

1906

KENNCO EXPLORATIONS, (WESTERN) LIMITED

REPORT

ON

SOIL GEOCHEMICAL SURVEY

PILLAR No. 2 GROUP

(Pillar Mineral Claims No. 1-6, 11-19, 21-28, 39, 53, 57, 65, 75)

Situated 12 miles north of Thutade Lake,
Omineca Mining Division
British Columbia

57° 126° SW

By

R. W. Stevenson, P. Eng.

June 12 to 16, 1969

July 16, 1969

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<p>Department of Mines and Petroleum Resources ASSESSMENT REPORT</p> <p>NO. 1906 MAP</p>
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LIST OF CLAIMS AND DISTRIBUTION OF WORK

Pillar No. 2 Group: Pillar M.C.'s 106, 11-19, 21-28, 39, 53,
57, 65, 75

<u>Claim No.</u>	<u>Record No.</u>	<u>Record Date</u>	<u>\$ Soil Geochem. Work Ea.Claim</u>	<u>Years Applied</u>
1	59969	June 19		1
2	59970	"		1
3	59971	"	475	1
4	59972	"		
5	59973	"	74	
6	59974	"		
11	59944	"		1
12	59945	"		1
13	59946	"		1
14	59947	"		1
15	59948	"	15	1
16	59949	"	30	1
17	59950	"	164	
18	59951	"	253	
19	59952	"		
21	59936	"		
22	59937	"		
23	59938	"		
24	59939	"		
25	59940	"		
26	59941	"		
27	59942	"		
28	59943	"		
39	59975	"		1
53	60014	June 24		
57	60018	"		
65	60885	July 16		
75	61271	August 1		
		Total	<u>\$1,011</u>	<u>10</u>

STATEMENT OF COSTS INCURRED

Soil Geochemical Survey

A detailed explanation of how the soil geochemical survey expenditures were incurred is given under the section titled 'Soil Survey Field Work'.

The total cost of the soil geochemical survey on Pillar No. 2 Group is as follows:

Chemical analysis of 68 samples - Cu, Mo, Zn, Pb			\$ 408.00
Wages & Board:			
R. W. Stevenson	June 12-14, 16	@ \$35.00 + \$4.50	158.00
D. Stark	June 12-14, 16	@ \$17.50 + \$4.50	88.00
J. Cordonier	June 12-14, 16	@ \$15.50 + \$4.50	80.00
I. McDougall	June 14, 16	@ \$19.50 + \$4.50	48.00
J. Rance	June 14, 16	@ \$16.50 + \$4.50	42.00
Helicopter set-out on property:	1:10 hrs		<u>187.00</u>
			<u>\$1,011.00</u>

The amount expended on each claim is shown on the list of claims.

INTRODUCTION

The mineral property discussed in this report is situated about 12 miles north of Thutade Lake, B.C. The exploration work on these claims consisted of a soil geochemical survey.

The work was done under the supervision of R. W. Stevenson, P. Eng.

LOCATION AND ACCESS

The property is situated at Latitude 57°15'N, Longitude 126°55'W, about 275 miles northwest of Prince George. This is about 12 miles northeast of Thutade Lake. The survey area is on a small upland plateau, at an elevation of about 6000' above sea level. It is above tree-line.

Access to the property is by fixed-wing aircraft from Smithers to Thutade Lake, a distance of about 165 miles, and by helicopter from there. Local travel is hampered by the steep topography between the camp and the upland plateau area. Thus helicopter set-outs were useful in minimizing unproductive travel time to the sampling area.

SOIL GEOCHEMICAL SURVEY

Soil Survey Field Work

Control Survey Lines

A control grid was established by chain and compass survey. Laths were used to mark the stations because the survey area is above tree-line. This gave good control of sample sites, with minimum expenditure.

The base-line azimuth is 122°. This grid layout was chosen so as to give efficient coverage of the upland area that was to be sampled, as well as conforming to the claim boundaries. Crews were set out from camp by helicopter so as to minimize unproductive walking time. A base map with scale 1" = 400' was compiled for use in plotting the sample results.

Soil Sample Collection

The samples were taken at 100-foot intervals along the grid lines. The location of the sample sites is shown on Plate No. 5. They were taken from the top of the "B" (rusty) horizon. Exceptions to this occurred in rocky places where sufficient soil could not be found to take a sample.

The samples were collected by digging a small hole with a trenching tool type of spade. By this means it was possible to see where the top of the "B" horizon was. The soil sample was then taken from the top of the "B" horizon, either with the tip of the spade, or with a small trowel.

A note was then made of the grid line location, the sample number, the depth to the top of the "B" horizon, the direction of drainage, the type of vegetation (i.e. - grass, or bare soil), and the soil type.

Packaging

The samples were placed in a 3" x 4½" brown paper envelope, on which the sample numbers had been marked. These were closed with a triangular triple fold. (The bags are not anomalous in trace metals).

Sample Preparation

The samples were taken to the base camp, and were oven-dried at 80°C. They were then shipped to our laboratory in North Vancouver, where they were sieved through an 80-mesh size stainless steel screen. (These sieves do not show noticeable wear even after several thousand samples have been sifted). The minus 80 mesh fraction was collected for all the analyses involved.

Analysis

The samples were analysed in the North Vancouver laboratory of Kennco Explorations, (Western) Limited under the supervision of John Barakso, MSc.

A one-gram sample is weighed to within \pm 2 mgm. making a possible error of 2% at this stage. This is much more accurate than a volumetric scoop.

The sample is placed in a dry test tube, and 1 ml of reagent grade 70% nitric acid is added, or just enough to wet the sample. Four ml of reagent grade 70% perchloric acid ($\text{HClO}_4 \cdot \text{H}_2\text{O}$) is added, and the sample is digested at 200°C on a hot plate for four hours. After cooling, the sample is diluted up to 50 ml with distilled water, agitated, and allowed to settle for two hours.

An aliquot of this solution is used for determination of copper, zinc, and lead by atomic absorption spectrophotometer.

An aliquot of this solution is also taken for determination of molybdenum. Ammonium thiocyanate, stannous chloride, and amyl acetate are added to the solution. Molybdenum forms a thiocyanate complex which is removed by solvent extraction in the amyl acetate. This is aspirated in the atomic absorption spectrophotometer to determine molybdenum.

Interpretation

Over most of the area, a good sample which was representative of the "B" horizon was obtained. The depth of overburden varies from a few inches to probably about 30' over most of the areas sampled. Considering the type of soil, it would seem likely that soil geochemistry is a reliable technique on these parts of the property. The samples were analysed for total metal content in copper, molybdenum, zinc, and lead.

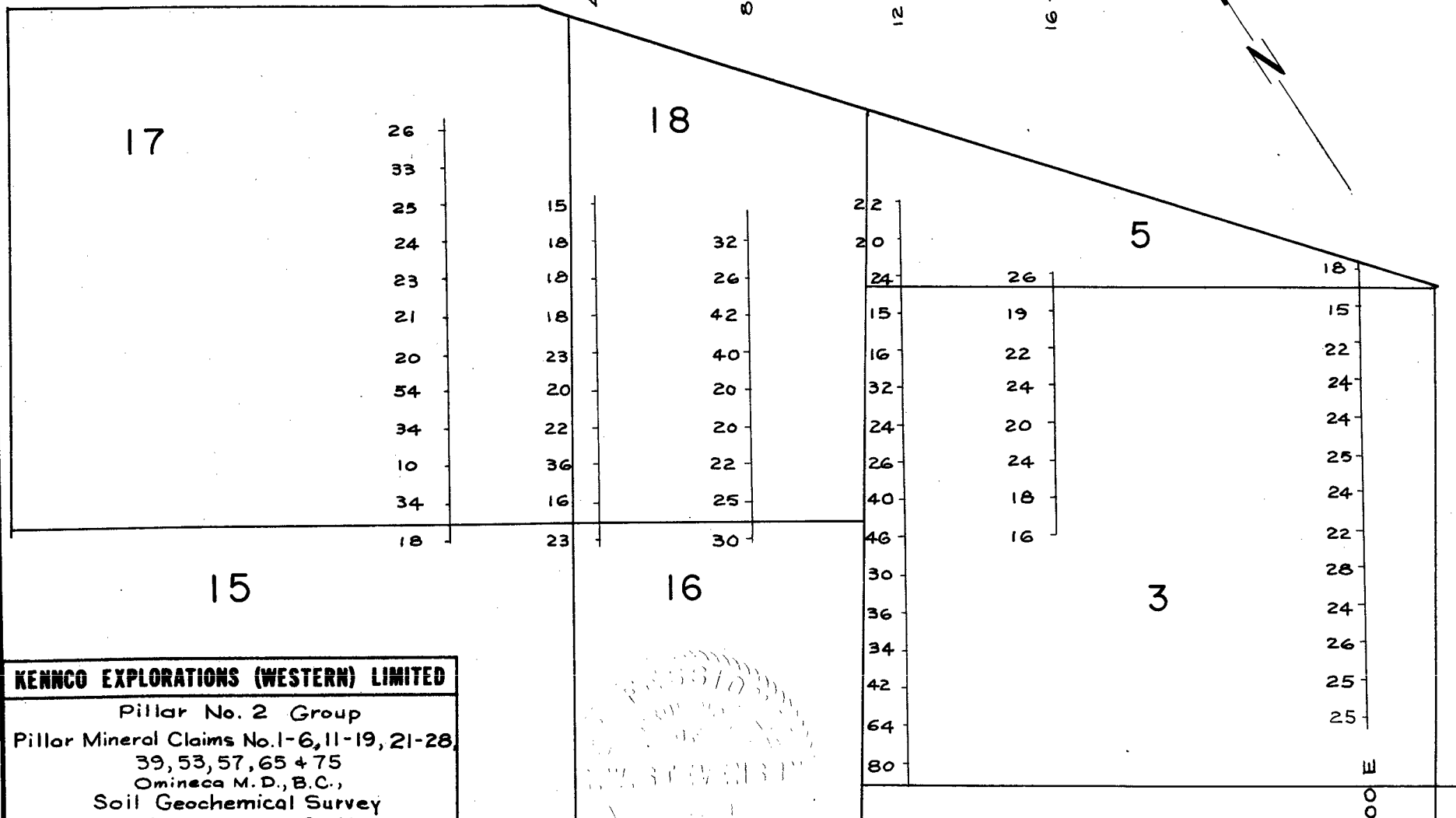
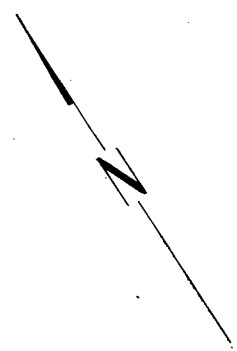
None of the soil samples are anomalous in copper (Plate No. 1), molybdenum (Plate No. 2), or zinc (Plate No. 3). A few scattered samples are weakly anomalous in lead (Plate No. 4). Although the results are negative, the survey was useful in evaluating an extensive drift-covered area.

Vancouver, B. C.

July 16, 1969


R. W. Stevenson

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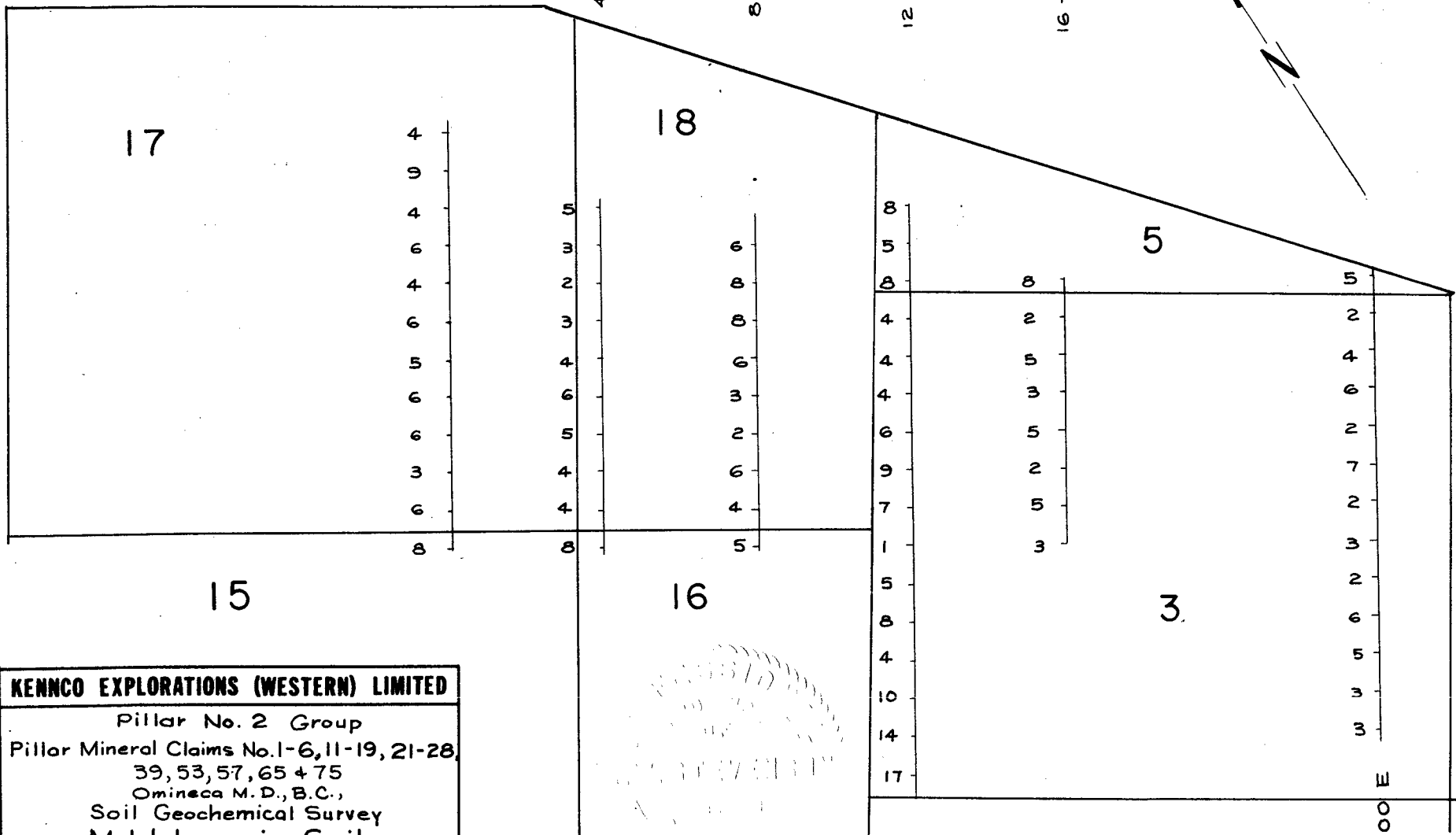
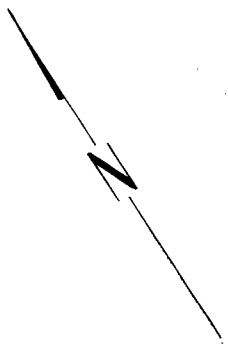
KENNCO EXPLORATIONS (WESTERN) LIMITED

Pillar No. 2 Group
 Pillar Mineral Claims No. 1-6, 11-19, 21-28,
 39, 53, 57, 65 & 75
 Omineca M. D., B.C.,
 Soil Geochemical Survey
 Copper in Soil

DATA BY: R.W.S.		N.T.S. 94-D	PL. NO.: 1
DRAWN BY:	DATE:	SCALE:	
TRACED BY: J.Q.L.	DATE: 15/7/69	1" to 400'	
REVISIONS:			

R.W. Stevenson

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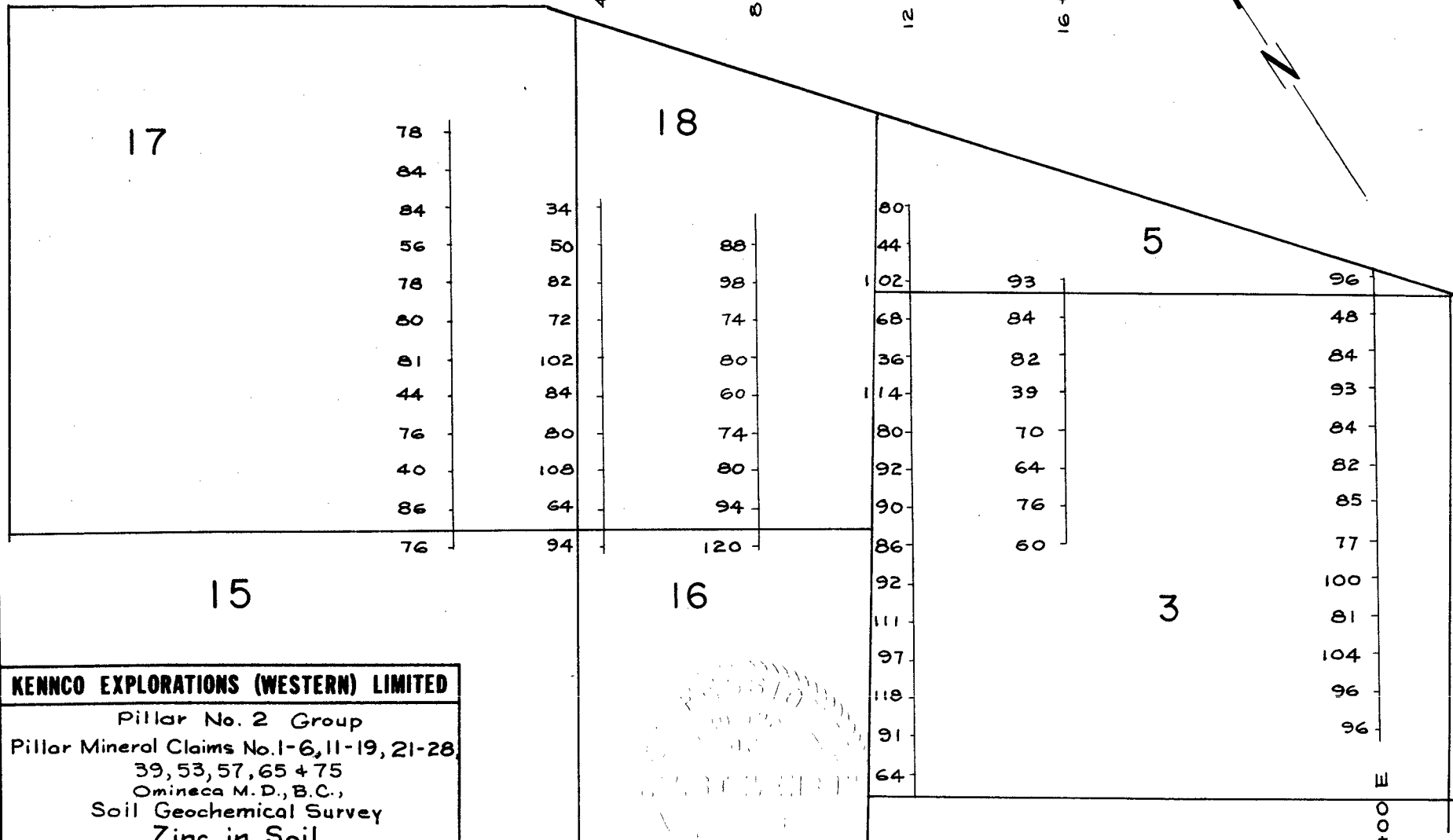
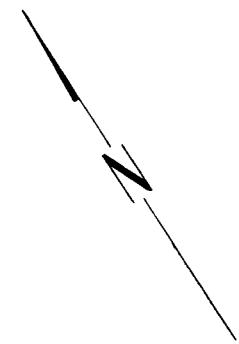


KENNCO EXPLORATIONS (WESTERN) LIMITED			
Pillar No. 2 Group			
Pillar Mineral Claims No. 1-6, 11-19, 21-28,			
39, 53, 57, 65 + 75			
Omineca M.D., B.C.,			
Soil Geochemical Survey			
Molybdenum in Soil			
DATA BY: R.W.S.	N.T.S.	PL. NO.: 2	
DRAWN BY:	DATE:	SCALE:	
TRACED BY: J.G.L.	DATE: 15/7/69	1" to 400'	
REVISIONS:			



R.S. Stevenson

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12+00E
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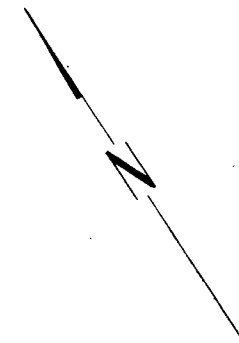


KENCO EXPLORATIONS (WESTERN) LIMITED
 Pillar No. 2 Group
 Pillar Mineral Claims No. 1-6, 11-19, 21-28,
 39, 53, 57, 65 + 75
 Omineca M. D., B. C.,
 Soil Geochemical Survey
 Zinc in Soil

DATA BY: R.W.S.	N.T.S. 94 - D	PL. NO.: 3
DRAWN BY:	DATE:	SCALE:
TRACED BY: J.G.L.	DATE: 15/7/69	1" to 400'
REVISIONS:		

R. W. Stevenson

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12+00E
16+00E



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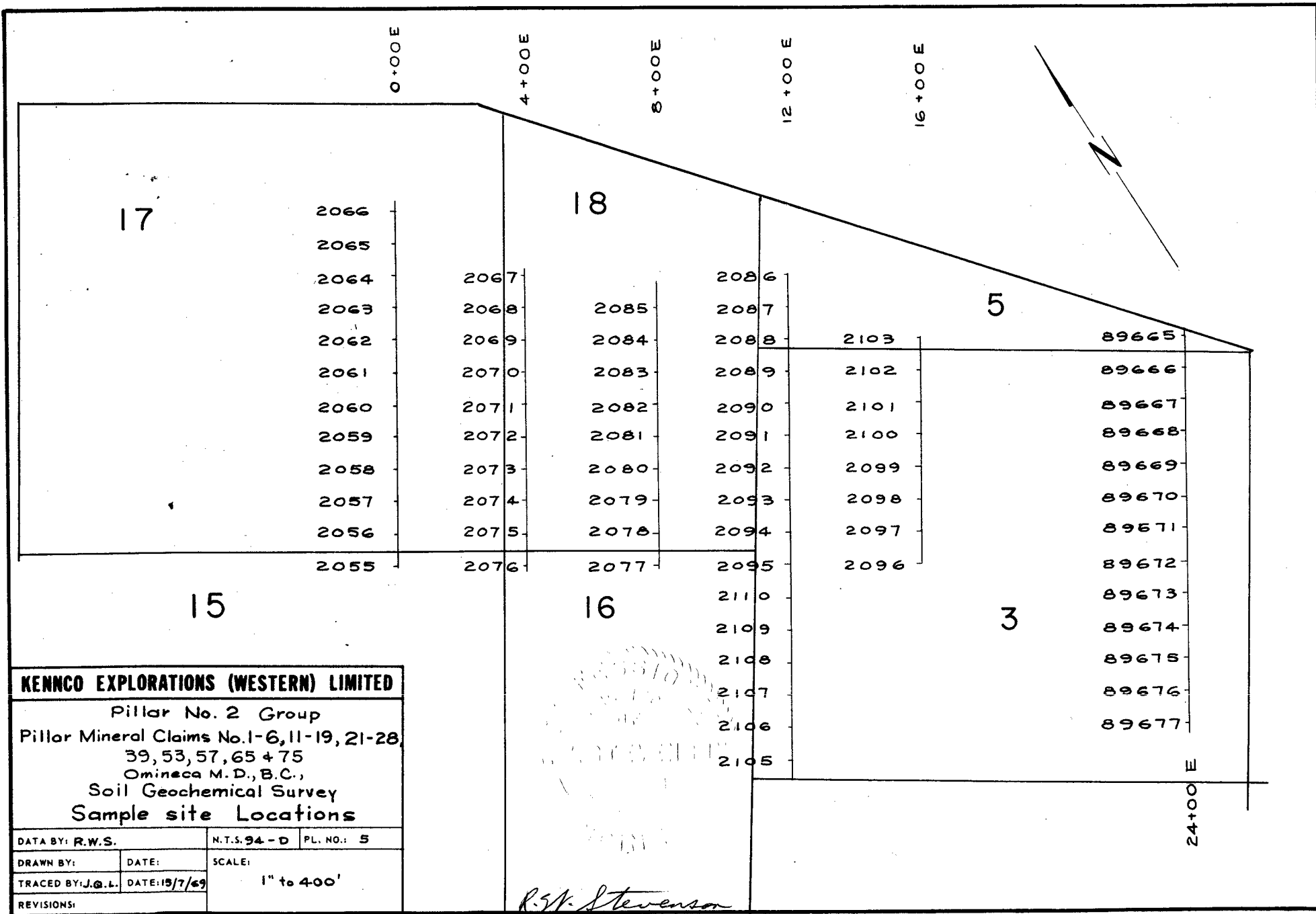
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R. W. Stevenson

KENCO EXPLORATIONS (WESTERN) LIMITED			
Pillar No. 2 Group			
Pillar Mineral Claims No. 1-6, 11-19, 21-28,			
39, 53, 57, 65 + 75			
Omineca M. D., B.C.,			
Soil Geochemical Survey			
Lead in Soil			
DATA BY: R.W.S.	N.T.S. 94-D	PL. NO. 4	
DRAWN BY:	DATE:	SCALE:	
TRACED BY: J.Q.L.	DATE: 12/7/69	1" to 400'	
REVISIONS:			



KENNCO EXPLORATIONS (WESTERN) LIMITED

Pillar No. 2 Group
 Pillar Mineral Claims No. 1-6, 11-19, 21-28
 39, 53, 57, 65 & 75
 Omineca M.D., B.C.,
 Soil Geochemical Survey
 Sample site Locations

DATA BY: R.W.S.	N.T.S. 94-D	PL. NO.: 5
DRAWN BY:	DATE:	SCALE:
TRACED BY: J.G.L.	DATE: 19/7/69	1" to 400'
REVISIONS:		

R. W. Stevenson