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REPORT ON

GEOLOGY AND HUMUS SURVEYS

AND STRIPPING

FLINT LAKE PROPERTY

NTS 52 F/5 SW

OPAP 1996

RECEIVED FEB 27 1997 MINING LANDS BRANCH

Quality H Timothy J. Twomey H.BSc. Geology

Balmertown, Ontario January 31, 1997



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SUMMARY

The Dogpaw-Cameron Lake area has been subject to gold prospecting since the late 1800's. This area hosts a number of gold deposits which are associated with splay faults off of the regional Pipestone-Cameron Fault. The largest of these deposits is also the most recently discovered. The Cameron Lake deposit (3.1 million tons at 0.17 oz/ton gold) was first found by prospecting in 1960. This surface showing went through three separate exploration programs before deep diamond drilling intersected the Main Zone in 1983.

A geological model applicable for exploration in the area is the Lightning Zone. The Lightning Zone is hosted within the regional Destor-Porcupine Fault in the Harker-Holloway area and is characterized by silica-albite alteration with pyrite surrounded by a sericite-carbonate halo. The Holt-McDermott gold mine is located 1 km south of the Lightning Zone on a splay fault from the Destor-Porcupine Fault.

The property contains the strike continuation of the shear zone hosting the Dubenski Deposit which exibits similar alteration and structural setting as the Lightning Zone gold deposit. This target has not been drill tested for a strike length of 750m within the property which lies under Flint Lake. Therefore, this represents an excellent drill target and should be tested by drill-holes on the ice of Flint Lake half way between the past drilling.

The Pipestone-Cameron Fault has not been diamond drilled within the property for a strike length of 3 km and represents a good "stacked" target adjacent to known gold showings within structures parallel to it. Therefore, drilling the humus gold anomaly should be done from BL\5E with a hole drilled north. This should be extended north to test the Pipestone-Cameron Fault which is consistent with the Lightning Zone model.

INTRODUCTION

The Dogpaw-Cameron Lake area has been subject to gold prospecting since the late 1800's. This area hosts a number of gold deposits which are associated with splay shears off of the regional Pipestone-Cameron Fault. The largest of these deposits is also the most recently discovered. The Cameron Lake deposit (3.1 million tons at 0.17 oz/ton gold) was first found by prospecting in 1960. This surface showing went through three separate exploration programs before deep diamond drilling intersected the Main Zone in 1983. Surface exploration by Cambior Inc. was conducted at the Cameron Lake deposit in the fall of 1996.

The Flint Lake Property is underlain by part of the Pipestone-Cameron Fault which is goldbearing nearby at the Sewell occurrence. The property contains the Meahan gold occurrence and also contains the strike extension of the shear zone which hosts the Dubenski gold deposit (100,000 tons at 0.25 oz/ton gold). Therefore, it is geologically well located and merits a thorough exploration program to evaluate its potential.

PROPERTY DESCRIPTION

The property consists of three claims, K.1178246 containing 2 claim units, K.1178247 containing 4 claim units and K.1184549 containing 4 units. The property contains ten units of approximately 160 hectares. It was recorded on October 18, 1995 to August 16, 1996 and requires \$1,600 assessment work by August 16, 1998.

LOCATION AND ACCESS

The property is centered about latitude 49°20'10" and longitude 93°50'10", within the Dogpaw Lake Area claim map G-2613. It is approximately 64 km southeast of the City of Kenora. Access to the property is provided by an all-weather gravel road to the Cameron Lake deposit from Highway 71. The property is located 150 m north of the Cameron Mine road at the Cameron River bridge which can then be accessed by boat or by a logging access road (the "clay road") just east of the bridge (see Fig. 1). The Cameron Mine Road has restricted access and requires a permit from the Ministry of Natural Resources in Kenora to travel on it as well as an annual user fee payable to Nuinsco Resources.

AREA EXPLORATION HISTORY

The area was first prospected for gold in the late 1800's where quartz veins containing free gold were found at the Otonabee Mine, 2 km west of the property. Those veins were rediscovered in 1943 by Noranda Mines prospectors. Diamond drilling up to 1961 has delineated 96,650 tons at 0.43 oz\ton gold to -600 feet and is owned by Canadian Arrow Mines Ltd. Recently, a road has been constructed to the deposit and the surface exposure has been stripped and bulk sampled.



93 45



Apparently, ore was trucked to the Horne smelter which returned a head grade of 0.30 oz\ton. The property is presently optioned to Houston Lake Mining Inc. who will be diamond drilling there this winter.

The Dubenski gold deposit, 600 m west of the property, was delineated between the 1940's and 1980's where surface and underground drilling has outlined 100,000 tons at 0.25 oz/ton gold in the Shaft Zone. It is hosted in silicified, carbonatized and pyritic sericite-schist whose structural setting and alteration exibits similaries to the Lightning Zone in the Harker-Holloway area. Some x-ray drilling was performed on the east extension of the deposit, west of the Flint Lake property, in the 1940's by Noranda Mines. That drilling returned anomalous gold in the shear zone, the furthest east intersection which was 0.02 oz/ton over 15.0 feet located 200 m west of the property boundary.

The Sewell gold showings are located 600 m northwest of the property and are on strike along the Pipestone-Cameron Fault. These were discovered by Noranda prospectors in 1943. Surface work from 1944 to 1961 delineated the Sewell No. 2 zone which is hosted in sheared, carbonatized and silicified mafic volcanics and porphyry dikes. It is 200 m long by 2.5 to 7 m wide on surface and averages 0.10 oz/ton gold. Diamond drilling returned negative results.

The Cameron Lake gold deposit, 9 km south-east of the property, was first found by Noranda prospectors in 1960. This showing went through three separate exploration programs before deep diamond drilling from surface, by Nuinsco/Lockwood, intersected the Main Zone in 1983. Underground evaluation has delineated 3.1 million tons at 0.17 oz/ton gold. The underground workings are presently flooded. Further surface diamond drilling and compilation by Cambior Inc. in the fall of 1996 has led to a new reserve of 4.7 million tons at 0.12 oz/ton.

PREVIOUS PROPERTY EXPLORATION

The northwest part of the property was explored by Gateway Uranium Mines Ltd. in 1961 who drilled two short holes, G-9 and G-10, on the north shore of the peninsula. No assays were reported. Sheared mafic volcanics with minor pyrite were noted in the logs.

The Cameron Lake discovery in 1983 precipitated a large amount of exploration in the area. However, the northwest part of the property was already part of Cymbal Explorations Inc. group where 13 claims had been staked in 1979 to cover the Sewell gold occurrence. The Cymbal Explorations work included ground VLF, mag and geology surveys and diamond drilling around the showing which gave disappointing results.

The south part of the property covers the east extension of the shear zone hosting the Dubenski gold deposit where geological mapping, mag and VLF were conducted by Pango Gold Mines Ltd. in 1973. Two diamond drill holes were drilled at the west boundary of the property in 1975, one south and the other north. They intersected sheared and sericitic rhyolite agglomerate. Hole P-75-1 drilled north and returned 0.01 oz/ton over 3.0 feet containing 15% quartz, 1%

pyrite and 2% pyrrhotite in sericitic, sheared rhyolitic agglomerate. The same hole also intersected 28 feet of sheared, partly sericitic rhyolite agglomerate containing 1% pyrite and trace chalcopyrite which returned trace gold. Hole P-75-1 did not define the limits of the shear zone. Hole P-75-2 intersected similar rocks and alteration to the south. These intersections may represent the strike extension of the Dubenski deposit.

The south part of the property was also explored by Sherritt Gordon Mines Limited in the early 1980's. Sherritt conducted ground magnetic and horizontal-loop EM surveys. Seven diamond drill holes were drilled between 1981 and 1987, the closest of which is 1,400 m west on strike from the Dubenski deposit. That drilling encountered strongly altered and sheared rocks with dissappointing assay results. Therefore, 750 m of the shear zone that hosts the Dubenski deposit remains untested within the property, as it is covered by Flint Lake and swamp.

The southeast part of the property contains the Meahan showing named after the Noranda prospector that discovered it in the 1940's. Stripping and trenching were conducted but no diamond drilling was reported. The showings consist of narrow quartz stringers and pyrite with native gold, within gabbro. G. Martin conducted further stripping and trenching around some of the old Meahan trenches in the 1980's.

There has been no drilling reported on the Pipestone-Cameron Fault on-strike to the southeast of the Sewell occurrence within the property for 3 km.

PROPERTY GEOLOGY

The property is underlain by the Pipestone-Cameron Fault, a regional fault over 100 km in length. In this area, it is generally characterized by a zone of sericite-chlorite-carbonate schist hundreds of metres wide and is probably derived from mafic metavolcanics. A number of splay-shears associated with the fault are found on the property, one of which hosts the Meahan gold occurrence. The property is also underlain by the shear zone which hosts the Dubenski deposit. These are mainly covered by Flint Lake and/or swamp and are poorly exposed. Felsic metavolcanics, mafic metavolcanics and quartz-feldspar porphyry dikes are present south of the Pipestone-Cameron Fault and north of it are gabbro and mafic volcanics which also exibit high strain due to their proximity to the fault.

Unit 4a, massive gabbro, is the most abundant within the property and is melanocratic, with medium-grained black amphibole in a dark-green matrix. It is weakly magnetic.

Unit 1a, mafic volcanic, is common in the northwest part of the property and is a fine-grained equivalent of the above. It is often pillowed but not magnetic.

Unit 2b, sericitic schist felsic volcanic, is found on the shore of Dubenski Peninsula, in isolated outcrops along the south margin of the swamp in Grid A and B and along the south shore of the

Main Grid. It is very-fine-grained, whitish to yelowish with a greasy lustre from sericite. It has a penetrative foliation and is spatially associated with shear zones.

Unit 6c, feldspar porphyry, is a minor unit associated with shear zones and is fine-grained, foliated and reddish coloured on fresh surfaces. It is rusty on weathered surfaces due to iron-carbonate.

MINERALIZATION

The Dubenski shear zone is characterized by a 75m wide zone of intensely altered and deformed sericite schist +- iron carbonate +- chlorite striking at 265 degrees and dips 85 north. Grab samples in 1995 and 1996 assayed from this shear zone along the shore of Dubenski Peninsula returned some anomalous results above 100 ppb gold. This shear zone strikes east underneath Flint Lake towards the Pipestone-Cameron Fault and has not been drill tested there for a strike length of 750 m. Diamond drilling just southeast of the peninsula by Pango Gold Mines Ltd. in 1975 did not extend to the north contact of the shear zone. To the east, 750 m from that drilling, Sherritt Gordon drilled in the 1980's and intersected strongly altered and sheared rocks such as "siliceous tuff with pyrite". Sampling generally returned negative results for gold, however ddh FL-1-81 sampled "quartz lenses in felsic tuff" but the gold values of the samples were not recorded. Outcrops along the south edge of the swamp at Grid B are highly altered and sheared carbonate-chlorite schists and sericite schists containing traces of disseminated pyrite. These outcrops are likely the extension of the Dubenski shear zone eastward towards the Cameron-Pipestone fault.

The Meahan trenches have exposed narrow, bleached and carbonatized fracture zones in gabbro. These contain variable amounts of fine and medium grained pyrite and quartz. One trench contains a 0.4 m wide quartz vein containing 5% disseminated pyrite and assayed 1.93 and 1.91 oz/t gold. It strikes at 060 parallel to some pyrite "seams" and appears to be a dilational tension direction which is conjugate to the regional fabric of 110. Other pyritic altered zones north of this strike at 110 and trend into the swamp. Figures 3, 4 and 5 show correlations between Au, Ag and As for some rock samples from the Meahan trenches. There is good correlation at the Meahan showings between gold and arsenic. This suggests that arsenic could be a good pathfinder for gold and should be analysed for in rock and humus samples.

HUMUS SURVEYS

An orientation humus survey for gold was conducted for 100 m south of the swamp contact on the north parts of Grids A and B. This survey has outlined a humus gold anomaly above 10 ppb Au, 300 m long. Its east end is associated with the Meahan showings and it trends west just south of the swamp contact parallel to the Cameron-Pipestone Fault. Sampling twenty-five m spacing is adequate to identify the anomaly, however 12 1/2 m sample spacing on Line 6E gives better resolution.



Figure 3: Rock assays, Au : As



Figure 4: Rock assays, As : Ag

SAMPLE	FIELD #	DESCRIPTION	Au opt
320751	ТЈТ-96-1	ser-sch, rusty carb., tr. py	183 ppb
320752	96-2	same as above, Dubenski peninsula	0
320753	96-3	float, white qtz, at shore	0
320754	96-4	ser-carb-chlor-sch, shr'd 4a, shoreline	0
320755	96-5	float, 1" qtz. vnlts	0
320756	96-6	carb-ser-sch, rusty, tr. py	0
320757	96-7	same as above, 50 m east	0
320758	96-8	same as 96-7, 25 m east	0
320759	96-9	ser-sch, rusty carb, tr. py, 25 m south of 8	0
320760	96-10	ser-sch with wh qtz tension gashes	0
320761	96-11	0.2 m wh. qtz vn in chlor-ser-sch	0
320762	TJT-96-12	white qtz, tr py	0
320763	7-20-1	Meahan, carb-chlor-sch, tr. py	.01
320764	7-20-2	Meahan, ser-carb-chlor-sch, tr. py	0
320765	7-20-3	Meahan, actin-biot-chlor-sch, 1% fine py	.02
320766	7-20-4	Meahan, chlor-actin-sch, 1% f.g. py	0
320767	7-20-5	Meahan, ser-chlor-sch, 1/2% f.g. py	83 ppb
320768	7-20-6	Meahan, chlor-sch, 1% m.g. py	.01
320769	7-20-7	Meahan, ser-chlor-sch, 1% py strs	.04
320770	TJT-96-16	Meahan, chlor-carb rock, 50% mag, tr. py	72 ppb
320771	96-17	Meahan, chlor-sch, carb strs, 1% c.g. cubic py	184 ppb
320772	96-18	Meahan, same as above	53 ppb
320773	96-19a	Meahan, 2 cm qtz vn, chlor-ser-sch, 2% fine py	.21
320774	96-19b	Meahan, carb-chlor-sch, 15% m.g. cubic py	.15

Table 1: Sample descriptions and assays.

SAMPLE	FIELD #	DESCRIPTION	Au opt
320775	TJT-96-19c	Meahan, chlor-sch, 1 cm carb vn, 5% diss. py	.06
320776	96-20	chlor-carb-ser-sch, minor qtz frcts	38 ppb
320777	96-21	rusty carb-chlor-sch, tr. m.g. py	0
320778	96-22	ser-sch, minor rusty carb	0
320779	96-23	greenish colored carb-ser-sch	17 ppb
320780	96-24	ser-carb-chlor-sch, tr. f.g. py	23 ppb
320781	96-25	Meahan, qtz-carb-chlor vn in chlor-sch, tr py	28 ppb
320782	96-26a	Meahan, f.g. chlor-carb hornfels? 2% f.g. py, chlor.	14 ppb
320783	96-26b	bleached carb-chlor-ser-sch, 5% f.g. py	20 ppb
320784	96-26c	as 26b	21 ppb
320785	96-26d	as 26a	0
320786	96-27	Meahan, chlor rock, 1% diss. py + mag	36 ppb
320787	96-28	chlor-carb-sch, 1% fine py	112 ppb
320788	96-29a	Meahan, chlor-carb-sch, 10% fine py, minor patchy silic.	.04
320789	96 - 29b	Meahan, chlor-carb-silic-sch, 1% diss. py	38 ppb
320790	96-30	Meahan, 1 cm qtz str in ser-carb sch	164 ppb
320791	96-31	Meahan, ser-chor-carb-sch, 1/2% diss. py	0
320792	96-32	Meahan, 35% m.g. py, 5 cm qtz vn	.04
320793	96-33	Meahan, 0.5 m wide 4a shr'd, 10% m.g. py	.10
320794	96-34	Meahan, silic. 4a with 2% cubic py	.03
320795	96-35	Meahan, as above	.02
320796	96-36a	Meahan, 40% c.g. cubic py beside qtz vn	.06
320797	96-36b	Meahan, 5% c.g. cubic py as above	.64
320798	96-36c	Meahan, 0.4 m qtz vn, 2% diss. py	1.91

Table 1: Sample descriptions and assays (cont'd).



Figure 5: Rock assays, Au : Ag

SAMPLE	FIELD #	DESCRIPTION	Au opt
320799	TJT-96-36d	Meahan, 1' wide q.v. with rusty carb, 2% py	1.93
320800	96-38	Meahan, as above, 5% diss. py.	.03
15901	96-39	Meahan, silic-carb-ser-sch, 1% py, qtz vnlts.	.02
15902	96-40	ser-carb-talc-sch, tr. py.	.02
15903	96-41	actin-sch, 5% cubic py, wh. qtz vnlt.	122 ppb
15904	96-42	float, carb-ser-sch, 1% py, ptyg. qtz. vnlts	187 ppb
15905	96-44	3 cm wh. qtz vn, 1% py, in 4a.	.01
15906	96-45	qtz-carb vn in ser-talc-sch	0
15907	96-46	as above	0
15908	96-47	as above	0
15909	96-48	ser-talc-schist	0
15910	96-49	bleached, carb 4a, 1% fine diss.py	60 ppb
15911	96-50	carb-ser-sch (6c), minor qtz vnlts	0
15912	96-51	qtz tension gashes in shr'd 6c	0
15913	96-52	float, silic-ser-sch, 1% fine diss. py	0
15914	96-53	qtz-carb vnlts in chl-sch	0
15915	96-54	ser-chlor-carb-sch, shr'd 6c	0
15916	96-55	ser-chlor-carb-sch	0
15917	96-56	bleached, sericitic 4a, 1% diss. py	67 ppb
15918	96-57	as above	.03

Table 1: Sample descriptions and assays (cont'd).

A single sample anomaly on L8E of the main grid from 1995 was checked by 3 samples in 1996 which returned no gold. A single sample anomaly of 20 ppb on L1W of grid A should be verified with $12 \frac{1}{2}$ m spaced samples on all sides.

The rest of Grid B as well as the Main grid should be humus sampled to complete the survey there.

BACKHOE STRIPPING

Twenty-two hours were spent stripping part of the humus anomaly on Grid B from L6E/0+25N to L5E/0+25S. This was done with a backhoe and a drainage ditch was cut as well. The outcrop exposed is sheared and altered but requires spring rains or washing to properly map.

CONCLUSIONS AND RECOMMENDATIONS

A geological model applicable for exploration in the area is the Lightning Zone. The Lightning Zone is hosted within the regional Destor-Porcupine Fault in the Harker-Holloway area and is characterized by silica-albite alteration with pyrite surrounded by a sericite-carbonate halo. The Holt-McDermott gold mine is located 1 km south of the Lightning Zone on a splay fault from the Destor-Porcupine Fault.

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The Pipestone-Cameron Fault has not been diamond drilled within the property for a strike length of 3 km and represents a good "stacked" target adjacent to known gold showings within structures parallel to it. Therefore, drilling the humus gold anomaly should be done from BL\5E with a hole drilled north. This should be extended north to test the Pipestone-Cameron Fault which is consistent with the Lightning Zone model.

CERTIFICATE OF QUALIFICATIONS

I, Timothy J. Twomey, of Box 88, Balmertown, Ontario, POV 1C0, do hereby certify as follows concerning my Report on Geology and Humus Surveys, Flint Lake Property, dated January 30, 1997:

- 1) I am a 1983 graduate of Lakehead University, Thunder Bay, Ontario, holding a Bachelor of Science (Honours) degree in geology.
- 2) I hold a 90% interest in the Flint Lake Property.

Timp . any.

Timothy J. Twomey B.Sc (Hons) Geology

January 31, 1997 Balmertown, Ontario

APPENDIX (ASSAY CERTIFICATES)

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		1070 THUNDER E Pr	LITHIUM DRIVE, UNIT 2 BAY, ONTARIO P78 6G3 PHONE (807) 623-6448 FAX (807) 623-6820 Age 1
TIMOTHY J. TWO	NGRY	J	uly 24, 1996
BOX 88	MR3 2 T 0	Т.	
POV 1CO	NIARIO		
(807)735-3450			
•			
SAM	PLE #	Gold	Gold
Accurassay	Customer	ppb	Oz/t
2 717	-9/-/ 220751	107	0 005
1 / J / -	// 7 320752 // 7 320752	10	<0.003
3	3 320753	<5	<0.001
4	4 320754	21	<0.001
5	5 320755	8	<0.001
6	6 320756	<5	<0.001
7	1 320757	<5	<0.001
8	320758	<5	<0.001
9	320759	<5	<0.001
10	(D 320760	<5	<0.001
11 chec	ck (D 320760	<5	<0.001
12	12 320761	<5	<0.001
13 TJT	-96-12 320762	<5	<0.001
14 70	-20-1 PB 320763	368	0.011
15	-2. 320764	17	<0.001
16	-3 320765	768	0.022
17	-4 320766	18	0.001
18	-5 320767	83	0.002
19	~6 { ~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~	380	0.011
20	-7.262,320769	1142	0.033
21 Chec	ck 320769	1189	0.035

Berer Certified By:

ACCURASSAY LABORATORIES

1070 LITHIUM ORIVE, UNIT 2 THUNDER BAY, ONTARIO P78 6G3 PHONE (807) 623-6448 FAX (807) 623-6820

Page 1 TIM TWOMEY BOX 88 Sept. 17> 1996 BALMERTOWN, ONTARIO POV 1C0 Job# 9641197 (807)735-3450

8))	PLB #	Gold	Gold
Accurassay	Customer	ppb	Oz/t
1	320770	72	0.002
2	320771	184	0.005
3	320772	53	0.002
4	320773	7351	0.214
5	320774	5058	0.148
6	320775	1871	0.055
7	320776	38	0.001
8	320777	8	<0.001
9	320778	8	<0.001
10	320779	15	<0.001
11 Che	ack 320779	17	<0.001
12	320780	23	<0.001
13	320781	28	<0.001
14	320782	14	<0.001
15	320783	20	<0.001
16	320784	21	<0.001
17	320785	9	<0.001
18	320786	36	0.001
19	320787	112	0.003
20	320788	1368	0.040
21 Che	ack 320788	1362	0.040
22	320789	38	0.001
23	320790	164	0.005
24	320791	9	<0.001

Certified By:

والمستحارة لمسترور البسا يسرس

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ACCURASSAY LABORATORIES A DIVISION OF ASSAY LABORATORY SERVICES INC.

		1070 THUNDER 1) LITHIUM DRIVE, UNIT 2 BAY, ONTARIO P7B 6G3 PHONE (807) 623-6448 FAX (807) 623-6820 Page 1
T. TWOMEY		1	Nov. 13, 1996
BOX 88			T-1-4 0CA1ACA
BALMERTOWN, O	NTARIO	•	JOD# 3041404
POV 1C0	0.5.00		
FAX (807)735-	2703		
SAM	PLE #	Gold	Gold
Accurassay	Customer	ppb	Oz/t
1	320792	1497	0.044
2	320793	3483	0.102
3	320794	854	0.025
4	320795	762	0.022
5	320796	1874	0.055
6	320797	21854	0.637
7	320798	65563	1.912
8	320799	66291	1.934
9	320800	1083	0.032
10	15901	566	0.017
11 Che	eck 15901	589	0.017
12	15902	45	0.001
13	15903	122	0.004
14	15904	187	0.005
15	15905	422	0.012
16	15906	10	<0.001
17	15907	<5	<0.001
18	15908	<5	<0.001
19	15909	8	<0.001
20	15910	53	0.002
21 Che	eck 15910	66	0.002
22	15911	<5	<0.001
23	15912	<5	<0.001
24	15913	<5	<0.001
25	15914	<5	<0.001
26	15915	<5	<0.001
27	15916	<5	<0.001
28	15917	67	0.002
29	15918	854	0.025

Certified By

ACCURASSAY LABORATORIES A DIVISION OF ASSAY LABORATORY SERVICES INC.

1070 LITHIUM DRIVE, UNIT 2 THUNDER BAY, ONTARIO P7B 6G3 PHONE (807) 623-6448 FAX (807) 623-6820

Dec. 2, 1996

,

Job# 9641464

.

TIM TWOMEY BOX 88 BALMERTOWN, ONTARIO POV 1C0

Sample	Ag	As
	ppm	ppm
320792	1.0	152
320793	1.6	212
320794	0.1	65
320795	0.1	68
320796	1.4	196
320797	10.2	155
320798	34.9	70
320799	51.7	73
320800	1.7	96
159 01	0.3	64
15902	0.2	3
15903	<.1	104
15904	0.6	35
15905	0.1	97
15906	<.1	11
15907	<.1	15
15908	0.1	10
15909	0.3	19
15910	0.5	24
15911	<.1	<2
15912	<.1	5
15913	<.1	<2
15914	<.1	2
15915	<.1	4
15916	<.1	19
15917	<.1	13
15918	0.7	109

2. CI Certified By:



Chemex Labs Ltd.

Analytical Chemists * Geochemists * Registered Assayers

5175 Timberlea Blvd., Mississauga Ontario, Canada L4W 2S3 PHONE: 905-624-2806 FAX: 905-624-6163 To: TWOMEY, TIM

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P.O. BOX 88 BALMERTOWN, ON I?0V 1C0 Page Number :1 Total Pages :2 Certificate Date: 16-JAN-97 Invoice No. :19710040 P.O. Number : Account :Lli

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Project : Comments: ATTN: TIM TWOMEY **

			CERTIFICATE OF ANALYSIS A9710040			0	
SAMPLE	PREP CODE	Au ppb FA+AA					
GRIDA-L1W/1+75N GRIDA-L1W/2+00N GRIDA-L1W/2+25N GRIDA-L1W/2+45N GRIDA-L2W/1+75N	217 217 217 217 217	<pre>< 5 < 5 < 5 < 5 20 < 5</pre>					
GRIDA-L2W/2+50N GRIDA-L2W/2+75N GRIDA-L3W/2+00N GRIDA-L3W/2+25N GRIDA-L3W/2+50N	217 217 217 217 217 217	<pre>< 5 < 5</pre>					
GRIDA-L3W/3+00N GRIDA-L3W/3+20N GRIDA-L4W/2+50N GRIDA-L4W/2+75N GRIDA-L4W/3+00N	217 217 217 217 217 217	<pre>< 5 < 5<</pre>					
GRIDA-L4W/3+25N GRIDA-L4W3+62.5N GRIDB-L0/1+50N GRIDB-L0/1+75N GRIDB-L0/2+00N	217 217 217 217 217	<pre>< 5 < 5</pre>					
GRIDB-L0/2+20N GRIDB-L1E/1+25N GRIDB-L1E/1+50N GRIDB-L1E/1+75N GRIDB-L1E/2+00N	217 217 217 217 217	<pre>< 5 < 5</pre>					
GRIDB-L2E/1+50N GRIDB-L2E/1+75N GRIDB-L2E/2+00N GRIDB-L3E/1+00N GRIDB-L3E/1+25N	217 217 217 217 217 217	<pre>< 5 < 5 < 5 < 5 140 10</pre>					
GRIDB-L3E/1+50N GRIDB-L3E/1+75N GRIDB-L4E/0+25N GRIDB-L4E/0+50N GRIDB-L4E/0+75N	217 217 217 217 217	<pre>< 5 < 5 < 5 < 5 25 < 5 < 5</pre>					
GRIDB-L4E/1+00N GRIDB-L5E/0+00 GRIDB-L5E/0+25N GRIDB-L5E/0+50N GRIDB-L6E/1+12S	217 217 217 217 217	<pre></pre>					
	J						Ruger R.

CERTIFICATION OF COMMONLE



SAMPLE

Chemex Labs Ltd.

Analytical Chemists * Geochemists * Registered Assayers

Au ppb

FA+AA

PREP

CODE

5175 Timberlea Blvd., Mississauga Ontario, Canada L4W 2S3 PHONE: 905-624-2806 FAX: 905-624-6163

To: TWOMEY, TIM

**

P.O. BOX 88 BALMERTOWN, ON POV 1C0

Page Number :2 Total Pages :2 Certificate Date: 16-JAN-97 Invoice No. :19710040 P.O. Number : Account :11

Comments: ATTN: TIM TWO

Project :

CERTIFICAT

			Account	: L.II
MEY				
e of a	NALYSIS	A97	710040	

GRIDB-L6E/1+00S GRIDB-L6E/0+87S GRIDB-L6E/0+75S GRIDB-L6E/0+62S GRIDB-L6E/0+50S	217 217 217 217 217 217	 <pre>< 5 200 < 5 < 5 15</pre>							
GRIDB-L6E/0+37S GRIDB-L6E/0+25S GRIDB-L6E/0+12S GRIDB-L6E/0+00 GRIDB-L6E/0+25N	217 217 217 217 217 217	 15 50 < 5 10 10							
GRIDB-L6E/0+50N GRIDB-L6E/0+70N -L8E4+82.5S -L8E/4+75S -L8E4+62.5S	217 217 217 217 217 217	 <pre>< 5 < 5 < 5 < < 5 < < 5 << 5 </pre>							
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Image: Second Information Wining Act, the information Wininformatin the the term of the term of the term of the	Transaction Number (office use) W 9710 00023 Assessment Files Research Ima d 66(3) of the Mining Act. Under section 8 c work and correspond with the mining land ho Northern Development and Mines, 6th F RECEIVED form 0240. FEB 27 1997 MINING LANDS BRANCH Client Number B07-735-3450 Fax Number
Personal information Mining Act, the inforr Questions about thi 333 Ramsey Lake R 52F055W0006 2:17087 DOG PAW LAKE 52F055W0006 2:17087 DOG PAW LAKE 900 Instructions: - For work performed on Crown Lands before recording a - Please type or print in ink. 1. Recorded holder(s) (Attach a list if necessary) 2.170 1. Recorded holder(s) (Attach a list if necessary) Name <u>TIMDTHY</u> J. TWOMEY Address <u>Box 88</u> <u>BALMERTOWN</u> <u>AN</u>	1 66(3) of the Mining Act. Under section 8 c work and correspond with the mining land ho Northern Development and Mines, 6th F RECEIVED form 0240. FEB 27 1997 MINING LANDS BRANCH Client Number B07-735-3450 Fax Number
Instructions: - For work performed on Grown Lands before recording a - Please type or print in ink. 1. Recorded holder(s) (Attach a list if necessary) Name TIMOTHY J. TWOMEY Address BOK BB, BALMERTOWN, ON	Client Number
Address BOX BB, BALMERTOWN, ON	Client Number Z O 3 959 Telephone Number B O 7 - 735 - 3450 Fax Number Client Number
Address BOX BB, BALMERTOWN, ON	Telephone Number <u>B07-735-3450</u> Fax Number Client Number
BOK 88 BALMERTOWN , DN	B07-736-3930 Fax Number
	Client Number
POV ICO	- · · · · · · · · · · · · · · · · · · ·
ε,	Telephone Number
Address	reepnone Number
	Fax Number
The structure of work performed. Check (, ,) and report on only ONE of the	A following groups for this declaration
Geotechnical: prospecting, surveys, assays and work under section 18 (regs)	stripping, Rehabilitat
Work Type	Office Use
Geological, numus, rock assays	Commodity
(G-chem)	Total \$ Value of
Dates Work From C/ 07 96 To 3/ 0/ 97 Performed Day Month Year Day Month Year	NTS Reference
Global Positioning System Data (if available) Township/Area	Mining Division
M or G-Plan Number	Resident Geologist
G - 2.673	District Kenora
 Please remember to: - obtain a work permit from the Ministry of Natural H provide proper notice to surface rights holders before - complete and attach a Statement of Costs, form 02 provide a map showing contiguous mining lands th include two copies of your technical report. 	esources as required; ore starting work; 112; at are linked for assigning work;
3. Person or companies who prepared the technical report (Attach a	a list if necessary)
Name TIMOTHY J. TINDMEY	Telephone Number 807-735-345
Address Row DR P. L. L. D. L. D. L.	Fax Number
Name	Telephone Number
Address	Fax Number
Mana	Tolophone Murchan
	release with the second s
Address	Fax Number
4. Certification by Recorded Holder or Agent	
I, TIMOTHY J. TWOMEY , do hereby certify that	I have personal knowledge of the fact
forth in this Declaration of Assessment Work having caused the work to b or after its completion and, to the best of my knowledge, the annexed rep	e performed or witnessed the same dur ort is true.
Signature of Recorded Holder of Agent	Date

.

Signature of Recorded Holder of Agen	5	12	wn		Date Feb-10/	97
Agent's Address		1	7	Telephone Number	Fax Number	
				water and the second		

inusi a	ccompany mis ioni.			·		
Mining (work wa mining li column indicated	Claim Number. Or if s done on other eligible and, show in this the location number t on the claim map.	Number of Claim Units. For other mining land, list hectares.	Value of work performed on this claim or other mining land.	Value of work applied to this claim.	Value of work assigned to other mining claims.	Bank. Value of work to be distributed at a future date.
eg	TB 7827	16 ha	\$26, 825	N/A	\$24,000	\$2,825
eg	1234567	12	0	\$24,000	0	0
өg	1234568	2	\$ 8, 892	\$ 4,000	0	\$4,892
1	1178247	400	A # 053.4	0 1,600		2453.44
2	1184549	4	5000	3,200		1800.
3		,				
4						-
5						
6				· · · · · · · · · · · · · · · · · · ·	· · · · · · · · · · · · · · · · · · ·	
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10	AEBE			961		
11	FEB 2	1997	9	FEB 27 10.		
12	in up in LAi	BS BEANEH		VING LAND		
13	MINING		-		NC I	
14						
15						
	· · · · · · · · · · · · · · · · · · ·	Column Totals	27053	4800		4253

the mining land where work was performed, at the time work was performed. A map showing the contiguous link

the claim where the work was done.

Signature of Recorded Holder or Agent Authorized in Writ Feb. 10, 91

6. Instructions for cutting back credits that are not approved.

Some of the credits claimed in this declaration may be cut back. Please check (\sim) in the boxes below to show how you wish to prioritize the deletion of credits:

- 1. Credits are to be cut back from the Bank first, followed by option 2 or 3 or 4 as indicated.
- 2. Credits are to be cut back starting with the claims listed last, working backwards; or
- 3. Credits are to be cut back equally over all claims listed in this declaration; or
- 4. Credits are to be cut back as prioritized on the attached appendix or as follows (describe):

Note: If you have not indicated how your credits are to be deleted, credits will be cut back from the Bank first, followed by option number 2 if necessary.

Received Stamp	KENOPA - MINING DIV.	Deemed Approved Date	Date Notification Sent
	IN MELEIN VIEID	Date Approved	Total Value of Credit Approved
0211 (02/06)	FE0141987 AM FM 7001112103456	Approved for Recording by Mining Recorder (S	gnature) ACTING

I, <u>Timothy</u> <u>T. Twomey</u>, do hereby certify that the above work credits are eligible under (print Full Name) subsection 7 (1) of the Assessment Work Regulation 6/96 for assignment to contiguous claims or for application to



Ministry of Northern Development and Mines

Statement of Costs for Assessment Credit

Transaction Number (office use)

W9710.00023

Personal information collected on this form is obtained under the authority of subsection 6(1) of the Assessment Work Regulation 6/96. Under section 8 of the Mining Act, the information is a public record. This information will be used to review the assessment work neglitation drop, on with the mining land holder. Questions about this collection should be directed to the Chief Mining Recorder, Ministry Plorther Development and Mines, 6th Floor, 933 Ramsey Lake Road, Sudbury, Ontario, P3E 685.

Work Type	Units of Work Depending on the type of work, list the number of hours/days worked, metres of drilling, kilo- metres of grid line, number of samples, etc.	Cost Per Unit of work	Total Cost
Geological Survey	9 days	\$ 2.00 /day	1800.0
Report é drafting	6 days	\$ 200/day	1200.0
Linecutting	4.1 km	· /	2500.0
Prospector	4 days	100 /day texpense	841.90
Assays			1860.56
Associated Costs (e.g. suppli	es, mobilization and demobilization).		
flagain	a tana		29,7
10		i	
		ECEIVED	· · · · · · · · · · · · · · · · · · ·
Trar	sportation Costs	LOLIVED	
10	ad access user fee	FEB 27 1997	325.
tro	MSport (car @ 30 4/And	NING LANDS BRANCH	225.
Foo	and Lodging Costs		270.
	Total Value o	of Assessment Work	9053.44

Calculations of Filing Discounts:

1. Work filed within two years of performance is claimed at 100% of the above Total Value of Assessment Work. 2. If work is filed after two years and up to five years after performance, it can only be claimed at 50% of the Total Value of Assessment Work. If this situation applies to your claims, use the calculation below:

TOTAL VALUE OF ASSESSMENT WORK × 0.50 = To	otal \$ value of worked claimed.
--	----------------------------------

Note:

- Work older than 5 years is not eligible for credit.

- A recorded holder may be required to verify expenditures claimed in this statement of costs within 45 days of a request for verification and/or correction/clarification. If verification and/or correction/clarification is not made, the Minister may reject all or part of the assessment work submitted.

Certification verifying costs: reasonably be determined and the costs were incurred while conducting assessment work on the lands indicated on the accompanying Declaration of Work form as <u>recorded holder</u>, agent, or state company position holder with signing authority) to make this certification. my Feb. 10/97

Ministry of Northern Development and Mines

June 5, 1997

Scott A. Rivett Mining Recorder 808 Robertson Street P.O. Box 5200 Kenora, ON P9N 3X9

Dear Sir or Madam:

Ministère du Développement du Nord et des Mines



Geoscience Assessment Office 933 Ramsey Lake Road 6th Floor Sudbury, Ontario P3E 6B5

Telephone: (705) 670-5853 Fax: (705) 670-5863

Submission Number: 2.17087

Status
Subject: Transaction Number(s): W9710.00023 Approval After Notice

We have reviewed your Assessment Work submission with the above noted Transaction Number(s). The attached summary page(s) indicate the results of the review. WE RECOMMEND YOU READ THIS SUMMARY FOR THE DETAILS PERTAINING TO YOUR ASSESSMENT WORK.

If the status for a transaction is a 45 Day Notice, the summary will outline the reasons for the notice, and any steps you can take to remedy deficiencies. The 90-day deemed approval provision, subsection 6(7) of the Assessment Work Regulation, will no longer be in effect for assessment work which has received a 45 Day Notice.

Please note any revisions must be submitted in DUPLICATE to the Geoscience Assessment Office, by the response date on the summary.

NOTE: This correspondence may affect the status of your mining lands. Please contact the Mining Recorder to determine the available options and the status of your claims.

If you have any questions regarding this correspondence, please contact Bruce Gates by e-mail at gates_b@torv05.ndm.gov.on.ca or by telephone at (705) 670-5856.

Yours sincerely,

ncod.

ORIGINAL SIGNED BY Ron C. Gashinski Senior Manager, Mining Lands Section Mines and Minerals Division

Correspondence ID: 10908 Copy for: Assessment Library

Work Report Assessment Results

Submission Number: 2,17087 Date Correspondence Sent: June 05, 1997 Assessor: Bruce Gates First Claim Transaction **Approval Date** Number Number Township(s) / Area(s) Status DOGPAW LAKE Approval After Notice June 01, 1997 W9710.00023 1178247 Section: 12 Geological GEOL 13 Geochemical GCHEM 17 Assays ASSAY

The revisions outlined in the Notice dated April 17, 1997, have been corrected. We have allowed the linecutting cost as originally submitted. Accordingly, assessment work credit has been approved as outlined on the Declaration of Assessment Work Form accompanying this submission.

Corres	pondence	e to:
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Mining	Recorder
Kenora,	ON

Resident Geologist Kenora, ON

Assessment Files Library Sudbury, ON

Recorded Holder(s) and/or Agent(s): TIMOTHY J TWOMEY BALMERTOWN, Ontario

Distribution of Assessment Work Credit

The following credit distribution reflects the value of assessment work performed on the mining land(s). Please contact the Mining Recorder to determine if this affects the status of your claims.

 Date:
 June 05, 1997

 Submission Number:
 2.17087

 Transaction Number:
 W9710.00023

 Claim Number
 Value Of Work Performed

 1178247
 1,813.00

 1184549
 7,240.00

 Total:
 \$

 9,053.00







