180-#930-#8601

#### GEOCHEMICAL REPORT

On The Yaky 1 - 2 Claims Latitude 53° 32'N Longitude 132° 12'W NTS 103F/9E QUEEN CHARLOTTE ISLANDS, B.C.

Skeena M. D.



for Consolidated Cinola Mines Ltd. Vancouver, B.C.

> by K. G. Sanders P. Eng. December 10,]980

> > MINERAL EXPLORERS



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APPENDIX

Geochemical Analysis of Ag., Au., As., and Hg. Acme Analytical Laboratores Ltd., Vancouver, B.C. MAP

#### Ref. No.

1]	Location Map: B.C. Road Map	
	1 cm - 20 km	[Frontispiece]
2]	Claim Map: B.C. Department of Mines	
	& Petroleum Resources, 1:50,000	[Follow page 1]
5]	Plate A - Au./Hg.	

#### REFERENCES

#### Ref. No.

3] B.C. Department of Mines & Petroleum Resources, Bulletin 54, Geology of the Queen Charlotte Islands, A. Sutherland Brown, 1968

4] B.C. Department of Mines & Petroleum Resources,

# REFERENCES (cont'd)

4] Report on the Specogna Gold Prospect, Queen Charlotte Islands, B.C., A. Sutherland Brown, T.C. Schroeter, 1975.





Geochemical Report

on the

YAKY 1 - 2 Claims

Latitude 53°32'N Longitude 132°12'W

NTS 103F/9E

Queen Charlotte Islands, B.C.

Skeena M. D.

for

Consolidated Cinola Mines Ltd.

Vancouver, B. C.

by

K. G. Sanders P. Eng. December 10, 1980

INTRODUCTION

This report is authorized by the Directors of the Company. The field work was carried out as recommended by the writer. Strato Geological Ltd. of Vancouver conducted the survey during the period of September 19,1980.

# LOCATION ACCESS TOPOGRAPHY 1]

The Queen Charlotte Islands Located off the north-west coast of B.C., are serviced daily by P.W. Airlines, landing at Sandspit on Moresby Island. Local ferry provides access to Graham Island where the claims are located.

Public and private ferry service from Prince Rupert provide an alternate access to Graham Island.

Graham Island has one public road, however, logging roads owned and maintained by MacMillan Bloedell enter the claim area. Branch 40 parallels the course of the Yakoun River, then turns north into the southern portion of the claims. This road is in poor condition. Permission to use the roads should be obtained from either the Queen Charlotte City or Juskatla, Office of MacMillan Bloedell. The Yakoun



River has exposed some geological features of the area. Most of the claim is covered by virgin timber. Except for the erosion caused by the rivers course, no areas of outcrops were located. Elevation rise gently on both sides of the river to about 100 meters, primarly to the west. Several small creeks flow into the rivers after periods of rain. During the summers, little precipitation reaches the river in this manner.

# CLAIM<sup>2]</sup>

The claims are described as follows:

	NAME		UNITS	RECORD NO.	EXPIRY DA	\TE	
	Yaky	1	20	1927	December	5	
	Yaky	2	20	1928	December	5	
	The I	LCP	was not	located for the	purpose of	the	study
The	bounda	arie	es of th	e claim were est:	imated from	the	Claim
Мар	of the	e ai	cea and	known topographic	cal features	3.	
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GENERAL GEOLOGY 3]4]

Except for the exposure by the Yakoun River, little exact geology of the claims is known. A description from Bulletin 54 gives an overview of the area.

The claims are overlain by Quaternary sediments estimated at being up to 50 feet thick. These sediments overlie the Skonun Formation of sandstone, mudstone, and conglomerates.

The above are underlain by the Masset Formation of subaerial flows of basalt and rhyolite, with them various ash flows, all being brecciated. The basement rock is argillite probably of the Kunga (Jurassic Formation).

A more detailed examination of the property cut by the Yakoun River indicated more specific phenomena of the area. The river has exposed the underlying strata in the same area. Sandstone, siltstone and conglomerate were evident. Some strata may be the precursor of the conglomerates found else

2.

where in the area. Fossils were found in the lower sandstone, layers similiar to other specimens found on the Cinola property and geologically comparable areas near Masset. This seems to indicate the possible extent of the same types of geological formations on Graham Island. Carbonized pieces of wood were evident in the lower layers of the cliffs along the river. Without the evidence of carbonized wood, the strata appear identical to the strata just underneath the soils, A-horizon. This suggests little change in the geology for a period of about 14 million years.

Sediments along the Yakoun River almost always contain visible mica flakes. The river bottom is mostly stones and pebbles with frequent gravel beds.

#### GEOCHEMICAL SURVEY

The survey intended to sample silt deposited in the claims area on both sides of the Yakoun River and where possible samples deposited in the centre of the river. A canoe was used to provide easy access to the area. Initially, the Phleger Corer method of silt sampling was considered. This method, which consists of driving a hollow pipe into the sediment and extracting the silt contained, had to be abandoned because of poor penetration of the gravel beds. The method used in the survey is as follows. Using a shovel, a hole or depression was dug in the gravel. The rocks underneath the depression were agitated either by hand or shovel which caused the formation of a colloidal dispursion in the depression. Samples of this clouded dispursion were collected in stainless steel bowls and allowed to settle. The water was decanted after gravity separation leaving silt and organic matter in the bowl. Some attempt was made to separate the silt from the lighter organic matter before placing in plastic bags. One sample of the three taken at each location was tested for gold and mercury and subsequently mapped. The remainder are being held for furthur studies.

MINERAL EXPLORERS

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It should be noted that the Yakoun River is often quite turbulent and carries large quantities of silt within it. Consequently, deposition of the silt within the claim may not indicate the origin for the parent rock located in the claim. Unfortunately, small streams within the claims were not found during the period of the survey. There was little precipitation which inhibited sampling in the areas other than the Yakoun River basin.

Subsequent work should concentrate on water courses flowing into the Yakoun from origin within the claim.



#### STATEMENT OF COSTS

Yaky 1 Claims ( 20 units ) Yaky 2 Claims ( 20 units )

### Direct Costs

Labour	\$4,	225.00
Transportation	• • • • • • • • • •	403.40
Supplies	• • • • • • • • • •	263.95
Analysis		137.55
Drafting	· · · · · · · · · · · · · · ·	50.00
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G. Smith

J. McLeod

A. Lawrence

A. House

K. Dorland

The above data supplied by Strato Geological Ltd. of Vancouver, B.C. the contractor.

The above is a true statement of the costs of this project.

K. B. Sanders

K. G. Sanders

#### CERTIFICATE

I, Kenneth G. Sanders of 1940 Limerick Place, North Vancouver, in the Province of British Columbia, hereby certify as follows:

I am a registered Geological Engineer in the Association of Professional Engineers of British Columbia, certificate No. 4536.

I have practiced in the profession for thirty years after graduation from the University of Toronto in ]949.

I personally supervised the silt sampling program referred to in this report submitted for assessment purposes .

Dated at Vancouver, British Columbia, this 22nd day of September, 1980.

26. B. Sanders

K. G. Sanders, P. Eng. December 10, 1980



#### ACME ANALYTICAL LABORATORIES LTD. 852 E. Hastings St., Vancouver, B.C. V6A 1R6 Phone: 253-3158

# Geochemical Analysis of Ag, As and Hg

# Sample preparation

Soil samples are dried at 75<sup>0</sup>C and sieved to -80 mesh. Rock samples are ground to -100 mesh.

## Digestion

A .50 gram sample is digested with dilute aqua regia in boiling water bath and diluted to 10 mls with demineralized water.

# Determination

Ag and As are determined by direct reading ICP emission spectrometer. Hg is determined by cold vapour AA using F & J scientific Hg assembly. An aliquot is add to stannous chloride-hydrochloric acid solution. The reduced Hg is carried by bubbling air through the solution and passed into the Hg cell determined by AA.

# Geochemical Analysis of Au

# Digestion and extraction

A 10 gram sample which has been ignited over night at 600<sup>0</sup>C is digested hot with dilute aqua regia, and the clear solution is extracted with Methyl Isobuthyl ketone.

# Determination

Au is determined by AA from the MIBK extractant with background correction.

ACME ANALYTICAL LABORATORIES LTD.

Assaying & Trace Analysis

852 E. Hastings St., Vancouver, B. C. V6A 1R6 phone:253 - 3158

File No. 80-1393

Vancouver,		B.C.	
V6C	1X8		

To: Starto Geological Ltd., 800 - 543 Granville St.,

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# GEOCHEMICAL ASSAY CERTIFICATE

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