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ASSESSMENT REPORT

GEOLOGICAL PETROLOGICAL AND GEOCHEMICAL WORK ON THE FOLLOWING CLAIMS

CLAIM SHEET 92F/3W

KSAG WEST 1946 (2)

KSAG EAST 1945 (2)

LOCATED AT NORTH END KENNEDY LAKE, B.C.

LATITUDE 49°04'30"

LONGITUDE 125°26'

ALBERNI MINING DIVISION

SOUTHWESTERN BRITISH COLUMBIA

Work between April 23 and December 9, 1984

On Behalf Of

INTERCON PETROLEUM INC.

WEST VANCOUVER, B.C.

REPORT BY

DR. W. D. GROVES, P.Eng.

ARCHAEAN RESOURCES CORP.

VANCOUVER, B. C.

Dated: April 15, 1985

WDG

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ABSTRACT

The 1984 Assessment Work program on the KSAG West - KSAG East Mineral Claims concentrated on a workup of the data around the area of two large aeromagnetic anomalies - one trending northwesterly through the KSAG West claim, partly covered by the four (prior) TONY two post claims, and a northeasterly trending one in the southwest portion of the KSAG East claim.

On the more easterly of the two anomalies, because of weather and access problems, caused by torrential rains (December 6 - 9, 1984), fieldwork on the KSAG East claim was curtailed to a geochem traverse of creek drainages downslope-south of the KSAG EAST magnetic anomaly area. Another visit by the author after the anniversary date to check structural geology of the faulted lime-granite contacts associated with the magnetic anomalies and magnetite-skarn zones (previously mapped by Eastwood, Figure 3) was frustrated in the case of the KSAG East, by snow above 500' level which was too deep for the 4WD.

On the KSAG West claim, a rock geochem and petrology sampling study (Traverse 1A) was carried out April 23, 1984 on the continuation of a NW fault between lime remnants in granite (on the NE) and fine grained intrusive andesite. On the SW the study follows the fault contact passing through the center of the major NW magnetic anomaly from the point where the contact passes NW off the northern edge of the Tony 4 claim. Splits of the rock geochem samples (K-series) were kept for a petrological study of various reaction phases in the contact zone. (Appendix IV)

Another traverse (Traverse 3, Figure 3) was made just east of the Tony-KSAG West margin inside the KSAG West claim, in a southward direction. A half dozen chip samples of the young granite were taken for rock geochem and petrology study. However, generally, the traverse encountered granite outcrop east of the fault gulley at the east boundary of the Tony claims. There is a good possibility that this is in the east side of a fault which has a left-hand offset: (offsetting E side N) and thereby disrupting the "Tony" magnetic anomaly locus. The Draw Mountain E-W to NE magnetic anomaly locus may thus be the faulted extension of the "Tony,"SE to EW one.

An initial partial road traverse (Traverse 1) of KSAG W and KSAG E claims was also

made by the author April 23, 1984, where rock types of the Tertiary intrusive, Karmutsen, contact magnetite-sulphides phase in the Tony contact reaction zone, local garnet skarn, and intrusive andesite characteristic of the area were studied, at the same time the more detailed rock geochem study of the Tony area contact was made on the KSAG West. Results of work to date are presented and discussed in this report. Reference is made to the pre-existing data base developed by Noranda (areomagnetic map), B.P. (Assessment Reports Mowgli 1-6 claims: KSAG West coincides closely with former Mowgli 4, KSAG EAST including part of Mowgli 5), Eastwood (two-inch to the mile scale mapping of the Brynnor iron mine area geology) and other work by the author in the area, which forms a general context for the present work. Focal point of present work was to study the degree of correspondence of precious metal rock and soil geochem values with magnetic mineral assemblages, such as that found on the Tony claims; as distinct from the B.P. model of precious-metal-bearing solution "leakage" up faults into the Parsons Bay Formation, (some of which Hoffman et al map as Tertiary). The southern portion of KSAG East overlaps the northern portions of Mowgli 5 claim.

Main finding from Petrological and chemical analysis, and field contact relations, is that the massive-sulphide -magnetite phase, bearing anomalous arsenic and gold values, and some silver, is phase-distinct from the marginal phase of the intrusive "magnetic andesite" whose margins are somewhat anomalous in copper, with traces of gold and silver, but not in arsenic in the region of the KSAG claims. Also, despite its relations engulfing the upper limestone of the Quatsino group, the late granite is so deficient in, particularly, copper and arsenic, that it is felt unlikely to be the actual progenitor of intrusive/lime contact economic mineralization.

KSAG WEST/KSAG EAST

INTRODUCTION

A. Property - Location, Access, Physiography

The KSAG WEst/KSAG East E-W contiguous block of two 4x5 twenty unit claims, (

long axis E-W), extend from the east shore of Kennedy Lake, east across the upper Draw Creek valley below Draw Lake, and thence eastward over the southern portion of Draw Mountain.

Location is 50 air-kilometers southwest of Port Alberni (about 60 road-kms. via Highway 4), and about 18 air kms northwest of Uclelet.

Logging roads access to the central portion of the claims from the main Brynnor iron mine road east of Highway 4, which continues on southerly to Toquart Bay. Location is shown on Figure 1.

Elevations range from Kennedy Lake level (10m) to 800 meters (top of Draw Mountain). Topography rises steeply from Kennedy Lake to the top of a 320 meter knoll in the middle of the KSAG West claim, thence a broad draw lying across Draw Creek (draining southerly out of Draw Lake on the centerline of the claims north boundary), thence steeply up over the inverted "T" shape of Draw Mountain (the inverted base east-west, the stem consisting of a N-S ridge forming the northern part of the mountain.) Vegetation consists of burned logging slash, partly replanted in Christmas trees, with some uncut stands of yellow cedar, hemlock and spruce. Climate is extremely mild and wet typical of the West coast of Vancouver Island.

B. Status of Property

The KSAG West and KSAG East claims are presently owned by Mr. Ken Gourley, a prospector from 3121 Victoria Drive, Vancouver, B. C. Relevant claim information is summarized below:

Claim Name	Record No.	No. of Units
KSAG WEST	1946 (2)	20 (5Wx4N)
KSAG EAST	1945 (2)	20 (5Ex4N)

The claims are situated in the Alberni Mining division on Claim Map NTS 92F/3W. They are pictorially represented in Figure 2.

C. History

The area was first prospected in a search for the hardrock source of the fine gold magnetite beach and river mouth placers at Wreck Bay (the mouth of Lost Shoe Creek) and on Tofino Inlet at the mouth of the Kennedy River. Large hardrock magnetite deposits in the area were signalled by large compass deflections: the Brynnor open pit magnetite mine (see Brynnor Pit, Figure 1) has so far yieded 4.4 million tons of magnetite ore in the 1950's - 60's.

Essentially the entire area of claim sheet 92F/3W is now held in mineral claims, due to recent interest kindled by the Teck-IPY gold-sulphides Tommy bulk stringer deposit some 10 km to the NE up the Kennedy River. The area also contains numerous small old gold bearing high grade quartz-sulphide fault veins such as those covered by Lost Canyon, Bear Group, Leora and Tommy crown grants. These were discovered and first worked mainly in the period 1902-1914.

The area has been mapped at 1/2 - mile scale by Eastwood (Ref.1), for the B.C. Department of Mines, and at 4 mile scale by Muller for the G.S.C.. The Brynnor pit area has been mined, mapped and extensively diamond drilled for magnetite by the Noranda Corporation. In the 1970's, British Petroleum Minerals had the area around of the iron mine crown grants held under the Mowgli 1-6 claims, and did reconaissance geology and geochemistry. BP was looking mainly for fault-line dissemination gold silver mineralization in the limey argillites of the Parson's Bay formation. B.C. continues to hold the Mowgli 6 claim, in whose Northwest corner is a gold-arsenic-silver occurrence near the contact of a young porphyry stock with late mesozoic or Tertiarty sediments.

Present interest focuses on gold values believed to be associated with large elongate magnetic anomalies crossing the E-W extent of the KSAG claims.

References

1. Geology of the Kennedy Lake Area, Vancouver Island, British Columbia, by G.E.P. Eastwood, B.C. Department of Mines. Bulletin No.55, 1968.

2. Geology and Mineral Deposits of Alberni Map Area, British Columbia (92F). Geological Survey of Canada paper 68-50. J.E.Muller and D.J.T. Carson, 1969.

3. Scientific American, April, 1985, p.50. "The Earth's Hotspots" by Gregory E. Vink, N.Jason Morgan and Peter R. Voigt. (Figure 5).

4. Geological and Geochemical Assessment of the Mowgli 1-6 claims, west coast of Vancouver Island, B.C. Alberni Mining District. NTS 92F/3W and 4E. Lat. 40°3'N, long. 125°30'W. Owned and operated by B.P. Minerals Limited. Part 1 of 2. Report No.9646. Dr. S.J. Hoffman, N. Humphries, B.P. Minerals Limited, November 15, 1981. BPVR 81-23.

5. Noranda Mines: Assessment Work Report, Airborne Geophysical Survey, Brynnor Mine Area.

6. Gold Bearing Deposits on the West Coast of Vancouver Island between Esperanza Inlet and Alberni Canal. Geological survey of Canada Memoir 204 by M.F. Bancroft, No. 2432, 1937.

E. Summary of Work Done

The author, accompanied by owner-prospector Ken Gourley, and Kelly Gourley, made a geological road traverse of the claims area April 23, 1984, at which time a rock geochem traverse of the upper KSAG Creek area was also made.

During the period December 6-9, 1984 inclusive, a stream sediment geochem traverse on southeast Draw mountain (December 7) and rock geochem traverse east of Draw Creek was carried out by Waldo Ejtel, Kelly Gourley and Ken Gourley (December 8, 1984). The author visited the area April 23 and December 9, 1984 and also revisited the area in February, 1985 to check rock types for purposes of the report. Splits of the April 23 and December 8 rock geochem samples were kept for petrological examination by the author to correlate with geochem chemical analysis.

A total of 40 samples were taken for assay - two of these were reference samples from the Tony property (JT-1 magnetite showing, and JT-2 intrusive andesite dyke in limestone.

TECHNICAL DATA AND INTERPRETATION

I. Geology and Petrology

1. Regional Geology

The immediate region is underlain by faulted and intruded remnants of Vancouver Group limestones and calcareous-tuffaceous sediments (Quatsino and Parson's Bay groups), now folded on northerly axes in the Draw Mountain anticline, whose axis passes just to the west of Draw Mountain, and Draw Lake syncline, passing through the KSAG West claim (see Figure 3). These sediments lie on submarine spreading center platform metabasalts (the Karmutsen formation). The Karmutsen platform docked against the North American continent in mid-early Mesozoic time. About 150 million years ago, the area passed north-north westward over a deep-mantle hotspot (Reference 3, Figure 5). The locus left by the relative NW by W movement of the crust over this heat source caused deep-seated vulcanism and faulting: upwelling magma tended to "track" into pre-existing plate defects (such as spreading center lines) for long periods of time until plate movement finally slid the weakness out of range (See Figure 5). The postulated N20°E cross-arc transform depositional and step-graben corridor roughly followed by the upper Kennedy River valley contacted lime units with basaltic magma at depth, the process being ultimately "driven" by the mantle hotspot. One speculates that the Vancouver-group spreading center riftline massive sulphide (black-smoker type) deposits were reworked in a vented system, explosively releasing CO_2 with concommittant block faulting, and allowing residual CaO to slag silicates and sulphides to Ca-Fe-silicates, plus magnetite, and concentrate nobler elements in the residual sulphide phase, some of which remained within the margins of some of the magnetite bodies.

Apparently magnetite and "slag" phases: more or less separated: "slag" phase either fine grained intrusive andesite (chilled by venting) containing limestone and argillite inclusions, or coarse-grained actinolite-rich rock, "magnetite phase": the magnetite-sulphides, which stoped along faults and tended to be contained beneath massive lime units. Later hydrothermal activity caused garnet-skarning of both Parson's Bay, and the andesite in places. More of the limey argillites were engulfed by later dioritic to granitic plutons, (one is dated at 30 million years age), which also caused contact skarning with the lime units. Remnants of the massive lime units are now preserved as undigested lenses in the later intrusions. A late grey porphyritic intrusive is present in dykes and small stocks intruding the other units, which also can carry manganese and precious metals in the contact areas. CO_2 and H_2O-powered pyroclastic extrusive activity up until Tertiary time gave rise to felsic extrusive sheets etc. disrupting the Mesozoic platform: remnants of cone sheets, sheet-vents and collapse structures involving the Bonanza series felsic volcanics are in evidence in the Kennedy river valley, but not in the immediate vicinity of the property. Up-blocks and "windows" of the underlying Sicker arc rocks, believed to underlie the Vancouver Group,are in evidence west of the Brynnor mine.

2. Property Geology and Petrology

Local structure is thus fairly complex, though fault-lead and lime-contained magnetite-sulphide bodies, signalled by extremely large magnetic anomalies in the area are the focal point of present interest. Limestones played a key role in the"smelting" reaction resulting in magnetite, and also in the present geometry containing it. It is quite possible that buried (now reacted) Sicker limestones caused the smelt, and the resulting upwelling magnetite was contained by effervescent cooling against higher (Quatsino) lime. The above speculation is worth considering though not proven by the present data-base. Magnetite in the quantities observed, with the associated peripheral precious metal content, may well result from magma-smelting of smoker type massive sulphide bodies rather than merely magma mafic mineral content reacting with lime.

Interest is focused on two major elongate magnetic anomalies. One passes SEward to eastward through the KSAG West claim, and one passes eastward to NE by E (and branching northward), on the KSAG East claim. There is some basis to believe that the two anomalies are fault displaced segments of one original northward-concave elongate magnetite emplacement structure, probably fault-controlled, but contained by massive limestone members, either below the upper lime unit (KSAG West) or lower one (KSAG East). Present state of erosional uncovering of the section suggests there may be containment under both. The various geological, petrological and geochemistry efforts made in 1984 were directed insofar as possible to work up the meager data base regarding possible gold-silver-copper-zinc-arsenic values associated with various phases of the fault-vented reaction system, particularly the intrusive andesite and sulphide-margined magnetite phases. To this end, two reference samples were taken from the Tony property, where one such magnetite-sulphides showing is on surface, to compare path-finder element signatures with material from the KSAG claims.

A number of general geological observations may be made from traverses looking at contact relations and making use of field relations defined by Eastwood's study of the Brynnor pit geology.

1. The KSAG West-Tony magnetic anomaly and the KSAG East magnetic anomalies are regarded as probably fault-dislocated segments of one original structure. The more E-W portion of this, on both claims indicates the magnetite came up in a SE-E-NE fault of considerable vertical displacement: on the KSAG West, Karmutsen is "stepped" against the upper lime of the Quatsino: (suggesting N-side-down displacement): on the KSAG East, diorite (N of the anomaly) contacts the lower members of the Quatsino: relative block movement is not clear. The block fault NE up Draw Creek near the KSAG West-KSAG East boundary line, along which the anomaly-bearing blocks moved at least 500 meters left-handedly (E side N), also throws younger granite (on the E) against the upper lime (on the W), again suggesting some incidental vertical movement. On the Tony claims, small scale block faulting is evidenced by displacements of the upper lime unit "sandwiched" in both overlying and underlying younger granite, which engulfed

the lime by preferential consumption of the Parson's bay above and below it.

A study of the andesite intrusion west of the KSAG Creek fault showed intensely green reaction rock on the fault merging away from the contact onto the 320 meter knoll just west of the NW corner of Tony 4, into a more dioritic color and composition. It is intrusive, as signalled by lime blocks and fragments in it near the contact, and thus could not be Karmutsen, which predated the Quatsino. The Andesite-Karmutsen contact sketched in the knoll area is not accurately located, but merely represents a boundary which must exist.

Just east of the Tony boundary, going into the valley of Draw Creek, the young granite can be seen both beneath and above the upper lime. Across the creek, only the young granite can be seen.

It is evident from the plot of the axis of the Draw Lake syncline and Draw Mountain anticline on the map (after Eastwood) that the arcing trace of the main magnetic anomaly is by way of a cross-fault. The northward branch of the main anomaly, on the KSAG East, **may** however, be axial plane-fault related. It is unfortunate that snow conditions during much of the work period prevented more detained geological taversing in the region of the magnetic anomaly on the KSAG East claims to further elucidate contact and fault relations. Eastwood's study of the Brynnor pit shows andesite coeval with magnetite, intruding and digesting argillites, and contained under massive lime units, and also following faults. These same general relations exist on the KSAG claims.

A final geological comment is that the lime on the KSAG West is probably the upper lime unit of the Quatsino (in the core of a syncline) and the lime on the Draw Mountain is the lower lime unit (in the core and east flank of an anticline). If so, this suggests a considerable west-side down relative position of KSAG West and KSAG East blocks (across Draw Creek fault).

Petrology of various samples of the K series (along the KSAG Creek fault), J-series (from the young granite) and of reference samples JT-1 (magnetite-sulphides) and JT-2 (andesite dyke cutting upper lime from the Tony claims area) are given in Appendix IV, with Au, Ag, Cu, As, Fe, geochem values appended.

A Field Procedure and Laboratory Analysis

Stream sediment samples were taken by screening fine silt from the middle of the stream or creek through a fine nylon mesh into a plastic bowl. Contents of the bowl were then washed into a marked standard kraft bag. Rock geochemistry/petrology samples were chipped with a steel hammer and placed in a kraft bag.

Acme Analytical Laboratories Ltd. of 852 East Hasting Street, Vancouver, carried out all the test work. Standard sample preparation consisted of drying to 60° and then sieving to -80 mesh. for sediment sampling, and pulverizing rock geochem samples. Parts per million content of all elements (except for gold) was determined by ICP (Inductively Coupled Argon Plasma). Prior to the ICP analysis, each sample (500 grams) was digested with 3 ml of 3:1:3 nitric acid to hydrochloric acid to water at 90°C for one hour, then diluted to 10 ml with water.

Gold content in parts per billion was determined by subjecting ten gram samples to fire Assay preconcentration techniques to produce silver beads: the silver beads were then dissolved and gold content of the resulting solution measured by atomic absorption. This method is apparently sensitive to 1.0 ppb.

B. Stream Sediment Survey Results

a) General

Contained Au/Ag/Cu/Zn/As/Fe metal values for individual stream sediment and rock geochem samples taken during the 1984 program are presented in this report in Figure 4. Sample location sites for the 42 samples taken are shown in Figure 3. The 1984 program partly represents a follow-up of reconnaissance silver-gold geochem results obtained by B.P. Minerals during an earlier regional study of the Mogli 1-6 claims. (Ref. 4)

B. Stream Sediment Survey, Draw Mountain

Seven stream sediment samples were taken December 8, 1984 by Kelly Gourley and prospector Waldo Ejtel from of small southward-flowing streams off the south flank of Draw Mountain where these intersected the main logging roads in the region down-slope from the trace of the major E-W magnetic anomaly. (see locations Figures 3 and 4.)

Results of the analysis are presented in Table 1.

TABLE 1

STREAM SEDIMENTS DRAW MOUNTAIN (TRAVERSE 2)

	pbb Au	ppm Ag	ppm Cu	ppm Zn	ppm As	% Fe
Ke1	1.	.1	38.	48.	8.	5.01
Ke2	1.	.1	31.	47.	5.	4.61
Ke3	1.	.5	42.	73.	17.	3.00
Ke4	1.	.2	43.	86.	9.	3.86
Ke5	1.	.1	33.	43.	3.	3.51
Ke6	1.	.1	39.	70.	5.	4.39
Ke7	3.	.1	50.	54.	7.	3.49

This KSAG E sediment geochem showed about average till signature - with nothing significantly anomalous. Iron enhancement is taken as oxidation not bedrock signature.

However, the above till -derived sediment values are somewhat higher in arsenic and have 10 times the copper levels of the young granite rock geochem. Gold, silver and iron are levels close to the same level in each, whereas zinc in the sediments is about twice that in the granite. (See Table 8)

TABLE 2

ROCK GEOCHEM. KSAG CREEK FAULT. (TRAVERSE 1A)
SOUTH OF BORROW PIT.

	ppb Au	ppm Ag	ppm Cu	ppm Zn	ppm As	% Fe
K1	4.	.1	80	40	3.	4.56
K2	2.	.1	61	50	4.	5.39
K3	9.	.1	9	37	2.	3.48
K4	1.	.1	34	53	7.	4.71
K5	2.	.1	87	57	5.	5.49
K6	1.	.1	79	50	7	5.75
K7	1.	.1	64	41	2.	4.21
K8	2.	.1	15	45	6.	4.88
K9	1.	.2	116	39	5.	3.98

TABLE 3

ROCK GEOCHEM. KSAG CREEK FAULT AREA (TRAVERSE 1A)
ACROSS BORROW PIT

NNW Series K17-K20 incl.

	ppb Au	ppm Ag	ppm Cu	ppm Zn	ppm As	% Fe
K17	6.	.1	133	65	4.	4.40
K18	1.	.3	90	34	3	3.31
K19	2.	.2	127	28	5.	3.54
K20	18	.1	309	55	4.	5.13

Finally Table 4 presents the K10-K15 traverse across the bottom pit toward the Creek/fault in highly fractured green reaction rock.

TABLE 4

ROCK GEOCHEM. KSAG CREEK FAULT AREA (TRAVERSE 1A)
NORTH OF BORROW PIT

	ppb Au	ppm Ag	ppm Cu	ppm Zn	ppm As	% Fe
K10	2.	.1	37	39	3.	3.48
K11	8.	.3	327	38	3.	3.24
K12	3.	.1	143	45	2.	4.21
K13	1.	.2	42	31	6.	3.35
K14	2.	.2	135	46	8.	3.93
K15	1.	.1	94	42	10	4.71

TABLE 5

ROCK GEOCHEM. KSAG CREEK FAULT AREA (TRAVERSE 1A)
GROUP AVE VALUES.

		ppb Au	ppm Ag	ppm Cu	ppm Zn	ppm As	% Fe
Overall 3 groups:	K1-K8 (Table 2)	1.7	.11	74	47	4.7	3.41
	K17-20 (Table 3)	6.75	.17	165	45.5	4.0	4.10
	K10-15 (Table 4)	2.79	.166	129.	40.3	5.3	3.82
Overall ave. K Series groups		3.75	.142	123.	44.2	4.7	3.77%

Compare this signature (overall ave.) Table 5 to JT-2(REF) (The green andesite dyke which cuts the grey limestone E of Tony showing), in Table 6.

TABLE 6

	ppb Au	ppm Ag	ppm Cu	ppm Zn	ppm As	% Fe
Av.K's	3.75	.142	123	44.2	4.7	3.77
JT-2(REF)	3.	.1	85	33	3.	2.19

JT-2 appears to be a member of the same population as the "K" series.

It is unfortunate that several Karmusten samples were not collected to see if the Andesite signature is distinctively different from that of known Karmutsen. It would be useful in determining whether the two units had a co-magmatic origin.

In any case, comparing K-averages to the Tony-switchback samples in Table 7, indicates very different characteristic metal levels and metal ratios in the two populations:-

TABLE 7

	ppb Au	ppm Ag	ppm Cu	ppm Zn	ppm As	% Fe
K.Ave.	3.75	.142	123	44.2	4.7	3.77
JT-1(REF)	80.	1.2	136	25	116.	22.47

In K-av. gold ppb/Fe % ratio is	3.75/3.77	1/1
In JT-1 ref.gold ppb/% Fe ratio is	80./22.47	4/1
ppm silver/% iron ratios K-av.	.142/3.77	1/3
JT-1	1.2/22	1/7

Cu, Zn levels are about the same.

ppm As/% Fe: K-av. = 4.7/3.77 1.3/1
JT-1 = 116/22 5/1

It would seem thus that the JT-1 auriferous-arsenic-iron sulphide/oxide assemblage is the gold bearing one, and the andesite/granite (lime) contact material, per se is not a carrier of comparable levels of gold or silver rock chemistry. The conclusion is that gold is primarily associated with the massive iron sulphide/oxide/arsenide phase whereas the KSAG Creek fault contact, even though it leads off the end of the magnetite showings area, while exhibiting slightly elevated gold-silver rock geochem, and a noticable copper contact, lacks arsenic, and is a separate (even if contiguous) phase as far as the distribution of gold values goes. That is not to say magnetite may not exist at depth along this contact: from the magnetic anomaly, it seems to do so: but the rock geochemistry does in itself not really signal it. There is a good possibility however, that "andesite" and "magnetite" phases are in equilibrium, and that the magnetite phase acted as a powerful extractant of Cu-As-Au-Ag values as a result.

4. Rock Chemistry of Young Granite

(KSAG West, Traverse 3)

TABLE 8

	ppb Au	ppm Ag	pbm Cu	ppm Zn	ppm As	% Fe
J1	1.	.1	2.	27	4.	2.08
J2	1.	.2	2	36	5	2.61
J3	3.	.2	1	29	2	2.73
J4	3.	.1	78	104	5	7.19
J5	1.	.2	6	35	2	2.36
J6	2.	.2	1	31	5	2.43

Av. J1-J6 (excl.J4)	1.4	.18	2.4	32	3.6	2.44%
K22-Granite from NE KSAG West:	1.0	.2	3.	42	2.	2.80

The K22 sample is obviously from the same population. The granite is very low in gold, low in Ag, very Cu-deficient, moderately low in Zn, low in As, low in iron. This corresponds to leuco-granite to alaskite in composition, despite minor mica.

CONCLUSIONS

Reference rock geochem sample (JT-1) comes from the Tony 1 "switchback" showing, an E-W trending massive sulphide-magnetite lense or "boil" enveloped by "intrusive andesite" and capped skarned limestone. The term intrusive andesite seems to include fine grained andesitic composition contorted dykes stoping out of the Granite-Limestone reaction zone, up into unaltered limestone - and surrounded by lime garnet skarn. Sample (JT-1) showed 1.5 ppm Ag and 80 ppb Au on the ICP scan, as well as 25 ppm Zn, 136 ppm Cu, 116 ppm As and 22.37% Fe.

This is believed to represent a qualitatively representative sample of the massive sulphide magnetite phase.

Samples K-1 through K-20 were taken along the green reaction zone on the edge of the block of intrusive andesite, in a NNW traverse (Traverse 1A, Figure 3) along the main logging road from the point it crosses the TONY 4 boundary, to the sharp switchback corner where the road turns back to cross KSAG Creek and the main contact. Of these, K1-K8 are in highly altered green "reaction rock". Samples K10-K15 inclusive were taken NEward for 15 m across a blast pit for road material. This is in a cross-sectional direction across the reaction zone. Slicken sides, fine veining, etc. and fracturing to arrowhead sized fragments, indicates the degree of in-place cleavage. Material is dark green (see Petrological Study K-specimens). Samples

K16-K20 are from a gradually more fine-dioritic-looking phase of the reaction material to the NNW, K-20 being practically a chloritized fine grained diorite.

None of these samples showed a comparable level of gold, silver or arsenic to JT-1. Slightly elevated copper levels were the only non-iron metals present in any appreciable amounts in these various portions of the green reaction zone in the andesite.

To establish a geochemical baseline for the Tertiary granite on the NE of the KSAG Creek fault contact, Sample K-22 was taken in unaltered granite (NE across the contact). See figure 4. Stream sediment sample K-21 was taken from the coarse granite stream sediment where the road crosses KSAG Creek. These carry comparable Au, Ag, Cu, Zn, Fe values to the J-series rock geochem samples taken east of Draw Creek (Traverse 3). See Table 8.

The main conclusion is that Au, Ag, rock geochem values are **not** appreciably anomalous in the KSAG Creek fault, but are rather specifically associated with the sulphide-magnetite phase, also signalled by magnetic anomalies.

Another conclusion is that the young granite is not in particular copper or arsenic-rich enough to be a source of the major magnetite-sulphide phase, despite its weak skarning against the lime. The source of the magnetite-sulphide phase must have been deeper seated.

Respectfully submitted,

William D. Groves.

William D. Groves.

APPENDIX I

WORK COST STATEMENT

FIELD PERSONNEL

Dr. W.D.Groves, P.Eng. (Geological, Chemical Engineering) @ $350/day
Mr. Ken Gourley, Prospector @ $150/day
Mr. Waldo Ejtel, Prospector @ $150/day
Mr. Kelly Gourley, Sampling Assistant @ $100/day

Date	Activity	WDG	KG	WE	Kelly G		
April 23, 1984	Truck traverse						
	Geol. K-series samples	1	1		1		
Dec. 6, 1984	Establish base camp		1	1	1		
Dec. 6, 1984	Traverse KSAG W						
	GRANITE "J" series			1	1		
Dec. 8, 1984	Draw Mountain stream						
	sediment Geochem traverse			1	1		
Dec. 9, 1984	Check sampling work.						
	Geolo. traverse						
	Break camp, sort samples	1	1		1/2		
		2	3	3	4 1/2	=	12 1/2 m/d
		700	450	450	450	=	$2,050

Food	12 1/2 man days @ $30/day	=	$ 375
Field Supplies	(camp rental, sample bags etc) @ $50/day for four days	=	220
Transportation	3 average 3-man trips Vancouver - property Ferry (return $50), gas $50, mileage $.30/km = $90, meals $30	=	660

WDG.

Geochemical Analysis

(30 element ICP, 7 samples 6 element ICP, 33 samples) Acme Invoice No. 85-0209	= 348.30
DIRECT FIELD COSTS AND ASSAYS	= 1,603.00
PROFESSIONAL AND FIELD LABOR	= 2,050.00
TOTAL	3,653.30

REPORT COSTS

Dr.W.D. Groves, report preparation, text, 2 1/2 days @ $350/day	875.00
Initial mapping of result, 1 day @ $350/day	350.00
Petrology study K and J specimens, 1 day @ $350/day	350.00
	1,575.00
George Toop, Draughtsman 12 hours @ $15/hour + 40 blueprints	220.00
Draft typing 4 hours $10/hour	40.00
Word processor 4 hours @ $25/hour	100.00
Map copies, blow up and xerox, jackets etc.	100.00
	$2,035.00
TOTAL	$5,688.00
	==========

WDG.

APPENDIX II

CERTIFICATE, W.D. GROVES, P.ENG.

I, William D. Groves do hereby certify that:

1. I, William D. Groves, am a Consulting Engineer (geological) with an office at 200-675 West Hastings Street, Vancouver, British Columbia.

2. I am a graduate of the University of British Columbia (B.A.Sc. in Geological Engineering, 1960). I am a graduate of the University of Alberta, B.Sc., in Chemical Engineering in 1962, and of the University of British Columbia with a Ph.D. in Chemical Engineering in 1971.

3. I am a registered Professional Engineer in the Province of British Columbia, No.8082.

4. I have practised my profession since 1960.

1. I have visited the KSAG WEST -KSAG EAST property to carry out geochemical sampling and geological work and supervised the work of Prospectors Gourley and Ejtel, and sampler Kelly Gourley between April 24 and December 9, 1984,

6. I have not received directly or indirectly, nor do I expect to receive any interest, direct or indirect, in the KSAG claims, nor do I beneficially own, directly or indirectly any securities of Intercon Petroleum Inc.

Respectfully submitted,

William D. Groves

William D. Groves, Ph.D. P.Eng.

April 15, 1985.

APPENDIX III

ASSAY CERTIFICATES, 1984 ROCK AND SEDIMENT GEOCHEM, KSAG WEST-KSAG EAST CLAIMS.

KSAG ROCK GEOCHEM.

ACME ANALYTICAL LABORATORIES LTD.
852 E.HASTINGS ST.VANCOUVER B.C. V6A 1R6
PHONE 253-3158 DATA LINE 251-1011

DATE RECEIVED: FEB 26 1985

DATE REPORT MAILED: March 4/1985

GEOCHEMICAL ICP ANALYSIS

.500 GRAM SAMPLE IS DIGESTED WITH 3ML 3-1-3 HCL-HNO3-H2O AT 95 DEG. C FOR ONE HOUR AND IS DILUTED TO 10 ML WITH WATER.
THIS LEACH IS PARTIAL FOR MN.FE.CA.P.CR.MG.BA.TI.B.AL.NA.K.W.SI.ZR.CE.SN.Y.NB AND TA. AU DETECTION LIMIT BY ICP IS 3 PPM.
- SAMPLE TYPE: ROCKS AND SEDIMENTS AU* ANALYSIS BY AA FROM 10 GRAM SAMPLE.

ASSAYER: T. Saundry DEAN TOYE OR TOM SAUNDRY. CERTIFIED B.C. ASSAYER

INTERCON PETROLEUM INC. FILE # 85-0209 PAGE 1

KSAG WEST ROCK GEOCHEM, 'TONY' FAULT NW OF TONY BDRY. (K-1 to K-22)

KSAG E/W BDRY, E. OF TONY, GRANITE SAMPLES (J-1 to JT-2)

SAMPLE#	Cu ppm	Ag ppm	Zn ppm	Fe %	As ppm	Au* ppb
K-1	80	.1	40	4.56	3	4
K-2	61	.1	50	5.39	4	2
K-3	9	.1	37	3.48	2	9
K-4	34	.1	53	4.71	7	1
K-5	87	.1	57	5.49	5	2
K-6	79	.1	50	5.75	7	1
K-7	64	.1	41	4.21	2	1
K-8	15	.1	45	4.88	6	2
K-9	116	.2	39	3.93	5	1
K-10	37	.1	39	3.48	3	2
K-11	327	.3	38	3.74	3	8
K-12	143	.1	45	4.21	2	3
K-13	42	.2	31	3.35	6	1
K-14	135	.2	46	3.93	8	2
K-15	94	.1	42	4.71	10	1
K-17	133	.1	65	4.40	4	6
K-18	90	.3	34	3.31	3	1
K-19	127	.2	28	3.54	5	2
K-20	309	.1	55	5.13	4	18
K-21 SED	97	.1	90	5.00	9	8
K-22	3	.2	42	2.80	2	1
J-1	2	.1	27	2.08	4	1
J-2	2	.2	36	2.61	5	1
J-3	1	.2	29	2.73	2	3
J-3B	2	.1	34	2.99	6	3
J-4	78	.1	104	7.19	5	2
J-5	6	.2	35	2.36	2	1
J-6	1	.2	31	2.43	5	2
J-7	11	.1	42	2.89	3	2
JT-1 TONY SW.BK. SHOWING	7136	1.2	25	22.47	116	80
JT-2 DIOR DYKE ^ LS	85	.1	33	2.19	3	3
G-1 SED (CR SED. START 'J')	11	.1	34	3.45	6	1
G-7 SED (CR SED END 'J')	21	.1	84	3.08	6	1
STD C/AU 0.5	63	7.2	131	3.94	37	500

WPG

ACME ANALYTICAL LABORATORIES LTD. 652 E.HASTINGS ST.VANCOUVER B.C. V6A 1R6 PHONE 253-3158 DATA LINE 251-1011

GEOCHEMICAL ICP ANALYSIS

.500 GRAM SAMPLE IS DIGESTED WITH 3ML 3-1-3 HCL-HNO3-H2O AT 95 DEG. C FOR ONE HOUR AND IS DILUTED TO 10 ML WITH WATER.
THIS LEACH IS PARTIAL FOR Mn.Fe.Ca.P.Cr.Mg.Ba.Ti.B.Al.Na.K.W.Si.Zr.Ce.Sn.Y.Nb and Ta. Au DETECTION LIMIT BY ICP IS 3 ppm.
- SAMPLE TYPE: SOILS & ROCKS AU* ANALYSIS BY AA FROM 10 GRAM SAMPLE.

DATE RECEIVED: DEC 14 1984 DATE REPORT MAILED: Dec 19/84 ASSAYER. D. Toye. DEAN TOYE. CERTIFIED B.C. ASSAYER

INTERCON PETROLEUM FILE # 84-3584 PAGE 1

SAMPLE#	Mo ppm	Cu ppm	Pb ppm	Zn ppm	Ag ppm	Ni ppm	Co ppm	Mn ppm	Fe %	As ppm	U ppm	Au ppm	Th ppm	Sr ppm	Cd ppm
KE-1	2	38	15	48	.1	10	12	663	5.01	8	5	ND	2	17	1
KE-2	2	31	15	47	.1	11	11	643	4.61	5	5	ND	2	19	1
KE-3	1	42	17	73	.5	12	9	881	3.00	17	5	ND	2	29	1
KE-4	2	43	17	86	.2	11	10	937	3.86	9	5	ND	3	33	1
KE-5	1	33	10	43	.1	7	7	483	3.51	3	5	ND	2	20	1
KE-6	2	39	20	70	.1	9	12	1280	4.39	5	5	ND	3	23	1
KE-7	2	50	9	54	.1	12	12	946	3.49	7	5	ND	2	17	1
SULPHIDE BOADER 7353 ROCK	2	63	29	45	.1	55	29	56	15.88	20	5	ND	3	2	1
7361 ROCK	9	38	128	97	1.5	6	9	262	4.01	37	5	ND	4	8	1
STD C/AU 0.5	19	60	39	126	7.0	67	26	1085	3.94	42	18	7	36	49	16

SAMPLE#	Sb ppm	Bi ppm	V ppm	Ca %	P %	La ppm	Cr ppm	Mg %	Ba ppm	Ti %	B ppm	Al %	Na %	K %	W ppm	Au* ppb
KE-1	2	2	106	.26	.11	8	21	.61	30	.16	8	3.34	.02	.03	2	1
KE-2	2	2	104	.28	.07	5	23	.77	28	.17	5	2.27	.01	.02	2	1
KE-3	2	2	63	.88	.08	9	17	.93	45	.11	8	2.81	.01	.01	2	1
KE-4	2	2	97	.94	.08	8	16	.89	54	.16	14	2.92	.02	.03	2	1
KE-5	2	2	90	.36	.05	6	15	.56	33	.16	6	1.85	.02	.02	2	1
KE-6	2	2	107	.40	.07	7	20	.81	46	.19	7	2.88	.02	.02	2	1
KE-7	2	2	85	.27	.08	9	22	.79	22	.20	8	4.04	.01	.01	2	3
SULPHIDE BOADER 7353 ROCK	2	21	4	.06	.01	2	1	.04	5	.01	7	.07	.01	.01	2	2
7361 ROCK	2	5	15	.54	.04	4	1	.20	27	.05	15	.59	.01	.17	2	19
STD C/AU 0.5	16	19	58	.44	.14	37	56	.88	176	.07	37	1.72	.06	.10	12	505

Stream Sed. + Rock Geochem
Traverse: K.G. + W. Ejkel. Work:
KSAG. E. Trav. Dec 8/84.
Rds. up. Draw Mtn.

u36

APPENDIX IV

PETROLOGY, K + J SERIES SAMPLES.

	ppb Au	ppm Ag	ppm Cu	ppm Zn	ppm As	% Fe
K1	4.	.1	80.	40.	3.	4.56

Very fine grained medium grey andesite. Fine blocky suborthogonal fracture. Few hairline white carbonate or felsic fracture fillings. Slight manganese bloom on internal cleavages. Trace of very fine syngenetic sulphides. Shattered rather than sheared texture. No appreciable mineralization.

	ppb Au	ppm Ag	ppm Cu	ppm Zn	ppm As	% Fe
K2	2.	.1	61.	50	4.	5.39

Same formation as K1. Very fine grained fractured medium grey andesite. Two 1 mm intersecting veinlets of quartz-carbonate unmineralized. Pale ochre-brown weathering, some MnO_2 on internal fractures. Very small amount of almost microscopically fine disseminated sulphide, otherwise unmineralized. In texture, looks like a slightly hornfelsed argillite.

	ppb Au	ppm Ag	ppm Cu	ppm Zn	ppm As	% Fe
K3	9.	.1	9.	37	2.	3.48

Lower copper and iron than K1 and K2. Light pale green, buff-weathering feldspathic zone, looks like Bonanza (may be Bonanza fragment). 50% of the sample is a drusy quartz augen, as in a flow-top structure. However, quartz containing small angular inclusions of the felsic host rock is unmineralized. Shear texture around the augen.

	ppb Au	ppm Ag	ppm Cu	ppm Zn	ppm As	% Fe
K4	1.	.1	34.	53	7.	4.71

Very fine grained to aphanitic textured highly fractured slightly horsfelsed andesite. Like K1 and K2. Pale buff weathering. Pale apple-green epidote-lined slickenside on one rock. Rock crisscrossed by hairline quartz carbonate fracture fillings. No visible sulphides. Another fragment has purple manganese-bloom fractures, some slickensided. Another fragment is a bleached felsic rock similar to K3.

	ppb	ppm	ppm	ppm	ppm	%
	Au	Ag	Cu	Zn	As	Fe
K5	2.	.1	87.	57.	5	5.49

Very fine grained medium grey-green andesite. Earthy brown suface fractures. Composition is somewhat feldspathic. Unmineralized.

	ppb	ppm	ppm	ppm	ppm	%
	Au	Ag	Cu	Zn	As	Fe
K6	1.	.1	79	50	7.	5.75

Fine grained medium grey andesite. Texture fresh on largest fragement, faint internal plum-black MnO_2 stains on partings. Intrusive texture. Other fragments: finely cleaved aphanitic-textured, buff weathering, selective leaching of fracture fillings on weathered surface. One fragment quite feldspathic. Unmineralized.

	ppb	ppm	ppm	ppm	ppm	%
	Au	Ag	Cu	Zn	As	Fe
K7	1.	.1	64	41.	2.	4.21

Fine grained fresh light to medium grey andesite. Fragments are laced with hairline epidote-carbonate-quartz filled fractures. Texture quite fresh. Slight MnO_2 "bloom" on internal fractures. Unmineralized.

	ppb	ppm	ppm	ppm	ppm	%
	Au	Ag	Cu	Zn	As	Fe
K8	2.	.1	15.	45.	6.	4.88

Slightly elevated level of silver in the geochem. No visible sulphides. Pale to medium grey very fine grained andesite. Weathers like Bozanza - slightly slickensided epidotized subplanar fractures, pitted weathered surface, several feldspar-quartz-carbonate fracture fillings. Unmineralized.

	ppb	ppm	ppm	ppm	ppm	%
	Au	Ag	Cu	Zn	As	Fe
K9	1.	.2	116.	39.	5.	3.98

Slightly elevated level of copper in geochem. Fine grained medium grey andesite. Uneven crumble fracture, white felsic hairline crackle weathering on internal fractures. Some manganese staining on internal fractures. Somewhat diabasic texture. Mo visible mineralization.

K-Series, Cross-strike Traverse.

	ppb	ppm	ppm	ppm	ppm	%
	Au	Ag	Cu	Zn	As	Fe
K10	2.	.1	37.	39.	3.	3.48

Blast-borrow pit, SE side. Medium grained amphibolite, glossy plum-black on fresh fractured surface (1 fragment). Weathers lighter colored, some alteration carbonate. Another fragment: Fine grained andesite in composition, muddy whitish yellow internal fracture fillings. Another fragment: slight plum MnO_2 shear on fractures, and muddy ochre to white alteration material in partings. Another fragment: weathered epidote-slickenside wafer. No visible sulphides.

	ppb	ppm	ppm	ppm	ppm	%
	Au	ag	Cu	Zn	As	Fe
K11	8.	.3	327.	38.	3.	3.24

Somewhat elevated gold, silver, copper values. Heavy black slickensided amphibolite containing an irregular inclusion of silicified calc-silicates after limestone. (An inclusion of the limestone.) Glossy slickensides have a bronzy to glossy black lustre. Fine epidote or green dropside margining the inclusions in places. Contains magnetite some of which has steel-grey slickensides accounting for specimen's unusual density and also probably for elevated Au/Ag/Cu values. Other fragments - spear-cleaved, glossy black to epidote green quartz-carbonate alteration in fractures. Fractures somewhat slickensided, plum blue black. Percent iron does not seem to indicate magnetite suggested by unusual density.

	ppb	ppm	ppm	ppm	ppm	%
	Au	Ag	Cu	Zn	As	Fe
K12	3.	.1	143.	45.	2.	4.21

Somewhat elevated gold and copper values. Single large fragment of fine grained amphibolite, with slickensided glossy black cleavages, and laced with quartz veinlets margined by green epidote giving rock overall dark green color. Texture - highly sheared.

	ppb	ppm	ppm	ppm	ppm	%
	Au	Ag	Cu	Zn	As	Fe
K13	1.	.2	42.	31.	6.	3.35

Fine grained highly crumble-fractured dark grey andesite to amphibolite. Weathers light pitted green like Bonanza. Internal cleavages somewhat slickensided, contains numerous 1 mm to hairline epidote margined white quartz partings and veinlets. Some are laminated and slickensided. Rock has overall blacky green hue. No visible mineralization.

	ppb	ppm	ppm	ppm	ppm	%
	Au	Ag	Cu	Zn	As	Fe
K14	2.	.2	135	46.	8.	3.93

Highly slickensided glossy black sufaced sheared amphibolite. Green epidote on slickensides gives overall blacky green color to sample. Fine-crumbly shatter, net-veined by tiny quartz-carbonate-epidote fracture fillings. Other slickensides black-plum colored suggesting magnetite films. Slightly elevated gold, silver -copper values.

	ppb	ppm	ppm	ppm	ppm	%
	Au	Ag	Cu	Zn	As	Fe
K15	1.	.1	94.	42.	10.	4.71

Slightly elevated copper, iron content. Fine grained andesite to amphibolite. Glossy black blocky fracture. Sub parallel hairline to 1 mm fracture fillings of quartz-epidote. Cleavages visibly slickensided. No visible sulphides. slickensides may be developing magnetite films.

Northwest Contact, NW of Borrow Pit

	ppb	ppm	ppm	ppm	ppm	%
	Au	Ag	Cu	Zn	As	Fe
K17	6.	.1	133.	65.	4.	4.40

Somewhat elevated gold and copper values. Very fine grained blackish green to magnetite colored andesite, with magnetite film Slickensides and quartz-carbonate-epidote fracture fillings. Texture highly shattered.

	ppb	ppm	ppm	ppm	ppm	%
	Au	Ag	Cu	Zn	As	FE
K18	1.	.3	90.	34.	3.3.31	

Very fine grained extremely shattered amphibolite to andesite. Green epidote absent. Some steely colored slickensides. Muddy carbonate film alteration material on cleavages.

	ppb	ppm	ppm	ppm	ppm	%
	Au	Ag	Cu	Zn	As	Fe
K19	2.	.3	127.	28.	5.	3.54

Slightly elevated gold, silver, copper values. Dark fine grained andesite to aphibolite. Intersecting subplanar cleavages, coated with muddy carbonate alteration fracture fillings. Fresher partings show serpentenization

	ppb	ppm	ppm	ppm	ppm	%
	Au	Ag	Cu	Zn	As	%
K20	18.	.1	309.	55.	4.5.13	

Elevated gold, copper, iron Content. Minutely fractured aphanitic slightly hornfelsed dark grey andesite. Network of hairline fractures, some showing slightly rusty weathering, most containing carbonate-epidote alteration veinlets. Some plum-colored MnO_2 films on internal fractures.

NOTE K20 represents end of traverse along KSAG creek fault.

K21 Granite-sand-stream sediment sample. NOT retained for petrology.

	ppb	ppm	ppm	ppm	ppm	%
	Au	Ag	Cu	Zn	As	Fe
K22	1.	.2	3.	42.	2.	2.80

Sample of young granite from 200 m northwest of KSAG creek contact. Granite in this vicinity contains various remnants of the limestone. The particular sample is not close to an inclusion. Quartz diorite, medium grained, 10% mafics. Feldspar whitish grey to white. Mafics mostly fine hornblende, plus bronzite to pale biotite 5% of rock. Occasional epidote partings. Contains a pale fuschia mineral, probably faintly colored quartz in some specimens. Geochem shows low contained metal values. Compositions not noticeably different from the J-series granite samples.

	ppb	ppm	ppm	ppm	ppm	%
	Au	Ag	Cu	Zn	As	Fe
J3	3.	.2	1.	29	2.	2.73

Another sample of the young granite from the Tony-KSAG west boundary area. Fragment of granite. Top surface is the weathered surface in which quartz composing about 10% of the rock, weathers up on the rough-pitted surface, feldspars weather to chalk, and mafics bleach and disappear. In the fresh surface, 10% black glossy-cleaved mafics, exhibiting a metallic sheen, are visible. Most of the specimen is medium grained subhedral feldspar grains.

REFERENCE SAMPLES FROM "TONY" PROPERTY

	ppb	ppm	ppm	ppm	ppm	%
	Au	Ag	Cu	Zn	As	Fe
JT1	80.	1.2	136.	25.	116.	22.47

Interbanded magnetite-pyrhotite-arsenopyrite. Weathered surface is manganese to ochre brown-black to rusty. Fine grained texture, shows small scale crushing of sulphides. Magnetic. Highly anomalous in gold, arsenic, iron, somewhat anomalous silver, copper. Low in zinc. Heavy, dense.

	ppb	ppm	ppm	ppm	ppm	%
	Au	Ag	Cu	Zn	As	Fe
JT2	3.	.1	85.	33.	3.	2.19

Fresh fine grained grey andesite to amhibolite, thin carbonate film on internal fractures. Has same chemical signature as K-series, more or less. This was a dyke cutting up into unreacted lime near the andesite-lime contact.

END STUDY. WDG

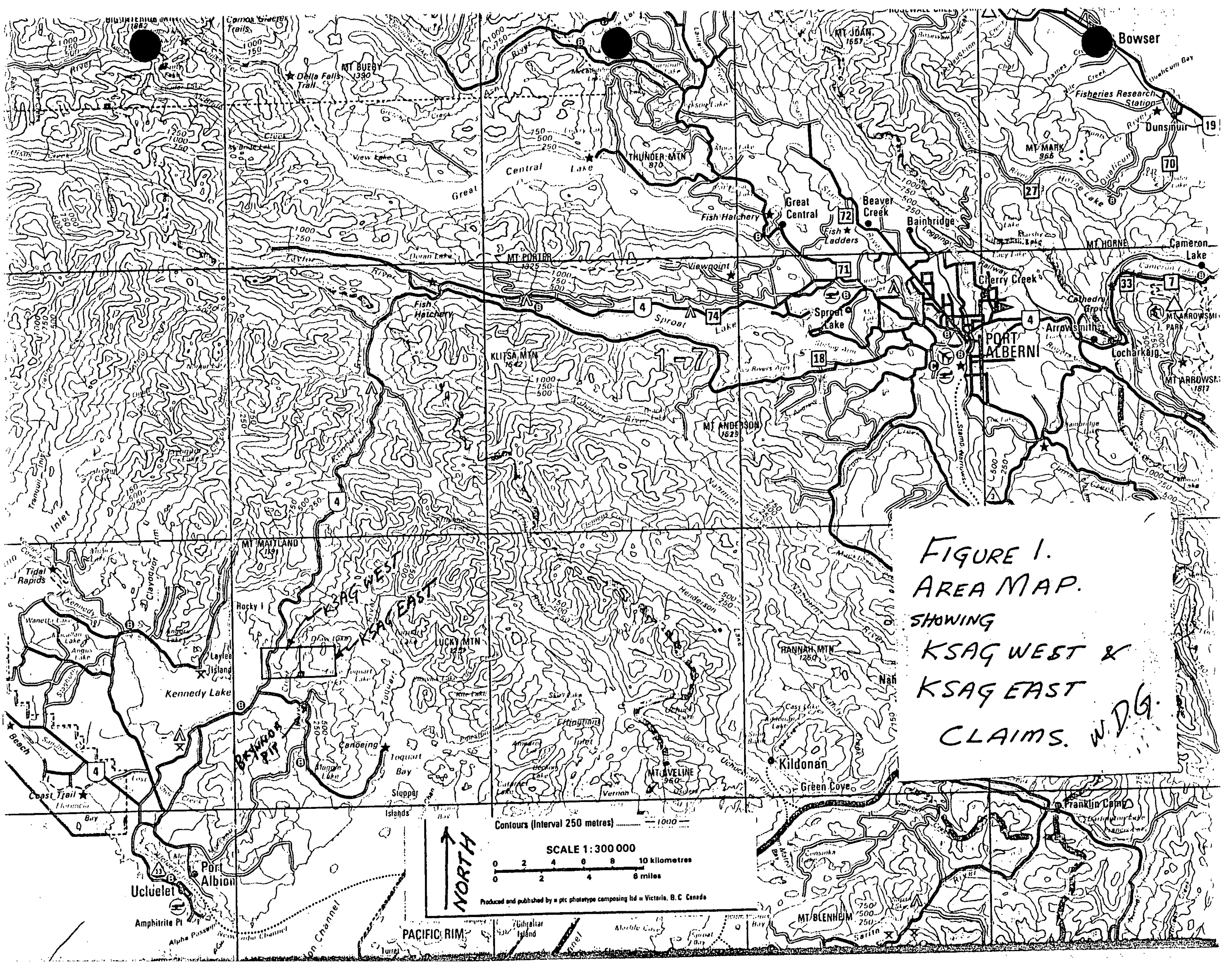


FIGURE 1.
AREA MAP.
SHOWING
KSAG WEST &
KSAG EAST
CLAIMS. W.D.G.

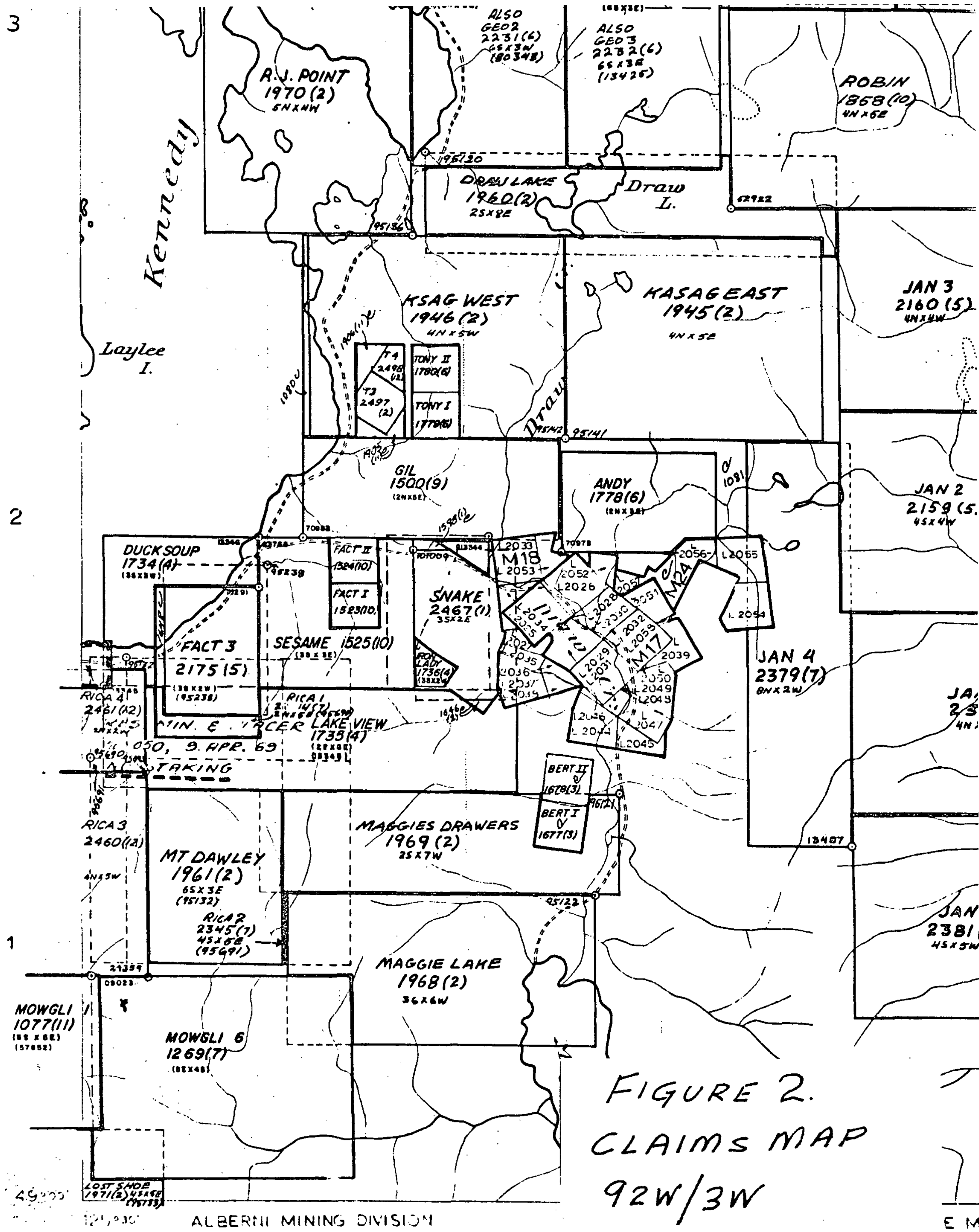
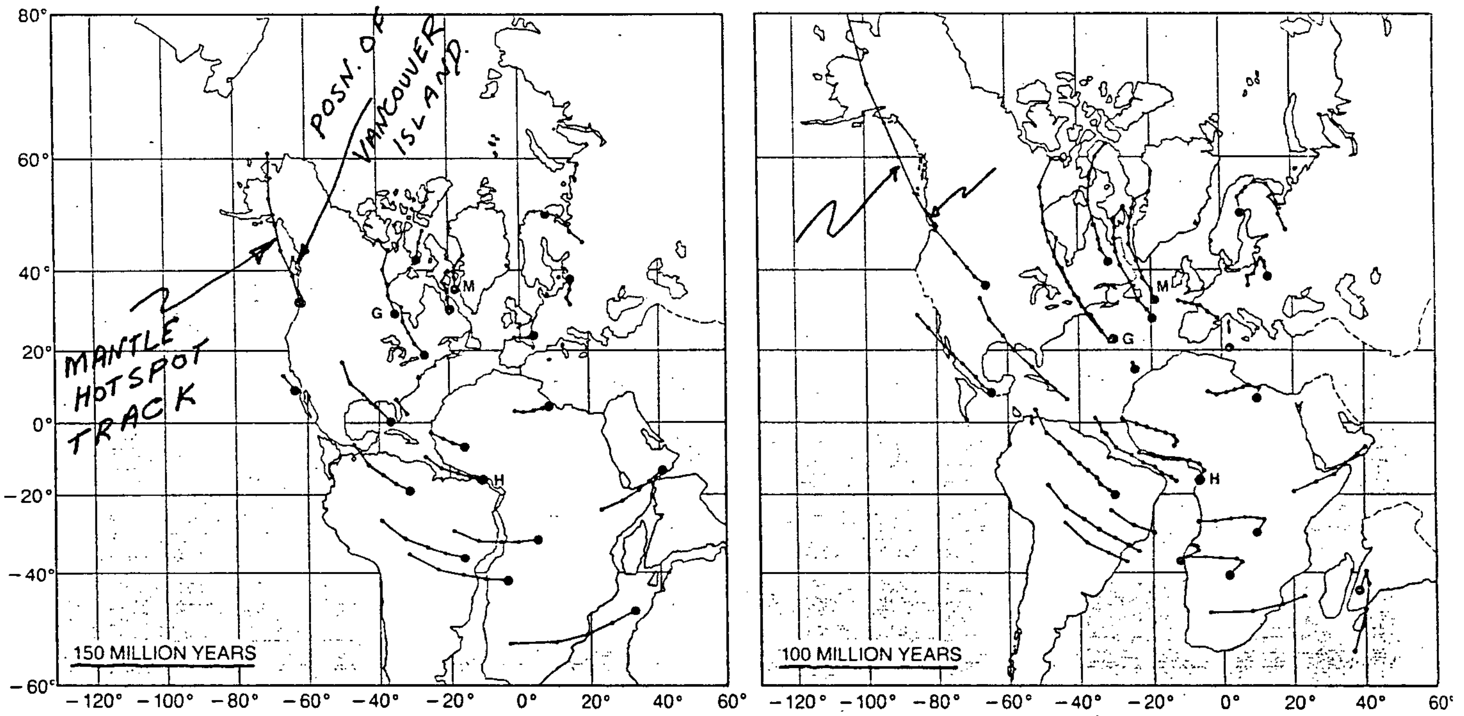


FIGURE 2.
CLAIMS MAP
92W/3W
SHOWING KSAG CLAIMS.

For up-to-date information on claims in any area apply to the Mining Recorder for the

ND
VICTORIA

WP 6.



HOT-SPOT TRACKS reveal how the plates have moved with respect to the earth's interior during the opening of the Atlantic Ocean. Because the hot spots (*large dots*) are anchored deep in the mantle, they remain relatively fixed; that is, their latitude and longitude remain unchanged. The tracks consist of extinct volcanoes, magma intrusions and swells in the crust formed by the upwelling plumes and then carried away by the plates. Each small dot represents 10 million years of plate motion. In reconstructing the plate motions one begins with one or two well-defined tracks, such as that of the Great Meteor hot spot (*G*), which also formed the New England Seamounts and magma intrusions in the White Mountains. The tracks of other hot spots are then calculated from the recon-

FIGURE 5. POSITION OF MANTLE HOTSPOT TRACK REINFORCING PLATE-TECTONIC VULCANISM AT NORTH AMERICAN CONTINENTAL - PACIFIC PLATE BOUNDARY IN MESOZOIC TIME. (FROM APR/85 SCIENTIFIC AMERICAN, REF 3.)

KSAG. A.W. R / INTERCON PETROLEUM.

wpg.


GEOLOGICAL BRANCH
ASSESSMENT REPORT
13,612
KSAG WEST
KSAG EAST
TONY 1
TONY 2
TONY 3
TONY 4
Ksag Lake
Draw Lake
Kennedy Lake
Draw Mountain
HWY 4
KARMUTSEN
YOUNG GRANITE
DIORITE
QUATSINO LIME
SWAMP (LOGGED)
DRAW LAKE SYNCLINE AXIS
DRAW MOUNTAIN 10°S PLUNGE ANTICLINE AXIS
MAPPED AT DRIFT
MAPPED AS KARMUTSEN
SEVERELY SMALL-BLOCK FAULTED
F.G. INTRUSIVE ROCK
ANDESITE-DIORITE
GREEN REACTION ROCK
TONY SHOWING MAGNETITE-SULPHIDES-SKARN (AU)
50m GREY XLINE LIME
CONTORTED F.G. ANDESITE (CONTACT ROCK) NR. CONTACT STOPING DYKES INTO LIME
10 m. GREEN 'andesite' dyke. CUTTING (L.S.)
TRUCK TRAVERSE APR. 23/84
W.E. + K.G. TRAVERSE
LCP
FOUR TONY 2-POST CLAIMS (EXCLUDED)
ACCESS RD. TO TONY I KSAG WEST, FROM IRON MINE ROAD
ACCESS RD. TO DRAW MTN. FROM IRON MINE ROAD
OUT TO IRON MINE ROAD
passes through Brynnor Pit
LOGGED XMAS TREES
LEGEND
ROAD
STREAM
CLAIM LINE
ROCK SOIL TRAVERSE
APPROX. AXIS OF MAJOR AERO MAGNETIC ANOMALY
CONTACT
FAULT
ANTICLINE
SYNCLINE
Scale 1: 5000
0 50 100 200 300 400 500 metres
INTERCON PETROLEUM LTD.
KSAG EAST, KSAG WEST CLAIMS
TRAVERSES, SAMPLE POINTS GEOLOGY, GEOLOGY NOTES
W.D.G.
Drawn: W.D.G., G.T.
Date: APRIL 1985
N.T.S. 92 F/3W
Figure: 3


GEOLOGICAL BRANCH
ASSESSMENT REPORT
13,612
KSAG WEST
KSAG EAST
TONY 1
TONY 2
TONY 3
TONY 4
Ksag Lake
Draw Lake
Kennedy Lake
Draw Mountain
HWY 4
SWAMP (LOGGED)
Draw Creek
APR 23/84 TRUCK TRAVERSE
LCP
FOUR TONY 2-POST CLAIMS (EXCLUDED)
ACCESS RD. TO TONY I KSAG WEST, FROM IRON MINE ROAD
ACCESS RD. TO DRAW MTN. FROM IRON MINE ROAD
OUT TO IRON MINE ROAD
LOGGED XMAS TREES
LEGEND
ROAD
STREAM
ROCK GEOCHEM PETROLOGY
SOIL OR SED. GEOCHEM.
TRAVERSE
APPROX. AXIS OF MAJOR AERO MAGNETIC ANOMALY
KE-1 1 / .1 / 38 / 48 / 8 / 5.01
Au ppb Ag Cu Zn As ppm Fe %
Scale 1:5000
0 50 100 200 300 400 500 metres
INTERCON PETROLEUM LTD.
KSAG EAST, KSAG WEST CLAIMS
ROCK SAMPLES plus STREAM SEDIMENT GEOCHEM.
Au, Ag, Cu, Zn, As, Fe W.D.G.
Drawn: W.D.G., G.T.
Date: APRIL 1985
N.T.S. 92 F/3W
Figure: 4