GEOPHYSICAL REPORT

AIR AND CAP CLAIMS

TRAIL CREEK MINING DIVISION

82 F / 4

49° 3 ' N, 117° 49 ' W

Owner: Rubicon Resources Ltd.

Operator: Rubicon Resources Ltd.

Author: D. K. Bragg

Date: March 15, 1985

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INTRODUCTION

The Rossland mining camp in its hayday was one of the major gold and silver producers of British Columbia. It had its beginning in the early I890's when some of the first claims were staked. Since then the camp has produced in excess of some five million tons of ore. Since the late I920's little production has taken place except for leasors on some of the old properties and the production from the southern flank of Red Mountain.

It was in the Rossland Camp that the Consolidated Mining and Smelting Company got the start that enabled it to become one of the worlds major producer of lead, zinc, and silver. The company is now Cominco.

Most of the early production was centered around the northern and western part of the camp where the veins were predominantly copper and gold producers ie: the War Eagle, Centre Star and the Le Roi claims. However many properties satellite to the main producing area were discovered. It is on these satellite properties that most of the recent exploration has taken place,although sporadic.

The writer has been involved in the Rossland camp since I970 and was actively mining on the Blue Bird crown grant from I972 to I976. Since then he has been involved in exploration on claims mainly in the south belt.

The Air I, I2 units, and the Cap claim, 6 units, were located in Jan. I98I. The claims were overflown by the Helicopter Magnetic and Electromagnetic Survey, which report dated March 25, I98I by Apex Surveys Ltd. was filed for assessment requirements. There is relatively no records of any prior work having been done in this immediate vicinity.

This report covers the first field work on the ground by the present owners. The airborne survey had indicated a northerly trending low in the southwest portion of the Air claim with magnetic highs on either side of the low. The purpose of this survey was to see if these magnetic expressions could be delineated on the ground and to see if the magnetic expressions could be explained by follow up on the ground.

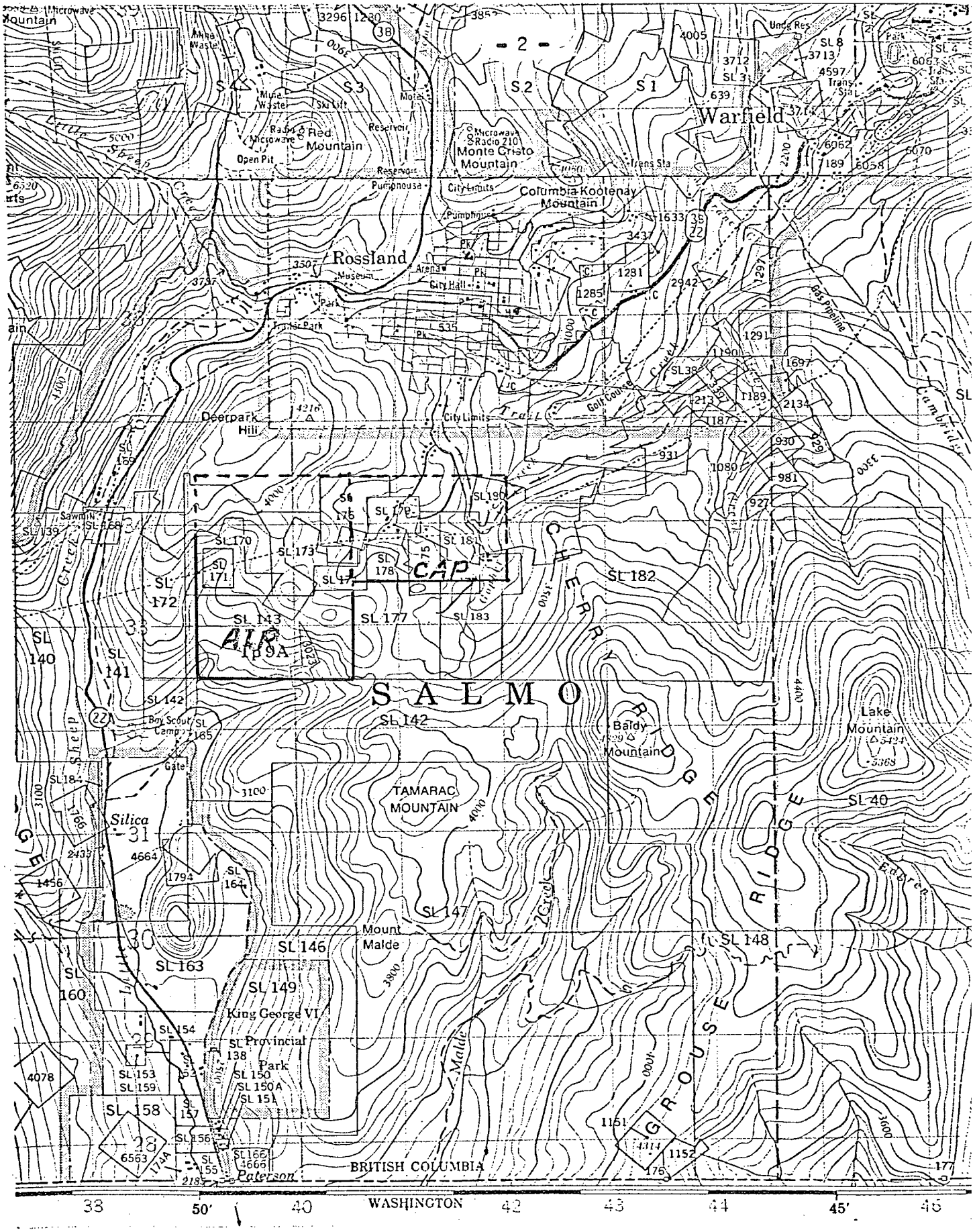

Fig. I
Index Map

Location of the Air I and Cap Claims

ROSSLAND-TRA

BRITISH COLUMBIA

Scale 1 50 000 Échelle

Miles 1 0 1

PROPERTY LOCATION AND ACCESSIBILITY

The Air I claim on which this work was performed lies south of Deerpark Hill and to the east of Highway 22. The centre of the claim is approximately 3.5 km southwest of the City of Rossland. Elevations on the claim range from 850 to I300 metres on southern rocky slopes. Access to the southern portion of the claim is by means of the old abandoned rail grade to North Port Wash. and by old logging roads from Highway 22, most of which are impassible to vehicles at this time due to washouts. The working area lies I.5 walking kilometers east of Highway 22.

The area of the current survey has been recently logged and in places the new growth of commercial timber is mot well established and much of the area is choked with non commercial scrub that, along with the steep rocky slopes, makes traversing difficult and slow in places.

GEOLOGY

The Rossland area is underlain by sedimentary and volcanic rocks which have been intruded and metamorphosed by igneous rocks (see G. S. C. Memoir 308 by L. W. Little).

The oldest formation is the Mount Roberts Formation (Pennsylvanian) which are sediments consisting of slates, limestones, quartzites and green stones (andesites and banded tuffs).

This in turn is overlain by the Rossland Formation (Lower Jurassic) which consists mainly of lava flows of andesetic to basaltic composition, augite porphry, and bodies of tuff and argillite.

The above rocks in turn have been intruded by a number of different intrusions in the following sequence:

Ultrabasic intrusions	(Lower Cretaceous)	serpentinized peridotite
Rossland Monzonite	(Lower Cretaceous)	Monzonite
Nelson Plutonic rocks	(Lower Cretaceous)	Granite and other phases
Coryell Plutonic rocks	(Tertiary)	alkali granite and syenite
Sheppard Intrusions	(Tertiary)	alkali granite and syenite

Most of all these formations have been subjected to faulting and the intrusion of numerous dykes of various composition from monzonites to basalts. In general these dykes are steeply dipping and trend to the north.

In the area to the south and south east of Rossland there are east west fractures or faults along which mineralized stopes are formed. These stopes seem to be well developed vertically, but are limited horizontally. One such stope on the Blue Bird crown grant measures about a hundred feet horizontally and has been drilled vertically to a depth of two hundred and forty feet and is still open downward.

There are two known mineralized fractures of considerable length in what is known as the south belt. The Blue Bird - Mayflower vein system has been traced over a distance of 1200 meters from the eastern portion of the Hattie Brown crown grant through the Blue Bird, Copper Queen, Olla Podrida and on to the Alfi crown grant and still may be open on both ends. The second vein system is the Homestake vein, and although it is not known for certain that this is a continuous system, mineralization has been found along a strike distance of 2200 metres. This system runs through the Monday, Homestake, Gopher, Maid of Erin, Robert E. Lee, Celtic Queen crown grants and on to the S D R claim.

There are numerous other short fractures in the area along which mineralization has been found, but since information is scarce and it is not known whether these mineralized occurances are aligned along continuous fracture systems.

FIELD WORK

On April 30, 1984 a magnetometer survey grid was started on the south west portion of the Air I claim. The 4 S, 2 W identification post was given the co ordinates 70+00 S, 28+75 E. The lines were run 25 metres apart with stations being established every five matres along the lines. A total of 6.I kilometers of line were run using a compass and topochain for controll.

Three base stations were set up on the area to be surveyed and numerous readings were taken prior to commencing the readings on the lines in order to establish an average reading for each base station to maintain controll for the diurnal fluctuations. The magnetometer had previously been calibrated at a controll station for all the surveys so that the lower range scales on the magnetometer would be used in the survey. As the survey progressed these three base stations were checked into on a regular basis in order to monitor the diurnal drift.

About I250 readings were taken over the grid lines using a McPhar M 700 vertical field magnetometer which works on the fluxgate principle. During the survey 82 duplicate readings were taken as a controll over the continuity of the survey and correlation of the readings already taken.

All the readings were corrected for the diurnal fluctuations. These readings were then plotted on a map to the scale of I - 500 and the results were then contoured at I00 gamma interval.

Due to time constraints the magnetometer was not run over the two most westerly lines. Although at the time of the field work the results had not been plotted some time was spent in trying to establish what might be causing some of the magnetic highs and lows. Some time was spent prospecting around the higher readings to see if any structure or mineralization could be found that could explain the highs. Some geology of the area was mapped but as only limited time was spent not enough was mapped to include it with this report.

RESULTS

The most striking feature of the plotted results is the northerly trending series of lows with an axial trend along line 26+75 E that completely truncates the axial trends of the magnetometer highs. While in the field it was thought that the readings along lines 26+50 E and 26+75 E were the result of a systematic error that was giving the lows along the two lines. However of the 82 duplicate readings that were taken 50 of the readings were within 25 gammas, 15 had been duplicated between 25 and 50 gammas and most of the 17 readings that were over 50 gammas were on steep gradients. The two lines are along a small stream that is thought to follow along a fault that has eroded to form a northerly trending basin. The basin is all drift covered so that prospecting the area could not establish evidence of the fault.

There is a strong linear anomaly with an axial trend of S 80° W through 29+75 E, 68+15 S and 25+50 E 68+25 S with corresponding lows that have roughly the same axial trends both to the north and to the south of the high. The range of the high magnetometer readings along this anomaly varies from 600 gammas to 900 gammas. This anomaly has been truncated by the northerly trending fault. That portion of the anomaly to the west of the fault is reflective of vein type mineralization found elsewhere in the camp. That portion of the anomaly to the east of the fault is broader and seems more broken. It is suspected that it may be reflective of possibly two veins that are parellel and at depth.

In the north west corner of the survey area it would appear that the survey has just caught the edge of another strong anomaly with a gamma range of over 1300 gammas. Little can be said of this anomaly until farther work is done in the area. There are five other small spot highs in the survey area that do seem to fallow along east west trending axis but are perhaps of little importance.

The rocks of the immediate area are of the Rossland Formation and consist of interbedded volcanic flows, tuffs, clastics and cherty sediments.

CONCLUSIONS

The field magnetometer survey did delineate the magnetic expressions that had been picked up in the airborne Magnetometer Survey of I98I. The axial trends that are indicated by the survey are different than those found south and south east of Rossland in the area of the BlueBird crown grant, and the Hillside and Tigre claims where the axial trends are N 80° W. The axial trends of this survey area are the same found on the Morning Star Lot 3023 just 580 metres to the east and on the Ida May group two kilometers north north west of the City of Rossland. The results of this survey suggest that the geological mapping of the area be continued and that the magnetometer survey be continued beyond what has been done.

STATEMENT OF COSTS

D. K. Bragg	April 30, I984 ½ day May 28, 29, 30, I984 3 days Total 3½ days at $ I80.00 / day	$ 630.00
E. S. Warner	April 30, I984 ½ day May 2I, I984 ½ day May 28, 29, 30 I984 3days Total 4 days at $ I80.00 / day	$ 720.00
Board	7½ days at $ 40.00 per man day	$ 300.00
Truck	3½ days at $ 50.00 per day	$ I75.00
Equipment rent and field supplies		$ 75.00
Pro rated transportation costs to Rossland and return		$ I00.00
Report preperation and costs		$ 560.00
	Total	$ 2560.00
	P A C withdrawl	$ I040.00
	Total	$ 3600.00

D. K. Bragg

STATMENT OF QUALIFICATIONS

D.K. Bragg supervised and did most of the work involved in this investigation, including the line cutting, prospecting, mapping the geology, soil sampling, magnetometer survey and report preparation. His qualifications are as follows:

Graduated Armstrong High School, Armstrong B.C. 1951.

Attended U.B.C. from 1958 to 1962 in the faculty of Arts and Science, in Honors Geology.

Has worked in the mineral exploration industry since 1956.

Worked for Kennco Explorations during the summers of 1956, 1957, and 1959 in the Yukon and northern B.C. as an assistant prospector and geochem sampler under the direction of Dr. R Campbell and R. Woodcock.

Worked as head prospector for the Nahanni 60 Syndicate in the Northwest Territories in 1960 under the direction of Doug Wilmont.

Worked as head prospector in the Yukon for Dualco in 1961 under the supervision of E.Wozniak.

Worked as head prospector for Mining Corp. of Canada in southwest B.C. in 1962 under J.S. Scott and Dr. K. Northcote.

Worked as head prospector during the summer of 1963 for the Francis River Syndicate, in the central Yukon, under the direction of Dr. A. Aho.

Worked as field geologist in the Greenwood area of B.C. for Scurry Rainbow Oil in 1965 under the direction of Bill Quinn.

Worked as a field supervisor for Alrae Explorations Ltd. from Sept 1965 to April 1967 under the direction of Rae Jury.

Since 1956 has also worked as a self employed contractor, working for various mining companies in the following fields: prospecting, property examination, staking, line cutting, topographical mapping, geological reconnaisance and mapping, mineral sampler, draughting, air photo interpretation, geochemistry, geophysics and supervising property exploration programs.

Since 1956 has been a self employed prospector working in various areas in B.C. on numerous properties.

Has worked in the Rossland camp since 1971 as a miner on the Snowdrop and Blue Bird claims. Has spent considerable time in the camp as a prospertor and mining exploration contractor.

Has recieved the B.C. Provincial Grubstake for the years 1964, 1968, 1969, 1970, 1980, 1981, 1982 and 1983.

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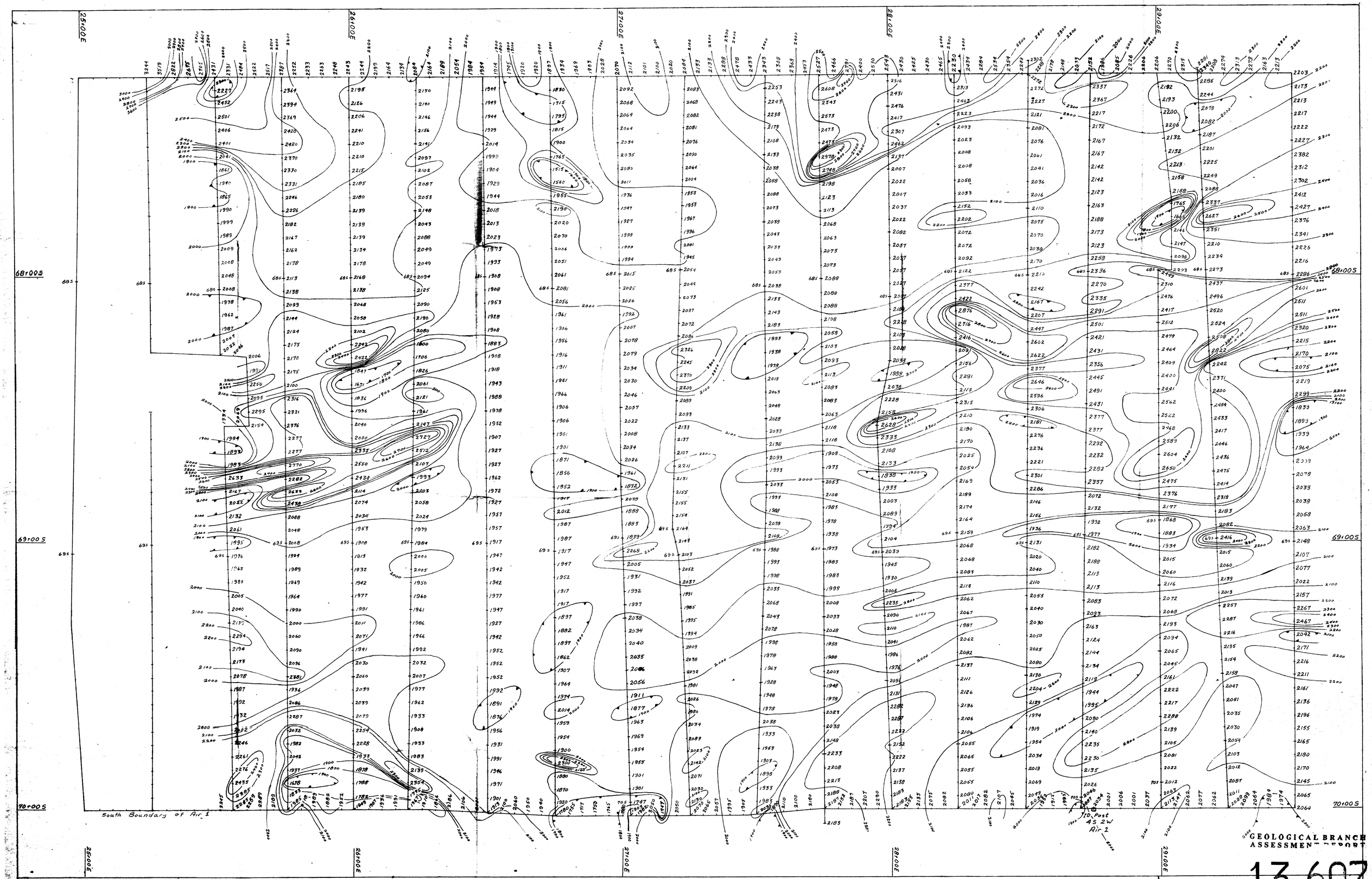
D. K. Bragg., 1983	Geophysical Report on the Hillside Claim



GEOLOGICAL BRANCH
ASSESSMENT REPORT

13,607

MAGNETOMETER SURVEY

AIR 1 & CAP CLAIMS
ROSSLAND B.C.
82F 4W
49° 3' N , 117° 45' W

To accompany 'GEOPHYSICAL REPORT' on the AIR 1 and CAP Claims, Rossland B.C., Trail Creek M.D. by O.K Bragg, March 15, 1985

SCALE: 1 - 500	DATE: March 15, 1985
DRAWN BY: O.K. Bragg	Fig 2