reanalyzed by a fire assay method. A total of 291 drill core samples were taken from the S135 gold zone of which 25 were significant (>0.025 oz Au/ton). The S135 samples were assayed in the same fashion as the Patricia zone samples. Drill core sample numbers for the Patricia and S135 zones are presented in Tables 2A and 2B, respectively.

All core is stored on the west Patricia grid east of MacKeith Lake.

Significant gold DDH intersections in hole S135-5 are listed in Appendix 3. Hole S135-5 yielded two significant assays from a total of 71 samples taken. A DDH log for hole S135-5 is found in Appendix 4 and a cross-section and location map for hole S135-5 are found in the back pockets.

TABLE 1A
Summary of Diamond Drill Hole Parameters
from the July to September, 1989 program
(Patricia zone - west mining grid)
SANGOLD PROPERTY

Hole No.	Collar Location	Dip	Azimuth	Length(ft)
SG-89-35	1+71.3N, 2+36.8W	-67.0	090.0	497.0
36	1+18.7N, 2+41.5W	-67.0	090.0	527.0
37	1+21.5N, 1+82.1W	-66.0	090.0	427.0
38A	0+60.7N, 3+71.2W	-66.0	090.0	837.0
38B	0+60.7N, 3+71.2W	-72.0	090.0	917.0
39	0+20.8N, 2+65.7W	-57.5	090.0	777.0
40	0+27.3N, 2+12.9W	-55.5	090.0	485.0
41	0+74.7S, 1+97.4W	-56.5	090.0	577.0
42	1+22.3S, 1+07.7W	-68.0	090.0	557.0
43	0+24.6S, 3+01.1W	-68.0	090.0	857.0
44	1+72.5S, 0+96.2W	-45.0	090.0	267.0
45	0+50.0N, 2+66.5W	-57.5	090.0	627.0
46	4+32.7N, 1+04.1W	-44.5	270.0	537.0
47	10+24.3N, 0+64.4W	-46.0	225.0	507.0
48	8+90.4N, 2+11.0W	-45.0	225.0	447.0
49	9+77.5N, 0+19.6W	-45.0	225.0	597.0
50	0+74.7S, 1+97.4W	-49.0	088.0	457.0
51	0+78.2S, 2+49.0W	-65.0	088.0	707.0
52	0+24.6S, 3+01.1W	-62.0	083.0	657.0
53	0+61.7N, 3+01.2W	-66.0	083.0	697.0
54	1+71.7N, 2+34.8W	-63.0	085.0	307.0
55	2+15.3N, 2+04.1W	-65.0	088.0	307.0
56	2+64.8N, 2+01.1W	-60.0	088.0	247.0
57	0+27.3S, 2+12.9W	-56.0	085.0	467.0
58	0+74.8N, 2+00.9W	-70.0	084.0	607.0
59	0+20.3N, 2+69.6W	-56.0	084.0	70.0
60	0+20.1N, 2+96.0W	-60.0	084.0	477.0
61	3+15.5N, 2+58.4W	-55.0	084.0	397.0
			Total	14,837.0

TABLE 1B
Summary of Diamond Drill Hole Parameters
From the July to September, 1989 program
(S135 zone - east traverse grid)
SANGOLD PROPERTY

Hole No.	Collar Location	Dip	Azimuth	Length (ft)
S135-01	0+61N, 2+34E	-44.5	160.0	207.0
S135-02	0+61N, 2+34E	-61.0	160.0	207.0
S135-03	0+68N, 2+54.5E	-46.5	160.0	207.0
S135-04	0+68N, 2+54.5E	-61.0	160.0	207.0
S135-05	0+32S, 2+00E	-46.0	008.0	497.0
S135-06	0+65S, 3+00E	-47.0	008.0	397.0
S135-07	0+65S, 3+00E	-60.0	008.0	421.0
S135-08	0+65S, 3+50E	-45.0	008.0	277.0
			Total	2420.0

TABLE 2A
Sample numbers from the July to September, 1989 drill program
SANGOLD PROPERTY
(Patricia zone - west grid)

Hole No.	Sample Number
SG-89-35	28051-28095 (45)
	43051-43503 (03)
SG-89-36	28096-28132 (37)
SG-89-37	28133-28167 (35)
SG-89-38A	28168-28214 (47)
	43504-43506 (03)
SG-89-38B	28215-28275 (61)
	43507-43508 (02)
SG-89-39	28276-28339 (64)
	43509-43512 (04)
SG-89-40	29340-28359 (20)
	43513-43514 (02)
SG-89-41	28360-28377 (18)
SG-89-42	28378-28400 (23)
	43515-43516 (02)
SG-89-43	28401-28443 (43)
	30932-30937 (06)
	43517-43525 (09)
	43978-44000 (23)
SG-89-44	28444-28457 (14)
	43526-43529 (04)
SG-89-45	28458-28464 (07)
	28465(missing)(1)
	28466-28500 (34)
	28552-28632 (81)
SG-89-46	28633-28679 (47)
	30828-30835 (08)
SG-89-47	28680-28700 (21)
	30837-30857 (21)
	43001-43054 (54)
SG-89-48	43055-43118 (64)
	43530-43534 (05)
SG-89-49	43801-43875 (75)
	43535-43537 (03)

Hole No.	Sample Number
SG-89-50	43206-43225 (20)
	43538-43542 (05)
	43876-43900 (25)
SG-89-51	43482-43491 (10)
SG-89-52	43268-43281 (14)
	43543-43546 (04)
	43901-43903 (03)
	44886-44900 (15)
SG-89-53	43282-43304 (23)
	43367-43374 (08)
	43398-43419 (22)
	43547-43558 (12)
SG-89-54	43343-43362 (20)
	43363(missing)(1)
	43364-43366 (03)
	43559-43560 (02)
SG-89-55	43375-43379 (05)
	43420-43442 (23)
	43561-43564 (04)
SG-89-56	43380-43397 (18)
	43443-43449 (07)
	43565-43571 (07)
SG-89-57	43450-43481 (32)
	43572-43585 (14)
SG-89-58	43586-43596 (11)
	43904-43965 (62)
	43966(missing)(1)
	43967-43977 (11)
SG-89-59	no samples taken
SG-89-60	6380-6392 (13)
	6393(missing)(1)
	6394-6400 (07)
	30938-30940 (03)
	43597-43600 (04)
SG-89-61	17936-17940 (05)
	43492-43500 (09)
	44851-44885 (35)

missing samples: 4

Total: 1,345

TABLE 2B
Sample numbers from the July to September, 1989 drill program
SANGOLD PROPERTY
(S135 zone - east grid)

Hole no.	Sample no.
S135-01	30858-30870 (13)
	30871(missing)(1)
	30872-30900 (29)
	39901-39927 (27)
S135-02	39928-39949 (22)
	39950(missing)(1)
	43119-43124 (06)
S135-03	39951-39963 (13)
	43125-43132 (08)
S135-04	39964-39971 (08)
	43133-43135 (03)
	43136(missing)(1)
	43137-43144 (08)
S135-05	39979-39984 (06)
	43226-43267 (42)
	43305-43327 (23)
S135-06	39972-39978 (07)
	39985-40000 (16)
	43145-43150 (06)
	43201-43205 (05)
S135-07	6178-6191 (14)
	6192(missing)(1)
	6193-6199 (07)
	30941(missing)(1)
	30942-30950 (09)
S135-08	17922-17924 (03)
	17925(missing)(1)
	17926-17934 (09)
	17935(missing)(1)
missing samples: 7	Total: 291

8.0 Results and Interpretation

Two significant gold assays (> 0.025 oz/ton) were encountered in the upper part of DDH S135-5: 0.150 oz/ton over 1.2 feet (sample #39981) and .110 oz/ton over 1.0 feet (sample #39983). They are separated by 1.9 feet of 190 ppb Au (0.006 oz/ton) to yield an average grade of 0.07 oz/ton over 4.1 feet.

This gold zone is marked by 50-80% quartz-carbonate veining and pyrite concentrated up to 20% locally and averaging 5-10%. The zone is also strongly sericitized and is hosted by foliated felsic volcanics intruded by intermediate dykes. When vertically projected to surface, the zone lines up with a surface trench sample assaying 0.424 oz/ton over 1.0 feet hosted by quartz-carbonate veining in oxidized felsic schist. On surface, shearing within the felsic volcanics strikes east-west and dips subvertically.

Down hole or north of the gold zone, felsic volcanics are the dominant rock type with intercalations of graphitic argillite. No other significant assays were found in this part of DDH S135-5.

9.0 Conclusions and Recommendations

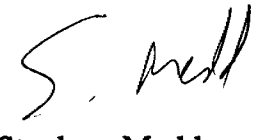
1) DDH S135-5 was successful at intersecting a gold zone, trenched and sampled on surface, at a vertical depth of 60 feet.

2) The gold zone (S135 zone) consists of quartz-carbonate veining in foliated, pyritized, sericitic felsic volcanics contained within an east-west trending shear system.

3) The gold content is generally low grade (0.07 oz/ton over 4.1 feet) and erratic in nature in DDH S135-5.

4) Further drilling at depth and along strike is needed to determine the economic potential of the S135 zone. This can be better decided by undertaking a full compilation of all the available drilling and trenching information for the S135 zone.

Respectfully Submitted



Stephen Medd

REFERENCES

HINZER, J.B.; 1989. Second Diamond Drill Report on the Sangold Property, Keith Township, Ontario of Marshall Minerals Corporation.

HINZER, J.B.; 1988. Diamond Drill Report on the Sandgold Property, Keith Township, Ontario of Marshall Minerals Corporation and Gold Vessel Resources Inc.

IRELAND, J.; 1987. Summary Property Examination Report; O.G.S.

WAHL, G.H.; 1988. Geological Compilation and Drill Report (1988) of the Sangold Property, Keith Township, Ontario - Marshall Minerals Corp., Gail Resources Inc., Gold Vessel Resources Inc.

Certificate of Qualification

THIS IS TO CERTIFY THAT:

I, Stephen B. Medd, am a consulting geologist and reside at 1117 - 7 Crescent Place, Toronto, Ontario, M4C 5L7.

I have been actively engaged in Canadian and Foreign mining and exploration since 1979.

I am a graduate of the University of Waterloo, Waterloo, Ontario, with an Honours B.Sc. (1983) in the Co-op Program of Earth Sciences.

I am a member, in good standing, of the Geological Association of Canada.

I have never visited the property.

Conclusions and recommendations are based on field data gathered and provided by Marshall Minerals Corp. and on reports and historical assessment records found in Government of Ontario files.

I have not directly nor indirectly received nor expect to receive any interest direct or indirect in the property of the company or any affiliate.

S. Medd

Stephen B. Medd

APPENDIX 1

CLAIMS OWNED 100% BY MARSHALL MINERALS

Claim Nos.	Date Recorded
P-930905	Apr 02/87
P-930906	Apr 02/87
P-930907	Apr 02/87
P-930908	Apr 02/87
P-930909	Apr 02/87
P-930910	Apr 02/87
P-930911	Apr 02/87
P-958074	Mar 17/87
P-958075	Mar 17/87
P-958076	Mar 17/87
P-958077	Mar 17/87
P-968202	Apr 02/87
P-968203	Apr 02/87
P-968204	Apr 02/87
P-968205	Apr 02/87
P-968206	Apr 02/87
P-968207	Apr 02/87
P-968208	Apr 02/87
P-968209	Apr 02/87
P-996922	Jun 19/87
P-996923	Jun 19/87
P-996924	Jun 19/87
P-996925	Jun 19/87
P-996926	Jun 19/87
P-996927	Jun 19/87
P-996928	Jun 19/87
P-996929	Jan 20/88
P-996930	Jan 20/88
P-996931	Jan 20/88
P-1029806	Jan 20/88
P-1029807	Jan 20/88
P-1029809	Jan 20/88
P-1029810	Jan 20/88
P-1029811	Jan 20/88
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P-1029814	Jan 20/88
P-1029815	Jan 20/88
P-1029816	Jan 20/88
P-1029817	Jan 20/88
P-1029958	Jan 20/88
P-1029959	Jan 20/88
P-1029960	Jan 20/88
P-1029975	Jan 20/88
P-1029976	Jan 20/88
P-1029977	Jan 20/88

CLAIMS HELD 55% BY MARSHALL MINERALS - 45% BY GAIL RESOURCES

Claim Nos.	Date Recorded
P-654248	Sep 13/82
P-654249	Sep 13/82
P-654250	Sep 13/82
P-654251	Sep 13/82
P-654252	Sep 13/82
P-654253	Sep 13/82
P-660601	Sep 13/82
P-660602	Sep 13/82
P-661517	Sep 13/82
P-661518	Sep 13/82
P-683689	Dec 06/82
P-683689	Dec 06/82
P-683690	Oct 04/83
P-688519	Dec 16/82
P-688520	Dec 16/82
P-688521	Dec 16/82
P-688522	Dec 16/82
P-688523	Dec 16/82
P-723987	May 16/83
P-723988	May 16/83
P-723989	May 16/83
P-723990	May 16/83
P-724931	Jun 24/83
P-724932	Jun 24/83
P-724933	Jun 24/83
P-724934	Jun 24/83
P-742762	Jul 19/83
P-751878	Oct 17/83
P-751880	Oct 04/83
P-751881	Oct 04/83
P-751882	Oct 04/83
P-751883	Oct 04/83
P-752139	Sep 30/83
P-752141	Sep 30/83
P-752142	Sep 30/83
P-752143	Apr 10/83
P-752144	Apr 10/83
P-752145	Apr 10/83
P-752146	Apr 10/83
P-752147	Jan 23/84
P-752148	Jan 23/84
P-752149	Jan 23/84

Claim Nos.	Date Recorded
P-752150	Jan 23/84
P-752185	Oct 17/83
P-752186	Oct 04/83
P-752600	Oct 04/83
P-752601	Oct 04/83
P-752602	Oct 04/83
P-752603	Oct 04/83
P-753418	Nov 07/83
P-753420	Nov 07/83
P-753421	Nov 07/83
P-753422	Nov 07/83
P-758049	Apr 11/83
P-758050	Apr 11/83
P-758051	Apr 11/83
P-758052	Apr 11/83
P-780865	Nov 15/83
P-806963	Jul 05/84
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P-806967	Jul 05/84
P-806968	Jul 05/84
P-807175	Oct 05/85
P-807306	Jul 05/84
P-833197	Oct 05/84
P-867747	Sep 06/85
P-867748	Sep 06/85
P-867749	Mar 27/86
P-867750	Mar 27/86
P-871697	Nov 07/85
P-871698	Nov 07/85
P-871699	Nov 07/85
P-871700	Nov 07/85
P-871701	Nov 07/85
P-871702	Nov 07/85
P-871703	Nov 07/85
P-871704	Nov 07/85
P-871705	Nov 07/85
P-871706	Nov 07/85
P-871707	Nov 07/85
P-871708	Nov 07/85
P-871709	Nov 07/85
P-871710	Nov 07/85
P-871711	Nov 07/85
P-872146	Nov 07/85

Claim Nos.	Date Recorded
P-872147	Nov 07/85
P-872148	Nov 07/85
P-872149	Nov 07/85
P-872150	Nov 07/85
P-872151	Nov 07/85
P-872152	Nov 07/85
P-872153	Nov 07/85
P-872154	Nov 07/85
P-872155	Nov 07/85
P-872156	Nov 07/85
P-872157	Nov 07/85
P-872158	Nov 07/85
P-872159	Nov 07/85
P-872160	Mar 27/86
P-872161	Mar 27/86
P-872162	Mar 27/86
P-872163	Mar 27/86
P-872164	Mar 27/86
P-872165	Mar 27/86
P-872306	Nov 25/85
P-872307	Nov 25/85
P-872308	Nov 25/85
P-872309	Nov 25/85
P-872310	Nov 25/85
P-872311	Nov 25/85
P-872312	Mar 27/86
P-872313	Mar 27/86
P-872314	Mar 27/86
P-872315	Mar 27/86
P-872316	Mar 27/86
P-872317	Mar 27/86
P-900417	Mar 27/86
P-900418	Mar 27/86
P-900419	Mar 27/86
P-900420	Mar 27/86
P-900421	Mar 27/86
P-900422	Mar 27/86
P-900423	Mar 27/86
P-900424	Mar 27/86
P-900425	Mar 27/86
P-900426	Mar 27/86
P-900427	Mar 27/86
P-900428	Mar 27/86
P-900429	Mar 27/86
P-900430	Mar 27/86

Claim Nos.	Date Recorded
P-900431	Mar 27/86
P-900432	Mar 27/86
P-900433	Mar 27/86
P-900434	Mar 27/86
P-900435	Mar 27/86
P-900436	Mar 27/86
P-900437	Mar 27/86
P-900438	Mar 27/86
P-900439	Mar 27/86
P-900440	Mar 27/86
P-900441	Mar 27/86
P-900442	Mar 27/86
P-900443	Mar 27/86
P-900444	Mar 27/86
P-900445	Mar 27/86
P-916887	May 14/86
P-916888	May 14/86
P-916889	May 29/86
P-916890	May 29/86
P-921784	May 29/86
P-921785	May 29/86
P-921786	May 29/86
P-921787	May 29/86
P-921788	May 29/86
P-921789	May 29/86
P-921790	May 29/86
p-921791	May 29/86
p-921792	May 29/86
p-921793	May 29/86
p-921795	May 29/86
p-921795	May 29/86
p-921796	May 29/86
p-921797	May 29/86
p-921798	May 29/86
p-921799	May 29/86
p-921800	May 29/86
p-923401	May 29/86
p-923402	May 29/86
p-923403	May 29/86
p-923404	May 29/86
p-923405	May 29/86
p-926003	Jun 06/86
P-926004	Jun 06/86
P-926005	Jun 06/86
P-926006	Jun 06/86

Claim Nos.	Date Recorded
P-926007	Jun 16/86
P-926008	Jun 06/86
P-926009	Jun 06/86
P-926010	Jun 06/86
P-926011	Jun 16/86
P-926012	Jun 16/86
P-926013	Jun 16/86
P-926014	Jun 16/86
P-926015	Jun 16/86
P-926016	Jun 16/86
P-926017	Jun 16/86
P-926018	Jun 16/86
P-926019	Jun 16/86
P-926020	Jun 16/86
P-926021	Jun 16/86
P-926022	Jun 16/86
P-926023	Jun 16/86
P-926024	Jun 16/86
P-926025	Jun 16/86
P-926026	Jun 16/86
P-926027	Jun 16/86
P-926029	Jul 24/86
P-926030	Jul 24/86
P-930902	May 29/86
P-930903	May 29/86
P-930904	May 29/86

APPENDIX 2

DIAMOND DRILL HOLE PARAMETERS FROM THE JULY TO SEPTEMBER, 1989 PROGRAM
SAN GOLD PROPERTY (EAST TRAVERSE GRID)

Hole No.	Collar Location	Elevation	Footage	Dip	Azimuth	Length
** S135-01	0+61N, 2+34E	0 (DATUM)	0.0	-44.5	160.0	207.0
			50.0	-44.0	159.7	
			100.0	-43.4	159.1	
			150.0	-42.0	158.9	
			190.0	-42.5	158.5	
** S135-02	0+61N, 2+34E	0	0.0	-61.0	160.0	207.0
			50.0	-61.2	159.5	
			100.0	-60.4	159.4	
			150.0	-58.6	158.5	
			180.0	-57.5	158.2	
S135-03	0+68N, 2+54.5E	0	0.0	-46.5	160.0	207.0
			50.0	-45.1	159.5	
			100.0	-43.7	159.0	
			150.0	-42.6	158.5	
			180.0	-42.0	158.3	
** S135-04	0+68N, 2+54.5E	0	0.0	-61.0	160.0	207.0
			50.0	-59.9	160.0	
			100.0	-58.8	159.5	
			150.0	-57.7	159.0	
			200.0	-56.9	158.6	

DIAMOND DRILL HOLE PARAMETERS FROM THE JULY TO SEPTEMBER, 1989 PROGRAM
SAN GOLD PROPERTY (EAST TRAVERSE GRID)

Hole No.	Collar Location	Elevation	Footage	Dip	Azimuth	Length
** S135-05	0+32S, 2+00E	+14.5	0.0	-46.0	008.0	497.0
			50.0	-44.5	007.8	
			100.0	-42.0	008.1	
			150.0	-40.1	007.6	
			200.0	-36.3	006.7	
			250.0	-34.0	005.7	
			300.0	-32.0	004.7	
			350.0	-30.8	004.3	
			400.0	-29.3	004.3	
			430.0	-29.0	004.3	
* S135-06	0+65S, 3+00E	+12.0	0.0	-47.0	008.0	397.0
			50.0	-45.6	007.7	
			100.0	-43.1	007.8	
			150.0	-40.2	008.0	
			200.0	-39.2	007.7	
			250.0	-38.8	007.6	
			300.0	-38.6	007.1	
			350.0	-37.5	006.6	
			370.0	-37.0	006.8	
S135-07	0+65S, 3+00E	+12.0	0.0	-60.0	008	421.0
			100.0	-60.0		
			250.0	-62.0		
			421.0	-44.0		
S135-08	0+65S, 3+50E	+12.0	0.0	-45.0	008	277.0
			100.0	-45.0		
			277.0	-35.0		

DIAMOND DRILL HOLE PARAMETERS FROM THE JULY TO SEPTEMBER, 1989 PROG
SANGOLD PROPERTY (EAST TRAVERSE GRID)

- COLLAR LOCATIONS REFER TO COORDINATES ON THE EAST TRAVERSE GRID
- COLLAR ELEVATIONS ARE IN RELATION TO 5135-01 (DATUM =

NO ASTERISK: DIP MEASUREMENTS ARE FROM ACID TESTS AND COLLAR AZIMUTHS ARE FROM SURFACE COMPASS BEARINGS.
** DIP MEASUREMENTS AND AZIMUTH MEASUREMENTS ARE SURVEYED BY A LIGHT-LOG BORE-HOLE INSTRUMENT

DIAMOND DRILL HOLE PARAMETERS FROM THE JULY TO SEPTEMBER, 1989 PROGRAM
SANGOLD PROPERTY (WEST MINING GRID)

Hole No.	Collar Location	Elevation	Footage	Dip	Azimuth	Length
**SG-89-35	1+71.3N, 2+36.8W	9995.2	0.0	-67.0	090.0	497.0
			50.0	-67.2	089.8	
			100.0	-65.8	091.7	
			150.0	-62.4	096.0	
			200.0	-59.3	099.1	
			250.0	-56.0	102.3	
			300.0	-52.4	105.3	
			350.0	-46.0	107.5	
			400.0	-42.8	107.7	
			450.0	-39.9	108.2	
			470.0	-39.5	108.1	
** SG-89-36	1+18.7N, 2+41.5W	9996.5	0.0	-67.0	090.0	527.0
			50.0	-67.8	089.7	
			100.0	-66.8	090.2	
			150.0	-66.1	091.0	
			200.0	-65.2	091.8	
			250.0	-64.1	092.0	
			300.0	-63.0	092.7	
			350.0	-62.2	093.4	
			400.0	-60.1	095.2	
			450.0	-58.1	097.0	
			500.0	-54.7	099.2	
			520.0	-53.7	099.9	

DIAMOND DRILL HOLE PARAMETERS FROM THE JULY TO SEPTEMBER, 1989 PROGRAM
SAN GOLD PROPERTY (WEST MINING GRID)

Hole No.	Collar Location	Elevation	Footage	Dip	Azimuth	Length
**SG-89-37	1+21.5N, 1+82.1W	9998.2	0.0	-66.0	090.0	427.0
			50.0	-64.9	091.5	
			100.0	-62.4	093.9	
			150.0	-57.4	097.3	
			200.0	-50.3	101.6	
			250.0	-42.2	106.5	
			300.0	-39.4	107.3	
			350.0	-38.2	107.2	
			400.0	-37.6	107.6	
			420.0	-37.5	107.7	
**SG-89-38A	0+60.7N, 3+71.2W	9990.6	0.0	-66.0	090.0	837.0
			50.0	-66.0	090.3	
			100.0	-63.3	092.2	
			150.0	-57.8	096.4	
			200.0	-53.3	099.0	
			250.0	-50.4	100.3	
			300.0	-46.5	101.4	
			350.0	-43.4	102.9	
			400.0	-41.9	103.1	
			450.0	-40.4	103.5	
			500.0	-39.5	104.2	
			550.0	-38.2	104.8	
			600.0	-36.0	106.9	
			650.0	-34.6	108.6	
			700.0	-33.6	109.8	
			750.0	-32.7	110.7	
			770.0	-32.5	110.7	

DIAMOND DRILL HOLE PARAMETERS FROM THE JULY TO SEPTEMBER, 1989 PROGRAM
SAN GOLD PROPERTY (WEST MINING GRID)

Hole No.	Collar Location	Elevation	Footage	Dip	Azimuth	Length
**SG-89-38B	0+60.7N, 3+71.2W	9990.6	0.0	-72.0	090.0	917.0
			50.0	-71.5	089.9	
			100.0	-71.7	090.5	
			150.0	-69.9	093.4	
			200.0	-67.6	095.9	
			250.0	-65.4	098.4	
			300.0	-62.4	101.0	
			350.0	-60.5	103.0	
			400.0	-57.6	105.4	
			450.0	-54.5	107.3	
			500.0	-51.0	109.1	
			550.0	-45.4	111.5	
			600.0	-39.5	113.3	
			650.0	-35.6	114.1	
			700.0	-32.6	115.6	
			750.0	-29.3	117.5	
			800.0	-27.7	117.8	
			850.0	-26.4	118.6	
			900.0	-25.3	119.2	
			910.0	-25.0	119.5	

DIAMOND DRILL HOLE PARAMETERS FROM THE JULY TO SEPTEMBER, 1989 PROGRAM
SAN GOLD PROPERTY (WEST MINING GRID)

Hole No.	Collar Location	Elevation	Footage	Dip	Azimuth	Length
**SG-89-39	0+208N, 2+65.7W	10000.4	0.0	-57.5	090.0	777.0
			50.0	-57.1	090.3	
			100.0	-56.0	091.9	
			150.0	-54.0	094.3	
			200.0	-52.3	096.5	
			250.0	-50.9	098.3	
			300.0	-48.9	100.4	
			350.0	-47.9	101.8	
			400.0	-46.1	103.5	
			450.0	-44.6	105.1	
			500.0	-43.5	106.2	
			550.0	-42.5	107.3	
			600.0	-40.7	108.8	
			650.0	-38.8	109.4	
			700.0	-37.5	109.9	
			750.0	-36.2	110.6	
			760.0	-36.0	110.8	
**SG-89-40	0+27.3S, 2+12.9W	10004.0	0.0	-55.5	090.0	485.0
			50.0	-55.9	090.0	
			100.0	-53.7	091.4	
			150.0	-50.7	094.1	
			200.0	-47.9	096.7	
			250.0	-44.7	099.6	
			300.0	-41.6	102.9	
			350.0	-38.4	105.7	
			400.0	-36.9	107.4	
			450.0	-35.3	108.9	
			460.0	-35.0	109.2	

DIAMOND DRILL HOLE PARAMETERS FROM THE JULY TO SEPTEMBER, 1989 PROGRAM
SAN GOLD PROPERTY (WEST MINING GRID)

Hole No.	Collar Location	Elevation	Footage	Dip	Azimuth	Length
**SG-89-41	0+74.7S, 1+97.4W	1002.9	0.0	-56.5	090.0	577.0
			50.0	-56.4	089.4	
			100.0	-55.4	088.6	
			150.0	-53.8	090.6	
			200.0	-52.8	091.8	
			250.0	-52.0	092.4	
			300.0	-49.8	094.6	
			350.0	-46.7	097.0	
			400.0	-42.0	100.1	
			450.0	-35.5	104.1	
			500.0	-30.4	108.3	
			550.0	-27.3	110.9	
**SG-89-42	1+22.3S, 1+07.7W	1003.5	0.0	-68.0	090.0	557.0
			50.0	-68.0	091.0	
			100.0	-67.2	092.0	
			150.0	-66.5	092.6	
			200.0	-65.8	093.4	
			250.0	-65.3	094.3	
			300.0	-64.8	095.3	
			350.0	-64.3	095.7	
			400.0	-63.8	096.6	
			450.0	-63.0	097.5	
			500.0	-62.7	098.8	
			540.0	-62.0	099.8	

DIAMOND DRILL HOLE PARAMETERS FROM THE JULY TO SEPTEMBER, 1989 PROGRAM
SAN GOLD PROPERTY (WEST MINING GRID)

Hole No.	Collar Location	Elevation	Footage	Dip	Azimuth	Length
**SG-89-43	0+24.6S, 3+01.1W	9994.8	0.0	-68.0	090.0	857.0
			50.0	-67.7	090.1	
			100.0	-65.6	090.9	
			150.0	-63.4	092.5	
			200.0	-62.6	093.5	
			250.0	-61.1	093.9	
			300.0	-60.1	094.3	
			350.0	-59.8	094.6	
			400.0	-60.1	095.5	
			450.0	-59.7	095.9	
			500.0	-59.1	096.2	
			550.0	-57.7	096.8	
			600.0	-57.5	097.4	
**SG-89-44	1+72.5S, 0+96.2W	10003.1	0.0	-45.0	090.0	267.0
			50.0	-45.3	090.0	
			100.0	-44.6	090.1	
			150.0	-44.4	090.4	
			200.0	-43.8	090.9	
			240.0	-43.0	091.4	

DIAMOND DRILL HOLE PARAMETERS FROM THE JULY TO SEPTEMBER, 1989 PROGRAM
SAN GOLD PROPERTY (WEST MINING GRID)

Hole No.	Collar Location	Elevation	Footage	Dip	Azimuth	Length
**SG-89-45	0+50.0N, 2+66.5W	9999.2	0.0	-57.5	090.0	627.0
			50.0	-57.5	089.7	
			100.0	-55.4	091.2	
			150.0	-54.2	092.8	
			200.0	-52.8	094.2	
			250.0	-51.6	095.6	
			300.0	-50.5	096.6	
			350.0	-48.9	097.7	
			400.0	-47.5	098.6	
			450.0	-46.9	099.0	
			500.0	-46.4	099.5	
			550.0	-45.6	100.1	
			600.0	-44.8	100.9	
			610.0	-44.5	101.1	
**SG-89-46	4+32.7N, 1+04.1W	9997.0	0.0	-44.5	270.0	537.0
			50.0	-45.7	271.4	
			100.0	-45.0	271.4	
			150.0	-42.9	270.7	
			200.0	-39.2	268.1	
			250.0	-35.0	265.7	
			300.0	-32.6	264.2	
			350.0	-30.0	262.6	
			400.0	-27.0	262.6	
			450.0	-24.3	262.4	
			500.0	-22.0	262.0	

DIAMOND DRILL HOLE PARAMETERS FROM THE JULY TO SEPTEMBER, 1989 PROGRAM
SAN GOLD PROPERTY (WEST MINING GRID)

Hole No.	Collar Location	Elevation	Footage	Dip	Azimuth	Length
**SG-89-47	10+24.3N, 0+64.4W	9990.4	0.0	-46.0	225.0	567.0
			50.0	-46.0	224.5	
			100.0	-45.2	223.8	
			150.0	-44.0	223.2	
			200.0	-42.8	222.3	
			250.0	-41.5	221.1	
			300.0	-40.4	219.9	
			350.0	-39.7	218.0	
			400.0	-38.3	215.7	
			450.0	-38.1	214.7	
			470.0	-37.5	214.1	
**SG-89-48	8+90.4N, 2+11.0W	9990.3	0.0	-45.0	225.0	447.0
			50.0	-44.6	224.9	
			100.0	-43.9	223.6	
			150.0	-43.6	222.1	
			200.0	-42.9	221.1	
			250.0	-42.3	220.1	
			300.0	-42.0	219.1	
			350.0	-41.7	218.4	
			400.0	-41.7	217.8	
			420.0	-41.5	217.3	

DIAMOND DRILL HOLE PARAMETERS: FROM THE JULY TO SEPTEMBER, 1989 PROGRAM
SAN GOLD PROPERTY (WEST MINING GRID)

Hole No.	Collar Location	Elevation	Footage	Dip	Azimuth	Length
# SG-89-49	9+77.5N, 0+19.6W	9991.5	0.0	-45.0	225	597.0
			50.0	-45.0		
			100.0	-45.0		
			150.0	-44.0		
			200.0	-42.5		
			250.0	-41.5		
			300.0	-41.0		
			350.0	-39.5		
			400.0	-39.5		
			450.0	-39.5		
			500.0	-39.5		
# SG-89-50	0+74.7S, 1+17.4W	10012.9	0.0	-49.0	088	457.0
			50.0	-49.0		
			100.0	-48.5		
			150.0	-46.5		
			200.0	-46.0		
			250.0	-44.0		
			300.0	-40.0		
			350.0	-38.0		
			400.0	-37.0		
			450.0	-36.5		

DIAMOND DRILL HOLE PARAMETERS FROM THE JULY TO SEPTEMBER, 1989 PROGRAM
SANGOLD PROPERTY (WEST MINING GRID)

Hole No.	Collar Location	Elevation	Footage	Dip	Azimuth	Length
* SG-89-51	0+78.2S, 2+49.0W	10004.1	0.0	-65.0	088	707.0
			50.0	-65.0		
			100.0	-65.0		
			150.0	-64.0		
			200.0	-63.0		
			250.0	-59.0		
			400.0	-52.0		
			550.0	-45.0		
			700.0	-38.0		
* SG-89-52	0+24.6S, 3+01.1W	9994.8	0.0	-62.0	083	657.0
			50.0	-61.0		
			100.0	-60.0		
			150.0	-58.0		
			200.0	-55.0		
			250.0	-54.0		
			300.0	-53.0		
			350.0	-51.5		
			400.0	-49.0		
			450.0	-47.0		
			500.0	-45.0		
			550.0	-41.5		
			600.0	-36.0		
			650.0	-32.0		

DIAMOND DRILL HOLE PARAMETERS FROM THE JULY TO SEPTEMBER, 1989 PROGRAM
SAN GOLD PROPERTY (WEST MINING GRID)

Hole No.	Collar Location	Elevation	Footage	Dip	Azimuth	Length
* SG-89-53	0+61.7N, 3+01.2W	9994.3	0.0	-66.0	083	697.0
			50.0	-65.0		
			100.0	-64.0		
			150.0	-63.0		
			200.0	-62.0		
			250.0	-55.0		
			300.0	-53.0		
			350.0	-49.5		
			400.0	-45.0		
			450.0	-40.0		
			500.0	-35.0		
			550.0	-33.0		
			600.0	-31.0		
			650.0	-30.0		
* SG-89-54	1+71.7N, 2+34.8W	9995.0	0.0	-63.0	085	307.0
			50.0	-63.0		
			100.0	-62.0		
			150.0	-60.0		
			200.0	-58.0		
			250.0	-56.0		
			300.0	-56.0		

DIAMOND DRILL HOLE PARAMETERS FROM THE JULY TO SEPTEMBER, 1989 PROGRAM
SAN GOLD PROPERTY (WEST MINING GRID)

Hole No.	Collar Location	Elevation	Footage	Dip	Azimuth	Length
SG-89-55	2+15.3N, 2+04.1W	9995.9	0.0	-65.0	088	307.0
			100.0	-67.0		
			307.0	-62.0		
SG-89-56	2+64.8N, 2+01.1W	9995.2	0.0	-60.0	088	247.0
			100.0	-62.0		
			247.0	-58.0		
** SG-89-57	0+27.3S, 2+12.9W	10004.0	0.0	-56.0	085.0	467.0
			50.0	-56.1	085.1	
			100.0	-54.6	085.6	
			150.0	-52.9	086.8	
			200.0	-50.9	087.7	
			250.0	-48.7	088.8	
			300.0	-46.6	089.7	
			350.0	-45.9	090.3	
			400.0	-44.6	090.9	
			440.0	-43.5	091.3	
SG-89-58	0+74.8N, 2+00.9W	9998.5	0.0	-70.0	084	607.0
			100.0	-72.0		
			250.0	-66.0		
			400.0	-60.0		
			607.0	-50.0		
SG-89-59	0+20.3N, 2+69.6W	9999.6	0.0	-56.0	084	70.0

DIAMOND DRILL HOLE PARAMETERS FROM THE JULY TO SEPTEMBER, 1989 PROGRAM
SANGOLD PROPERTY (WEST MINING GRID)

Hole No.	Collar Location	Elevation	Footage	Dip	Azimuth	Length
** SG-89-60	0+20.1N, 2+96.0W	9994.7	0.0	-60.0	084.0	497.0
			50.0	-61.2	084.6	
			100.0	-61.3	087.3	
			150.0	-59.4	088.2	
			200.0	-58.2	089.1	
			220.0	-58.0	089.3	
			400.0	-56.0		
SG-89-61	3+15.5N, 2+58.4W	9993.7	0.0	-55.0	084	397.0
			100.0	-57.0		
			250.0	-52.0		
			347.0	-51.0		

- COLLAR LOCATIONS AND ELEVATIONS ARE SURVEYED (WEST MINING GRID)

NO ASTERISK: DIP MEASUREMENTS ARE FROM ACID TESTS AND COLLAR AZIMUTHS ARE FROM SURFACE COMPASS BEARINGS.

* DIP MEASUREMENTS ARE SURVEYED BY A LIGHT-LOG BORE-HOLE INSTRUMENT AND COLLAR AZIMUTHS ARE FROM SURFACE COMPASS BEARINGS.

** DIP MEASUREMENTS AND AZIMUTH MEASUREMENTS ARE SURVEYED BY A LIGHT-LOG BORE-HOLE INSTRUMENT.

APPENDIX 3

SIGNIFICANT GOLD DDH INTERSECTIONS FROM THE JULY TO SEPTEMBER, 1989 PROGRAM
SAN GOLD PROPERTY (S135 ZONE - EAST GRID)

Hole No.	Sample No.	Footage	Length (feet)	Grade (oz/to
S135-01	30866	44.1 - 45.4	1.3	0.046
	30872	145.5 - 147.5	2.0	0.063
	39912	159.0 - 160.6	1.6	0.036
S135-02	39930	49.0 - 50.2	1.2	0.362
	39934	75.0 - 77.0	2.0	0.037
	39940	84.7 - 86.6	1.9	0.043
	39941	86.6 - 87.5	0.9	0.345
	39942	87.5 - 89.4	1.9	0.112
	39944	119.5 - 121.0	1.5	0.088
	39945	121.0 - 122.0	1.0	0.096
	43122	195.0 - 197.0	2.0	0.026
S135-03	39952	25.5 - 27.4	1.9	0.056
	39961	123.0 - 124.7	1.7	0.027 *
	39962	124.7 - 126.2	1.5	0.049
S135-04	39965	65.4 - 67.8	2.4	0.025 *
	39966	67.8 - 68.8	1.0	0.064
	39970	84.5 - 87.0	2.5	0.230
	43137	88.4 - 90.4	2.0	0.186
	43143	197.0 - 198.5	1.5	0.030
S135-05	39981	81.4 - 82.5	1.2	0.150
	39983	84.5 - 85.5	1.0	0.110
S135-06	39973	168.3 - 170.1	1.8	0.321
	39977	175.0 - 176.2	1.2	0.066
	39978	176.2 - 177.7	1.5	0.030 *
S135-07	NONE			
S135-08	17931	147.0 - 148.0	1.0	0.110

Total significant assays (≥ 0.025 oz Au/ton): 25

SIGNIFICANT GOLD DDH INTERSECTIONS FROM THE JULY TO SEPTEMBER, 1989 PROGRAM
SANGOLD PROPERTY (WEST GRID)

Hole No.	Sample No.	Footage	Length (feet)	Grade (oz/ton)
SG-89-35	28057	261.5 - 262.7	1.2	0.074
	28066	317.8 - 319.2	1.4	0.030 *
	28067	319.2 - 322.3	3.1	0.154
	28069	325.3 - 327.0	1.7	0.066
	28072	331.5 - 332.5	1.0	0.035
	28075	340.7 - 341.7	1.0	0.076
	28082	369.0 - 371.5	2.5	0.028 *
	28091	404.0 - 406.0	2.0	0.045
SG-89-36	28110	329.0 - 332.0	3.0	0.046
	28113	335.5 - 337.0	1.5	0.041
	28114	337.0 - 340.7	3.7	0.117
SG-89-37	28134	176.0 - 177.5	1.5	0.032
	28151	277.6 - 280.6	3.0	0.199
	28152	280.6 - 282.3	1.7	0.094
	28153	282.3 - 285.3	3.0	0.030 *
	28154	285.3 - 288.3	3.0	0.036
SG-89-38A	28178	197.0 - 198.0	1.0	0.040
	28180	210.6 - 213.6	3.0	0.088
	28181	213.6 - 215.5	1.9	0.034
	28186	224.5 - 226.0	1.5	0.030
	28193	707.9 - 710.5	2.6	0.031
	28194	710.5 - 711.5	1.0	0.044
	28197	717.0 - 720.0	3.0	0.049
	28198	720.0 - 721.5	1.5	0.080
SG-89-38B	28223	228.7 - 231.7	3.0	0.116
	28224	231.7 - 234.7	3.0	0.027
	28249	531.0 - 533.5	2.5	0.515
	28261	657.0 - 660.0	3.0	0.048
SG-89-39	28296	419.0 - 420.8	1.8	0.025
	28304	438.3 - 440.2	1.9	0.043
	28315	493.7 - 495.3	1.6	0.070
	28318	500.9 - 502.5	1.6	0.040
	28319	502.5 - 505.0	2.5	0.042
	28320	505.0 - 506.2	1.2	0.038
	28321	506.2 - 508.0	1.8	0.110

SIGNIFICANT GOLD DDH INTERSECTIONS FROM THE JULY TO SEPTEMBER, 1989 PROGRAM
SANGOLD PROPERTY (WEST GRID)

Hole No.	Sample No.	Footage	Length (feet)	Grade (oz/to.
SG-89-40	28354	406.7 - 409.2	2.5	0.354
	28355	409.2 - 411.5	2.3	0.076
	43514	415.5 - 417.0	1.5	0.061
SG-89-41	28367	406.3 - 408.9	2.6	0.030
SG-89-42	28388	449.9 - 450.9	1.0	0.042
	28393	486.5 - 488.0	1.5	0.031 *
SG-89-43	28404	69.3 - 70.9	1.6	0.025 **
	28431	537.0 - 538.4	1.4	0.030
	43995	787.0 - 790.0	3.0	0.026 **
	43996	790.0 - 793.0	3.0	0.028 **
	43999	810.4 - 811.4	1.4	0.150
	30933	815.6 - 817.7	2.1	0.039
SG-89-44	28455	221.3 - 223.8	2.5	0.044
SG-89-45	28472	257.9 - 259.8	1.9	0.092
	28477	288.0 - 290.5	2.5	0.036 *
	28561	425.0 - 427.5	2.5	0.032 *
	28567	468.5 - 469.5	1.0	0.026
	28568	469.5 - 470.6	1.1	0.356
	28569	470.6 - 471.9	1.3	0.031
	28587	514.5 - 517.0	2.5	0.029
	28594	529.0 - 530.0	1.0	0.064
	28607	553.0 - 554.5	1.5	0.028 **
	28611	561.8 - 564.0	2.2	0.050
SG-89-46	30834	474.7 - 475.7	1.0	0.031
SG-89-47	30840	432.1 - 433.6	1.5	0.049
	30845	440.0 - 441.5	1.5	0.331
	30851	451.1 - 453.1	2.0	0.027
	43046	477.0 - 479.5	2.5	0.028
SG-89-48	43115	394.0 - 396.8	2.8	0.028
	43117	408.2 - 409.2	1.0	0.031
SG-89-49	NONE			

SIGNIFICANT GOLD DDH INTERSECTIONS FROM THE JULY TO SEPTEMBER, 1989 PROGRAM
SANGOLD PROPERTY (WEST GRID)

Hole No.	Sample No.	Footage	Length (feet)	Grade Oz/Ton
SG-89-50	43889	295.0 - 298.0	3.0	0.038
	43890	298.0 - 300.0	2.0	0.028 **
	43 891	303.0 - 305.0	2.0	0.034
	43 212	326.3 - 327.3	1.0	0.040
	43 214	328.8 - 331.3	2.5	0.027 **
	43216	332.5 - 333.5	1.0	0.078
	43217	333.5 - 335.0	1.5	0.044
	43222	346.0 - 347.0	1.0	0.506
	43223	347.0 - 350.0	3.0	0.550
SG-89-51	NONE			
SG-89-52	43269	552.9 - 554.7	1.8	0.030 *
	43270	554.7 - 555.6	0.9	0.104
	43271	555.6 - 557.3	1.7	0.066
	43272	557.3 - 558.3	1.0	1.972
	43274	560.8 - 562.9	2.1	0.044
	43277	567.3 - 568.4	1.1	0.230
	43279	569.6 - 571.9	2.3	0.084
	43901	642.5 - 645.5	3.0	0.044
SG-89-53	43372	128.6 - 129.6	1.0	0.286
	43285	204.1 - 206.2	2.1	0.029 **
	43296	397.2 - 399.2	2.0	0.048
	43297	399.2 - 401.2	2.0	0.175
	43300	403.4 - 405.2	1.8	0.043
	43303	441.6 - 442.6	1.0	0.740
	43554	468.0 - 471.0	3.0	0.055
	43412	494.0 - 495.5	1.5	0.028 *
SG-89-54	43347	156.0 - 159.0	3.0	0.070
	43357	279.0 - 281.0	2.0	0.026 **
SG-89-55	NONE			

SIGNIFICANT GOLD DDH INTERSECTIONS FROM THE JULY TO SEPTEMBER, 1989 PROGRAM
SANGOLD PROPERTY (WEST GRID)

Hole No.	Sample No.	Footage	Length (feet)	Grade (oz/ton)
SG-89-56	43381	117.9 - 119.0	1.1	0.152
	43383	120.0 - 121.0	1.0	0.162
	43384	121.0 - 122.5	1.5	0.104
	43385	122.5 - 124.0	1.5	0.066
	43387	126.5 - 127.5	1.0	0.158
	43388	190.1 - 191.7	1.6	0.062
	43389	191.7 - 193.0	1.3	0.032
	43390	193.0 - 196.0	3.0	0.050
	43391	196.0 - 199.0	3.0	0.110
	43392	199.0 - 200.5	1.5	0.096
	43393	200.5 - 201.5	1.0	0.066
	43394	201.5 - 204.5	3.0	0.048
	43396	205.5 - 207.0	1.5	0.046
SG-89-57	43461	343.9 - 346.4	2.5	0.026 **
	43463	349.5 - 351.5	2.0	0.057
	43465	353.3 - 356.0	2.7	0.025 **
	43466	389.5 - 391.5	2.0	0.028 **
	43471	413.8 - 415.8	2.0	0.121
	43478	427.9 - 429.6	1.7	0.352
	43479	429.6 - 432.6	3.0	0.084
SG-89-58	43955	529.6 - 532.0	2.4	0.032
	43959	546.5 - 548.8	2.3	0.042
	43961	550.3 - 552.4	2.1	0.338
	43963	553.5 - 556.1	2.6	0.039
	43972	577.0 - 578.0	1.0	0.266
	43973	578.0 - 579.3	1.3	0.130
	43976	582.8 - 584.1	1.3	0.031 **
	43977	584.1 - 585.1	1.0	0.150
SG-89-59	NO SAMPLES TAKEN - HOLE ABANDONED IN OVERBURDEN.			
SG-89-60	6381	77.9 - 80.0	2.1	0.033 **
	6392	166.7 - 167.7	1.0	0.040

SIGNIFICANT GOLD DDH INTERSECTIONS FROM THE JULY TO SEPTEMBER, 1989 PROGRAM
SANGOLD PROPERTY (WEST GRID)

Hole No.	Sample No.	Footage	Length (feet)	Grade (oz/ton)
SG-89-61	43495	148.0 - 149.0	1.0	0.026
	43496	149.0 - 151.0	2.0	0.252
	44855	191.3 - 193.1	1.8	0.048
	44857	194.8 - 196.1	1.3	0.030 *
	44866	219.7 - 220.8	1.1	0.440
	44868	223.8 - 226.8	3.0	0.025 **
	44873	267.2 - 269.7	2.5	0.142
	44874	269.7 - 272.2	2.5	0.126
	44876	274.4 - 277.4	3.0	0.068
	44878	280.8 - 283.5	2.7	0.160
	44879	283.5 - 286.0	2.5	0.096
	44882	310.2 - 311.5	1.3	0.086

Total significant assays ($\geq$ 0.025 oz Au/ton): 133

* Grade represents conversion of ppb Au (From Atomic Absorption method) to oz Au/Ton. Corresponding Fire Assay values are below 0.025 oz Au/ton.

** Grade represents conversion of ppb Au (from Atomic Absorption method) to oz Au/Ton. No corresponding Fire Assay values exist for these samples.

All other assays represent Fire Assays values in oz Au/ton.

APPENDIX 4

Frank H. Toews B.Sc., F.G.A.C.

Marshall Minerals Corp. - DIAMOND DRILL RECORD

Property name: SANGOLD
Hole No. : S135-5
Location : 0+~~92~~S 2+00E (EAST TRAVERSE GRID) Length: 497.0'
Elevation: +14.5 (REL. TO S135-1) Azimuth: ~~240~~ 008 Dip: -45.0
Started : Aug. 19, 1989 Finished: Aug. 20, 1989

Acid dip tests			
Footage	Dip	Footage	Dip
100'	-45.0	497' ±	-29
250'	-38.0		
400'	-28.0		

Remarks: BQ core. Part of core split prior to logging.

Logged by: F.H. Toews

Footage From	To	Description	Sample No.	% Sulphides	From	To	Total	Assays (Au) ppb	Oz/tn	Re
0	10.0'	Casing								
10.0'	112.5'	FELSIC VOLCANIC Medium to light grey, fine grained, often sericitic, moderately soft to moderately hard. Locally reacts to HCl in oxidized zones (water seams) which are more prevalent down to about 39.0'. Rocks are foliated to moderately foliated at 25-45 deg. to C. A. Most of the rocks have a mottled appearance with elongate lighter grey spots and lenses (1/8-1.0") oriented parallel to foliation (due to cataclasis?). Variable quartz-carbonate +/- Py +/- chlorite vein content from less than 1/2% to locally 50%. Veins vary from 1/8" to 0.8' wide and are oriented at subparallel to cross cutting the foliation. Sulphide content varies from trace to locally 20% over 2.0" and consists of disseminated to clusters of cubic Py up to 1/8" in size and galena occasionally visible in quartz veining. Occasional chloritic fragments less than 1.0" in size present in host rocks.									

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Hole No.: S135-5 Sheet 2 of 1

Footage From	To	Description	Sample No.	% Sulphides	From	To	Total	Assays (Au) ppb	Oz/tn	Re
		10.0′ - 17.0′ Approximately 2.0′ lost core, minor veining.								
		17.0′ - 18.6′ 10-15% veins at 30-15 deg. to C. A. Veins 1.0-1/8" wide, locally oxidized, mainly subparallel to foliation at 35 deg. to C. A.	43226	Trace Py	17.0	18.7	1.7′	10		
			43227		18.7	19.7	1.0′	Nil		
		19.7′ - 20.8′ 15% veins at 5-35 deg. to C. A. Veins 1/8-1.0" wide, locally oxidized, foliation at 35-15 deg. to C. A.	43228	Trace Py	19.7	20.8	1.1′	Nil		
		21.3′ - 23.3′ Strongly to moderately oxidized Felsic Volcanic (water seams), broken core, 1.0' lost core, foliation at 25-30 deg. to C. A.	43229		20.8	24.0	3.2′	Nil		
			43230		32.0	33.6	1.6′	10		
		33.6′ - 35.3′ 15% veins at 10-20 deg. to C. A. Veins 1/4 to 1.0" wide, foliation at 25-35 deg. to C. A., possible minor galena.	43231	Tr Gn ?	33.6	35.3	1.7′	40		
		35.3′ - 37.0′ Broken oxidized core. Less than 1.0′ lost core, 1/4" quartz-carbonate vein.	43232		35.3	37.0	1.7′	30		
		37.0′ - 47.2′ 10-15% veins at 15-35 deg. to C. A. 1/8-1.0" wide. Locally minor Py and up to 1% galena visible, foliation at 25-30 deg. to C. A.	43233	Trace Py	37.0	39.0	2.0′	10		
			43234	<1/2% Gn	39.0	40.6	1.6′	20		
			43235	Trace Py	40.6	42.6	2.0′	10		
			43236	Trace Py	42.6	45.0	2.4′	120		
		49.8′ - 50.6′ Oxidized water seam at 10 deg. to C. A.	43237	<1/2% Gn, Py	45.0	47.2	2.2′	50		
		51.6′ - 52.0′ 40% veins at 20-30 deg. to C. A., 2.0-3.0" wide, subparallel foliation.	43238		47.2	49.4	2.2′	Nil		
			43239		49.4	51.6	2.2′	Nil		
			43240	Trace Py	51.6	53.0	1.4′	10		
		55.0′ - 57.0′ 10% contorted veins, 1/8-1/2" wide, subparallel to cross cutting foliation at 30-35 deg. to C. A.	43241		53.0	55.0	2.0′	10		
			43242	Trace Py	55.0	57.0	2.0′	40		
		57.0′ - 79.9′ Felsic Volcanic with 1-2% veins, 1/8-1/2"								

Footage From	To	Description	Sample No.	% Sulphides	From	To	Total	Assays (Au) ppb	Oz/tn	Re
		wide, at subparallel to 35 deg. to C. A. Foliation at 30-35 deg. to C. A. Nil to locally 1/2% Py. Occasional water seam with local oxidization. (Note: core previously split from 78.4' - 86.9')	39979	Trace Py	78.4	79.9	1.5'	90		
		79.9' - 81.4' 20% veins up to 2.0" wide(?) with locally 5-10% Py and minor galena, local strong sericitization.	39980	2% Py,Gn	79.9	81.4	1.5'	480		
		81.4' - 82.6' 80% veins with locally 20% Py.	39981	5-10% Py	81.4	82.6	1.2'	5140	0.150	
		82.6' - 84.5' 50% veins with locally possible tourmaline veinlet, less than 1% Py.	39982	< 1%Py	82.6	84.5	1.9'	190		
		84.5' - 85.5' 70% veins with locally 20% Py, local strong sericitization.	39983	5-10% Py	84.5	85.5	1.0'	3980	0.110	
		85.5' - 86.9' 3% veins, trace to 1% Py.	39984	1/2% Py	85.5	86.9	1.4'	70		
		87.2' - 88.4' 10% veins at 15-25 deg. to C. A. Veins 1/4 to 1.0" wide, foliation about 25 deg. to C. A., rocks hard, silicified.	43243	1/2% Py	86.9	88.4	1.5'	Nil		
			43244	Nil	88.4	90.8	2.4'	80		
		90.9' - 91.8' 1.0" vein at 10 deg. to C. A. with minor Py and galena?, foliation at 25-45 deg. to C. A.	43245	Up to 1/2% Py,Gn	90.8	91.9	1.1'	100		
		92.0' - 93.9' 5% veins.	43246		91.9	93.9	2.0'	Nil		
			43247	<1/2% Py	93.9	96.4	1.5'	Nil		
		96.5' - 98.5' 15% veins, 1/8-1/2" wide, contorted at 0-15 deg. to C. A. Local oxidization, foliation at 35-10 deg. to C. A.	43248	Up to 1% Py	96.4	98.5	2.1'	30		

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Footage From	To	Description	Sample No.	% Sulphides	From	To	Total	Assays (Au) ppb	Oz/tn	Re
		98.5' - 101.5' 2-3% veins at 10-20 deg. to C. A., minor Py, foliation at 35-40 deg. to C. A.	43249	<1/2% Py	98.5	101.5	3.0'	Nil		
		104.9' - 105.5' ALTERED DYKE - Pale greenish, fine grained, epidotized (and sericitized?) groundmass with 2-3% chlorite spots (up to 1/8" size) Contacts sharp at 25-30 deg. to C. A. with up to 1/4" wide dyke gashes 0.1' away from contacts. Host rocks bleached, sericitized. Dyke has weak foliation parallel to contacts. Minor Py in dyke and host rocks.								
		106.0' - 112.5' OXIDIZED ZONE and FAULT in Felsic Volcanics foliated at mainly 40-50 deg. Chlorite (+/- vuggy quartz) seams often parallel foliation and are locally anastamosing brecciated host rock which appears cataclastic in part. Occasional 1/8" quartz vein. 107.5' - 109.7' Broken core, vuggy parts, brecciated around 108.0', soft, sericitic and partly talcose(?). 110.0' - 111.5' Up to 1% Py cubes, up to 1/8" size.	43250	Up to 1% Py	110.0	112.5	2.5'	Nil		
		111.5' - 112.5' Bleached, silicified,								

Footage From	To	Description	Sample No.	% Sulphides	From	To	Total	Assays (Au) ppb	Oz/tn	Re
		brecciated and well foliated parallel to dyke contact at 15 deg. near the dyke. Rocks probably sericitic as well.								
112.5'	117.5'	INTERMEDIATE DYKE Medium to darker grey, fine to medium grained, chloritic, locally carbonatized where oxidized, weakly foliated to massive. 15-20% quartz-carbonate +/- chlorite veins locally appear brecciated. Veins 1/4-3/4" wide mainly, oriented at 15-75 deg. to C. A. 1/2-1% Py in veins and host rocks. Contact at 117.5' at 45 deg. to C. A.								
		112.5' - 113.3' Oxidized, carbonatized, (water seams), vuggy, chlorite spotting.	43251	Up to 1% Py	112.5	115.6	3.1'	Nil		
		114.2' - 114.8' Brecciated vein with wall rock inclusions. Vein contacts at 75 and 20-25 deg. to C. A.								
		115.0' - 115.6' Oxidized, carbonatized, (water seams), vuggy.	43252	< 1% Py	115.6	117.6	1.9'	Nil		

Marshall Minerals Corp. - DIAMOND DRILL RECORD

Footage From	To	Description	Sample No.	% Sulphides	From	To	Total	Assays (Au) ppb	Oz/tn	Re
117.5'	138.0'	ARGILLITE Medium to dark grey to black, very fine to fine grained, laminated to thin bedded (less than 0.5') with black chlorite rich beds interbedded with grey more siliceous beds. Bedding oriented at 50-25 deg. to C. A., occasionally paralleled by less than 1/8" wide quartz-carbonate veinlets and lenses which alse cross cut bedding obliquely. Rocks are generally moderately hard to soft with patchy carbonatization of the grey beds. Scattered disseminated cubic Py (up to 1/8") sometimes alligned parallel to bedding. Trace to locally 3% Py. Lower contact is gradational. Black beds locally graphitic on slips (several down to about 134.0'). Local microfaulting.								
		117.5' - 118.5' Sericitic, pale greenish beds, sheared near dyke parallel to bedding at 45-50 deg. to C. A.	43253	1-2% Py	117.5	120.5	3.0'	Nil		
			43254	Up to 1% Py	120.5	123.5	3.0'	Nil		
		134.0' - 138.0' More massive with 5%(+/-) laminated beds at 20-25 deg. to C. A. Rocks medium to light grey, more siliceous. Moderately hard to soft. Contact placed at laminated, moderately soft beds at 20 deg. to C. A.								

Footage From	To	Description	Sample No.	% Sulphides	From	To	Total	Assays (Au) ppb	Oz/tn	Re
138.0'	141.8'	FELSIC VOLCANIC (Cherty? or Silicified?) Medium to light grey, very fine grained, cherty looking, siliceous, sometimes very hard (silicified?) with somewhat softer parts (carbonatized). 2-3% darker beds (up to 1/8"), occasionally chloritic, which are partly deformed at 15-25 deg. and some at 35 deg. to C. A. Parts cut by darker, subparallel to anastamosing fracture fillings. Eight late milky quartz-carbonate veinlets (up to 1/8") and gashes at 30-40 deg. to C. A. oblique to subparallel to bedding. Rocks locally carbonatized, trace to locally 1% cubic Py. Contact in broken core.	43255	<1% Py	139.7	141.7	2.0'	Nil		
141.8'	200.3'	ALTERED FELSIC VOLCANIC and INTERMEDIATE DYKES Volcanics: Generally fine grained, light to medium grey often with a greenish cast (due to sericite). 5-20% pale greenish to yellowish sericite seams (1/32-1/2" wide) at 35-50 deg. to C. A. imparting a foliation to the host rocks (locally beige to light grey silicification follows the seams). Rocks are generally hard, siliceous to moderate-								

Footage From	To	Description	Sample No.	% Sulphides	From	To	Total	Assays (Au) ppb	Oz/tn	Re
		ly hard with patchy silification and carbonatization throughout. Sericitization locally strong.								
		2% quartz-carbonate veins (1/8-1/2") scattered throughout parallel to and oblique to foliation.								
		Trace to locally 1% cubic Py disseminated.								
		Dykes: Between 145.4' - 174.1', 0.1-3.5' widths.								
		Intermediate, medium grey to greenish grey, fine to medium grained, locally foliated, locally reacts to HCl but often speckled with iron carbonate(?), chlorite spotting.								
		Contacts sharp, oriented at parallel to subparallel to foliation in host rocks.								
		Occasionally dykes contain host rock inclusions(?) of host rock showing transgressive contact relations.								
		Trace to 1% disseminated Py in dykes.								
		Occasionally dykes cut by quartz-carbonate (+/- Py) veins, 1/16 to 1/2" wide.								
		141.7' - 144.0' Mainly medium to dark grey, foliated at 40-45 deg. to C. A., moderately hard, sericitized, carbonatized Felsic Volcanic. Possibly locally fragmental. 1% disseminated Py. Gradational contact.	43256	1% Py	141.7	144.0	2.3'	10		

Marshall Minerals Corp. - DIAMOND DRILL RECORD

Footage From	To	Description	Sample No.	% Sulphides	From	To	Total	Assays (Au) ppb	Oz/tn	Re
		144.0′ - 145.4′ Foliated at 45-50 deg. to C. A., hard, silicified, sericitic (+ epidote?) Felsic Volcanic with several grey bands. Up to 1% Py.	43257	< 1% Py	144.0	145.4	1.4′	10		
		145.4′ - 147.5′ Dyke - Contacts at about 50 deg. to C. A. Lower contact ragged with fragments of host rock. Trace to 1/2% Py.	43258	<1/2% Py	145.4	147.5	2.1′	Nil		
		147.5′ - 149.0′ Similar to 144.0′ - 145.4′. 1% Py.	43259	1% Py	147.5	149.0	1.5′	10		
		149.0′ - 151.6′ Light grey to bleached, silicified, partly cherty looking Felsic Volcanic with sericitic (+/- silicification) seams at 45-50 deg. to C. A. with 1.0' dyke (quartz margins) and 0.2′ dyke at about 45-50 deg. to C. A. 1% Py.	43260	1% Py	149.0	151.6	1.6′	Nil		
		151.6′ - 155.1′ Dyke with cherty (bedded), silicified, bleached inclusions (up to 0.6′) at 45 deg. to C. A. from 152.5′ to 153.6′. Less than 1% Py in all rocks. Contacts at 45-50 deg. to C. A.								
		155.1′ - 158.0′ Silicified, plus bleaching, sericite seams at 50 deg. to C. A., trace to 1/2% Py, gradational.								
		161.6′ - 162.5′ Three 1/4-1/2' wide quartz-carbonate +/- chlorite veins at 60-70 deg. to C. A.								
		165.7′ - 166.8′ Beige silification veins parallel to and cross cutting sericite seams at 50 deg. to C. A. Host rocks silicified near dyke.	43261	Up to 1% Py	165.8	167.0	1.2′	Nil		

Marshall Minerals Corp. - DIAMOND DRILL RECORD

Footage From	To	Description	Sample No.	% Sulphides	From	To	Total	Assays (Au) ppb	Oz/tn	Re
		Less than 1% Py.								
166.8'	168.2'	Dyke - moderately foliated at 35-40 deg. to C. A., subparallel to contacts at 30 and 40 deg. to C. A. Upper contact cut by beige silification veinlet, lower contact ragged with inclusions.	43262	Trace Py	167.0	168.2	1.2'	Nil		
168.2'	171.9'	Similar to 165.7' - 166.8', more brecciation near 168.4'.	43263	Up to 1% Py	168.2	169.9	1.7'	Nil		
		169.5' Quartz-carbonate veinlet cuts beige silification.	43264	1% Py	169.9	171.9	2.0'	Nil		
		Up to 1% disseminated Py.								
171.9'	174.0'	Dyke - contacts at 55 and 40 deg. to C. A. Weak foliation at about 50 deg. to C. A.	43265	1% Py	171.9	174.0	2.1'	Nil		
		1% Py.								
		172.4' - 173.6' 15% quartz-carbonate veins cross cutting and subparallel to foliation. Veins partly patchy.								
174.0'	174.3'	Silification, 1% Py.	43266	Up to 1% Py	174.0	175.0	1.0'	Nil		
179.5'	184.5'	Sections with shearing, brecciation and quartz-carbonate veining (1/8-1/2") at 30-60 deg. to C. A. 5% veins.	43267	Trace Py	182.0	184.0	2.0'	Nil		
197.0'	198.6'	3% quartz-carbonate veinlets (oblique to foliation) at 35 deg. to C. A.	43305	< 1% Py	197.0	199.1	2.1'	Nil		
198.6'	199.1'	Broken core. Lost core.								

Footage From	To	Description	Sample No.	% Sulphides	From	To	Total	Assays (Au) ppb	Oz/tn	Re
		199.1' Quartz-carbonate vein, 2.0' wide, partly vuggy at 35 deg. to C. A. Contact with broken core oxidized (water seam). 2% Py in vein.	43306	< 1% Py	199.1	200.1	1.0'	Nil		
		199.9' Deformed quartz-carbonate, shearing parallel to foliation at 45-50 deg. to C. A.								
200.3'	278.7'	INTERCALATED FELSIC VOLCANICS and ARGILLITE with FAULTS								
		Volcanics: Light to medium grey to slightly greenish, fine grained, moderately to weakly foliated at 35-55 deg. to C. A., minor Py.								
		Rocks siliceous and with patchy carbonatization and sericitization, parts with thin chloritic argillaceous partings.								
		Generally less than 2% quartz-carbonate veins and gashes up to 1/4' wide.								
		Argillite: Black to medium grey, laminated to thin bedded at 35-60 deg. to C. A., very fine to fine grained, chloritic, locally graphitic, parts deformed								
		Less than 2% quartz-carbonate veins and gashes, locally 2% cubic Py, patchy carbonatization.								
		200.3' - 210.5' Argillaceous, partings and beds at 40-60 deg. to C. A., mainly medium grey.								
		210.5' - 211.1' Predominantly black, chloritic and GRAPH-	43307	< 2% Py	210.1	211.1	1.0'	10		

Marshall Minerals Corp. - DIAMOND DRILL RECORD

Footage From	To	Description	Sample No.	% Sulphides	From	To	Total	Assays (Au) ppb	Oz/tn	Re
		ITIC. Bedding deformed in upper part at 60-65 deg. to C. A., brecciation in lower 0.2', partly vuggy. Lower contact at about 55 deg. to C. A. 2% Py.	NR							
		Possible fault zone (competent core).	43308	≤ 1% Py	211.1	213.0	1.9'	NIL		
211.1'	215.6'	Felsic Volcanic. Medium grey to greenish, carbonatized. Mainly oxidized patches due to water seams.	43309	1% Py	213.0	215.6	2.6'	Nil		
		Microbrecciated near uper contact and often cut by irregular to more uniform anastamosing fractures filled with chlorite.								
		Locally weakly foliated at about 25 deg. to C. A. Up to 1% cubic Py disseminated.								
		215.6'- Contact in broken core, but may be about 55 deg. to C. A.								
215.6'	219.9'	Black argillite with thin disrupted to contorted beds and laminations, GRAPHITIC.	43310		215.6	217.0	1.4'	Nil		
			43311		217.0	219.9	2.9'	Nil		
		Bedding at about 50-55 deg. to C. A. 1% carbonate veins less than 1/4" wide, often parallel to bedding, some deformed and contain up to 15% Py.								
		Rocks partly brecciated, much broken core. POSSIBLE FAULT ZONE. Lost core.								

Footage From	To	Description	Sample No.	% Sulphides	From	To	Total	Assays (Au) ppb	Oz/tn	Re
		219.9' - 228.6' Felsic Volcanics. Greenish, siliceous, sericitic, weakly to moderately foliated at 25-45 deg. to C. A. Up to 1% Py. Occasional quartz-carbonate vein less than 1/4". Grey, brecciated in last foot. 228.6'- Contact at 50 deg. to C. A.								
		228.6' - 229.5' Deformed to brecciated black argillite. Up to 1% Py, 5% deformed quartz-carbonate veins.								
		229.5' - 278.7' Mainly grey to black, locally graphitic, argillite. Partings and bedding at 45-60 deg. to C. A., locally deformed. Locally carbonatized, scattered Py.								
		241.4' - 243.5' Oxidized, water seam.								
		245.0' - 247.0' No core recovery.								
		248.3' - 248.8' 10% deformed quartz-carbonate veins up to 1/4" at 35-45 deg. to C. A. 1% Py	43312	1% Py	247.5	249.0	1.5'	Nil		
		264.6' - 265.6' Intermediate Dyke. Bleached, partly silicified host rocks. Contacts at 40 and 55 deg. to C. A.								
		267.5' - 270.5' 2% clusters of Py, occasional quartz-carbonate vein up to	43313	2% Py	267.5	270.5	3.0'	10		

Footage From	To	Description	Sample No.	% Sulphides	From	To	Total	Assays (Au) ppb	Oz/tn	Re
		3/8", locally deformed argillite.								
		273.0'- 1.0' calcite vein at 55-60 deg. to C. A.								
		276.6' - 278.7' Foliated to brecciated and crenulated argillite. Bedding-foliation at about 40-55 deg. to C. A., some graphitic slips parallel to foliation.	43314	1-2% Py	276.6	278.7	2.1'	10		
		1-2% Py clusters and cubes. Several quartz-carbonate veins and gashes subparallel to foliation.								
		278.7'- Contact at 55 deg. to C. A.								
278.7'	497.0'	FELSIC VOLCANICS								
		Pale yellowish to greenish grey, fine grained, well foliated at 45-50 deg. to C. A., moderately soft to soft, sericitic, locally silicified and carbonatized, tuffs and lapilli tuffs (fragments 1/4-3.0"), possibly brecciated.								
		10-50% yellowish sericite seams and threads mainly parallel to the foliation, locally cross cutting the foliation.								
		5% Py cubes, clusters and disseminations. Nil to locally 10-20% quartz-carbonate veins, patches, both parallel to and cross cutting the foliation orientation (some veins cut and deformed by the filiation). Veins 1/8-2.0" wide.								
		Some parts appear cataclastic, medium to coarse grained								

Marshall Minerals Corp. - DIAMOND DRILL RECORD

Footage From	To	Description	Sample No.	% Sulphides	From	To	Total	Assays (Au) ppb	Oz/tn	Re
		grey matrix.								
		278.7' - 279.6' Darker greenish grey, brecciated to sheared, with chloritic matrix and foliation planes at 55 deg. to C. A.	43315	1% Py	278.7	279.7	2.0'	Nil		
			43316	Up to 1% Py	279.7	282.7	3.0'	10		
		Less than 1-2% Py. Sharp colour change at 279.6' parallel to foliation.								
		284.7' 2.0-3.0" quartz-carbonate vein (oblique to foliation) at about 45 deg. to C. A. Some chlorite patches.								
		297.0' - 300.0' 5% quartz-carbonate veins, patches parallel to foliation. Up to 2% Py in and near veins. One vein vuggy and folded at 299.5'.	43317	Up to 2% Py	297.0	300.0	3.0'	Nil		
		307.0' - 308.5' 3% Py clusters and cubes, some aligned parallel to foliation.	43318	3% Py	307.0	308.5	1.5'	Nil		
			43319	< 1% Py	308.5	310.7	1.2'	Nil		
		310.7' - 311.7' 20% quartz-carbonate veins 1/8-2.0" wide.	43320	2% Py	310.7	311.7	1.0'	Nil		
		364.0' - 366.2' 10-15% quartz-carbonate veins 1/8-1.5" wide. Up to 1% disseminated Py in host host rocks.	43321	Up to 1% Py	364.0	367.0	3.0'	Nil		
		373.0' Water seam 0.6' wide, oxidation.								
		376.7' - 377.7' Water seam, vuggy, oxidation.								
		394.8' - 467.0' Generally more siliceous, hard, medium to coarse grained, greenish grey, matrix more massive to cataclastic(?) in appearance.								

Marshall Minerals Corp. - DIAMOND DRILL RECORD

Footage From	To	Description	Sample No.	% Sulphides	From	To	Total	Assays (Au) ppb	Oz/tn	Re
		Sericitic threads and seams at 50-60 deg. to C. A. Trace to 1% Py.								
		399.2' - 402.0' Three 1.0-2.0" wide quartz-carbonate veins at 45-60 deg. to C. A. subparallel to foliation. Up to 2% Py in veins.	43322	Up to 1% Py	399.0	402.0	3.0'	Nil		
		442.9' - 443.5' 3/8" wide irregular quartz-carbonate(?) vein at 0-35 deg. to C. A. with minor Py dissemination.	43323	< 1% Py	442.8	443.8	1.0'	Nil		
		443.8' - 487.0' Somewhat softer matrix.								
		462.0' - 463.3' Water seams, oxidized. Seams at 25-30 deg. to C. A. Minor Py in host rocks.	43324	< 1% Py	461.0	464.0	3.0'	Nil		
		467.0' - 497.0' Somewhat similar to 443.8' - 467.0' but more fine grained material present.								
		479.6' - 480.4' Water seam, oxidized. Seam at about 15 deg. to C. A.								
		486.5' - 487.2' Water seam, oxidized. Seam at 25 deg. to C. A.								
		488.2' - 488.8' Water seam, oxidized. Seam at 30 deg. to C. A.	43325	< 1/2% Py	490.0	493.0	3.0'	Nil		
		493.1' - 494.0' 3/8-1.0" quartz-carbonate veins at 30-60 deg. to C. A.	43326	< 1/2% Py	493.0	494.0	1.0'	Nil		
		Trace Py, wall rocks silicified.	43327	< 1/2% Py	494.0	497.0	3.0'	Nil		
	497.0'	END OF HOLE								

APPENDIX 5

Swastika Laboratories

A Division of Assayers Corporation Ltd.

Established 1928

Assaying - Consulting - Representation

Certificate of Analysis

Certificate No. 75979 Date Aug. 25, 1989

Received Aug. 23, 1989 6 Core Samples

Submitted by Marshall Minerals Inc., Niagara Falls, Ontario.

Proj. #Sangold File #92-0733 ATTENTION: J. Hinzer

S135-6

SAMPLE NO.	GOLD PPB	GOLD Oz/ton	GOLD g/t
39979	90	---	---
39980	480	---	---
39981	5140	0.150	5.14
39982	190	---	---
39983	3980	0.110	3.77
39984	70	---	---

Per G. Lebel

G. Lebel - Manager /ns

CTA Member Canadian Testing Association

P.O. Box 10, Swastika, Ontario P0K 1T0

Telephone (705) 642-3244 FAX (705) 642-3300

Established 1928

Swastika Laboratories

A Division of Assayers Corporation Ltd.

Assaying - Consulting - Representation

Certificate of Analysis

Certificate No. 76074 Date Sept. 5, 1989

Received Sept. 1, 1989 54 Core Samples

Submitted by Marshall Minerals Inc., Niagara Falls, Ontario.

Proj. #Sangold File #92-0762

SAMPLE NO.	GOLD PPB	SAMPLE NO.	GOLD PPB	SAMPLE NO.	GOLD PPB
43226	10	43247	Nil	43305	Nil
43227	Nil	43248	30	43306	Nil
43228	Nil	43249	Nil	43307	Nil/10
43229	Nil	43250	Nil	43308	Nil
43230	10/Nil	43251	Nil	43309	Nil
43231	40	43252	Nil	43310	Nil
43232	30	43253	Nil	43311	Nil
43233	10	43254	Nil	43312	Nil
43234	20	43255	Nil/Nil	43313	10
43235	10	43256	10	43314	10
43236	120	43257	10	43315	Nil
43237	50	43258	Nil	43316	10
43238	Nil	43259	10		
43239	Nil	43260	Nil		
43240	10	43261	Nil		
43241	10	43262	Nil		
43242	40	43263	Nil		
43243	Nil	43264	Nil		
43244	80	43265	Nil		
43245	100/60	43266	Nil		
43246	Nil	43267	Nil		

Per G. Lebel - Manager /ns

CTA Member Canadian Testing Association

P.O. Box 10, Swastika, Ontario P0K 1T0

Telephone (705) 642-3244 FAX (705) 642-3300

Swastika Laboratories

A Division of Assayers Corporation Ltd.

Established 1928

Assaying - Consulting - Representation

RECEIVED SEP 1 3 1989

Certificate of Analysis

Certificate No. 76094 Date Sept. 6, 1989

Received Sept. 5, 1989 22 Core Samples

Submitted by Marshall Minerals Inc., Niagara Falls, Ontario. ATTENTION: J. Hinzer

Proj. #Sangold File #92-0767

SAMPLE NO.	GOLD PPB
43317	Nil
43318	Nil
43319	Nil
43320	Nil
43321	Nil/Nil
43322	Nil
43323	Nil
43324	Nil
43325	Nil
43326	Nil
43327	Nil
~~43865~~	Nil
43866	Nil
43867	Nil
43868	Nil/Nil
43869	Nil
43870	Nil
43871	Nil
43872	Nil
43873	Nil
43874	Nil
43875	Nil

5135=5

91-49

Per G. Lebel

G. Lebel - Manager /ns

P.O. Box 10, Swastika, Ontario P0K 1T0

Telephone (705) 642-3244. FAX (705)642-3300

APPENDIX 6

GEOLOGICAL COMPILATION AND DRILL REPORT (1988)

OF THE SANGOLD PROPERTY

KEITH TOWNSHIP, ONTARIO

Marshall Minerals Corp. ,Gail Resources Inc.
Gold Vessel Resources Inc.

April, 1988

George H. Wahl.

TABLE OF CONTENTS

CERTIFICATE

I, George H. Wahl, of 366 Toke St., in the city of Timmins, Province of Ontario, certify as follows, concerning my geological report of the Sangold property, Keith Township, Ontario, Porcupine Mining Division, dated April, 1988:

1. I am a graduate of the University of Western Ontario, with an Honors Bachelor of Science degree in Geological Sciences, obtained in May 1985.

2. I have been practicing in Canada since 1981, as a geological assistant and professional geologist.

3. This report is based on the author's experience in exploration, on a comprehensive study of all the assessment work records and on geological maps and reports published for the area of interest .

4. The attached report is the product of this writer's research, and, visit to the property in the fall of 1987.

5. I have no direct or indirect interest in the properties, leases or securities of Gail Resources Inc., Marshall Minerals Corp. or Gold Vessel Resources Inc., and/or their affiliates, nor do I expect to receive or obtain any.

Dated this April the 7th, 1988, in Timmins, Ontario.

G. H. Wahl.

George H. Wahl
Geologist

SUMMARY

Two well mineralized Vein Zones were discovered in 1987, both of which strongly resemble the mineralization characteristic of the Joburke deposit. Detailed channel sampling on the Anastamosing Vein Zone and Vein Zone returned values up to 0.78 oz/ton Au over 15 ft. An examination of previous work indicates that gold mineralization is widespread not only in the vicinity of the Vein Zones, but also along the entire Joburke–Sangold mineralized trend.

Over 4 miles of potentially auriferous stratigraphy stretch, east–west across the Sangold property. Several other target areas associated with north–northeasterly trending structures occur, both north and south, of this stratigraphy.

An exploration program, consisting of stripping, geophysics, mapping and diamond drilling is recommended to confirm and/or extend the best mineralized zones.

INTRODUCTION

The Sangold property is held jointly by Gail Resources Inc. (45%) and Marshall Minerals Corp. (55%). An agreement was reached whereby Gold Vessel Resources Inc. can earn a 25% interest in the Sangold property by spending 3.6 million dollars on exploration.

This report provides a summary of the previous exploration history of the Sangold property, it's geology, as well as a summary of recent work, completed under the direction of Marshall Minerals Corp. and Minroc Management Ltd. This work, consisting of surface and airborne geophysics, channel sampling, mapping and a recently completed 4,521 foot drill program resulted in the definition of several target areas for future exploration.

PROPERTY

The Sangold property consists of 205 unpatented claims (Table 1), located in the northeast corner of Keith Township, Ontario (Figure 1). The property is approximately square covering roughly 8,200 acres. The Sangold property entirely surrounds 20 patented claims belonging to the former producing Joburke Mine, held by Noranda Exploration Ltd. Enough assessment work has been completed to bring 30% of the Sangold claims to lease in the upcoming year. An additional 46 claims have been staked and are available to Marshall Minerals Corp. for option.

LOCATION AND ACCESS

The property lies roughly 60 miles west of Timmins, Ontario (Fig. 2). Highway No. 101, which extends west of Timmins, crosses the extreme northeast claim of the Sangold property and continues to Foleyet a distance of another 11 miles. From the northeast corner of the property, a secondary gravelled highway, No. 616, extends 1.5 mile southwest to the Palomar, Canadian National Railway siding. From this point, the railway extends northwest and southeast diagonally across the property. The Horwood Lake Road branches off of highway No. 616 approximately 1/2 mile south of Highway No. 101 and extends south along the eastern margin of the property towards Horwood Lake. At the point where this road

MUSKEGO TWP.

Keith Lake

GROUNDHOG RIVER

101

616

PALOMAR LAKE

LEGEND

Sangold Property Claims

Joburke Property Boundary

Sanford Claims available to Marshall Minerals

GAIL RESOURCES INC.
MARSHALL MINERALS CORP.
GOLD VESSEL INC.

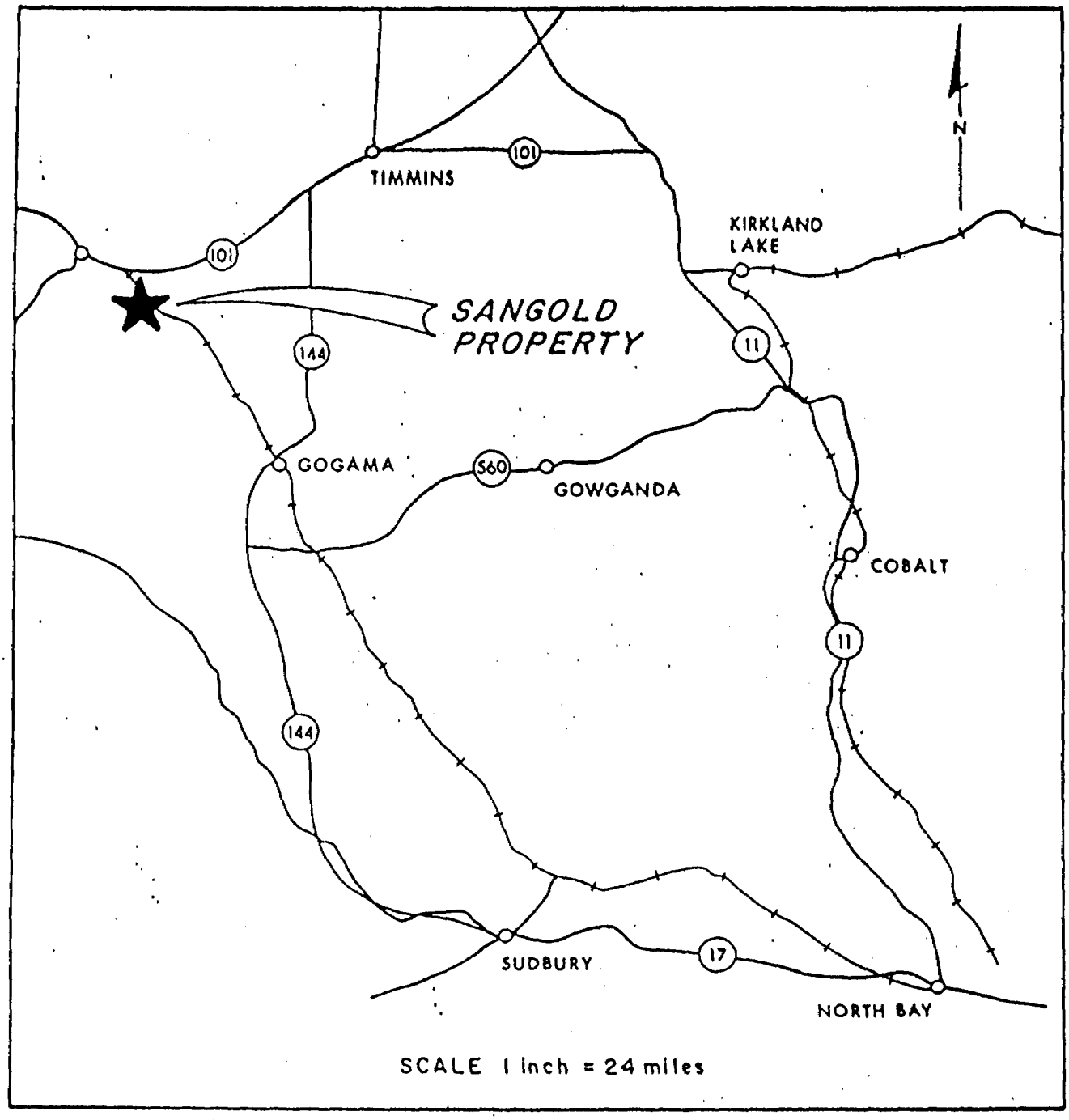
SANGOLD PROPERTY

KEITH TOWNSHIP, ONTARIO

MINROC MANAGEMENT LIMITED

SCALE 1" = 1/2 mile

Figure



MARSHALL MINERALS CORP
AND GOLD VESSEL INC.

SANGOLD PROPERTY, KEITH TWP.

PROPERTY LOCATION MAP

Figure 2

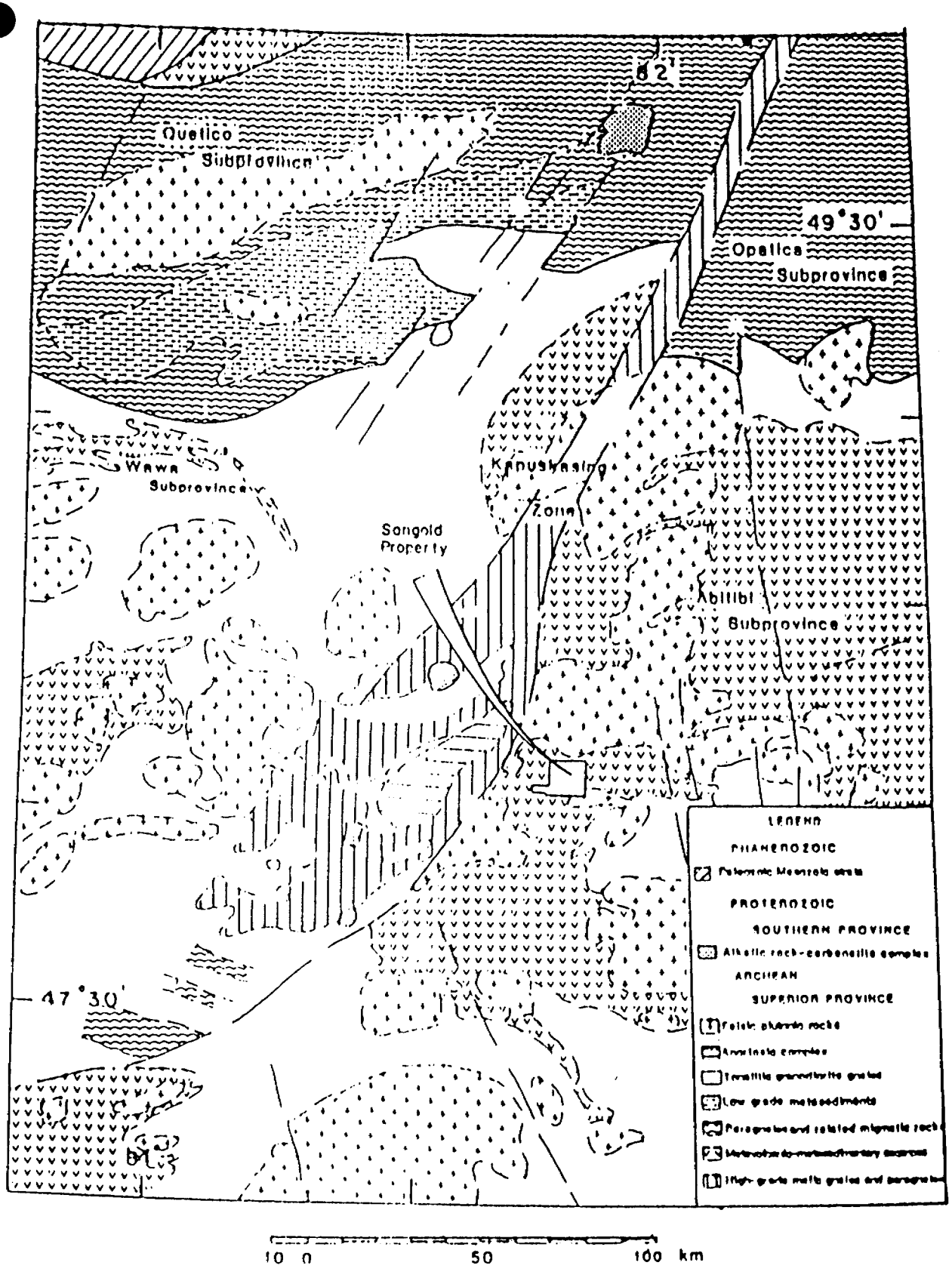
crosses the railway tracks, the Joburke road heads due west through the Joburke property to the western Sangold property boundary. The extreme western property boundary is accessible via the Keith lumber road.

The vein zones are accessible via a 1/2 mile gravel drill road extending south of the Joburke road.

REGIONAL GEOLOGICAL SETTING

The Sangold claim group lies within the northern part of the Precambrian Swayze–Deloro metavolcanic-metasedimentary belt (Figure 3). This major zone is truncated to the west by the Kapuskasing structural zone, beyond which it continues as the Wawa greenstone belt. To the east the Swayze belt is split into northeasterly and southeasterly branches by the Kenogamissi batholith, continuing to the east as the Abitibi belt. The belt comprises a marginal zone of felsic to intermediate metavolcanics overlain by iron formation, graphitic sediments with intercalated ultramafic komatiitic and tholeitic flows and pyroclastics. These are succeeded by basaltic komatiites and high–magnesium tholeitic flows which grade into iron–rich tholeites. The upper part of the sequence comprises calc–alkaline dacites to rhyolites, pyroclastics and volcanoclastics, agglomerates and flows interbedded with andesitic flows. The volcanics are succeeded by epiclastic sediments comprising conglomerate, greywacke with minor arkose, argillite and iron formations. (Ireland, 1987)

Gold mineralization in the Swayze occurs primarily in quartz lodes, hosted by a variety of rock types but usually associated with shearing, fracturing, silicification and carbonatization, typical of other major greenstone belt deposits. Host rocks of known occurrences include diorite, carbonate, silicified felsic porphyry, sheared metasediments, carbonatised basic volcanics, and granite. Iron formations of both the massive sulphide and oxide types and stratiform massive pyrite in volcanoclastic sequences also host gold in the Swayze. Representatives of all these rock types occur on the Sangold property in a variety of structural settings. (D. Patrick, 1987)



Regional geological setting of the Sangold property within the Abitibi subprovince (after Percival and Card, in press).

Figure 3

LOCAL GEOLOGY

The geology of the Sangold property is represented on Map 1 taken from the O.D.M. 1950 Geology Map of Keith and Muskego Townships. The geology of the Sangold property comprises an interbedded suite of mafic and felsic volcanics and associated intrusives, sediments and iron formation. The following rock type descriptions are in part taken from Prest (1950).

Mafic to Ultramafic Volcanics

Mafic to ultramafic volcanics extend across the entire Sangold property. Generally, they are medium to fine grained, dark green massive flows. Pillowed flows, amygdules, spherulites and flow top breccias are seldom exposed. Ultramafic flows, with spinifex textures were located in the vicinty of the Groundhog River.

Felsic Volcanics

The felsic volcanics on the claim group largely consist of felsic flows, breccias, tuffs, intrusives, and interbedded sediments. Together they form a large belt trending easterly across the south central portion of the Sangold claims. The thickness of this felsic unit varies between 1,000 and 3,000 feet. Generally, the felsic belt comprises porphyritic tuffs having either quartz or feldspar or both as the phenocrysts. Crystal tuffs as well as porphyritic flows and intrusives commonly occur within this belt.

Close to the Joburke Road between the Hoodoo and Joburke camps, a quartz–feldspar porphyry, was noted to contain quartz eyes almost a quarter inch in diameter. Thin section work by Prest (1950) determined the unit was of tuffaceous origin due to the banded appearance of the mica.

Adjacent to this area diamond drill hole P 6. intersected a porphyry flow or intrusive in which feldspar crystals were elongate and alligned in a matrix of fine grained mica.

Within the main belt of felsics, a pyroclastic unit occurs which consists of fragments varying from one inch to more than a foot across. These occur both southwest of the Joburke property and in recent drilling in the vicinity of the Vein Zone's.

Several felsic quartz feldspar porphyries were also mapped as dykes and plugs in the mafic volcanics of the Vein Zone's and Hoodoo showing areas.

Near the southern property boundary in the vicinty of Hoodoo Lake, there is a small area mapped as acidic tuffs and breccias. Their appearance is dissimilar to those of the main felsic band. This may be the result of alteration and recrystallization from nearby granitic intrusives.

Sediments

Sediments occur in several areas of the Sangold property. Four separte easterly trending horizons have been identified.

To the south of the property, a large sedimentary horizon has been mapped on the west shore of Keith Lake. This unit has been interpreted to extend eastward across the northern flank of the Sangold property to Groundhog River. No outcrops of this unit have as yet been mapped on the Sangold property, however outcrops to the east and west indicate that the units comprise a similar interbedded sequence of conglomerate, arkose, greywacke, quartzite and argillite. Pebbles of the conglomerate units are made up of quartz–eye granite, porphyries and sediments. Quartz pebbles are rare.

Approximately one mile south of Keith Lake, a narrow band of sediments were mapped, consisting of fine grained pearl–grey weathered quartzites. This unit may be equivalent to the fuchsite bearing sediments encountered in drilling beneath Palomar Lake.

Near the Lot 18, 19 boundary, sediments lie conformably on the north side of the main felsic volcanic belt and are also interbedded with the mafic volcanics. From the western Joburke boundary eastward these sediments largely comprising argillites appear to be in fault contact with the felsic volcanics. These argillaceous sediments terminate to the northwest of the Joburke shaft, however reappear along the northern contact of the main felsic belt, northeast of the Joburke shaft.

At a point 1,500 feet north of the junction of the Hoodoo Lake Road and the Joburke Road, sheared carbonated quartzites occur along the southern edge of iron formation. This unit is truncated by east–northeasterly trending faults.

Iron formation

Several horizons of oxide iron formation extend both east and west of Mackeith Lake. These consist of alternating magnetite rich and quartz rich bands. Occasionally jasper beds and green amphibolite rich bands occur.

Near the east end of Mackeith Lake, where shearing and fracturing is more intense, the iron formation is hematized, rendering it non–magnetic. This feature is prominently exposed in the airborne magnetic survey as a point of magnetic weakness along the length of the iron formation.

One other band of iron formation occurs roughly 1,500 ft. south of the southern boundary of the felsic belt. This iron formation was intersected in D.D.H. J29 south of the Joburke shaft, in the Dome 53B series of holes, along the south west border of the Sangold property and in the Dome 48 series of holes drilled to the south of the Hoodoo showings. This iron formation, up to 15 feet in width is described as a siliceous tuff carrying 5–20% pyrrhotite, pyrite and chalcopyrite. Airborne magnetic data indicates that this iron formation also extends over the entire width of the property.

Diorites and Serpentinites

Diorites preferentially occur as dikes injected within the iron formations and occasionally split the iron formations in two or more parts. They are commonly dark in color and are rich in hornblende. Increasing alteration results in the formation of biotite, giving the rock a reddish–brown weathered surface.

Serpentinites occur as dikes and plugs throughout the property. Their precurser ranges from dunites to peridotites to olivine gabbros.

Several dikes of easterly trending lamprophyres and north–north westerly trending Matachewan diabases occur on the Sangold claims.

Structure

Several structural interpretations have been made possible due to the large amount of mapping, geophysics and stratigraphic drilling completed since the 1940's.

Prest (1950) indicated that the exposure of several horizons of iron formation lying to the east and west of Mackeith Lake may be due to folding. Many of the top indicators used to prove this were implied to be questionable. A second explanation for the multiple iron formation horizons would include the effect of low angle cross faulting which is quite prevalent in the area northeast of Mackeith Lake. Both cross faults and strikes faults are common. The strike faults occur along the northern edge of the main felsic belt and within the adjoining sediments and interbedded iron formations. Actual displacement along these faults is unknown.

Cross faults occurring as northeast to east–northeast trending faults are quite common in the Mackeith Lake area. The east–northeasterly trending fractures at the western end of Mackeith Lake, displace the main felsic belt over 3,000 feet to the southwest.

A third period of faulting probably occurring much earlier than the previously mentioned faults is that of a north–northeast trending fracture system. These faults parallel the general strike of the Kapuskasing structural zone a few miles to the west of the property and are interpreted to be associated with it. Well to the south of the property, on Horwood Lake several gold showings have been interpreted to have been associated with east–west splays branching off of a similar trending fault. Noranda has been acquiring much ground in the area with this theory in mind (personnal communication J. Ireland.)

On the Sangold property, two of these faults have been interpreted. The first occurs along the eastern shore of Keith Lake and extends southward parallel to Keith Creek. A second fault, just east of Mackeith Lake extends southward to Horwood Lake. Several zones of alteration and quartz carbonate veining have been associated with these faults on the Sangold property. Carbonatized mafic volcanics and sediments are present both east and west of the Keith Lake fault and the Mackeith Lake fault. Iron formation on either side of the Mackeith Lake fault is

strongly hematized. Several quartz carbonate veins have also been mapped in close proximity to these faults. Quartz Carbonate veining, on the southern property boundary and within the Joburke–Sangold mineralization trend occur on either side of the Mackeith Lake fault. Quartz carbonate veining on the south shore of Keith Lake is interpreted as being related to the Keith Lake fault.

Recent preliminary mapping of the Vein Zone's revealed a possible associated fracture which parallels the north–northeast trending zone. Instead of a fault zone, this lineation may more aptly be called a deformation zone in which the rocks have undergone a larger degree of ductile deformation, rather than brrittle deformation. The amount of intense isoclinal folding of mafic volcanics and increased number of porphyry intrusives all indicate a very early, zone of deep seated structural weakness.

Future exploration will need to address the role these deformation zones play in mineralizing horizons such as the Joburke–Sangold mineralized trend.

PREVIOUS WORK

Due to the large size of the Sangold property, and diverse number of rock types, a large number of companies have explored for a variety of minerals including gold, silver, copper, zinc, nickel, asbestos and iron. Listed below is a short summary of those companies whose previous exploration work has contributed to the development of gold exploration targets on the Sangold property.

Joburke Gold Mines

The following account is quoted from reports by J. Ireland (1986) and D. Patrick (1987).

The property was quickly evaluated on surface by extensive stripping, trenching and channel sampling which exposed 9 separate zones containing gold mineralization. It was determined that gold was associated with quartz, quartz–carbonate and albite–carbonate vein systems occurring within a wide zone of extensively sheared, chloritized and carbonatized mafic pillowed lavas and associated fragmental units and interflow tuffs. The vein systems are extensively

regional foliation associated with the major sheared zone, which trends from east–west near the main showing, to northwest-southeast at the east end of the property. There appears to be a proportional relationship between sulphide content, primarily pyrite and chalcopyrite, and gold content. Visible gold is very rare, but where it was observed, the gold occupied cubic cavities where pyrite had weathered out.

In 1947, a vertical, two compartment shaft was completed to 425 feet with stations established at the 125, 250 and 375 foot levels. During the shaft work, 24,600 feet in 60 surface holes and 774 feet of underground drilling was completed. This initial drilling was concentrated on the number one zone. Approximately 3,590 feet of lateral work on the 250 and 375 foot levels were completed by Joburke Gold Mines Limited, and another 2,500 feet of underground diamond drilling completed before operations stopped in August 1948. By this time, a considerable amount of development ore had been stockpiled on surface.

The property was optioned to McIntyre Porcupine Mines Limited, who, during the period 1949–1950, dewatered the shaft and carried out underground sampling on the 250 and 375 foot levels. The option was subsequently dropped. In 1964, five surface diamond drill holes totalling 5,000 feet were completed under an agreement with Denison Mines Limited.

The property remained idle until 1973 when Noranda acquired an 80% interest and put the property into production which continued through to 1976. Total production, including development ore on surface, was 16,487 ounces of gold from 182,292 tons of ore milled. The recovered grade was 0.09 oz/ton Au.

Noranda reopened the mine in 1979 and continued production until 1981. A total of 168,500 tons of ore was milled at a recovered grade of 0.094 oz/ton Au. The mine buildings have been removed and the property has remained idle since 1981. Total production from the Joburke Mine was reportedly 350,792 tons at a grade of 0.09 oz/ton Au.

Hoodoo Lake Mines, 1947 (Dunvegan Mines)

The following account by D. Patrick (1987) describes the original work on the Hoodoo property:

The most significant previous work on the Sangold property was carried out by Hoodoo Gold Mines Ltd., in 1946–1947. This consisted of prospecting, blasting and sampling on two zones, an "east" showing and a "west" showing followed by a 19 hole drill program totalling 7,500 ft. Both showings are described as quartz-carbonate veins in sheared (east) or massive (west) lavas. The East showing is described as being 8–12 inches in width and occupying a N 10 E cross–fracture. The west vein is from 30 to 50 inches wide but is indicated to pinch out over a length of 20 feet or so.

Subsequently, the Hoodoo showings have formed the main focus for exploration under the current ownerships.

Palomar Gold Mines, 1947

The Palomar property consisted of 26 claims and adjoined the Joburke and Hoodoo properties on the east and north respectively. Nine diamond drill holes totalling 5,093 feet were drilled. Minor quartz-carbonate stringers were noted in hole No. P8, which lies on strike with of the Joburke deposit, however no significant assays are reported from this hole. Carbonated mafic volcanics and sediments as well as quartz stringers and minor sulfides were reported by Palomar Gold Mines to occur, both east and west of the north–south portion of the Canadian National railway.

Alladin - Groundhog Mines Limited, 1947

Alladin-Groundhog was located immediately north of the Palomar property. Three diamond drill holes comprising 2,339 feet provide a cross section of the stratigraphy underlying Palomar Lake. Hole No. AG–4 intersected a band of sediments which hosted pyrite bearing fuchsite as well as a few pyritized quartz stringers. No significant assay values were reported.

Nib–Yellowknife Mines, 1947

Nib–Yellowknife was located immediately south of the Hoodoo property. Two veins of interest were noted. One vein is a 10' X 30' quartz body while the other is a quartz vein stockwork system within a zone of highly sheared, pyritized and crenulated volcanics. Gold values were reported to be rather low.

Wejack Gold Mines, 1947

This property, 1 mile west of the Joburke claims, had 9 holes drilled, comprising 6,781 feet. The southernmost hole, No. W4, which was collared in the mafic volcanics south of the felsic volcanic pile, intersects a horizon which is stratigraphically equivalent to the mafic host of the Joburke and Sangold mineralization. Numerous quartz-carbonate veins and stringers carrying varying amounts of pyrite were noted. Two 10–foot sludge samples were also noted, carrying 0.03 oz/ton Au. This is the only hole to date which tests the 2.5 mile strike extent of the interpreted western equivalent of the Joburke–Sangold mineralized stratigraphy.

Mining Oriented Investments, 1969

This property consisting of 3 claims is located roughly 1,000 feet SSE of the present Vein Zones. Two X–Ray holes were drilled in order to intersect an E.M. anomaly. Both holes intersected over 100 feet of siliceous tuff intruded by numerous quartz veins and veinlets which carried minor sulfides. Several bands of massive sulfide occured within the bedded tuffs. No assays were taken for gold.

Mining Corp., 1978–1980

Mining Corp. drilled 2 holes along the eastern Joburke property boundary. Numerous quartz veins and stringers were intersected carrying up to 40% pyrite It is interesting to note all assay data was deleted from the drill logs. Descriptions of core strongly resemble that of recent drilling on the Vein Zones.

WORK UNDER CURRENT OWNERSHIP

Showings

A majority of the recent work has concentrated on the area which hosts the Hoodoo "East" and "West" showings and their stratigraphic extensions (Map 1).

Stripping in the Hoodoo area has revealed a succession of massive chloritized mafic flows intercalated with pillowed flows and breccias. These units are crosscut by numerous porphyry dykes up to 3 feet wide as well as lamprophyre dykes.

Generally, the units have a northwesterly strike and dip vertically. However, on a detailed scale, they have been affected by several episodes of faulting, drag–folding and shearing, whose intensity appears to increase towards the northwest.

The most dominant form of alteration is carbonatisation, whose intensity increases with the amount of shearing. Silicification, pyritization and chloritization occur in varying degrees throughout the exposed outcrops.

Quartz and quartz-carbonate veins occur throughout the exposed area. Sampling indicates that a direct relationship exists between the percentage of sulfides and the grade of Au mineralization. Several episodes of veining occur, occasionally containing pyrite with minor chalcopyrite. Generally, these veins are narrow (4") and have limited strike extent.

A description of those areas which returned values are as follows:

Hoodoo East showing is a quartz-carbonate-pyrite vein hosted in a north-northeasterly trending cross fracture. This vein returned values of 0.072 oz/ton Au over 2.5 ft., 0.152 oz/ton Au over 1.5 ft. and up to 4.03 oz/ton Au in grab sample. The Hoodoo drilling in this area only intersected low grade material (0.03 oz/ton Au over 23 ft., 0.04 oz/ton Au over 2 ft., and 0.18 oz/ton Au over 2 ft.). The area is characterized by gash veins and sheared cross–fracture hosted veins of limited width and strike extent. (D. Patrick, 1987)

Approximately 300 feet northwest of the Hoodoo vein, a grab sample taken across a 16–inch quartz carbonate-pyrite pod returned 0.376 oz/ton Au. Two other grab samples in the same area returned 0.087 oz/ton Au and 0.05 oz/ton Au. Again veining is of limited width and length and occurs as shear–hosted gash veins and veinlets.

Three hundred feet west of the above vein, a silicified, carbonatized and pyritized porphyry returned 0.05 oz/ton Au and 0.094 oz/ton Au in grab samples.

Almost 400 feet north-northwest of the porphyry is the Hoodoo West showing, which also represents the southeastern most extension of the recently exposed Vein Zone (Map 2). From the rubble covered, blasted area of the old Hoodoo West showing, extends a strong 6 inch to 5 foot wide vein, for a distance of approximately 200 feet to the northwest. This vein bifurcates and is offset to the north–south by several cross fractures. The vein is occasionally boudinaged and drag–folded. At a point, 200 feet northwest of the Hoodoo West showing, the vein crosses a fault and reappears as a heavily folded stringer zone. At this point, the zone becomes difficult to follow due to the severe intensity of folding and faulting in several directions, as well as numerous porphyry intrusives. This vein system has been sampled approximately every 15 feet and carries an average grade of 0.15 oz/ton Au over a width of 4 feet and a length of 200 feet.

A fifth zone, called the Anastamosing Vein Zone occurs 15 feet to the northeast of the northern end of the Vein Zone (Map 2). This zone measuring roughly 33' X 114' consists of a swarm of complexly folded veins and veinlets hosted by highly altered mafic volcanics and irregular shaped porphyries. The veins range in size from 1/4" to 1'. In some localities, these veins are intensely deformed with isoclinal and recumbent drag–folded sections. Gold values are concentrated in the noses of the folds. Channel sampling consisted of 2–3 foot long samples. Every attempt was made to take samples normal to the vein direction. This became difficult due to the complex nature of folding. The following include some of the intersections from surface sampling 0.17 oz/ton Au over 10 ft., 0.20 oz/ton Au over 15 ft., 0.19 oz/ton Au over 10 ft., 0.10 oz/ton Au over 9 ft. and 0.78 oz/ton Au over 15 ft.

A final zone is located 3,000 feet northeast of the Anastamosing Vein Zone. The area surrounding this showing was mapped by J. Ireland and covered with magnetic VLF–EM, and more recently I.P. surveys. The zone is a quartz vein hosted within a heavily sheared, altered porphyry body. A grab sample returned 0.05 oz/ton Au. The vein is podiform and has limited strike extent. (D. Patrick, 1987).

Airborne geophysics

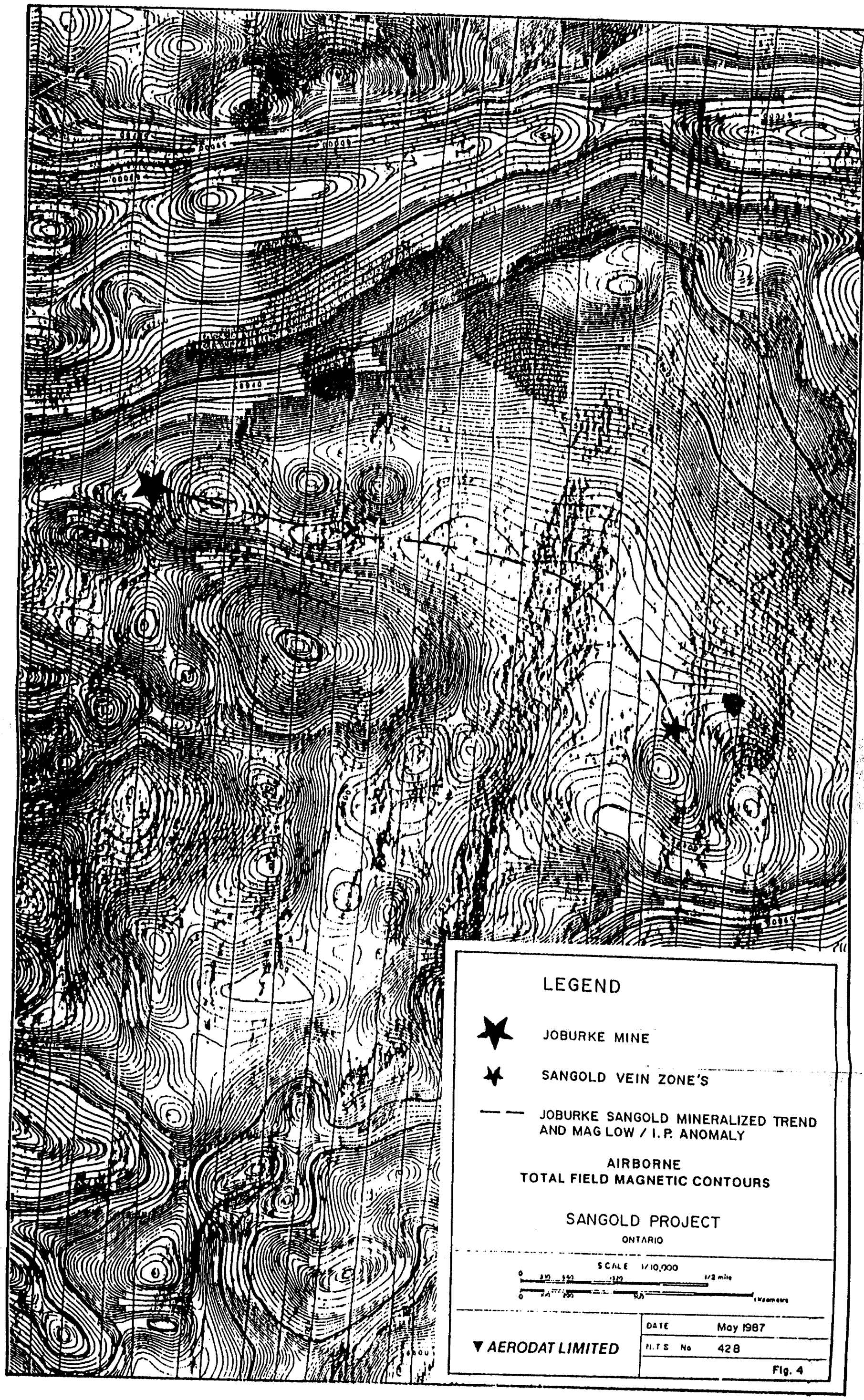
In May 1987, a magnetic and electromagnetic survey was flown over the entire Sangold property.

The eastern and western extensions of the Joburke and Hoodoo showings are identified by a magnetic low, which may be the result of alteration within the mafic volcanics (Figure 4).

A second linear magnetic anomaly trends north-northeasterly between the Joburke and Hoodoo showings. This anomaly is expressed by a disruption in an east–west trending iron formation to the south of Joburke and a warping in the iron formation to the northeast of Mackeith Lake. Several well–carbonatized outcrops have been mapped near the apex of the warped iron formation. Near the southern property boundary, quartz carbonate veining has been mapped on both sides of the north–northeasterly trending magnetic anomaly. This north–northeasterly trending anomaly is also subparallel to several shear zones which appear to be related to the Hoodoo mineralization.

Many of the electromagnetic anomalies are attributed to sulfide and/or graphitic horizons due to their common occurrence in the area. Dome Exploration drilled several of these anomalies, with similar results.

BHP Utah which holds contiguous claims to the north of Sangold, drilled a set of weaker E.M. anomalies. Substantial widths of arsenopyrite with anomalous gold values were intersected. (Personal communication, J. Ireland)



LEGEND

JOBURKE MINE

SANGOLD VEIN ZONE'S

JOBURKE SANGOLD MINERALIZED TREND AND MAG LOW / I.P. ANOMALY

AIRBORNE
TOTAL FIELD MAGNETIC CONTOURS

SANGOLD PROJECT
ONTARIO

SCALE 1/10,000

0 1/2 mile

0 1 kilometre

▼ AERODAT LIMITED

DATE May 1987

N.T.S. No 428

Fig. 4

I.P. survey

In the fall of 1987, an I.P. survey was conducted over an area extending west of the Hoodoo showings to the Joburke boundary (Map 3). The results were fraser filtered and contoured. The resulting anomaly is coincident with the airborne magnetic low, and extends from the Hoodoo West showing northwest towards the Joburke property.

A second stronger anomaly extends roughly east–west adjacent to Joburke road. The source of this anomaly is interpreted as a graphitic horizon.

A third anomaly trending northeast crosscuts both of the above–mentioned anomalies near the Joburke boundary. This trend appears to be almost coincident with the previously mentioned north–northeasterly trending airborne magnetic expression. The anomaly may be the result of a water–filled fault zone.

Diamond drilling

Seven diamond holes totalling 4,521 feet were drilled in February of 1988 (Map 3). These holes were drilled to test the extension of the Anastamosing Vein Zone at depth and it's inferred extension to the north, as delineated by the previously mentioned I.P. anomaly. A summary of the anomalous drill intersections in each hole is included in Table 2. Figure 3 contains a plan of the vein zones and drill hole locations. The drill logs with assays are in Appendix A.

Holes SG–88–01, 02 and 04 were collared to intersect the Anastamosing Vein Zone at depth. The rock types consisted dominantly of moderately to intensely sheared massive mafic volcanics intruded by narrow quartz feldspar porphyry dykes. Numerous quartz-carbonate-pyrite veins and veinlets were intersected, however very few carried significant values and those which did carry, were only anomalous over short widths.

In holes SG–88–01 and 04, which were drilled at -55º towards one another, 2 zones were intersected in each hole roughly 200 feet apart, at roughly the same depth. A correlation between these intersections would be premature, however they do indicate widespread mineralization at depth.

Hole SG–88–03, collared at the same location as SG–88–01 and 02, and striking north at -55º intersected the felsic volcanic pile at 124 feet depth. At 405 feet and 419 feet, two graphitic horizons were encountered. Similar graphitic horizons, although much larger (20 feet) were encountered in SG–88–05 and Hoodoo Lake Mines Ltd. hole No. 17. This graphitic horizon which follows the felsic/mafic contact is interpreted to be the source of the I.P. anomaly which extends from the Hoodoo showings to the Joburke property.

The mafic–felsic contact was also intersected by SG–88–07 and 08. However, only SG–88–07 intersected a small zone carrying 0.095 oz/ton Au over 5 ft., at a depth of 600 feet, well within the mafic volcanic sequence. No gold values of any significance were returned from the felsic volcanics.

CONCLUSION

Mapping of the Hoodoo West showing and it's associated Vein Zones has shown the necessity of large scale structural deformation in localizing and concentrating gold mineralization.

The occurrence of gold mineralization within 9 zones on the Joburke property, as well as the Hoodoo and Vein Zone showings and several drill holes on strike indicate the widespread nature of mineralization along the Joburke - Sangold trend.

Geophysical data and previous mapping indicate the importance of the north–northeast trending fault zones in providing sufficient deformation and alteration within the local geology to form additional exploration targets. The first phase of drilling has shown that a problem exists in correlating geology and assay data within a deformation zone. Future drilling programs will need to be more closely spaced in order to confidently trace zone extensions.

In general, the Sangold property hosts a large number of targets, which would represent a good exploration potential for a Joburke style deposit.

RECOMMENDATIONS

The large amount of previous work on the Sangold property has resulted in the definition of several target areas (Refer to Map 1).

1. Hoodoo Mines intersected 0.08 oz/ton Au over 3 ft. in hole No. 15 located 400 feet east of the Hoodoo East showing. This area remains largely untested to the Groundhog River, representing a strike length of one mile. This area requires further stripping and diamond drilling.

2. The entire stripped area between the Hoodoo East and West showings requires a greater density of sampling. Further stripping should be completed on the sheared pyritized porphyry which ran 0.094 oz/ton Au on the southern flank of the stripped area.

3. Additional samples should be taken along the Vein Zone. Within the Anastamosing Vein Zone, all of the water and mud filled pits should be cleaned out. A second program of sampling should be completed in order to increase the density of sampling and also to test the repeatability of assays with adjacent channel samples. This should be followed by a bulk sampling program to test the compatibility of assays between channel samples and bulk samples. Further stripping should commence to the north and northeast of the Vein Zones provided overburden depth does not increase significantly.

4. A phase II drill program should concentrate on shallower holes intersecting the vein zones at 50–250 foot depths, at 50 foot intervals. This would greatly aid the understanding of the nature and consistency of mineralization at depth. This drilling program should also test the entire strike length from the Vein Zone showings to the Joburke property. Additional sampling of the previous drilling program should also be completed.

5. Noranda Mines, which owns the Joburke property, is compiling a report covering all previous work on the Joburke Mine. Every attempt should be made to acquire this data in order to understand the grade of mineralized drill intersections required to distinguish ore grade material at depth. This

type of data would be invaluable in assessing the potential significance of lower grade intersections in the Sangold drilling program.

6. The north–northeasterly trending magnetic lineament, just east of Mackeith Lake, requires a large degree of further exploration. The areas representing carbonatized lavas on both sides of the lineament, east of Mackeith Lake, should be stripped and channel sampled. A similar program of stripping should be carried out in the vicinity of the Nib–Yellowknife area, where quartz-carbonate veining has been mapped on both sides of the lineament. A third area along this lineament which requires attention would be it's intersection point with the Joburke-Sangold mineralized mafic stratigraphy.

7. Two thousand feet south–southeast of the vein zones, drilling by Mining Oriented Investments, intersected numerous quartz veins and veinlets carrying pyrite and chalcopyrite within a siliceous tuff. These zones were drilled in an area where overburden depths were limited to a few feet and could be easily stripped and evaluated.

8. Quartz carbonate veining within the felsic volcanics well to the northeast of the Vein Zone showings, should be further explored. Large areas of intensely altered felsic volcanics in this region were stripped in the summer of 1987, and still need to be mapped and channel sampled.

9. A band of sediments on strike of the section drilled by Alladin Groundhog Gold Mines in 1946–1947, on Palomar Lake, should be stripped and sampled. Drilling intersected fuchsite with disseminated and massive pyrite. No values were reported.

10. The area west of Joburke, which represents the same stratigraphy hosting the Joburke and Vein Zones mineralization, remains virtually untested. In 1947, Wejack Gold Mines drilled one hole No. W4 into this stratigraphy. A zone of quartz-carbonate veining was intersected which returned 0.03 oz/ton Au over 10 ft. of sludge. This stratigraphy covers 2.5 miles of strike length on the Sangold property. An attempt should be made to define the felsic–mafic contact with an I.P. survey followed by a program of stratigraphic trenching and diamond drilling.

11. Immediately south of Keith Lake on the west side of another north–northeast trending fault, there exists a zone of pervasive carbonatization containing quartz-carbonate veining. A road has been pushed north, in order to access this area. Several stratigraphic trenches are recommended in this area as well as detailed channel sampling. BP Selco has recently completed a 7,000–foot drill program to the west of this stratigraphy.

12. Electromagnetic conductors along the northern Sangold property boundary which are on strike with auriferous mineralization currently under evaluation by Utah and Unigold represent further targets. However, it is recommended that exploration in this area be limited to an initial phase of prospecting, while work by both Utah and Unigold be monitored.

13. Present grids should be extended to cover all of the above–mentioned areas of interest. These grids should then be covered with Mag., VLF and geological mapping. All anomalies should then be followed up with I.P. over selected areas, and mechanical trenching. Assaying should not be limited to gold only, but should occasionally include assays for nickel, copper, zinc, silver, platinum and palladium where they are deemed to be warranted.

BUDGET PROPOSAL

A program of line cutting, geophysics, mapping, stripping, channel sampling, bulk sampling and drilling has been planned in order to identify new zones of mineralization as well as extend the strike extent of those zones already exposed. Details of the proposed program are as follows:

Line cutting	- 185 km @ 215 $/km	39 775
Geophysics	- Mag. - 328 km @ 100 $/km	32 800
	- VLF - 328 km @ 100 $/km	32 800
	- I.P. (over selected areas) 100 days @ 1 400 $/d	140 000
Airtrack drilling (to test overburden thickness)		50 000
Stripping and trenching	- 2 crews, 90 days @ 2 600 $/day	468 000
Surface mapping (all grid lines and stripped areas)	- 2 crews of 2 geologists	175 000

Diamond Drilling - 50000 ft. @ 30 $/ft. all inclusive (to test stratigraphy on strike of the Joburke and Vein zones as well as any additional zones)	1 500 000
Bulk sampling testwork - 10000 tons @ 37 $/ton all included (to test the consistency of channel and drill sampling with bulk sampling)	370 000
Drill and access roads	50 000
Core logging, drill supervision and assaying	140 000
Geological supervision and management	100 000
Drafting and report writing	40 000
Truck rental and accomodations	70 000
Contingencies	391 625
TOTAL:	**3 600 000 $**

April, 1988

George H. Wahl.
Geologist

TABLE 1

List of unpatented claims
(205 claims)

930902 to 930904	833197	753418
926003 to 926027–29–30	872146 to 872165	752185
900417 to 900445	872306 to 872317	753420 to 753422
916887 to 916890	724931 to 724934	780865
921784 to 921800	723987 to 723990	742762
923401 to 923405	758049 to 758052	654248 to 654253
806963 to 806968	752139 to 752150	660601 - 660602
871697 to 871701	752600 to 752603	688522 - 688523
871702 to 871711	752186	688519 - 688521
807306	751880 to 751883	661517 - 661518
807175	751878	683688 to 683690
867747 to 867750	789758	

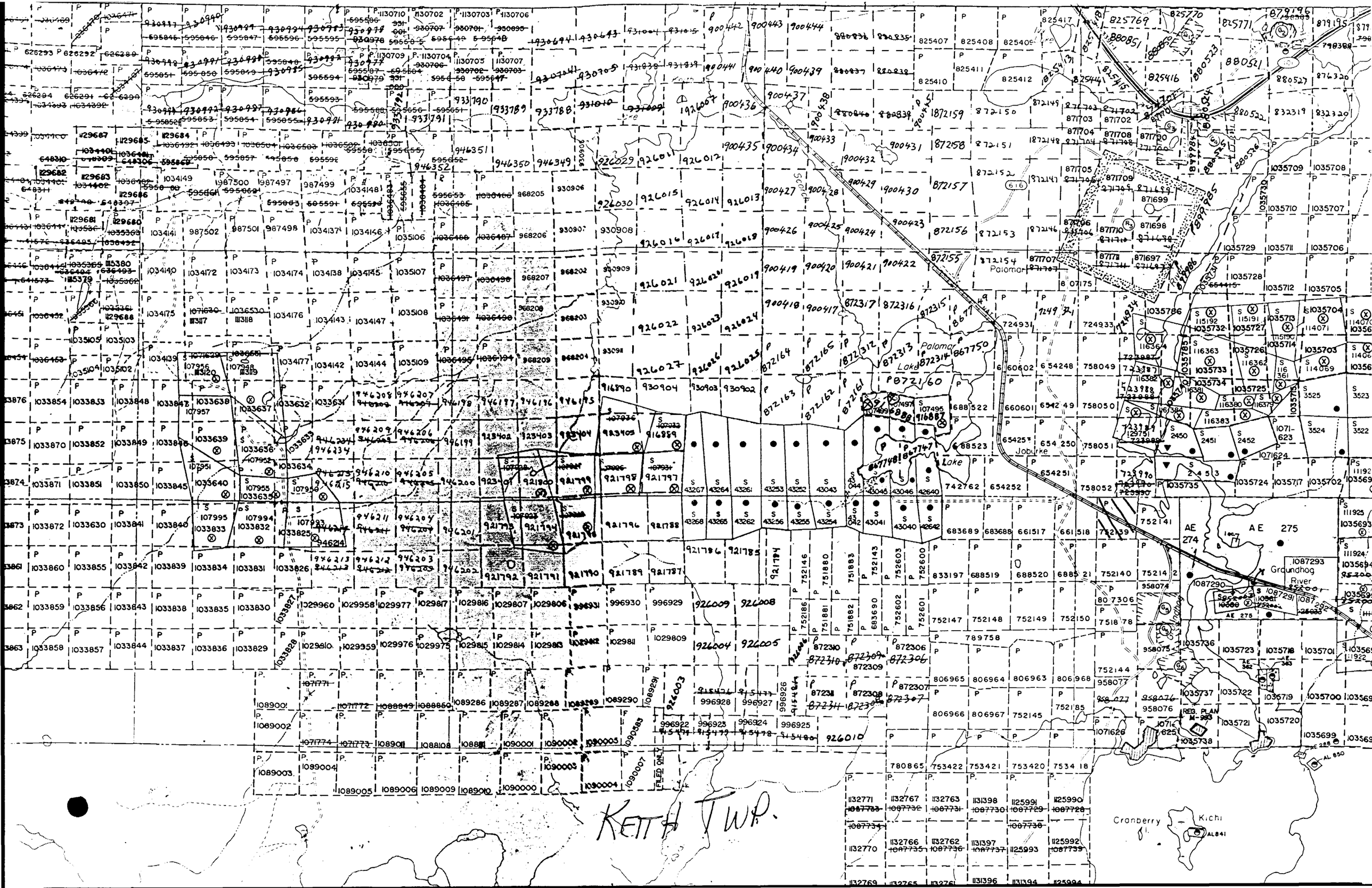
List of unpatented claims available for option from G. Sanford.
(46 claims)

958074 to 958077	1029958 to 1029960	1029809 to 1029817
930905 to 930911	1029975 to 1029977	996922 to 996931
968202 to 968209	1029806 - 1029807	

TABLE 2

Sangold drilling intersections, 1988

Hole No.	Length	Host	Depth	Intersection oz/ton Au	Vein type
SG-01	607'	Mafic volcanics	@ 224.7'	2.8' of 0.16	qz cb vein
			@ 457,0'	3.0' of 0.067	qz cb vein
SG-02	557'	Mafic volcanics	@ 412.5'	2.5' of 0.029	qz cb vein
			@ 410.0'	1.5' of 0.144	qz cb vein
SG-03	757'			Nil results	
SG-04	557'	Mafic volcanics	@ 296.0'	5.0' of 0.041	qz cb vein
		Mafic volcanics	@ 497.0'	3.0' of 0.321	qz cb vein
		Mafic volcanics	@ 500.0'	4.0' of 0.009	qz cb vein
		Mafic volcanics	@ 509.0'	3.0' of 0.149	qz cb vei
SG-05	607'			Nil results	
SG-06				Not drilled	
SG-07	647'	Interbanded tuff	@ 600.0'	5.0' of 0.095	qz cb vein
SG-08	687'			Nil results	


KEITH TWP.
Paloma
Lake
Joburke
Lake
Groundhog River
Cranberry
Kichi
AE 275
AE 274
REG. PLAN M-983

Ministry of Northern Development and Mines
Ontario

DOCUMENT No. W 9006•6031

42B01NE0141 53 KEITH 900

Inst
- Pl
- Fc be
- Fc (G Ex
- Refer to Sections 76 and 77, the Mining Act for assessment work requirements and the reverse side of this form for table of information.

Mining Act — Report of Work

Name and Address of Recorded Holder	Prospector's Licence No.
Marshall Minerals Corporation	A-38077
4776 Bridge Street, P.O. Box 356, Niagara Falls, Ontario 12E 6T8	Telephone No. (416) 356-9112

Summary of Distribution of Credits and Work Performance

Mining Division	Mining Claim Prefix	Mining Claim Number	Work Days Cr.	Mining Claim Prefix	Mining Claim Number	Work Days Cr.	Mining Claim Prefix	Mining Claim Number	Work Days Cr.
Porcupine		968207	165						
Township or Area: Keith Township		968208	166						
Total Assessment Credits Claimed: 497		968209	166						

Type of Work Performed (Check one only)

- ☐ Manual Work
- ☐ Shaft Sinking Drifting or other Lateral Work
- ☐ Mechanical equipment
- ☐ Power Stripping other than Manual (maximum credit allowed - 100 days per claim)
- ☒ Diamond or other Core drilling
- ☐ Core Specimens

Dates when work was performed	Total No. of Days Performed	Total No. of Days Claimed	Total No. of Days to be Claimed at a Future Date
From: August 19, 1989 To: August 20, 1989	497	497	----

All the work was performed on Mining Claim(s): Indicate no. of days performed on each claim. * (See note No. 1 on reverse side)	Mining Claim	No. of Days	Mining Claim	No. of Days	Mining Claim	No. of Days	Mining Claim	No. of Days
	752139	497						
Mining Claim	No. of Days	Mining Claim	No. of Days	Mining Claim	No. of Days	Mining Claim	No. of Days	Mining Claim	No. of Days	Mining Claim	No. of Days

Required Information eg. type of equipment, Names, Addresses, etc. (See Table on reverse side)
If space below is insufficient, attach schedules with required information and location sketches

Hole S135-5 (497 feet of BQ core) was drilled using a Longyear model 38 wireline diamond drill by:

Longyear Canada Inc.
1111 Main Street West
P.O. Box 330
North Bay, Ontario
P1B 8H6

ONTARIO GEOLOGICAL SURVEY
ASSESSMENT FILES
OFFICE
MAY 11 1990
RECEIVED

Certification of Beneficial Interest * (See Note No. 2 on reverse side)

I hereby certify that, at the time the work was performed, the claims covered in this report of work were recorded in the current recorded holder's name or held under a beneficial interest by the current recorded holder.	Date	Recorded Holder or Agent (Signature)

Certification Verifying Report of Work

I hereby certify that I have a personal and intimate knowledge of the facts set forth in the Report of Work annexed hereto, having performed the work or witnessed same during and/or after its completion and the annexed report is true.

Name and Address of Person Certifying			
James Burns 190 Grage Crescent Timmins Ontario			
P4N 8K8	Telephone No. 705-268-4660	Date May 9/90	Certified By (Signature) James Burns

For Office Use Only

Work Assignments

RECORDED
MAY 09 1990
RB

Received PORCUPINE MINING DIVISION
RECEIVED
MAY 9 1990
2:20 pm BB

768 (89/06)

GEOPHYSICAL LEGEND

V.L.F.- E.M. FRASER FILTERED CONDUCTOR AXES
(Values in % per 50 ft.)

- 5-15% (Weak conductor)
- 15-30% (Moderate conductor)
- >30% (Strong conductor)

GEOLOGY LEGEND

1 - INTERMEDIATE-BASIC VOLCANICS
- A - Pillowed
- B - Tuff
- C - Massive

2 - FELSIC VOLCANICS (Dacite to Rhyolite)
- A - Fragmental
- B - Tuff
- C - Massive

3 - METASEDIMENTS
- A - Conglomerate
- B - Arkose/Greywacke
- C - Argillite

4 - INTERMEDIATE-BASIC INTRUSIVES (Diorite to Gabbro)

5 - FELSIC INTRUSIVES
- A - Altered (Quartz) Feldspar Porphyry

6 - SERPENTINITE

IF - IRON FORMATION

SYMBOLS

- Hill
- Pit/Depression
- Swamp
- Swampy Lowland Boundry
- OB Cleared, Stripped Area Boundry (with OverBurden)
- Cut Area Boundry
- Road/Bush Road
- 1A X Outcrop (Large/Small)
- Geological Boundry
- 80 Strike and Dip of Inclined Stratum, Faults and veins.
- Strike and Vertical Dip of Stratum
- Fault
- Shear
- Diamond Drill Hole
- Claim Post Located
- Claim Post Assumed
- Building
- Railroad
- Wide Trench or Pit
- QV 5' Quartz Vein with Width
- Narrow Trench
- Small Pit

MARSHALL MINERALS CORP.	
COMPILATION MAP	
Fort	
Project#	SANGOLD PROPERTY EAST GRID
Survey#	
Scale#	1" = 200'
File loc#	
Dwg no#	18
Date#	7-MAY-90
Srvy'd by	
Appr'd by	S. Mudd
Chk'd by	
Dra'n by	NORTHERN GEOTECH