UMEX · INC.

1935 Leslie Street, Don Mills, (Toronto) Canada M3B 2M3
Cable Address UMEXCORP, TORONTO
Telephone (416) 445-8832 Telex 06-966679

BECKINGTON PROJECT

BECK 1 AND BECK 2 CLAIM GROUP

SAVANT LAKE AREA, ONT.

April 1983

J.-J. Lefebvre

2.5564

SUMMARY

In 1982, work was carried out on a large block of claims in the Beckington area, southeast of Savant Lake. The block of claims was divided in two working zones, Beck 2 to the north and Beck 1 to the south, separated by an area covered with thick sandy glacial sediments.

The Beckington claim group delineates a zone of felsic to intermediate volcanic tuffs enclosed between two thick mafic sequences. The felsic material is largely affected by hydrothermal alteration associated with local poorly developed vein-type mineralizations. Little potential is envisaged for expanding these vein-type sulfide occurrences which may be interpreted to be structurally "trapped" sulphides in the hydrothermal fluid course to the surface. There is a better potential for massive sulfide deposits at the top of the felsic sequence in spite of important reworking and erosion of the volcanics that resulted in relatively abundant epiclastic material. Taking into account the existence of very extensive hydrothermal activities associated with stringer-type sulfide accumulation containing some Cu-Zn mineralizations and local gold indications, and considering the existence of known gold deposits to the south of the mapped area, it is obvious that the Beckington area must be suggested for further exploration.

RECOMMENDATIONS

It appears that the area of Beck 1, south of the logging road where the alteration is the most intense and reaches the upper levels of the felsic volcanic pile represents the best potential of finding a Cu-Zn-Pb massive sulphide deposit. This zone also yielded some indications of possible gold concentration in the pyrite-pyrrhotite stringers.

Potential for gold mineralization also exists where the alteration rises in the geological succession and intersects the iron formation creating favorable areas for gold remobilization and concentration.

Structures such as these are supposed to exist under the glacial cover between Beck 1 and 2 may be important in providing channel ways resulting in gold being deposited in specific structural sites as economic-grade deposits.

From these considerations, the following field work could be recommended:

- More detailed geological mapping is suggested along the contact between pyroclastic and epiclastic tuffs overlying the felsic cycle to the east of Beck 1 and 2. Along this zone, and more particularly athward the eastern section of the logging road in Beck 1, where the hydrothermal alteration is the most intense and extensive, MaxMin II surveys should be completed to confirm several EM anomalies that were already detected in the area.

- In the same area, along the creek and south of the logging road, MaxMin-confirmed anomalies have been only partially probed by drill hole #9. Gold indications were detected in this hole suggesting that more drilling should be completed in order to appraise the possible extention of these mineralization indications.

- Systematic gold analyses in ppb is suggested on the surface samples along the iron formation; mainly in the areas where the formation is intersected by the hydrothermal alteration.

- Geophysical data in the area between Beck 1 and Beck 2 should be reinterpreted taking into account possible directional variations of the geological trends.

INTRODUCTION

Purpose and Scope

The purpose of the survey was to evaluate the large Beck 1 and 2 claim block which contains complexly intercalated sequences of mafic metavolcanics, intermediate to felsic fragmental rocks and minor metasediments. These volcanic rocks are locally intensely affected by hydrothermal alterations, associated with metal anomalies and occasional good values of copper and zinc.

The Beck project is an exploration program directed primarily towards the discovery of a volcanogenic, stratiform massive-sulphide type polymetallic deposit, using geological mapping, lithogeochemical and geophysical techniques. The Beck 1 and 2 claim block was outlined to follow and cover the felsic volcanic rocks and principally the interpreted mafic to felsic volcanic contacts.

During the course of the field season, an area of 18 square kilometers in the Beck 1 and 2 area was surveyed and sampled. Reference should be made to Figure 1, the location map, and Figures 2, 3, 4, 5 and 6, illustrating the density of sampling stations and geological observations.

Location and access

The Beck project area lies within the Wabigoon sub-province, about 3 kilometers east of Savant Lake, in the district of Thunder Bay, Northwestern Ontario.

The area of interest is approximately 4 by 25 kilometers located within the central portion to the south part of the Beckington Lake, O.G.S. map 2431. The access to this general region and the base camp is to proceed north of the Transcanada highway via Highway 599, up to Savant Lake, 130 km north of Ignace. Access to the claims is via logging roads and trails. The claims are also straddling the CN main rail line across Canada.

Geographic setting

The Beck project area lies within a region of low to very moderate relief where elevations range from 400 to 500 metres above sea level. Spruce is common throughout with little underbrush in most areas, alternating with numerous marshes and swamps. The latter being locally associated with muskeg, cedar and, less frequently, alder.

A large area between Beck 1 and Beck 2 is covered with thick sandy glacial sediments where, in the South-East section of Beck 2, several eskers were delineated. On these sandy hills, the vegetation is less dense and consists mainly of jack pine.

Personnel deployment

A field crew of two men worked on the property for a period of 3 months (between May 1982 and August 1982). Geological mapping and lithogeochemical sampling were completed, with some geophysical surveys, along base lines and traverse lines 125 meters apart. 212 lithogeochemical samples were collected in Beck 1 and 244 samples in Beck 2. All these samples were assayed at the X-Ray Assay Laboratories in Toronto for Cu, Zn, Pb in ppm; total rock analyses were completed on most of these samples. Only a few of them were assayed for Au in ppb. A large number of these samples were also prepared for microscopic examination at the UMEX Laboratory in Toronto.

Staking

The Beckington claim group, covering Beck 1 and 2, covers an area of about 25 square kilometers, measuring 12 kilometers long and 2 kilometers wide. The 201 claims, as listed in Appendix 1, were staked from April 1980 to August 1982.

EXPLORATION METHODS

Office Assessment

The initial office assessment of the Beck Project entailed the compilation of all known pertinent information on the area. Geological and topographic maps were obtained, as well as air photos for the region. This material was studied with particular emphasis on gross geological trends and lineament patterns, the results of which were used as a frame for the field geological mapping. Assessment and OGS, ODM reports and publications concerning the project area were researched and documented.

Field Procedures

The exploration camp was located at Savant Lake. The project area was explored from this base by vehicle and systematic walking along the grid lines.

Descriptions of rock samples of all outcrops encountered were summarized on standardized rock data cards; the samples were systematically etched by hydrochloric acid.

Lithogeochemical samples were taken at about 100 meter intervals, preferably in felsic volcanic material and at shorter interval in zones with geological or alteration contacts. In case of dubious identification, thin sections were prepared and microscopically studied. Most of these samples were analyzed for copper, zinc, and lead (in ppm) and for total rock analyses. Geochemically anomalous zones in copper, zinc, lead, silica and manganese were outlined and defined by using routine statistical techniques. A geochemical program was computed on the data collected from total rock analyses and alteration zones of different types were defined and compared with the geological interpretations and geophysical readings. Resulting targets would then be outlined and suggested for the drilling phase.

GEOLOGY

General

The understanding of the geology resulted from systematic examination of the rather abundant outcrops encountered while running the base line and the traverse lines cut at intervals of 125 meters.

Metavolcanics

Intermediate to Mafic metavolcanics

The thick sequences of mafic metavolcanics underlying to the west and superposed east to the felsic metavolcanics are well exposed immediately east of the mapped area. At that location, they consist principally of fine to coarse-grained flows, mainly basaltic in composition with rare gabbroic to dioritic intercalations. To the west of the mapped area, in the Beck 2 claim group, the outcrops are less abundant. Among the fine-grained mafic flows, some pillowed and porphyritic textures were observed. To the west of the Beck 1 claim group, the outcrops are still scarce. In this area, mafic intrusives of gabbroic to dioritic composition are quite common. The mafic metavolcanics are recrystallized to varying extents and, locally, the recrystallization is so intense, that the textures are no longer conserved. The confusion with gabbroic intrusive is then easily made.

The most common mineral assemblage is plagioclase, amphibole, chlorite, biotite, carbonate and epidote. The basicity of the plagioclases decreases from the Beck 2 area to the Beck 1 area.. Amphiboles are mainly common hornblende and actinolite to the North and essentially actinolite to the south of the separation boundary between Beck 1 and 2.

The felsic sequence, in the mapped area, consists of several volcanic cycles separated by intermediate to mafic metavolcanics. These horizons consist of andesitic to basaltic flows and pyroclastic tuffs. The hydrothermal alteration has frequently enriched these rocks in quartz and biotite. The resulting crystallization has almost systematically destroyed the original textures and structures. In the Beck 1 area, south of the east-west trending logging road, relatively thin intrusive gabbros are remarkably enriched in quartz, siderite and, locally, in tourmaline.

Felsic metavolcanics

In the mapped area, in Beck 1, as well as in Beck 2, four to five felsic volcanic cycles have been identified. They are separated by thin andesitic to mafic episodes, which can be easily followed in the field for relatively long distances. Each cycle consists of dominantly fine dacitic tuffs and flows.

The lower cycles in the Beckington felsic volcanic sequence contain abundant quartz-feldspar-porphyritic-dacite flows. The subhedral to euhedral plagioclase phenocrysts are slightly sericitized and partially recrystallized, and tend to blend into the matrix. Some coarse grains of plagioclase are fragmented; this feature as well as inhomogeneities in the texture, indicate that the rock may be partly pyroclastic in origin. The quartz phenocrysts are mainly white and locally mixed with less common blue quartz. The blue quartz are predominant in the upper cycles and particularly abundant at the top of the sequence, in Beck 1, just south of the logging road, where they crystallize in all kinds of rocks and in the mafic metavolcanics as well.

The fragments in the felsic tuffs rarely excede a few millimeters and tend to be slightly coarser and flattened toward the top of the sequence.

In the south part of Beck 2, volcanic tuff-breccia were observed in the lowest felsic cycle. The coarsest fragmental rocks are dacitic to andesitic in composition. The fragments are generally well sorted. The dacitic fragments are more felsic than the biotite-rich matrix and are distinct. The fragments consist predominantly of only one rock type and are angular in shape; the matrix may locally show flow textures.

To the north of Beck 2, a partially sericitized lens of fragmental rhyodacite to rhyolite was observed below an extensive iron formation. The white fragments vary in size from several cm to large blocks of indeterminate size and are homogeneous in composition. The angular to subrounded fragments are haphazardly arranged and set in a matrix with a similar composition.

The uppermost felsic cycle lies on the iron formation underneath the upper mafic sequence. The felsic material belonging to this cycle has been partially eroded and is associated with intercalated and overlying fragmental epiclastic rocks. These fragmental rocks are extremely poorly sorted having equally abundant rounded and subangular fragments randomly oriented in an abundant volume of matrix. The fragments are variable in composition and origin. They are principally composed of fine felsic tuffs, quartz porphyries and minor mafic to intermediate rocks. Rare sulfide-rich fragments were observed south of the logging road. These deposits were at least partially tentatively interpreted to be a lahar. The size of the fragments diminish to the north as well as the thickness of the deposits. In Beck 2, this horizon consists of very fine material; the deposit tends to be lensy and disappears north of Beck 2, where the iron formation underlies directly the upper mafic sequence.

Metasediments and Iron formation

The iron formation near the top of the felsic sequence is quite extensive and was followed from an area north of the mapped area (south of Evans Lake, about five km north of the village of Savant Lake) to the south part of Beck 2, where it disappears under the glacial cover. Farther south, it can be traced by magnetic methods down to the north of Beck 1 where it was observed again outcropping continuously down to the south of the logging road. At that location, the iron formation was recognized at the bottom of drill hole #8 and on the surface, west of this drill-hole, with an approximate thickness of 60 m, that is to say, less than half of the thickness estimated for this iron formation north of Beck 2.

The iron formation consists of fine tuffaceous metasediments, andesitic and mafic tuffs and an unusual rock almost essentially composed of amphibole and garnet (Mn-rich almandine). This garnet rich rock is sporadically mineralized in pyrite and pyrrhotite but is extremely poor in magnetite. The iron content of this silica-iron-rich rock may be as high as 30% Fe_2O_3 and is never less than 15%.

Lenses of metaquartzites, metapelites and tuffaceous metasediments were observed sporadically at the base of the upper mafic sequence. The metasediments have weathered to a buff brown. The metaquartzites are massive while the more shaly material exhibit sharp bedding planes.

Intrusives

The felsic volcanic sequence is intruded to the west of Beck 2 by an excrescence of a large trondhjemitic batholith. This intrusion appears to be responsible for abundant silicifications in the surrounding quartz-feldspar porphyry flows and tuffs and could be the root for the extensive hydrothermal alteration affecting Beck 2 and extending largely to the north and to Beck 1. These silicifications around the intrusion are apparently associated with patches of copper anomalies.

Quartz-feldspar porphyritic rhyodacites are predominantly found in the central and southwest part of Beck 1 where they form small-sized, sill-like bodies intercalated in the felsic tuffs. These rocks typically contain quartz and feldspar phenocrysts in a fine-grained, pinkish-grey massive matrix.

Mafic to intermediate intrusive sills were locally observed in Beck 1 and 2 and appeared to be slightly more common in the south-east of Beck 1. These sills (and dikes?) are composed predominantly of quartz diorite and quartz gabbro. In the field, these rocks weather from dark grey to dark green and are usually dark grey on the fresh surface. Grain size is commonly fine to very fine.

Metamorphism

The entire Beckington area has been regionally metamorphosed. Beck 2 and north part of Beck 1 have been metamorphosed to predominantly amphibolite facies. South part of Beck 1, just south of the logging road, the area has been regionally metamorphosed to greenschist facies. In the hydrothermally altered felsic metavolcanics, the passage from the medium-grade metamorphic conditions to the low grade metamorphic conditions is well marked by the substitution of chloritoids for staurolite in a relatively narrow band athwart the logging road where staurolite-chloritoid-garnet-andalusite assemblages were observed. In the Beck 2 area, staurolite is quite common and chloritoid absent and kyanite and sillimanite are sporadically associated with andalusite. North of Beck 2, sillimanite and kyanite tend to be slightly more common than andalusite in the deeply altered metavolcanics.

Structural geology

The claim group is located on the south-east limb of an anticlinal structure plunging to the northeast. Consequently, the felsic to intermediate metavolcanic sequence covered by the claim group, and intercalated between two thick sequences of mafic metavolcanics, extends rather regularly along a northwest-southeast trend. The structure is dipping to the east with an angle ranging between 60 and 80°.

The metavolcanics and metasediments do not have a prominent foliation. This poorly marked foliation which may or may not be primary arises from the subparallel alignment of chlorite, actinolite and hornblende in the mafic metavolcanics and principally biotite in the felsic metavolcanics and metasediments (chlorite and sericite in the extreme south of Beck 1).

Crenulation folding is present in the central portion of Beck 1 in deeply altered sericite and sericite-chlorite rich rocks.

No major fault was observed in the field. However, the area between Beck 1 and Beck 2, which is partly covered by a thick overburden could be a zone of intense faulting and fracturation. Some outcrops containing cataclastic rocks were observed in this area north-west of Beck 1.

A fractured zone has been intersected by drill hole #8 and interpreted to be a transverse fault, probably responsible for a slight change in the trend of lithologies from north to south of the logging road in the east section of Beck 1.

Economic Geology

Sulphide mineralizations in the Beckington area occur as sporadic disseminations of pyrite or pyrrhotite in felsic to intermediate tuffs and more seldom in the coarse mafic material and gabbro intrusions.

Concentrations of stringer-type pyrite-pyrrhotite mineralizations were observed locally in the iron formation and the hydrothermally altered felsic metavolcanics. Two of these stringer-type pyrite-pyrrhotite mineralizations from drill hole #9, yielded some gold values in deeply altered intermediate to mafic metavolcanics (respectively 410 and 240 ppb Au).

In the Beckington area, the copper and zinc mineralizations encountered to date occur as isolated, minor chalcopyrite disseminations within altered intermediate rocks along the railway in Beck 2, a chalcopyrite vein in altered dacitic tuff in drill hole #3 and sphalerite stringers in chloritized rocks in d.d.h. 8, respectively in Beck 2 and 1. Drill hole #4 intersected traces of Cu-Zn mineralizations in Py Po stringers in altered felsic tuffs.

Invariably, these occurrences of copper-zinc mineralization appear to be vein type. Host rocks are usually hydrothermally altered felsic to intermediate tuffs. There is no evidence to suggest that any of these mineralizations may be related to conformable massive sulfide bodies; they are probably not continuous enough to develop economic tonnages. These vein-type mineralizations only indicate that the hydrothermal fluids responsible for the widely extended alteration patterns were carrying metals. However, taking into account the abundance of epiclastic tuffs topping the felsic volcanic cycle, it is reasonable to think that the conditions of relative quietness necessited for the deposition and the conservation of massive sulfide bodies were not completely fulfilled.

The area also has a potential for gold mineralization associated with stringer-type sulfide in altered metavolcanics as illustrated by anomalous gold in the 10-400 ppb range intersected in drill-hole #9.

GEOCHEMISTRY

General

Approximately 450 lithogeochemical samples were taken in the Beckington area. Each was analyzed for copper, zinc and lead and a large selection was sent for whole rock analysis to assist in characterizing rock units circumscribing and defining the hydrothermal alterations.

Lithogeochemistry

A well defined alteration zone was identified in Beck 2, affecting the upper cycles below the Iron Formation. The alteration zone intersects the Iron Formation north of Beck 2 and in the area explored by drill hole #2. It could be rooted in the trondhjemite excrescence of Chivelston Lake where important silicifications were observed.

This extensive alteration seems to continue under the glacial cover between Beck 2 and Beck 1, as indicated by rare outcrops and diamond drilling (DDH #3 and 5) and was recognized from the north part of Beck 1, down to the southwest of the claim group, on the west shore of Sturgeon Lake. In the Beck 1 area, the alteration appears to be more intense in the vicinity of the logging road where it reaches higher levels in the volcanic pile. At that location, the contact between the pyroclastic tuffs and the epiclastic tuffs at the top is marked by a relatively consistent silicification associated with Manganese and possibly lead anomalies.

Chemically, this alteration is characterized by a strong Na_2O depletion and very low values of the saturation index, indicating important relative alumina enrichments. Mineralogically, these peraluminous rocks are expressed by abundant crystallizations of kyanite, sillimanite, andalusite and staurolite in Beck 2, and andalusite, staurolite, chloritoids in Beck 1. South of Beck 1, this same alteration is represented by the mineral assemblage of andalusite and chloritoid. Chloritization and sericitization are well developed just south of the logging road in Beck 1, in an area where the sodium depletion is particularly intense.

Results of the geochemical analyses of the rock samples indicate normal background values of Cu, Zn and Pb for the region.

Element	Mean (ppm)	Mean+1 (ppm)	Mean +2	Mean +3
Cu	18.85	36	52	69
Zn	39.24	65	91	116
Pb	7.14	10	14	17

Small zones of anomalous Cu and Zn were identified as isolated patches in the alteration zone. Among these anomalous zones, only two are considered important. Abnormal values found in the remaining areas were either too weak or too small to be of interest. In Beck 2, along the transcanadian railway, a Cu (Zn,Pb) anomaly is centered in the broadest section of the alteration zone and is caused by visible chalcopyrite in the samples. In Beck 1, an important Cu, Zn, Pb anomaly occupies the same location as the zone of chloritization, sericitization and Na depletion south of the logging road.

It is in this particular area that drill hole #8 intersected a narrow zone of sphalerite stringers in chloritized rocks and that the drill hole #9 revealed important accumulations of pyrite and pyrrhotite mineralizations yielding some gold values.

The results of the geochemical survey are shown in the attached map; whole rock analysis and lithogeochemical interpretation are in Appendix X.2

DIAMOND DRILLING

Eight targets have been selected for drilling in the Beck 1 and 2 claim block. These targets resulted from the intersection of hydrothermal alteration pattern, confirmed by lithogeochemistry and microscopical examination of the corresponding altered rocks, and favorable geology, generally along the upper contact of felsic tuff with overlying mafic formations, iron formation or felsic epiclastic material. These targets were also outlined by EM-16 and Max-Min geophysical anomalies.

Drill hole # 1 - was located in claim Pa 486261, which is mainly covered with a thin blanket of glacial sand and gravel and it intersected a sequence of metasediments, mafic to intermediate metatuff and an iron-rich garnet amphibolite. The geophysical anomaly was related to minor pyrite-pyrrhotite stringer type mineralizations.

Drill hole # 2 - was located in claim Pa 486255, in a similar geological environment as ddh #1, with a similar type of mineralization.

Drill hole # 3 - was located in claim Pa 486118, which is covered with a relatively thick blanket of glacial sand. It intersected deeply hydrothermally altered felsic and mafic tuffs containing minor pyrite and pyrrhotite mineralizations associated with weak copper and zinc values.

Drill hole # 4 - was located in claim Pa 486031, mainly covered with swamps, and where the extension of a felsic/mafic metavolcanics contact, observed further North, was expected to be continued under the overburden. The drill-hole missed the geophysical anomaly and the contact. Only traces of pyrite, pyrrhotite and sphalerite were intersected.

Drill hole # 5 - was located in claim Pa 486119, which is covered with a thick blanket of glacial sand. The drill intersected a complex succession of intensely altered felsic and mafic tuffs. The mineralization consisted of minor pyrite and pyrrhotite disseminations and traces of chalcopyrite.

Drill hole # 6A - located in claim Pa 486031, on the same target as the one missed by drill hole #4. The drill hole was stopped in the overburden rich in boulders and gravels because of broken drill rods.

Drill hole # 6B - in the same claim, intersected a contact between mafic tuff and a quartz porphyry dacitic to rhyodacitic tuff containing locally abundant patches of pyrrhotite.

Drill hole # 7 - was located in claim Pa 486065 in an area covered with recent river sediments. Under this relatively thick overburden, the geology consisted of epiclastic tuffs topping felsic pyroclastic tuffs and a silica-rich iron formation. Geology in d.d.h. 7 was also characterized by faulting and local but intense fracturation of the rocks. Some pyrrhotite concentrations were observed below the fracture zone, in a dark andesitic tuff.

Drill hole # 8 - was located in claim Pa 486069 with abundant outcropping indicating the same geological succession as in drill hole #7. Minor sphalerite was observed in a chlorite-sericite schist resulting from the hydrothermal alteration of felsic to intermediate tuffs.

Drill hole # 9 - was located in claim Pa 486068 on a river bank, the geology consisted of a complex succession of deeply hydrothermally altered felsic to mafic metavolcanic tuffs intersected by relatively fresh gabbro intrusions.

Rather frequent concentrations of stringer-type pyrite and pyrrhotite mineralizations were observed in d.d.h. #9; two of these concentrations yielded some significant gold values.

Hole locations and complete drill logs are in Appendix 2.3

CONCLUSIONS

The potential for volcanic massive sulphide mineralizations in the Beckington area, strongly suggested by extremely favorable geological and geochemical conditions, is limited by the paucity of geophysical response at the surface of the studied area and by the existence of intensely reworked material at the top of the felsic cycle. However, abundance of hydrothermal activity and the occurrence of numerous pyrite-pyrrhotite stringer-type mineralizations yielding local gold indications enhance the potential of the area.

F. Felder
Exploration Manager

AUTHOR'S QUALIFICATIONS

I, Frederick Felder of 7776 Nursery Street, Burnaby, B.C., V5E 2B4, certify the following:

I am a greduate of McGill University of B.Sc. Geology 1967 and M.Sc. Geology-Geochemistry the University of New Brunswick 1972.

I am a member of the Society of Exploration Geochemists, Canadian Institute of Mining and Metallurgy and Geological Association of Canada.

From 1967 to 1979, I have been employed in my field by Cominco + Exminesa in Eastern Canada, Spain and Mexico, Soquem in Quebec, and Union Minière S.A. in Mexico and Central and South America.

From 1979 to 1983, I have been the Regional Manager for Union Minière Explorations and Mining Corporation Limited for the Western District.

From 1983 to the present, I have acted as Exploration Manager [illegible] Inc.'s canadian operations.

F. Felder
January 19, 1984

Before assessing see note attached at back of survey MEA

BECKINGTON AREA - GEOLOGY
GEOCHEMISTRY

FIGURES

Fig. 28	Pb Anomalies	DWG No. 1	Beck 2
Fig. 29	Pb Anomalies	DWG No. 3	Beck 1
Fig. 30	Pb Anomalies	DWG No. 4	Beck 1
Fig. 31	Pb Anomalies	DWG No. 5	Beck .

APPENDIX 1

LIST OF BECK CLAIMS

BECK CLAIMS

Pa 611926	July 19, 1982
Pa 612001	August 3, 1982
612002	"
612003	"
612004	"
612005	"
612006	"
612007	"
612008	"
612009	"
612010	"
612011	"
612012	"
Pa 612014	"
Pa 612016	"
612017	"
612018	"
612019	"
612020	"
612021	"

Pa 487062	February 2, 1981
487063	"
487064	"
487065	"
487066	"
487067	"
487068	"
487069	"
Pa 487633	February 16, 1981
487634	"
487635	"
487636	"
487637	"
487638	"
487639	"
487640	"
487641	"
Pa 486913	October 1, 1980
486914	"
486915	"
486916	"
Pa 436823	April 10, 1980
436824	"
436825	"
436826	"
Pa 436828	"
436829	"
436830	"
436831	"
436832	"
436833	"
436834	"
436835	"
436836	"
436837	"
436838	"

BECK CLAIMS

Pa 437423	April 11, 1980	
437424	"	
437425	"	
437426	"	
437427	"	
437428	"	
437429	"	
437430	"	
Pa 486020	April 9, 1980	
486021	"	
486022	"	
486023	"	
486024	"	
486025	"	
486026	"	
486027	"	
486028	"	
486029	"	
486030	"	
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486049	"	
486050	"	
486051	"	
486052	"	
486053	"	
486054	"	
486055	"	
Pa 486056	April 9, 1980	
486057	"	
486058	"	
486059	"	
486060	"	
486061	"	
486062	"	
486063	"	
486064	"	
486065	April 10, 1980	
486066	"	
486067	"	
486068	"	
486069	"	
Pa 486087	April 11, 1980	
486088	"	
486089	"	
486090	"	
486091	"	
486092	"	
486093	"	
486094	"	
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486100	"	
486101	"	
486102	"	
486103	"	
486104	"	
486105	"	
486106	"	
486107	"	
486108	"	
486109	"	
486110	"	
486111	"	
486112	"	
486113	"	
486114	"	
486115	"	
486116	"	
486117	"	
486118	"	

BECK CLAIMS

Pa 486119	April 11, 1980	Pa 486288	April 10, 1980
486120	"		
486121	"	Pa 486308	April 10, 1980
486122	"	486309	"
486123	"	486310	"
486124	"	486311	"
486125	"	486312	"
486126	"	486313	"
486127	"	486314	"
486128	"	486315	"
486129	"		
486130	"		
486131	"		
486132	"		
486133	"		
486134	"		
486135	"		
486136	"		
Pa 486253	"		
486254	"		
486255	"		
486256	"		
486257	"		
486258	"		
486259	"		
486260	"		
486261	"		
486262	"		
486263	"		
486264	"		
486265	"		
486266	"		
486267	"		
486268	"		
486269	"		
486270	"		
486271	"		
486272	"		
486273	"		
486274	"		
486275	"		
486276	"		
486277	"		
486278	"		
486279	"		
486280	"		

APPENDIX 2

a) surface geochemical analyses.

b) whole rock analyses.

c) statistical interpretation of surface geochemical analyses.

d) lithogeochemical interpretation.

X-RAY ASSAY LABORATORIES 04-AUG-82 REPORT 15411 REF. FILE 11123-M3

SAMPLE	ZN PPM	AG PPM	PB PPM	CU PPM
B2AS1	--	--	--	>4000
B2AS2	--	--	--	--
B2AS3	74.0	--	8	42.0
B2AS4	26.0	--	8	52.0
B2AS5	31.0	--	10	56.0
B2AS6	25.0	--	12	29.0
B2AS7	36.0	--	10	55.0
B2AS8	29.0	--	6	14.0
B2AS9	16.0	--	8	12.0
B2AS10	36.0	--	12	4.0
B2AS11	16.0	--	4	12.0
B2AS12	44.0	--	8	28.0
B2AS13	40.0	--	10	29.0
B2AS14	30.0	--	14	22.0
B2AS15	19.0	--	8	63.0
B2AS16	35.0	--	12	50.0
B2AS17	25.0	--	12	86.0
B2AS18	52.0	--	6	11.0
B2AS19	43.0	--	8	11.0
B2AS20	43.0	--	10	10.0
B2AS21	37.0	--	8	49.0
B2AS22	37.0	--	6	9.0
B2AS23	150	--	8	19.0
B2AS24	61.0	--	10	4.5
B2AS25	32.0	--	4	10.0
B2AS26	39.0	--	6	11.0
B2AS27	40.0	--	6	15.0
B2AS28	47.0	--	4	25.0
B2AS29	25.0	--	4	9.5
B2AS30	90.0	--	12	14.0
B2AS31	24.0	--	6	32.0
B2AS32	64.0	--	14	19.0
B2AS33	6.0	--	2	14.0
B2AS34	66.0	--	12	37.0
B2AS35	38.0	--	12	61.0
B2AS36	31.0	--	10	24.0
B2AS37	11.0	--	6	14.0
B2AS38	30.0	--	8	350
B2AS39	37.0	--	10	19.0
B2AS40	83.0	--	8	2000
B2AS41	330	--	18	350
B2AS42	35.0	--	6	17.0
B2AS43	16.0	--	4	130
B2AS44	20.0	--	12	17.0
B2AS45	37.0	--	12	75.0
B2AS46	--	--	--	1900
B2AS47	13.0	--	6	67.0
B2AS48	59.0	--	20	68.0
B2AS49	100	--	4	20.0
B2AS50	42.0	--	12	51.0
B2AS51	14.0	--	6	36.0
B2AS52	23.0	--	12	180
B2AS53	26.0	--	6	21.0
B2AS54	45.0	--	6	44.0
B2AS55	21.0	--	8	8.0

X-RAY ASSAY LABORATORIES 04-AUG-82 REPORT 15411 REF. FILE 11123-M3

SAMPLE	ZN PPM	AG PPM	PB PPM	CU PPM
B2AS56	42.0	--	6	10.0
B2AS57	26.0	--	8	12.0
B2AS58	12.0	--	8	35.0
B2AS59	30.0	--	8	420
B2AS60	22.0	--	2	46.0
B2AS61	47.0	--	10	19.0
B2AS62	75.0	--	6	8.0
B2AS63	31.0	--	4	6.5
B2AS64	70.0	--	12	160
B2AS65	99.0	--	6	61.0
B2AS66	52.0	--	4	8.5
B2AS67	77.0	--	22	9.0
B2AS68	30.0	--	8	10.0
B2AS69	25.0	--	4	120
B2AS70	16.0	--	6	140
B2AS71	22.0	--	6	12.0
B2AS72	15.0	--	10	130
B2AS73	39.0	--	6	10.0
B2AS74	64.0	--	46	8.0
B2AS75	37.0	--	6	5.0
B2AS76	37.0	--	6	16.0
B2AS77	30.0	--	6	9.5
B2AS78	14.0	--	4	7.0
B2AS79	14.0	--	6	11.0
B2AS80	10.0	--	6	31.0
B2AS81	68.0	--	10	20.0
B2AS82	8.5	--	10	12.0
B2AS83	24.0	--	10	42.0
B2AS84	44.0	--	4	9.0
B2AS85	49.0	--	6	23.0
B2AS86	34.0	--	10	46.0
B2AS87	44.0	--	8	38.0
B2AS88	5.0	--	2	8.5
B2AS89	40.0	--	6	17.0
B2AS90	25.0	--	6	13.0
B2AS91	30.0	--	4	8.5
B2AS92	15.0	--	10	7.5
B2AS93	28.0	--	4	5.0
B2AS94	24.0	--	8	55.0
B2AS95	5.5	--	6	19.0
B2AS96	57.0	--	6	15.0
B2AS97	36.0	--	6	24.0
B2AS98	74.0	--	12	28.0
B2AS99	74.0	--	6	22.0
B2AS100	20.0	--	6	23.0
B2AS101	19.0	--	8	44.0
B2AS102	14.0	--	8	13.0
B2AS103	53.0	--	4	8.5
B2AS104	6.0	--	4	7.0
B2AS105	7.5	--	8	49.0
B2AS106	10.0	--	4	180
B2AS107	45.0	--	4	65.0
B2AS108	20.0	--	14	230
B2AS109	32.0	--	10	110
P2AS110	58.0	--	8	20.0

X-RAY ASSAY LABORATORIES 04-AUG-82 REPORT 15411 REF. FILE 11123-M3

SAMPLE	ZN PPM	AG PPM	PB PPM	CU PPM
B2AS111	18.0	--	6	12.0
B2AS112	10.0	--	10	12.0
B2AS113	34.0	--	8	16.0
B2AS114	41.0	--	6	11.0
B2AS115	29.0	--	4	9.5
B2AS116	14.0	--	4	28.0
B2AS117	91.0	--	8	24.0
B2AS118	35.0	--	6	22.0
B2AS119	5.5	--	<2	11.0
B2AS120	18.0	--	4	290
B2AS121	37.0	--	8	22.0
B2AS122	19.0	--	6	12.0
B2AS123	12.0	--	8	11.0
B2AS123A	59.0	--	8	2300
B2AS124	18.0	--	6	56.0
B2AS125	24.0	--	8	13.0
B2AS126	12.0	--	8	24.0
B2AS127	17.0	--	6	40.0
B2AS128	28.0	--	10	19.0
B2AS129	25.0	--	12	15.0
B2AS130	19.0	--	6	4.0
B2AS131	10.0	--	4	5.0
B2AS132	40.0	--	4	30.0
B2AS133	51.0	--	6	41.0
B2AS134	7.0	--	<2	12.0
B2AS135	20.0	--	4	16.0
B2AS136	50.0	--	8	15.0
B2AS137	36.0	--	2	62.0
B2AS138	41.0	--	24	41.0
B2AS139	24.0	--	8	5.5
B2AS140	27.0	--	6	19.0
B2AS141	30.0	--	6	32.0
B2AS142	15.0	--	2	12.0
B2AS143A	45.0	--	4	8.5
B2AS143B	44.0	--	10	15.0
B2AS144	41.0	--	4	13.0
B2AS145	100	--	8	58.0
B2AS146	29.0	--	4	17.0
B2AS147	91.0	--	14	140
B2AS2C1	7.0		4	2.5
B2AS2C2	16.0		6	4.5
B2AS203	21.0		4	4.0
B2AS204	32.0		<2	3.0
B2AS205	70.0		6	27.0
B2AS206	29.0		2	37.0
B2AS207	21.0		14	28.0
B2AS208	5.0		4	10.0
B2AS2C9	4.5		14	7.0
B2AS21C	34.0		8	3.0
B2AS211	65.0		14	10.0
B2AS212	84.0		14	4.0

X-RAY ASSAY LABORATORIES 04-AUG-82 REPORT 15411 REF. FILE 11123-M3

SAMPLE	ZN PPM	AG PPM	PB PPM	CU PPM
B1AS1	59.0	--	14	19.0
B1AS2	15.0	--	6	130
B1AS3	26.0	--	4	31.0
B1AS4	7.0	--	4	7.5
B1AS5	45.0	--	4	12.0
B1AS6	28.0	--	4	7.5
B1AS7	57.0	--	6	28.0
B1AS8	17.0	--	10	21.0
B1AS9	44.0	--	6	18.0
B1AS10	80.0	--	20	22.0
B1AS11	320.	--	100	24.0
B1AS12	36.0	--	10	8.0
B1AS13	8.5	--	4	10.0
B1AS14	30.0	--	4	16.0
B1AS15	13.0	--	2	6.5
B1AS16	10.0	--	4	8.5
B1AS17	40.0	--	14	120
B1AS18	27.0	--	12	18.0
B1AS19	37.0	--	14	17.0
B1AS20	7.5	--	4	9.5
B1AS21	39.0	--	8	14.0
B1AS22	50.0	--	6	28.0
B1AS23	38.0	--	4	10.0
B1AS24	49.0	--	6	15.0
B1AS25	22.0	--	6	5.0
B1AS26A	42.0	--	2	64.0
B1AS26B	27.0	--	2	6.5
B1AS27	56.0	--	4	12.0
B1AS28	43.0	--	6	17.0
B1AS29	9.0	--	16	11.0
B1AS30	11.0	--	16	6.0
B1AS31	5.5	--	4	6.0
B1AS32	11.0	--	4	7.0
B1AS33	26.0	--	10	11.0
B1AS34	20.0	--	10	18.0
B1AS35	52.0	--	6	6.5
B1AS36	14.0	--	12	5.5
B1AS37	39.0	--	6	10.0
B1AS38	50.0	--	10	300
B1AS39	35.0	--	6	11.0
B1AS40	16.0	--	4	8.5
B1AS41	46.0	--	6	18.0
B1AS42	11.0	--	10	6.5
B1AS43	9.0	--	10	7.5
B1AS44	8.0	--	10	8.5
B1AS45	36.0	--	6	13.0
B1AS46	59.0	--	6	25.0
B1AS47	32.0	--	8	9.0
B1AS48	64.0	--	10	13.0
B1AS49	6.5	--	4	7.0
B1AS50	47.0	--	8	50.0
B1AS51	28.0	--	6	6.5
B1AS52	95.0	--	6	19.0
B1AS53	84.0	--	8	20.0
B1AS54	26.0	--	8	6.0
B1AS55	50.0	--	6	11.0

X-RAY ASSAY LABORATORIES 04-AUG-82 REPORT 15411 REF. FILE 11123-M3

SAMPLE	ZN PPM	AG PPM	PB PPM	CU PPM
B1AS56	31.0	--	6	57.0
B1AS57	21.0	--	8	10.0
B1AS58	81.0	--	8	10.0
B1AS59	14.0	--	4	8.0
B1AS60	35.0	--	12	8.5
B1AS61	14.0	--	4	7.0
B1AS62	14.0	--	10	7.0
B1AS63	34.0	--	10	9.5
B1AS64	15.0	--	12	11.0
B1AS65	10.0	--	2	5.5
B1AS66	40.0	--	8	16.0
B1AS67	34.0	--	8	7.0
B1AS68	32.0	--	4	5.0
B1AS69	8.5	--	4	7.5
B1AS70	30.0	--	6	10.0
B1AS71	46.0	--	10	10.0
B1AS72	35.0	--	18	160
B1AS73	21.0	--	8	9.0
B1AS74	42.0	--	4	7.0
B1AS75	61.0	--	14	18.0
B1AS76	38.0	--	14	7.0
B1AS77	37.0	--	10	6.0
B1AS78	8.0	--	4	6.0
B1AS79	4.5	--	4	4.5
B1AS80	22.0	--	6	4.5
B1AS81	26.0	--	4	18.0
B1AS82	41.0	--	2	10.0
B1AS83	18.0	--	8	9.0
B1AS84	6.0	--	2	5.5
B1AS85	52.0	--	14	15.0
B1AS86	39.0	--	16	7.5
B1AS87	42.0	--	8	7.0
B1AS88	39.0	--	10	14.0
B1AS89	18.0	--	2	7.0
B1AS90	65.0	--	4	17.0
B1AS91	52.0	--	16	9.0
B1AS92	27.0	--	10	11.0
B1AS93	34.0	--	4	72.0
B1AS94	23.0	--	10	8.0
B1AS95	11.0	--	8	22.0
B1AS96	21.0	--	6	7.0
B1AS97	16.0	--	8	6.5
B1AS98	49.0	--	10	4.0
B1AS99	14.0	--	8	120
B1AS100	75.0	--	10	16.0
B1AS101	22.0	--	10	4.0
B1AS102	55.0	--	6	9.5
B1AS103	9.0	--	4	3.0
B1AS104	36.0	--	6	7.5
B1AS105	72.0	--	10	110
B1AS106	49.0	--	6	55.0
B1AS107	35.0	--	10	4.5
B1AS108	34.0	--	10	5.0
B1AS109	9.5	--	14	4.5
B1AS110	6.0	--	8	31.0

X-RAY ASSAY LABORATORIES 24-SEP-82 REPORT 15961 REF. FILE 11621-A4

SAMPLE	CU PPM	ZN PPM	PB PPM
B1AS111	5.5	6.5	6
B1AS112	6.0	8.5	8
B1AS113	17.0	41.0	6
B1AS114A	180	85.0	14
B1AS114B	15.0	95.0	64
B1AS115	11.0	64.0	34
B1AS116	12.0	60.0	34
B1AS117	3.5	57.0	10
B1AS118	13.0	40.0	16
B1AS119	5.5	39.0	8
B1AS120	11.0	48.0	16
B1AS121	7.0	27.0	8
B1AS122	7.0	26.0	10
B1AS123	35.0	28.0	4
B1AS124	12.0	140.	8
B1AS125	6.5	30.0	8
B1AS126	370.	84.0	6
B1AS127	27.0	190.	8
B1AS128	9.0	21.0	6
B1AS129	24.0	130.	14
B1AS130	2.0	12.0	50
B1AS131	40.0	44.0	8
B1AS131A	19.0	48.0	4
B1AS132	27.0	33.0	8
B1AS133	71.0	61.0	8
B1AS134	30.0	72.0	8
B1AS135	6.5	64.0	6
B1AS136	18.0	69.0	10
B1AS137	20.0	63.0	4
B1AS138	5.0	63.0	2
B1AS139	39.0	63.0	4
B1AS140	3.0	31.0	4
B1AS141	8.0	19.0	4
B1AS142	8.5	16.0	<2
B1AS143	10.0	37.0	4
B1AS144	3.0	21.0	10
B1AS145	500.	31.0	10
B1AS146	9.0	13.0	2
B1AS147	5.0	18.0	<2
B1AS148	60.0	91.0	14
B1AS149	24.0	150.	12
B1AS150	190.	23.0	4
B1AS151	13.0	32.0	2
B1AS152	42.0	94.0	12
B1AS153	65.0	84.0	10
B1AS154	35.0	38.0	4
B1AS155	37.0	77.0	12
B1AS156	46.0	80.0	10
B1AS157	33.0	97.0	8
B1AS158	19.0	49.0	2
B1AS159	4.5	24.0	2
B1AS160	2.0	34.0	4
B1AS161	4.0	24.0	4
B1AS162	14.0	93.0	4

X-RAY ASSAY LABORATORIES 24-SEP-82 REPORT 15961 REF. FILE 11621-A4

SAMPLE	CU PPM	ZN PPM	PB PPM
81AS163	25.0	68.0	4
81AS164	13.0	62.0	84
81AS165	15.0	66.0	60
81AS166	9.0	81.0	78
81AS167	18.0	59.0	74
81AS168	5.5	4.0	36
81AS169	2.5	85.0	30
81AS170	21.0	52.0	44
81AS171	67.0	75.0	14
81AS172	25.0	30.0	10
81AS173	17.0	50.0	10
81AS174	14.0	38.0	6
81AS175	48.0	24.0	14
81AS176	7.5	46.0	22
81AS177	30.0	120.	46
81AS178	8.0	59.0	10
81AS179	9.0	25.0	10
81AS180	16.0	65.0	12
81AS181	270.	35.0	8
81AS182	13.0	72.0	8
81AS183	3.0	12.0	4
81AS184	50.0	130.	10
81AS185	14.0	24.0	8
81AS186A	4.0	12.0	4
81AS186B	160.	27.0	10
81AS187	66.0	86.0	12
81AS188	12.0	18.0	20
81AS189	5.5	120.	20
81AS190	5.5	29.0	12
81AS191	91.0	49.0	14
81AS192	110.	110.	16
81AS193	35.0	56.0	4
81AS194	6.0	52.0	6
81AS195	8.0	26.0	10
81AS196	2.0	20.0	4
81AS197	15.0	61.0	16
81AS198	17.0	70.0	14
81AS199	4.0	63.0	12
81AS200	7.0	200.	10
81AS201	4.5	16.0	14
81AS202	16.0	47.0	8
81AS203	10.0	43.0	8
81AS204	5.0	16.0	4
81AS205	5.5	30.0	8
81AS206	10.0	30.0	10
81AS207	3.0	14.0	4
81AS208	3.0	28.0	6
81AS209	9.0	31.0	4
81AS210	13.0	57.0	2
81AS211	11.0	110.	12
81AS212	55.0	79.0	20
81AS213	14.0	34.0	6
81AS214	69.0	69.0	14
81AS215	18.0	37.0	4
81AS216	3.5	11.0	2

X-RAY ASSAY LABORATORIES 24-SEP-82 REPORT 15961 REF. FILE 11621-A4

SAMPLE	CU PPM	ZN PPM	PB PPM
B1AS217	47.0	93.0	10
B1AS218	73.0	78.0	14
B1AS219A	9.5	18.0	4
B1AS219B	10.0	18.0	4
B1AS22C	2.0	27.0	4
B1AS221	60.0	75.0	20
B1AS222	89.0	57.0	8
B1AS223	8.5	120.	6
B1AS224	10.0	120.	4
B1AS225	20.0	46.0	8
B1AS226	56.0	72.0	10
B1AS227	14.0	55.0	2
B1AS228	6.0	45.0	6
B1AS229	7.5	22.0	4
B1AS23C	150.	59.0	10
B1AS231	46.0	180.	6
B1AS232	17.0	18.0	<2
B1AS233	230.	150.	120
B1AS234	130.	62.0	12
B1AS235	14.0	14.0	4
B1AS236	1.5	37.0	10
B1AS237	14.0	29.0	4
B1AS238	6.5	21.0	2
B1AS239	7.0	15.0	4
B1AS24C	8.0	24.0	2
B1AS241	8.0	8.0	2
B1AS242	2.5	47.0	12
B1AS243	74.0	9.0	4
B1AS244	11.0	33.0	10

X-RAY ASSAY LABORATORIES 04-AUG-82 REPORT 15411 REF. FILE 11123-M3

SAMPLE	ZN PPM	CU PPM	PB PPM
B18S1	82.0	17.0	6
B18S2	15.0	14.0	4
B18S3	62.0	32.0	10
B18S4	36.0	54.0	6
B18S5	11.0	13.0	2
B18S6	56.0	34.0	4
B18S7	78.0	21.0	6
B18S8	38.0	6.5	8
B18S9	66.0	35.0	6
B18S10	35.0	10.0	4
B18S11	44.0	6.0	6
B18S12	92.0	42.0	6

WHOLE ROCK ANALYSIS

ALUMINA ALTERATION

SAMPLE ID	ANOM	T1	T2	T3	T4	T5	F.A.	F.B.	F.C.	F.S.	F.K.	F'.K.	F.F.	F.H.
B1AS011	0.71			0.58	-6.16		-6.16	22.23	0.64	0.75	0.33	-1.07	3.36	0.22
B1AS030	0.91			0.70	-4.54	0.61	-4.54	21.50	2.07	0.84	0.28	-0.47	5.79	0.27
B1AS031	0.86			0.62	-7.67		-7.67	21.98	0.51	0.72	0.42	-0.87	3.35	0.19
B1AS034	0.74			0.64	-5.67	0.94	-5.67	21.13	0.90	0.80	0.33	-0.70	3.23	0.23
B1AS035	0.69			0.68	-5.59		-5.59	17.45	0.45	0.91	0.55	-0.21	3.79	0.17
B1AS043	1.05			0.68	-8.55	0.52	-8.55	21.41	1.73	0.78	0.20	-0.29	3.10	0.31
B1AS047	0.65			0.56	-5.08		-5.08	20.46	1.07	0.82	0.40	-1.24	1.90	0.14
B1AS066	0.60			0.64	-6.76		-6.76	20.67	0.51	0.78	0.43	-0.46	3.08	0.13
B1AS073	0.83			0.59	-6.84		-6.84	19.71	0.55	0.82	0.37	-0.85	2.29	0.22
B1AS079	1.24			0.65	-10.01		-10.01	18.66	1.24	0.79	0.46	7.91	0.44	0.07
B1AS080	0.48			0.51	-5.63		-5.63	21.52	0.38	0.76	0.37	-1.62	3.26	0.19
B1AS081	0.64			0.59	-5.45		-5.45	21.05	0.56	0.77	0.48	-1.19	2.78	0.14
B1AS101	0.82			0.62	-5.60		-5.60	23.28	1.20	0.72	0.46	-1.01	1.24	0.09
B1AS103	0.93			0.67	-5.74		-5.74	19.77	0.57	0.81	0.58	-0.55	1.30	0.14
B1AS109	1.02			0.64	-5.34	0.59	-5.34	19.73	2.32	0.89	0.21	-0.45	2.68	0.31
B1AS117	0.49			0.58	-6.96		-6.96	22.45	0.64	0.69	0.54	-0.86	0.94	0.10
B1AS137	1.29			0.64	-8.43		-8.43	19.83	0.26	0.76	0.52	-0.45	1.41	0.36
B1AS192	2.28			0.68	-7.49	0.28	-7.49	30.86	1.12	0.56	0.11	-0.26	4.74	1.98
B1AS243	0.70			0.55	-8.38		-8.38	18.53	0.21	0.82	0.37	-0.46	3.45	0.25
B1AS244	0.87			0.65	-5.30	0.66	-5.30	22.08	1.33	0.80	0.24	-0.55	3.45	0.37

BECK 1

WHOLE ROCK ANALYSIS

CARBONATATION

SAMPLE ID	ANOM	T1	T2	T3	T4	T5	F.A.	F.B.	F.C.	F.S.	F.K.	F'.K.	F.F.	F.H.
B1AS116	0.64					0.36	0.32	25.83	6.02	0.83	0.02	-0.36	1.14	1.26

BECK

WHOLE ROCK ANALYSIS

CHLORITIZATION

SAMPLE ID	ANCM	T1	T2	T3	T4	T5	F.A.	F.B.	F.C.	F.S.	F.K.	F'.K.	F.F	F.H.
B1AS104	-0.63				-5.59	0.22	-5.59	13.43	0.60	1.23	0.05	-0.19	6.16	5.94

R E C K - - - - -

WHOLE ROCK ANALYSIS

MUSCOVITE ALUMINA ALTERATION

SAMPLE ID	ANOM	T1	T2	T3	T4	T5	F.A.	F.B.	F.C.	F.S.	F.K.	F'.K.	F.F.	F.H.
B1AS074	1.40			0.72	-8.37		-2.27	21.68	0.85	0.70	0.58	0.34	0.97	0.13
B1AS089	1.52			0.76	-11.73		-11.73	19.90	0.13	0.72	0.54	7.84	1.82	0.51
B1AS188	0.81			0.80	-5.27	0.76	-5.27	20.69	2.09	0.81	0.58	0.12	1.10	0.09

BECK - - - - I

WHOLE ROCK ANALYSIS

PROPYLITIZATION

SAMPLE ID	ANOM	T1	T2	T3	T4	T5	F.A.	F.B.	F.C.	F.S.	F.K.	F'.K.	F.F.	F.H.
B1AS003	-1.55				-1.10		-1.10	20.86	0.32	0.77	0.35	-4.11	1.58	0.04
B1AS007	-1.26				-1.81		-1.81	21.44	0.17	0.76	0.27	-4.42	7.40	0.09
B1AS019	0.52				-3.21		-3.21	24.46	1.70	0.77	0.12	-1.05	1.98	0.25
B1AS022	0.27			0.64	-2.50		-2.50	19.19	0.75	0.88	0.63	-0.84	1.50	0.03
B1AS027	-0.44				-2.93		-2.93	19.83	0.35	0.63	0.23	-3.59	2.23	0.13
B1AS028	-0.34				-1.45		-1.45	22.04	0.34	0.78	0.33	-3.00	5.65	0.12
B1AS029	-0.29				-2.57		-2.57	26.29	0.39	0.65	0.37	-3.18	5.53	0.11
B1AS039	0.73				-2.53		-2.53	17.28	1.95	1.04	0.28	-1.22	0.94	0.22
B1AS050	-0.17				-2.40		-2.40	21.25	0.46	0.80	0.37	-2.44	3.64	0.10
B1AS052	-1.31				-1.27		-1.27	19.62	0.18	0.62	0.27	-4.50	2.65	0.07
B1AS053	-0.21				-1.30		-1.30	21.06	0.47	0.84	0.34	-2.37	3.39	0.12
B1AS056	0.46				-1.97		-1.97	20.77	0.33	0.83	0.36	-2.48	3.54	0.15
B1AS068	-0.74				-1.98		-1.98	21.70	0.30	0.77	0.35	-3.28	2.17	0.08
B1AS087	0.03				-2.23		-2.23	22.55	0.64	0.80	0.26	-1.91	3.54	0.15
B1AS088	0.43			0.55	-3.24		-3.24	22.93	0.74	0.77	0.38	-1.44	4.45	0.15
B1AS093	-0.95				-2.49		-2.49	19.75	0.12	0.80	0.34	-3.83	3.59	0.12
B1AS094	0.38				-2.41		-2.41	23.97	1.26	0.75	0.33	-1.90	1.97	0.12
B1AS096	-0.36				-2.62		-2.62	22.34	0.50	0.77	0.25	-2.87	4.22	0.09
B1AS098	0.06			0.51	-1.62	0.67	-1.62	19.67	0.95	0.98	0.17	-0.63	6.56	0.54
B1AS100	0.09				-2.11		-2.11	22.43	0.47	0.79	0.39	-1.96	5.28	0.16
B1AS102	-0.46				-2.20		-2.20	21.71	0.37	0.79	0.33	-2.78	6.25	0.09
B1AS104	0.11				-3.18		-3.18	17.02	0.54	0.93	0.57	-1.64	0.87	0.12
B1AS106	-1.05				-1.22		-1.22	20.76	0.25	0.80	0.33	-3.75	3.14	0.08
B1AS108	0.27			0.54	-2.99		-2.99	22.38	0.61	0.78	0.41	-1.59	2.81	0.11
B1AS113	-1.15				-1.33		-1.33	20.52	0.17	0.79	0.30	-4.43	2.42	0.09

B E C K — — — — 1

WHOLE ROCK ANALYSIS

DEVOLATILIZATION

SAMPLE ID	ANOM	T1	T2	T3	T4	T5	F.A.	F.B.	F.C.	F.S.	F.K.	F'.K.	F.F.	F.H.
B1AS123	-0.07				-2.92		-2.92	19.44	0.68	0.86	0.45	-1.86	1.43	0.08
B1AS135	-0.11				-2.26		-2.26	17.62	0.37	0.94	0.38	-2.59	3.84	0.17
B1AS139	-0.94				-1.77		-1.77	28.34	0.30	0.63	0.19	-3.57	5.16	0.13
B1AS179	0.07				-2.93		-2.93	20.38	2.29	0.85	0.30	-2.14	0.71	0.07
B1AS180	0.16				-3.25		-3.25	17.98	0.36	0.91	0.46	-1.89	3.54	0.13
B1AS181	-0.88				-2.72		-2.72	20.46	0.27	0.76	0.37	-4.16	2.00	0.09
B1AS185	0.24			0.52	-1.62		-1.62	20.33	2.85	0.89	0.39	-1.33	0.66	0.06
B1AS187	0.72			0.72	-2.92	0.54	-2.92	13.73	1.30	1.29	0.40	-0.32	4.95	0.42
B1AS189	-0.90		5.61		-2.68		-2.68	19.37	0.25	0.83	0.40	-2.36	5.31	0.05
B1AS191	-0.36				-2.01		-2.01	21.59	0.61	0.84	0.24	-2.01	3.29	0.13
B1AS201	0.66				-1.66	0.65	-1.66	21.34	3.56	0.93	0.04	-0.64	1.48	0.68
B1AS207	0.10	75.30			-3.03		-3.03	17.01	1.16	0.99	0.39	-1.02	1.49	0.05
B1AS210	-0.66				-1.97		-1.97	18.60	0.37	0.92	0.05	-3.70	2.69	0.15
B1AS217	-0.60				-2.11		-2.11	22.14	0.41	0.79	0.36	-2.11	4.58	0.11
B1AS235	-0.39				-1.79		-1.79	18.90	1.29	0.90	0.18	-3.52	0.63	0.09
B1AS238	-0.24				-2.86		-2.86	18.92	1.16	0.84	0.40	-3.17	0.46	0.09
B1AS239	0.04				-1.13		-1.13	17.65	2.28	0.94	0.60	-1.80	0.26	0.06
B1BS005	-1.41				-1.72		-1.72	17.35	0.35	0.88	0.33	-2.49	1.16	0.04
B1BS006	-0.61				-1.13		-1.13	18.36	0.24	0.90	0.29	-3.72	4.19	0.14
B1BS011	-0.42				-1.03		-1.03	23.21	0.36	0.75	0.40	-3.05	5.51	0.12

B E C K — — — — 1

WHOLE ROCK ANALYSIS

SERICITIZATION

SAMPLE ID	ANCH	T1	T2	T3	T4	T5	F.A.	F.B.	F.C.	F.S.	F.K.	F'.K.	F.F.	F.H.
B1AS004	1.50			0.87	-9.65	0.73	-9.65	19.46	1.03	0.75	0.81	10.10	0.63	0.15

BECK - - - - 1

WHOLE ROCK ANALYSIS

SILICIFICATION

SAMPLE ID	ANOM	T1	T2	T3	T4	T5	F.A.	F.B.	F.C.	F.S.	F.K.	F'.K.	F.F.	F.H.
B1AS054	1.15	75.50		0.74	-3.91	0.32	-3.91	15.10	2.95	1.11	0.56	-0.20	0.69	0.19
B1AS115	1.24	78.70		0.65	-7.36	0.99	-7.36	14.18	2.20	1.06	0.41	0.57	0.59	0.25
B1AS122	0.89	75.90			-5.51		-5.51	15.20	1.14	1.04	0.30	-1.43	0.58	0.30
B1AS176	1.58	75.60		0.85	-4.98	0.59	-4.98	16.18	13.52	1.01	0.70	0.84	0.12	0.11
B1AS178	0.41	77.10			-4.04		-4.04	15.11	1.08	1.11	0.10	-2.09	0.91	0.27
B1AS183	-0.01	77.40			-2.72		-2.72	14.80	1.23	1.08	0.38	-0.79	0.70	0.04
B1AS190	0.99	78.30			-2.40	0.84	-2.40	13.04	2.22	1.41	0.11	-0.78	1.72	0.53
B1AS202	1.04	76.10		0.76	-5.68	0.62	-5.68	14.10	1.06	1.14	0.49	0.25	2.71	0.27
B1AS205	0.97	75.30		0.77	-4.70	0.68	-4.70	15.00	1.43	1.10	0.56	0.20	2.08	0.17
B1AS241	-0.17	77.00			-1.71		-1.71	14.22	0.54	1.10	0.57	0.34	1.03	0.05

BECK 1

WHOLE ROCK ANALYSIS

TOTAL DEPLETION

SAMPLE ID	ANOM	T1	T2	T3	T4	T5	F.A.	F.B.	F.C.	F.S.	F.K.	F'.K.	F.F.	F.H.
B1AS049	1.62			0.74	-11.25	0.19	-11.25	16.80	2.14	0.91	0.11	0.06	2.74	1.46
B1AS084	1.85	75.80	5.27	0.87	-14.12	0.10	-14.12	15.97	0.90	0.89	0.13	2.02	5.49	4.00

WHOLE ROCK ANALYSIS

UNALTERED ROCK

SAMPLE ID	ANOM	T1	T2	T3	T4	T5	F.A.	F.B.	F.C.	F.S.	F.K.	F'.K.	F.F.	F.H.
B1AS009	-0.28						0.94	22.12	0.81	0.87	0.35	-1.85	6.96	0.10
B1AS040	-1.44						0.91	21.20	0.48	0.82	0.20	-4.67	1.57	0.03
B1AS041	-1.68						0.07	21.19	0.43	0.78	0.28	-4.58	0.97	0.03
B1AS046	-1.75						-0.56	20.06	0.10	0.79	0.21	-5.46	5.05	0.10
B1AS114	-1.50						0.59	18.24	0.30	0.92	0.24	-4.66	1.78	0.06
B1AS120	-0.20						-0.74	22.75	1.84	0.84	0.19	-1.84	0.94	0.08
B1AS124	-1.12						-0.72	19.05	0.17	0.92	0.11	-3.56	5.71	0.22
B1AS130	-1.57						0.78	24.12	0.51	0.74	0.20	-4.50	1.00	0.05
B1AS131	-1.60						-0.99	23.20	0.28	0.71	0.22	-5.23	1.82	0.04
B1AS132	-1.24						-0.30	19.49	0.58	0.85	0.18	-4.83	1.38	0.04
B1AS134	-1.66						3.11	30.30	0.39	0.64	0.14	-4.06	3.12	0.09
B1AS136	-0.60						-0.49	18.43	0.29	0.92	0.40	-3.25	2.99	0.11
B1AS144	1.15			0.72	-5.40		-5.40	17.81	1.70	0.92	0.56	-0.35	0.96	0.16
B1AS145	0.42			0.72			2.70	33.62	1.41	0.61	0.49	-0.98	1.44	0.15
B1AS194	-0.08						-0.99	27.82	0.20	0.65	0.11	-3.56	2.99	0.32
B1AS195	-0.38						0.83	20.02	1.57	0.92	0.44	-2.28	0.41	0.06
B1AS197	0.18			0.62			1.29	31.11	1.18	0.65	0.38	-1.16	1.61	0.14
B1AS199	-0.65						-0.60	22.36	1.25	0.84	0.32	-1.46	1.39	0.03
B1AS206	-0.11						0.87	23.70	3.17	0.83	0.24	-1.79	0.51	0.08
B1AS223	-1.77		6.69				-0.50	18.67	0.15	0.85	0.39	-3.44	2.12	0.04
B1AS237	-0.79	75.10					0.77	16.88	1.11	1.03	0.25	-3.58	0.84	0.04
B1AS240	-1.00						-0.71	18.71	0.61	0.86	0.46	-2.43	0.79	0.03
B1BS001	-0.22						0.36	19.64	0.59	0.92	0.36	-2.87	3.17	0.11
B1BS003	0.06			0.52			0.18	23.39	1.10	0.80	0.45	-1.87	2.74	0.08
B1BS004	-0.61						1.93	25.88	1.18	0.79	0.27	-1.51	3.07	0.09

BECK

WHOLE ROCK ANALYSIS

UNALTERED ROCK

SAMPLE ID	ANOM	T1	T2	T3	T4	T5	F.A.	F.B.	F.C.	F.S.	F.K.	F'.K.	F.F.	F.H.
B1BS007	-2.92		5.58				17.05	32.64	2.92	0.92	0.03	-2.02	0.56	0.02
B1BS008	-0.55						0.30	20.52	0.80	0.87	0.38	-2.80	1.13	0.05
B1BS009	-0.27						0.72	22.03	0.87	0.88	0.34	-1.70	4.14	0.10
B1BS010	-1.80						0.81	21.26	0.44	0.80	0.27	-4.77	1.76	0.03
B1BS012	-0.45						-0.70	22.77	0.32	0.78	0.34	-2.93	4.00	0.14

B L O C K - - - - - 1

WHOLE ROCK ANALYSIS

SERICITIZATION + ALUMINA ALTERATION

SAMPLE ID	ANOM	T1	T2	T3	T4	T5	F.A.	F.B.	F.C.	F.S.	F.K.	F'.K.	F.F.	F.H.
B1AS026A	0.70			0.59	-5.74		-5.74	18.14	0.67	0.86	0.55	0.57	1.29	0.07
B1AS026B	1.01			0.65	-7.27		-7.27	17.16	0.54	0.89	0.51	0.61	1.37	0.16
B1AS069	1.70		5.13	0.82	-10.61	0.64	-10.61	17.94	0.52	0.82	0.53	5.30	1.72	0.24
B1AS078	1.79			0.86	-11.92	0.55	-11.92	18.73	0.16	0.76	0.58	10.27	1.83	1.09
B1AS082	0.78			0.61	-6.22		-6.22	19.79	0.33	0.81	0.61	1.02	2.11	0.09
B1AS105	-0.28			0.65		0.55	0.76	23.89	1.95	0.67	0.22	-0.50	5.47	0.28
B1AS121	0.97	75.10		0.64	-7.44		-7.44	15.53	0.49	0.97	0.50	0.68	1.11	0.29
B1AS147	0.37			0.52	-6.41		-6.41	20.51	0.61	0.74	0.55	0.37	0.60	0.08
B1AS186A	1.29	76.40		0.74	-8.41		-8.41	16.27	1.62	0.51	0.60	3.34	0.44	0.18
B1AS196	-0.36			0.53		0.96	0.07	19.07	1.15	1.04	0.27	-0.84	2.36	0.18

B E C K - - - - - 1

WHOLE ROCK ANALYSIS

FE CHLORITIZATION

SAMPLE ID	ANOM	T1	T2	T3	T4	T5	F.A.	F.B.	F.C.	F.S.	F.K.	F'.K.	F.F.	F.H.
B1AS129	-0.65				-3.89		-3.89	21.40	0.23	0.80	0.14	-2.23	4.23	0.28

WHOLE ROCK ANALYSIS

ALUMINA ALTERATION (MAFIC)

SAMPLE ID	ANOM	T1	T2	T3	T4	T5	F.A.	F.B.	F.C.	F.S.	F.K.	F'.K.	F.F.	F.H.
B1AS216	1.58	76.10		0.71	-9.08	0.91	-9.08	14.46	0.27	1.00	0.49	3.03	1.23	0.62
B1AS219A	-0.03				-3.88		-3.86	20.92	0.72	0.82	0.20	-2.41	1.54	0.14
B1AS219B	0.05				-5.85		-5.85	22.15	0.86	0.69	0.51	-1.05	0.56	0.06
B1AS220	0.49				-5.13		-5.13	19.63	0.64	0.84	0.30	-1.74	1.82	0.13
B1AS227	-0.83		5.46		-4.33		-4.33	21.51	0.22	0.71	0.46	-1.13	1.77	0.04
B1AS242	1.25			0.73	-6.50	0.54	-6.50	20.82	2.07	0.82	0.28	-0.35	2.34	0.33

B E C K — — — — 1

WHOLE ROCK ANALYSIS

ALUMINA ALTERATION (MAFIC)

SAMPLE ID	ANOM	T1	T2	T3	T4	T5	F.A.	F.B.	F.C.	F.S.	F.K.	F'.K.	F.F.	F.H.
B1AS067	0.21			0.53	-3.47		-3.47	22.33	0.89	0.79	0.35	-1.30	3.18	0.10
B1AS070	0.40				-5.57		-5.57	20.48	0.59	0.82	0.16	-1.69	1.85	0.26
B1AS071	0.65				-6.44		-6.44	22.05	0.45	0.75	0.24	-1.38	2.80	0.27
B1AS072	0.99			0.70	-5.61	0.58	-5.61	21.64	1.47	0.81	0.27	-0.44	3.51	0.34
B1AS076	0.98			0.73	-4.32	0.79	-4.32	20.92	1.67	0.84	0.43	-0.54	2.68	0.20
B1AS077	0.86				-5.69	0.75	-5.69	20.51	1.21	0.86	0.13	-0.69	2.71	0.55
B1AS083	0.58				-5.47		-5.47	21.92	0.60	0.78	0.18	-1.57	2.44	0.32
B1AS085	0.96				-5.64	0.55	-5.64	20.55	2.43	0.88	0.03	-0.54	2.22	0.79
B1AS086	0.58				-3.34	0.43	-3.34	23.21	3.64	0.84	0.01	-0.43	3.17	0.90
B1AS091	0.75			0.83	-5.23	0.40	-5.23	23.80	2.26	0.75	0.36	-0.21	5.31	0.23
B1AS095	0.37				-5.65		-5.65	21.84	0.38	0.76	0.33	-1.53	6.10	0.20
B1AS097	0.14				-3.85		-3.85	22.67	0.54	0.77	0.24	-1.82	4.34	0.17
B1AS107	0.50				-3.71		-3.71	19.64	1.32	0.89	0.28	-1.38	1.65	0.16
B1AS110	1.23			0.75	-8.75	0.71	-8.75	20.02	0.67	0.79	0.40	-0.19	4.04	0.35
B1AS111	1.33			0.71	-10.20	0.68	-10.20	18.80	0.61	0.81	0.31	0.06	4.10	0.41
B1AS112	0.50				-5.39		-5.39	21.91	0.44	0.76	0.31	-1.88	5.06	0.20
B1AS119	0.53			0.56	-3.92		-3.92	18.03	0.93	0.91	0.52	-1.00	1.20	0.08
B1AS125	-0.78				-4.68		-4.68	21.80	0.56	0.70	0.28	-4.26	0.56	0.10
B1AS133	-0.71				-4.54		-4.54	29.05	0.26	0.55	0.39	-4.05	2.54	0.08
B1AS138	0.48				-7.85		-7.85	24.04	0.18	0.64	0.31	-2.43	2.07	0.26
B1AS146	0.29				-3.73		-3.73	18.16	1.14	0.91	0.43	-1.23	1.08	0.07
B1AS175	0.55				-6.18		-6.18	21.45	0.98	0.76	0.24	-2.05	1.02	0.11
B1AS204	0.23				-4.42		-4.42	19.19	1.51	0.84	0.48	-0.72	0.54	0.05
B1AS208	0.48			0.53	-3.93		-3.93	21.73	1.57	0.79	0.40	-1.59	0.97	0.13
B1AS209	-0.34				-3.92		-3.92	20.73	0.60	0.79	0.28	-2.77	1.65	0.08

BECK [illegible]

WHOLE ROCK ANALYSIS

ALUMINA ALTERATION (MAFIC)

SAMPLE ID	ANOM	T1	T2	T3	T4	T5	F.A.	F.B.	F.C.	F.S.	F.K.	F'.K.	F.F.	F.H.
B1AS006	0.24				-4.63		-4.63	20.29	0.24	0.80	0.26	-2.52	4.07	0.25
B1AS008	0.32			0.51	-3.84		-3.84	22.47	0.63	0.77	0.35	-1.52	3.75	0.14
B1AS012	0.56				-5.71		-5.71	24.00	1.15	0.78	0.18	-1.52		0.22
B1AS013	-1.11				-5.36		-5.36	28.28	0.14	0.55	0.32	-4.03	4.89	0.08
B1AS014	-0.41				-3.92		-3.92	21.59	0.20	0.77	0.28	-2.64	7.51	0.16
B1AS016	-0.49				-4.05		-4.05	19.43	0.13	0.91	0.31	-3.22	5.05	0.15
B1AS017	-0.49				-4.12		-4.12	24.40	0.27	0.70	0.04	-3.17	3.24	0.19
B1AS018	0.66				-6.14		-6.14	22.55	0.73	0.76	0.20	-1.00	3.97	0.32
B1AS020	1.39			0.71	-8.76	0.48	-8.76	16.67	0.96	0.94	0.25	-0.11	2.49	0.65
B1AS023	0.22			0.51	-3.36		-3.36	17.51	0.77	0.93	0.50	-1.22	1.50	0.08
B1AS032	0.49				-6.32		-6.32	23.11	0.38	0.72	0.26	-1.70	3.50	0.22
B1AS036	0.95				-6.81	0.56	-6.81	21.54	1.34	0.81	0.09	-0.52	3.44	0.76
B1AS042	1.47			0.73	-7.77	0 32	-7.77	20.43	5.73	0.84	0.16	-0.19	1.64	0.43
B1AS044	1.35			0.82	-10.71	0.29	-10.71	20.78	1.64	0.76	0.24	0.05	3.98	0.54
B1AS045	0.41				-4.41		-4.41	20.51	0.96	0.83	0.30	-1.76	2.01	0.15
B1AS048	0.51			0.56	-3.70		-3.70	20.84	1.29	0.84	0.34	-1.16	2.60	0.16
B1AS051	0.45				-4.94		-4.94	20.89	0.83	0.81	0.28	-1.77	1.47	0.18
B1AS055	0.27				-4.07		-4.07	21.40	0.81	0.79	0.38	-1.89	1.41	0.12
B1AS057	0.35			0.52	-3.73		-3.73	22.54	0.57	0.77	0.37	-1.57	3.77	0.16
B1AS058	-0.44				-3.66		-3.66	20.67	0.20	0.79	0.18	-3.50	2.44	0.19
B1AS059	0.46				-5.61		-5.61	20.85	0.51	0.80	0.18	-2.08	2.06	0.20
B1AS061	0.22				-5.07		-5.07	20.78	0.39	0.80	0.24	-1.82	3.08	0.18
B1AS062	1.33			0.76	-8.52	0.51	-8.52	19.30	1.11	0.83	0.32	-0.14	2.54	0.42
B1AS063	0.92				-5.75	0.95	-5.75	19.73	1.18	0.88	0.16	-0.84	1.83	0.35
B1AS064	1.37			0.84	-7.39	0.37	-7.39	20.50	2.09	0.81	0.38	0.02	1.55	0.24

[redacted]

WHOLE ROCK ANALYSIS

SAMPLE ID	SIO2	AL2O3	CAO	MGO	NA2O	K2O	FE2O3	MNO	TIO2	P2O5	LOI	SUM
B2AS003	53.30	12.10	13.70	2.63	1.66	0.82	7.44	0.22	0.55	0.08	7.47	99.97
B2AS007	58.00	16.90	5.21	3.52	4.12	0.93	7.02	0.17	0.77	0.17	2.31	99.12
B2AS008	70.40	15.00	3.03	0.70	3.28	2.04	2.78	0.07	0.49	0.19	0.93	98.91
B2AS011	71.00	13.60	4.41	0.83	3.40	1.19	2.14	0.02	0.22	0.06	2.23	99.10
B2AS013	56.90	14.40	7.12	5.47	3.93	0.58	8.08	0.12	0.82	0.26	1.16	98.84
B2AS015	57.60	15.30	7.01	4.47	3.44	0.28	8.36	0.18	0.77	0.21	1.31	98.93
B2AS016	60.20	17.50	6.20	2.65	3.96	0.63	5.52	0.13	0.78	0.18	1.23	98.98
B2AS018	69.00	14.00	2.90	1.42	3.67	1.64	4.16	0.12	0.37	0.07	1.54	98.89
B2AS020	68.50	15.40	3.47	1.19	4.24	1.56	2.45	0.02	0.29	0.08	1.39	98.59
B2AS021	54.90	14.80	5.02	4.49	2.62	1.23	13.20	0.28	0.69	0.13	0.70	98.06
B2AS022	69.30	16.80	2.34	0.96	4.36	1.98	1.97	0.02	0.29	0.08	1.31	99.31
B2AS023	66.90	15.70	3.53	1.71	3.63	1.76	4.42	0.05	0.25	0.06	1.23	99.24
B2AS024	58.50	19.70	4.54	2.35	4.60	1.96	4.71	0.07	0.33	0.11	2.16	99.03
B2AS025	70.30	14.30	2.90	1.07	3.48	1.81	3.36	0.11	0.31	0.09	1.31	99.04
B2AS026	68.20	15.80	2.85	0.67	5.42	1.52	2.15	0.05	0.36	0.10	2.08	99.20
B2AS028	68.90	15.50	2.78	0.83	4.55	1.39	2.53	0.01	0.25	0.07	1.54	98.35
B2AS030	56.00	15.10	5.25	3.74	1.28	0.48	14.00	0.21	0.91	0.12	1.70	98.79
B2AS032	59.20	20.30	5.01	2.18	1.97	3.19	5.02	0.07	0.43	0.08	1.31	98.76
B2AS037	69.80	16.00	4.25	1.36	1.62	1.91	2.30	0.05	0.33	0.08	1.54	99.24
B2AS042	65.00	19.00	3.63	1.46	2.87	2.15	2.84	0.04	0.33	0.09	1.54	98.95
B2AS044	67.30	15.90	4.52	1.91	2.12	1.36	3.64	0.03	0.34	0.10	1.08	98.30
B2AS045	67.80	15.30	4.53	2.18	2.04	2.03	3.29	0.04	0.35	0.10	1.62	99.28
B2AS047	53.90	20.10	1.67	2.96	0.91	0.75	17.50	1.13	0.74	0.15	0.39	100.20
B2AS049	68.30	14.10	1.08	0.65	2.90	5.06	6.02	0.08	0.43	0.09	0.54	99.25
B2AS051	71.50	14.50	3.57	1.42	2.30	1.00	3.11	0.04	0.21	0.07	0.93	98.65
B2AS052	68.90	16.90	4.08	1.67	2.16	0.96	2.61	0.02	0.29	0.09	0.54	98.22
B2AS053	70.90	15.40	2.39	0.75	2.89	2.18	2.18	0.04	0.32	0.08	1.16	98.29
B2AS054	67.30	16.30	3.94	2.04	2.57	1.87	3.52	0.04	0.44	0.12	1.00	99.14
B2AS055	70.80	14.30	3.45	1.48	1.84	2.63	2.42	0.02	0.26	0.07	1.00	98.27
B2AS056	67.20	18.60	2.76	2.35	2.77	1.22	2.45	0.01	0.40	0.11	0.62	98.49

WHOLE ROCK ANALYSES

SAMPLE ID	SIO2	AL203	CAO	MGO	MNO	K2O	FE203	MNO	TIO2	P205	LOI	SUM
B2AS057	67.10	15.90	4.59	1.50	2.50	1.22	2.90	0.02	0.26	0.07	1.93	97.99
B2AS058	67.00	18.10	3.02	1.77	1.51	1.79	4.34	0.06	0.50	0.10	1.00	99.39
B2AS059	66.40	15.90	4.57	2.70	2.48	1.44	3.51	0.05	0.36	0.11	0.85	98.37
B2AS060	69.70	16.80	1.75	1.16	2.02	1.62	3.26	0.06	0.30	0.08	1.31	98.06
B2AS061	72.80	13.80	3.12	1.65	0.97	2.26	2.74	0.05	0.37	0.09	1.47	99.32
B2AS063	71.90	13.40	1.72	0.44	4.90	1.83	3.03	0.06	0.40	0.08	0.93	98.74
B2AS064	61.60	15.60	4.43	1.25	3.26	2.02	7.58	0.09	0.50	0.12	1.77	98.22
B2AS066	69.80	14.00	0.67	0.49	3.33	4.34	4.06	0.06	0.44	0.10	0.85	98.14
B2AS068	74.90	12.60	2.64	1.58	0.76	1.74	2.28	0.03	0.20	0.04	1.23	98.00
B2AS069	79.10	8.67	1.94	2.03	1.54	0.82	3.33	0.04	0.24	0.07	0.77	98.55
B2AS070	71.70	16.20	2.65	1.47	2.43	0.73	2.68	0.04	0.35	0.09	0.85	99.19
B2AS071	77.00	12.40	1.45	0.98	0.79	2.73	1.53	0.01	0.10	0.02	1.39	98.40
B2AS072	67.70	16.40	5.00	1.50	3.38	0.95	2.20	0.01	0.42	0.11	1.47	99.14
B2AS073	75.20	12.50	2.18	0.96	2.91	1.65	1.62	0.01	0.11	0.03	1.62	98.99
B2AS075	74.10	12.40	2.06	1.12	2.87	2.20	2.29	0.03	0.17	0.03	1.77	99.04
B2AS076	76.00	12.00	1.46	0.39	4.73	0.91	2.26	0.02	0.14	0.03	1.08	99.02
B2AS077	75.50	13.40	2.27	1.60	1.17	2.00	2.34	0.03	0.28	0.05	1.00	99.64
B2AS078	77.40	14.20	0.63	0.41	0.88	3.25	0.72	0.00	0.07	0.03	1.85	99.44
B2AS080	67.70	16.40	1.59	1.07	2.48	1.61	6.89	0.08	0.72	0.19	0.85	99.58
B2AS081	64.80	15.60	4.08	1.49	3.75	1.81	5.32	0.06	0.51	0.14	2.23	99.79
B2AS082	70.30	16.30	1.23	0.37	6.16	1.83	0.92	0.00	0.54	0.10	0.77	98.72
B2AS084	70.00	15.70	3.04	1.20	3.96	1.30	2.38	0.03	0.25	0.07	0.93	98.86
B2AS085	69.00	15.50	2.67	0.86	5.30	1.24	3.17	0.05	0.24	0.07	1.70	99.80
B2AS087	67.90	16.40	2.89	0.66	4.64	1.89	3.42	0.04	0.52	0.14	1.08	99.58
B2AS088	65.60	23.40	0.74	0.51	1.33	0.79	4.84	0.03	0.78	0.19	0.62	99.03
B2AS089	71.00	16.00	3.42	1.80	2.36	1.17	2.74	0.05	0.29	0.08	0.77	99.68
B2AS090	77.30	14.20	1.61	1.18	0.50	1.59	1.97	0.03	0.23	0.04	0.70	98.75
B2AS091	76.20	12.70	1.18	0.34	4.46	1.29	2.36	0.05	0.17	0.03	1.00	99.78
B2AS092	79.30	12.60	1.82	1.29	0.32	1.00	1.87	0.02	0.10	0.02	0.39	99.23
B2AS093	71.70	15.10	2.41	0.80	3.56	1.71	2.39	0.03	0.24	0.07	1.31	97.32

WHOLE ROCK ANALYSIS

SAMPLE ID	SIO2	AL2O3	CAO	MGO	NA2O	K2O	FE2O3	MNO	TIO2	P2O5	LOI	SUM
B2AS096	71.60	11.60	0.88	0.82	1.69	3.15	3.32	0.16	0.19	0.04	0.77	99.42
B2AS097	69.30	15.90	2.94	0.74	5.67	0.70	2.34	0.02	0.30	0.14	0.23	98.48
B2AS099	63.60	14.90	4.22	1.80	3.91	1.77	5.84	0.17	0.33	0.07	2.31	98.92
B2AS100	59.00	16.20	5.30	3.70	4.32	0.10	8.87	0.18	0.68	0.15	0.62	99.12
B2AS101	68.90	15.80	3.85	1.07	3.51	1.05	3.78	0.04	0.57	0.14	0.70	99.41
B2AS103	68.30	15.10	2.50	0.70	3.22	2.50	2.75	0.09	0.28	0.08	1.23	99.75
B2AS104	79.00	12.80	0.81	0.32	0.64	2.69	1.17	0.01	0.21	0.04	1.39	99.28
B2AS105	74.00	13.20	2.80	1.61	1.30	1.61	3.37	0.05	0.25	0.05	0.77	99.01
B2AS106	70.00	16.20	2.97	1.84	2.44	0.83	3.34	0.04	0.36	0.10	1.23	99.85
B2AS107	69.60	15.30	1.98	0.91	5.06	1.21	4.01	0.01	0.36	0.10	0.93	99.47
B2AS108	71.70	15.20	3.82	2.22	2.36	0.87	2.01	0.02	0.30	0.10	0.77	99.37
B2AS109	69.10	15.70	4.38	1.90	2.80	1.22	2.49	0.04	0.36	0.10	1.54	99.63
B2AS110	76.70	13.90	1.55	0.58	0.95	3.15	1.25	0.02	0.25	0.05	1.54	99.94
B2AS111	71.60	15.20	3.23	1.38	2.48	1.36	2.37	0.03	0.26	0.07	0.85	98.83
B2AS112	76.40	13.10	3.19	1.34	0.62	0.64	2.71	0.04	0.36	0.08	0.47	98.93
B2AS114	73.40	13.90	1.75	0.68	1.35	3.06	2.76	0.04	0.27	0.03	1.85	99.01
B2AS116	71.60	13.50	0.14	1.64	0.19	2.68	7.82	0.20	0.30	0.04	1.77	99.88
B2AS120	73.10	14.90	2.35	1.72	1.78	0.97	2.82	0.04	0.38	0.12	0.77	98.9
B2AS122	70.80	15.20	3.57	1.51	1.93	1.99	3.35	0.04	0.54	0.09	0.93	99.9
B2AS123A	64.90	14.90	3.73	2.29	3.83	1.06	6.50	0.06	0.39	0.08	0.93	98.6
B2AS123B	75.70	13.00	4.75	0.52	1.63	1.01	1.03	0.02	0.03	0.04	1.77	99.5
B2AS124	77.00	12.50	1.89	1.24	0.98	2.28	1.26	0.01	0.11	0.03	1.31	98..
B2AS127	72.20	15.30	3.63	1.75	2.42	1.14	2.30	0.03	0.21	0.06	0.47	99.5
B2AS126	73.60	13.20	2.61	1.60	1.73	1.54	3.59	0.04	0.31	0.06	0.77	99..
B2AS127	68.00	15.60	3.97	2.31	2.35	0.47	4.71	0.06	0.39	0.11	1.47	99..
B2AS129	68.00	15.70	4.36	1.49	1.64	1.82	4.83	0.06	0.43	0.12	1.08	99..
B2AS130	68.50	16.00	3.73	1.71	2.21	2.04	3.04	0.04	0.45	0.09	1.16	98.
B2AS131	69.30	16.00	4.22	2.37	2.95	1.17	1.82	0.02	0.24	0.08	1.00	99..
B2AS132	68.00	14.50	2.81	2.52	3.37	1.91	4.99	0.05	0.39	0.08	0.77	99..
B2AS134	76.40	13.90	1.95	0.37	4.33	0.99	0.72	0.00	0.07	0.03	0.70	99.

WHOLE ROCK ANALYSIS

SAMPLE ID	SIO2	AL2O3	CAO	MGO	NA2O	K2O	FE2O3	MNO	TIO2	P2O5	LOI	SUM
B2AS139	72.00	14.30	2.72	1.87	[illegible]	[illegible]	2.46	0.03	0.39	0.08	1.23	99.08
B2AS141	66.50	16.80	4.06	1.82	2.99	1.76	3.10	0.04	0.46	0.11	1.54	99.18
B2AS143B	60.70	14.10	8.51	4.06	1.15	1.27	6.67	0.15	0.38	0.08	2.77	99.84
B2AS144	70.50	15.10	2.78	0.92	4.98	0.91	2.93	0.03	0.30	0.08	0.62	99.15
B2AS145	58.50	17.20	4.69	3.08	3.45	2.13	8.27	0.14	0.49	0.08	1.00	99.00
B2AS146	70.00	15.30	2.98	1.64	2.69	1.71	3.17	0.06	0.31	0.11	1.23	99.20

SAMPLE ID	SIO2	AL2O3	CAO	MGO	NA2O	K2O	FE2O3	MNO	TIO2	P2O5	LOI	SUM
B1AS003	69.00	16.30	2.43	0.69	5.26	1.92	2.07	0.02	0.25	0.09	1.31	99.54
B1AS004	70.80	17.40	0.72	0.60	0.76	4.68	1.37	0.00	0.18	0.06	2.16	98.70
B1AS006	67.40	15.40	2.58	2.60	2.72	1.31	5.65	0.05	0.35	0.09	1.39	99.74
B1AS007	66.60	16.20	2.58	1.44	4.81	1.44	4.63	0.03	0.46	0.08	0.62	98.89
B1AS008	66.70	15.90	3.81	1.92	1.77	1.85	4.69	0.06	0.50	0.08	1.31	98.79
B1AS009	68.30	14.40	5.47	2.11	2.00	1.69	4.84	0.10	0.43	0.09	0.70	100.13
B1AS011	66.70	16.30	3.20	2.23	1.62	1.81	5.40	0.07	0.48	0.08	1.62	99.21
B1AS012	69.40	16.40	3.68	2.18	1.65	1.01	2.78	0.05	0.28	0.07	1.47	98.97
B1AS013	60.40	20.10	2.44	1.26	4.72	2.12	5.29	0.04	0.62	0.10	1.08	98.37
B1AS014	65.40	15.70	2.87	2.03	2.89	1.48	6.96	0.10	0.50	0.08	0.93	98.94
B1AS016	69.00	15.70	1.96	1.91	3.77	1.61	5.44	0.06	0.54	0.09	1.06	100.73
B1AS017	63.90	16.70	3.80	2.45	3.19	0.20	6.20	0.08	0.55	0.09	1.93	99.09
B1AS018	66.30	16.00	3.66	2.38	1.12	1.09	6.37	0.10	0.49	0.09	1.62	99.42
B1AS019	66.50	15.90	5.49	2.35	1.10	0.62	4.20	0.10	0.50	0.09	2.16	99.01
B1AS020	71.60	14.00	1.70	1.82	0.48	1.16	5.29	0.11	0.41	0.08	2.16	98.81
B1AS022	69.30	14.40	3.09	1.17	1.68	3.04	3.49	0.12	0.28	0.07	2.39	99.03
B1AS023	73.10	14.40	2.43	0.91	2.31	2.42	1.95	0.03	0.24	0.06	1.31	99.16
B1AS026A	72.30	15.50	1.77	0.63	1.99	2.85	1.90	0.01	0.38	0.06	1.47	98.86
B1AS026B	73.10	15.10	1.40	0.91	1.42	2.58	2.63	0.02	0.33	0.07	1.93	99.49
B1AS027	70.70	15.70	2.74	1.79	3.83	1.18	2.90	0.04	0.38	0.10	1.31	100.67
B1AS028	66.60	15.40	3.70	2.16	3.22	1.74	4.80	0.06	0.54	0.09	0.85	99.36
B1AS029	63.50	18.00	3.95	2.40	3.41	2.19	4.28	0.03	0.58	0.09	0.77	99.20
B1AS030	68.70	15.10	4.32	2.30	0.61	1.39	4.89	0.09	0.46	0.08	0.85	98.77
B1AS031	67.80	17.20	2.40	1.72	1.45	2.40	4.62	0.07	0.50	0.09	1.39	99.64
B1AS032	65.80	16.90	3.10	2.32	1.91	1.49	6.12	0.11	0.61	0.09	1.77	100.21
B1AS034	67.00	15.30	3.36	2.04	0.94	1.66	5.66	0.09	0.45	0.08	1.77	98.30
B1AS035	70.60	14.20	2.00	1.30	1.21	2.60	5.26	0.05	0.38	0.08	1.39	99.07
B1AS036	66.40	15.10	3.71	2.82	0.56	0.44	7.08	0.12	0.52	0.09	2.08	98.92
B1AS039	72.80	13.70	3.64	2.09	1.38	1.20	1.93	0.04	0.20	0.05	2.08	98.51
B1AS040	68.80	15.30	3.68	0.70	5.07	1.03	2.16	0.04	0.49	0.11	1.39	98.97

SAMPLE ID	SIO2	AL2O3	CAO	MGO	NA2O	K2O	FE2O3	MNO	TIO2	P2O5	LOI	SUM
B1AS041	67.80	15.90	2.99	0.70	5.23	.47	1.85	0.02	0.24	0.06	1.93	98.27
B1AS042	72.00	15.60	3.54	1.78	0.32	0.65	2.76	0.05	0.44	0.07	1.70	99.31
B1AS043	69.30	16.40	3.11	1.56	0.52	1.10	4.95	0.11	0.46	0.07	1.62	99.20
B1AS044	68.50	16.60	2.12	1.85	0.29	1.83	6.35	0.14	0.51	0.08	1.62	99.39
B1AS045	70.60	15.70	3.34	1.82	2.02	1.36	2.46	0.03	0.30	0.08	1.23	99.14
B1AS046	66.50	15.40	2.14	1.48	5.80	1.09	5.07	0.03	0.48	0.08	1.00	99.07
B1AS047	70.50	15.90	3.07	1.68	1.66	2.13	2.47	0.04	0.31	0.08	1.31	99.12
B1AS048	69.60	15.20	3.93	1.99	1.39	1.73	3.16	0.06	0.27	0.08	1.23	98.83
B1AS049	73.40	14.80	1.42	1.51	0.19	0.84	4.98	0.12	0.43	0.07	1.85	99.31
B1AS050	68.30	15.60	3.49	1.67	2.77	1.91	3.90	0.07	0.43	0.08	1.68	99.30
B1AS051	69.70	15.90	3.25	2.01	1.99	1.46	2.80	0.05	0.30	0.08	1.93	99.47
B1AS052	68.90	15.50	2.25	1.02	5.11	1.39	3.47	0.03	0.43	0.07	1.31	99.38
B1AS053	67.70	14.80	3.95	1.96	2.59	1.68	4.68	0.06	0.45	0.08	1.39	99.34
B1AS054	75.50	12.50	2.49	1.52	0.82	2.35	1.47	0.02	0.12	0.03	2.16	98.98
B1AS055	69.30	16.20	3.30	1.77	2.24	2.06	2.89	0.03	0.31	0.06	1.85	99.73
B1AS056	66.70	14.80	3.42	2.27	2.71	1.78	5.42	0.06	0.89	0.09	1.54	99.68
B1AS057	65.90	15.80	3.73	2.23	1.80	1.93	5.19	0.09	0.49	0.08	1.39	98.65
B1AS058	66.40	15.50	2.55	2.20	3.66	0.92	5.01	0.10	0.45	0.08	2.08	98.95
B1AS059	69.30	16.00	3.00	1.90	2.25	0.98	3.73	0.10	0.50	0.08	1.85	99.6
B1AS061	67.80	15.50	3.03	1.78	2.05	1.26	5.42	0.07	0.49	0.09	1.77	99.2
B1AS062	69.00	15.30	2.21	2.02	0.51	1.69	5.57	0.11	0.47	0.08	2.23	99.1
B1AS063	70.20	14.70	3.51	2.11	0.95	0.78	4.47	0.06	0.44	0.08	2.47	99.7
B1AS064	69.80	15.80	3.02	1.68	0.37	1.98	3.77	0.08	0.44	0.08	2.47	99.4
B1AS066	68.00	16.00	2.48	1.13	1.27	2.38	5.43	0.06	0.48	0.08	1.77	98.9
B1AS067	68.30	15.90	4.16	1.45	1.41	1.84	4.13	0.07	0.43	0.07	1.31	99.2
B1AS068	67.00	16.00	3.12	1.33	3.72	1.84	4.00	0.04	0.43	0.08	1.85	99.4
B1AS069	72.30	16.30	0.76	0.64	0.64	2.89	3.28	0.05	0.52	0.09	1.93	99.4
B1AS070	69.00	15.40	3.18	2.19	1.81	0.83	4.22	0.08	0.32	0.08	2.31	99.4
B1AS071	66.00	16.10	3.04	2.35	1.56	1.79	6.16	0.09	0.57	0.09	2.23	99.1
B1AS072	66.90	15.20	3.84	2.55	0.58	1.36	6.42	0.11	0.55	0.09	1.85	99.4

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WHOLE ROCK ANALYSES

SAMPLE ID	SIO2	AL203	CAO	MGO	NA2O	K2O	FE2O3	MNO	TIO2	P2O5	LOI	SUM
B1AS073	69.40	15.60	2.39	1.68	1.33	1.91	4.68	0.10	0.44	0.07	2.08	99.68
B1AS074	68.20	17.80	1.82	1.14	1.33	3.46	2.29	0.03	0.55	0.09	2.39	99.10
B1AS076	68.70	15.10	3.80	2.31	0.79	2.18	4.11	0.05	0.39	0.07	1.54	99.04
B1AS077	68.10	14.60	3.77	2.83	0.75	0.61	5.94	0.12	0.40	0.08	2.23	99.43
B1AS078	70.10	17.00	0.27	1.13	0.53	3.30	4.36	0.04	0.49	0.09	2.39	99.72
B1AS079	74.10	17.20	0.98	0.29	1.45	2.66	0.78	0.01	0.33	0.09	1.77	99.66
B1AS080	66.90	16.20	2.73	2.11	1.97	2.01	5.22	0.10	0.49	0.08	1.62	99.43
B1AS081	68.60	16.30	2.69	1.62	1.79	2.60	3.83	0.06	0.46	0.08	1.39	99.42
B1AS082	70.60	16.00	1.44	0.73	2.09	3.27	2.94	0.02	0.52	0.09	1.39	99.09
B1AS083	67.00	15.80	3.51	2.92	1.66	0.96	5.04	0.07	0.39	0.07	2.08	99.50
B1AS084	75.80	15.60	0.32	0.96	0.10	0.65	5.06	0.10	0.48	0.09	0.93	100.09
B1AS085	69.80	14.60	4.26	2.33	0.55	0.14	4.55	0.10	0.41	0.08	2.08	98.90
B1AS086	67.90	14.90	5.82	2.56	0.43	0.06	5.31	0.11	0.43	0.07	1.70	99.29
B1AS087	67.00	15.40	4.47	2.33	2.04	1.34	4.89	0.07	0.44	0.08	1.39	99.45
B1AS088	66.40	15.90	4.12	2.29	1.66	2.04	4.79	0.06	0.50	0.08	1.08	98.92
B1AS089	69.20	17.70	0.41	0.67	1.02	3.16	4.31	0.05	0.56	0.09	2.39	99.76
B1AS091	65.30	16.10	4.34	2.39	0.40	1.95	6.86	0.15	0.49	0.08	1.31	99.37
B1AS093	67.10	15.50	1.93	1.41	4.48	1.77	4.96	0.06	0.47	0.08	1.39	99.15
B1AS094	67.60	16.60	4.71	2.16	2.08	1.80	2.57	0.03	0.49	0.09	1.31	99.44
B1AS095	66.30	16.10	2.94	2.14	1.81	1.79	6.09	0.07	0.49	0.09	1.00	98.82
B1AS096	68.90	16.40	3.84	1.60	3.09	1.37	3.56	0.07	0.46	0.08	0.85	100.22
B1AS097	66.70	15.90	3.98	2.13	1.97	1.26	5.30	0.08	0.49	0.08	1.23	99.14
B1AS098	65.30	12.20	4.69	3.46	0.67	0.70	10.50	0.19	0.41	0.08	1.62	99.82
B1AS100	65.40	15.30	3.99	2.69	2.15	2.00	5.67	0.08	0.46	0.08	1.08	98.90
B1AS101	68.10	17.50	3.35	1.28	1.63	2.68	2.45	0.04	0.54	0.09	2.00	99.66
B1AS102	67.60	15.80	3.50	1.51	2.11	1.74	4.40	0.04	0.46	0.08	0.70	98.94
B1AS103	68.80	15.70	2.19	1.43	1.52	3.03	3.59	0.02	0.47	0.08	2.77	99.60
B1AS104	72.40	14.30	1.90	1.27	2.76	2.70	1.81	0.01	0.16	0.05	2.08	99.44
B1AS105	63.50	13.40	6.55	2.83	0.55	1.00	8.73	0.19	0.38	0.09	1.62	98.84
B1AS106	67.60	15.50	2.95	1.36	4.17	1.68	4.12	0.03	0.37	0.07	1.31	99.16

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WHOLE ROCK ANALYSES

SAMPLE ID	SIO2	AL2O3	CAO	MGO	NA2O	K2O	FE2O3	MNO	TIO2	P2O5	LOI	SUM
B1AS107	71.70	14.60	3.72	1.82	1.59	1.40	2.53	0.03	0.37	0.08	1.34	99.48
B1AS108	67.90	16.00	3.98	1.76	1.91	2.21	3.66	0.05	0.43	0.08	1.31	99.29
B1AS109	71.30	14.70	3.80	1.90	0.59	1.03	3.16	0.07	0.40	0.07	1.39	99.21
B1AS110	68.90	16.10	2.04	2.02	0.71	2.15	6.15	0.11	0.52	0.08	1.54	100.32
B1AS111	70.90	16.00	1.53	1.45	0.68	1.65	5.30	0.11	0.50	0.08	1.31	99.51
B1AS112	68.20	16.50	3.06	2.35	2.12	1.72	4.70	0.06	0.51	0.09	0.93	100.24
B1AS113	67.20	15.70	2.43	1.42	4.88	1.52	4.36	0.04	0.49	0.08	1.77	99.83
B1AS114	70.70	14.20	2.76	1.10	3.04	1.15	2.60	0.03	0.24	0.06	1.47	99.35
B1AS115	78.70	13.40	1.28	0.41	0.99	1.82	0.84	0.02	0.08	0.03	1.46	99.53
B1AS116	64.20	14.30	7.51	4.37	0.36	0.10	4.93	0.15	0.33	0.11	4.47	100.85
B1AS117	68.30	18.20	1.96	1.08	2.40	3.25	1.82	0.01	0.33	0.08	1.93	99.36
B1AS119	73.60	14.90	2.55	0.99	2.03	2.59	1.93	0.02	0.35	0.10	1.62	100.68
B1AS120	70.00	15.40	3.54	1.32	1.98	0.19	2.17	0.02	0.33	0.10	2.31	100.16
B1AS121	75.10	14.30	1.04	1.12	1.37	2.39	2.20	0.04	0.12	0.04	2.00	99.72
B1AS122	75.90	13.40	1.77	1.73	1.87	1.35	1.19	0.02	0.15	0.04	2.08	99.50
B1AS123	71.70	15.30	3.03	1.14	2.53	2.30	2.50	0.05	0.26	0.06	1.77	100.64
B1AS124	66.70	13.40	3.31	3.01	3.61	0.48	7.93	0.07	0.29	0.07	1.39	100.26
B1AS125	69.90	18.30	1.74	1.14	3.11	1.69	0.87	0.00	0.36	0.08	1.54	100.73
B1AS129	64.70	14.80	3.41	2.88	2.30	0.69	9.09	0.09	0.28	0.07	2.16	100.47
B1AS130	66.60	16.60	4.52	1.43	4.67	1.10	2.72	0.05	0.31	0.08	2.77	100.85
B1AS131	67.30	17.50	3.03	0.92	5.69	1.27	2.67	0.03	0.52	0.10	1.47	100.50
B1AS132	71.90	15.50	2.93	0.73	5.26	0.91	1.37	0.02	0.46	0.08	1.00	100.16
B1AS133	61.60	20.60	2.93	1.65	4.60	2.67	3.52	0.03	0.64	0.10	1.39	99.73
B1AS134	59.80	17.10	6.73	2.82	4.10	0.82	5.97	0.09	0.53	0.13	1.93	100.01
B1AS135	71.90	14.00	2.66	2.08	2.91	1.77	3.56	0.05	0.25	0.04	0.93	100.15
B1AS136	70.40	14.10	2.96	1.76	3.61	1.90	4.07	0.11	0.37	0.09	1.39	100.76
B1AS137	68.20	16.60	1.23	2.00	1.62	2.87	4.11	0.05	0.53	0.08	2.93	100.21
B1AS138	64.10	18.30	1.96	2.42	2.83	1.89	5.39	0.06	0.65	0.11	2.62	100.33
B1AS139	61.60	18.10	4.86	2.93	3.65	1.12	6.35	0.07	0.53	0.09	1.23	100.53
B1AS144	73.80	14.80	2.48	1.55	1.06	2.74	1.97	0.04	0.27	0.08	2.08	100.87

B E C K [illegible]

WHOLE ROCK ANALYSES

SAMPLE ID	SIO2	AL2O3	CAO	MGO	NA2O	K2O	FE2O3	MNO	TIO2	P2O5	LOI	SUM
B1AS145	54.60	16.40	7.74	4.40	1.06	2.70	7.40	0.12	0.79	0.18	5.23	100.62
B1AS146	74.00	14.90	2.77	0.80	2.20	2.14	1.58	0.02	0.29	0.08	1.47	100.25
B1AS147	70.60	17.60	1.44	0.68	2.95	3.25	1.15	0.01	0.37	0.08	1.93	100.06
B1AS175	70.80	17.10	2.87	1.19	2.45	1.37	1.71	0.03	0.52	0.07	1.70	99.81
B1AS176	75.60	13.80	2.29	0.99	0.59	3.24	0.41	0.03	0.27	0.05	3.54	100.81
B1AS178	77.10	12.80	2.52	1.76	2.18	0.41	1.53	0.02	0.11	0.04	1.70	100.17
B1AS179	72.80	15.80	3.71	1.07	2.54	1.59	0.91	0.03	0.30	0.07	1.31	100.13
B1AS180	71.20	14.40	2.43	1.47	2.51	2.22	3.82	0.04	0.39	0.11	1.08	99.67
B1AS181	69.50	16.90	1.80	1.21	3.12	2.08	1.84	0.02	0.41	0.11	0.92	99.91
B1AS183	77.40	13.20	1.86	0.38	3.12	1.65	0.69	0.02	0.26	0.07	1.00	99.65
B1AS184	61.90	9.25	1.68	3.79	0.22	0.16	16.30	0.25	0.09	0.03	3.00	98.67
B1AS185	72.20	14.90	4.40	0.98	1.78	1.95	1.24	0.05	0.30	0.07	1.93	99.80
B1AS186A	76.40	15.40	0.95	0.73	1.09	3.07	0.77	0.01	0.12	0.03	1.77	100.34
B1AS187	74.30	10.60	2.81	2.30	0.54	1.42	5.72	0.07	0.13	0.03	1.16	99.08
B1AS188	69.70	15.80	3.16	1.10	0.76	3.07	2.84	0.06	0.24	0.06	2.62	99.41
B1AS189	70.80	15.60	2.43	0.67	3.65	2.10	3.76	0.01	0.27	0.11	0.70	100.10
B1AS190	78.30	10.20	3.23	2.07	0.84	0.38	2.47	0.08	0.16	0.07	1.47	99.27
B1AS191	68.70	15.10	4.40	1.94	2.15	1.22	4.82	0.05	0.27	0.06	1.47	100.18
B1AS192	48.50	15.80	3.88	6.69	0.28	0.59	17.70	0.20	1.85	0.15	3.77	99.41
B1AS194	56.50	16.10	4.57	6.05	3.58	0.61	9.12	0.11	0.74	0.16	3.08	100.62
B1AS195	70.40	14.10	[illegible]	1.23	2.66	2.06	1.52	0.03	0.21	0.06	3.77	100.47
B1AS196	69.00	12.20	5.[illegible]	1.84	0.96	1.10	6.62	0.12	0.17	0.08	2.85	100.04
B1AS197	57.30	16.30	7.14	3.28	1.25	2.06	6.89	0.07	0.76	0.21	4.31	99.57
B1AS199	70.10	15.40	5.21	0.60	1.99	1.65	3.00	0.02	0.21	0.08	2.16	100.42
B1AS201	70.10	13.80	5.87	3.26	0.65	0.17	3.62	0.04	0.23	0.05	2.47	100.26
B1AS202	76.10	12.30	1.81	1.27	0.62	2.01	3.92	0.09	0.19	0.05	1.47	99.83
B1AS204	72.60	15.90	2.42	0.58	2.52	2.52	0.91	0.01	0.27	0.07	1.70	99.50
B1AS205	75.30	12.60	2.25	1.18	0.68	2.34	3.30	0.09	0.19	0.05	1.62	99.60
B1AS206	69.20	15.30	6.27	1.60	1.91	1.24	1.48	0.02	0.35	0.08	2.93	100.39
B1AS207	75.30	14.00	2.84	0.53	2.22	1.81	1.57	0.05	0.23	0.15	1.08	99.79

[redacted]

WHOLE ROCK ANALYSIS

SAMPLE ID	SIO2	AL2O3	CAO	MGO	NA2O	K2O	FE2O3	MNO	TIO2	P2O5	LOI	SUM
B1AS208	69.90	16.30	3.67	1.89	1.90	2.17	1.76	0.04	0.26	0.07	1.85	99.81
B1AS209	71.30	16.50	2.94	1.06	3.26	1.53	2.15	0.03	0.32	0.08	1.31	100.46
B1AS210	71.30	14.30	3.14	1.08	3.74	0.25	3.26	0.07	0.29	0.07	1.23	99.53
B1AS216	76.10	14.00	0.47	1.23	0.91	2.28	2.73	0.02	0.30	0.06	2.23	100.33
B1AS217	66.90	15.50	3.98	1.79	2.37	1.86	5.89	0.16	0.28	0.07	1.31	100.11
B1AS219A	70.60	15.90	3.52	1.77	2.58	1.08	2.69	0.06	0.29	0.07	1.77	100.33
B1AS219B	69.40	18.40	1.81	0.72	3.44	3.12	0.87	0.00	0.37	0.08	1.54	99.75
B1AS220	71.70	15.70	2.61	1.36	2.16	1.59	2.91	0.05	0.46	0.08	1.62	100.44
B1AS223	69.50	15.10	1.96	0.54	5.28	1.95	3.61	0.02	0.24	0.10	1.70	100.00
B1AS227	68.80	17.70	1.76	0.50	4.24	2.74	2.73	0.01	0.34	0.14	1.54	100.50
B1AS235	72.90	14.90	3.22	1.40	3.71	0.67	0.97	0.01	0.30	0.03	1.54	99.85
B1AS237	75.10	13.40	3.27	0.64	4.12	1.12	1.02	0.02	0.36	0.09	1.23	100.37
B1AS238	72.20	15.80	2.16	1.23	3.96	2.11	0.67	0.01	0.31	0.07	1.47	99.99
B1AS239	73.40	14.30	2.74	0.90	2.96	2.85	0.58	0.00	0.27	0.05	2.23	100.28
B1AS240	71.70	15.40	2.24	0.45	4.76	2.35	1.10	0.01	0.33	0.10	1.39	99.83
B1AS241	77.00	12.90	1.50	0.43	3.43	2.43	1.15	0.05	0.25	0.04	1.16	100.34
B1AS242	68.90	15.40	3.46	2.22	0.54	1.43	4.43	0.10	0.47	0.08	1.93	98.96
B1AS243	70.50	15.80	1.38	1.24	1.61	1.96	5.79	0.11	0.51	0.09	1.70	100.69
B1AS244	66.70	15.30	4.07	2.82	0.66	1.23	6.60	0.09	0.51	0.09	1.93	100.00
B1BS001	69.70	14.00	4.00	2.17	3.06	1.67	3.17	0.05	0.41	0.09	1.00	99.32
B1BS003	67.10	15.50	5.14	1.73	2.13	2.35	3.14	0.07	0.53	0.08	1.16	98.93
B1BS004	64.70	15.10	6.92	1.82	1.62	1.36	5.18	0.07	0.42	0.08	1.70	98.97
B1BS005	72.30	15.10	1.40	0.42	5.35	1.68	1.08	0.01	0.13	0.03	0.93	98.43
B1BS006	69.80	14.20	2.65	2.01	3.98	1.38	3.89	0.05	0.38	0.07	0.93	99.34
B1BS007	60.80	12.20	13.90	0.60	2.03	0.11	3.35	0.23	0.28	0.07	6.39	99.96
B1BS008	70.00	14.80	4.09	0.95	3.28	1.85	2.22	0.05	0.42	0.11	2.00	99.77
B1BS009	67.70	14.20	5.41	1.91	1.86	1.62	4.75	0.09	0.40	0.09	1.16	99.19
B1BS010	68.40	15.80	3.32	0.77	5.33	1.42	2.04	0.02	0.25	0.09	1.16	98.64
B1BS011	65.00	16.00	3.84	2.47	3.28	2.15	4.65	0.09	0.45	0.09	0.85	98.87
B1BS012	64.20	15.20	4.02	2.79	3.08	1.73	5.85	0.07	0.46	0.11	1.47	98.99

[redacted]

WHOLE ROCK ANALYSIS

SAMPLE ID	SIO2	AL2O3	CAO	MGO	NA2O	K2O	FE2O3	MNO	TIO2	P2O5	LOI	SUM
B[illegible]-0081.0	68.60	15.60	2.66	0.83	5.38	1.46	2.00	0.01	0.24	0.06	2.23	99.07
F1-0191.0	45.20	11.50	7.19	4.44	0.80	0.20	27.20	1.10	0.62	0.13	0.00	98.38
[illegible]1-0208.6	58.80	24.20	1.54	1.11	2.95	3.86	2.65	0.08	0.94	0.08	2.39	98.60
B2-0042.0	65.60	15.30	4.62	1.30	5.92	0.80	2.55	0.03	0.26	0.06	2.47	98.91
B2-0283.0	45.90	12.60	7.04	4.53	1.30	0.31	25.70	1.02	0.53	0.12	0.00	99.05
B3-0068.0	74.30	16.60	0.99	0.49	1.21	2.92	0.65	0.01	0.32	0.09	1.54	99.12
B3-0148.0	71.90	15.90	1.79	1.15	1.78	2.02	2.76	0.03	0.28	0.07	1.54	99.24
B3-0157.0	77.00	15.80	0.86	0.36	1.12	1.96	1.04	0.00	0.29	0.08	1.47	99.68
B3-0178.1	51.00	14.70	9.21	6.12	0.79	0.38	13.70	0.25	0.89	0.07	0.93	98.04
B3-0178.6	51.10	16.30	5.28	5.61	0.88	0.98	15.70	0.19	1.01	0.08	2.00	99.33
B3-0179.1	59.20	16.70	1.01	3.26	0.88	2.31	13.10	0.17	1.57	0.07	1.00	99.27
B3-0179.9	58.90	12.10	0.33	3.92	0.06	2.78	17.10	0.17	1.83	0.09	1.39	98.67
B3-0180.11	52.50	13.40	2.00	5.05	1.14	0.18	19.90	0.27	1.71	0.13	3.31	99.59
B3-0181.4	56.70	12.10	1.04	5.24	0.57	0.08	18.90	0.20	1.45	0.12	3.16	99.56
B3-0181.6	59.90	15.60	1.08	3.62	0.67	1.33	13.90	0.17	1.36	0.11	1.39	99.13
B3-0182.0	63.50	15.90	0.43	3.10	0.26	2.08	11.90	0.14	1.13	0.09	0.77	99.30
B3-0182.8	49.90	17.20	3.68	4.76	1.96	1.01	17.40	0.31	1.35	0.12	2.62	100.31
B3-0184.0	50.80	16.20	5.53	5.82	0.78	1.10	15.30	0.21	1.13	0.09	1.62	98.56
B3-0184.6	48.40	14.80	7.95	7.25	0.75	1.21	16.20	0.26	1.02	0.09	0.85	98.76
B4-0127.0	71.50	14.40	2.11	0.61	4.69	1.63	2.33	0.02	0.17	0.06	1.70	99.22
B4-0162.0	64.60	15.40	2.37	1.46	3.28	1.93	7.25	0.13	0.48	0.08	1.70	98.68
B4-0188.0	66.80	14.70	4.10	1.10	3.63	1.29	5.09	0.14	0.43	0.08	1.77	99.13
B4-0203.0	69.00	15.20	1.83	1.47	1.25	2.08	6.19	0.11	0.47	0.08	1.70	99.38
B4-0205.0	69.40	16.40	0.52	1.01	0.60	3.43	4.58	0.07	0.48	0.08	2.39	98.96
B4-0238.2	69.80	13.80	3.56	1.37	2.25	2.16	2.42	0.10	0.40	0.11	3.16	99.13
B4-0238.3	56.70	14.80	8.98	3.36	1.67	2.21	4.96	0.19	0.46	0.11	6.85	100.3[illegible]

BECK — 2

WHOLE ROCK ANALYSIS

ALUMINA ALTERATION

SAMPLE ID	T1	T2	T3	T4	T5	F.A.	F.B.	F.C.	F.S.	F.K.	F'.K.	F.F.	F.H.
B2AS032			0.62	-4.19		-4.19	32.51	0.72	0.54	0.47	-1.68	3.86	0.08
B2AS058			0.54	-7.63		-7.63	24.20	0.70	0.68	0.30	-1.20	4.36	0.17
B2AS068			0.70	-4.51	0.76	-4.51	15.47	2.18	1.09	0.41	-0.34	1.86	0.24
B2AS105			0.55	-4.06		-4.06	16.44	0.91	1.03	0.37	-0.94	4.38	0.20

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[redacted] ANALYSIS

PROTEOLYTIC ACTIVITY

SAMPLE ID	T1	T2	T3	T4	T5	F.A.	F.B.	F.C.	F.S.	F.K.	F.N.	F.F.	F.H.
B2AS008				-1.66		-1.66	19.48	0.47	0.86	0.41	-2.32	3.03	0.04
B2AS022				-3.00		-3.00	21.00	0.39	0.78	0.35	-3.38	1.51	0.06
B2AS023				-1.16		-1.16	21.86	0.31	0.78	0.34	-3.34	3.60	0.09
B2AS024				-1.45		-1.45	21.51	0.30	0.55	0.30	-4.42	2.20	0.08
B2AS025				-1.12		-1.12	18.61	0.35	0.90	0.38	-2.90	2.63	0.07
B2AS028				-1.22		-1.22	20.18	0.34	0.82	0.27	-3.95	1.64	0.05
B2AS030				-2.71		-2.71	27.63	0.42	0.68	0.10	-1.26	8.31	0.40
B2AS044				-2.49		-2.49	23.07	0.84	0.78	0.26	-1.96	3.37	0.12
B2AS045				-1.26		-1.26	22.24	0.96	0.81	0.40	-1.83	2.04	0.12
B2AS051				-2.94		-2.94	19.22	0.71	0.91	0.21	-2.10	3.35	0.12
B2AS054				-2.64		-2.64	22.97	0.62	0.76	0.34	-2.34	3.52	0.12
B2AS055			0.59	-1.92		-1.92	19.07	1.11	0.91	0.55	-1.32	2.42	0.10
B2AS057				-1.88		-1.88	23.22	0.90	0.78	0.23	-2.32	1.51	0.09
B2AS059				-1.70		-1.70	23.44	0.75	0.77	0.27	-2.36	4.14	0.15
B2AS075				-1.36		-1.36	14.84	0.45	1.10	0.53	-1.92	1.30	0.11
B2AS082				-1.92		-1.92	19.18	0.31	0.78	0.33	-2.14	1.18	0.04
B2AS084				-2.03		-2.03	20.36	0.46	0.82	0.25	-3.60	2.56	0.08
B2AS087		5.18		-1.21		-1.21	21.60	0.26	0.76	0.35	-3.65	3.17	0.03
B2AS093				-2.80		-2.80	18.57	0.40	0.87	0.34	-2.67	1.83	0.06
B2AS101				-1.65		-1.65	21.69	0.41	0.80	0.20	-3.26	5.38	0.06
B2AS107				-1.86		-1.86	18.88	0.14	0.84	0.24	-4.39	4.28	0.07
B2AS108				-3.23		-3.23	20.17	1.15	0.87	0.17	-2.26	2.60	0.18
B2AS109				-1.57		-1.57	22.10	0.90	0.81	0.23	-2.65	1.63	0.11
B2AS122			0.51	-3.16		-3.16	20.16	0.79	0.86	0.39	-1.56	3.61	0.11
B2AS125				-3.28		-3.28	19.94	0.93	0.87	0.22	-2.24	4.85	0.14

WHOLE ROCK ANALYSIS

PROPYLEYIZATION

SAMPLE ID	T1	T2	T3	T4	T5	F.A.	F.B.	F.C.	F.S.	F.K.	F'.K.	F.F.	F.H.
B2AS129			0.53	-2.87		-2.87	22.43	0.79	0.80	0.35	-1.36	4.49	0.10
B2AS130				-3.14		-3.14	21.90	0.79	0.79	0.38	-1.89	2.63	0.11
B2AS131				-1.97		-1.97	22.19	1.12	0.80	0.22	-2.83	1.82	0.14
B2AS132				-1.56		-1.56	19.36	0.24	0.86	0.40	-3.10	6.46	0.17
B2AS141				-2.34		-2.34	23.63	0.63	0.73	0.31	-2.75	2.03	0.09

HECK

WHOLE ROCK ANALYSIS

SERICITIZATION

SAMPLE ID	T1	T2	T3	T4	T5	F.A.	F.B.	F.C.	F.S.	F.K.	F'.K.	F.F.	F.H.
B2AS049		9.26	0.64	-1.64		-1.64	16.90	0.09	0.89	1.08	4.31	11.09	0.08
B2AS066		8.29	0.57	-2.39		-2.39	15.98	0.07	0.92	0.93	9.89	4.79	0.10
B2AS096		10.15	0.65	-3.65		-3.65	13.47	0.09	1.12	0.80	2.68	10.87	0.19

BECK - - - - 2

WHOLE ROCK ANALYSIS

SILICATE IRON FORMATION

SAMPLE ID	T1	T2	T3	T4	T5	F.A.	F.B.	F.C.	F.S.	F.K.	F'.K.	F.F.	F.H.
B2A8047		5.91		-14.66	0.91	-14.66	30.71	0.15	0.49	0.11	-0.76	46.58	1.07

SECTION 2

WHOLE ROCK ANALYSIS

SILICIFICATION

SAMPLE ID	T1	T2	T3	T4	T5	F.A.	F.B.	F.C.	F.S.	F.K.	F'.K.	F.F.	F.H.
B2AS069	79.10			-1.60		-1.60	10.20	0.54	1.68	0.28	-1.33	4.32	0.44
B2AS071	77.00		0.78	-5.36	0.79	-5.36	13.68	1.71	1.14	0.66	1.13	1.10	0.19
B2AS073	75.20			-1.78		-1.78	14.65	0.59	1.11	0.40	-2.12	1.12	0.10
B2AS077	75.50		0.63	-5.02		-5.02	15.78	1.18	1.04	0.45	-0.62	2.35	0.22
B2AS078	77.40		0.79	-7.96	0.88	-7.96	14.57	1.42	1.00	0.69	11.70	0.39	0.16
B2AS090	77.30		0.76	-9.73	0.50	-9.73	14.96	1.46	1.00	0.34	0.83	2.82	0.56
B2AS091	76.20	6.94		-1.65		-1.65	13.85	0.16	1.10	0.30	-1.24	2.39	0.05
B2AS092	79.30		0.55	-6.75	0.82	-6.75	13.83	1.70	1.16	0.24	-0.39	4.73	0.39
B2AS104	79.00		0.81	-7.24	0.64	-7.24	13.10	1.55	1.13	0.63	5.75	0.84	0.19
B2AS110	76.70		0.77	-5.95	0.95	-5.95	15.32	1.86	1.01	0.68	2.55	0.82	0.09
B2AS112	76.40		0.51	-5.45	0.62	-5.45	16.21	2.71	1.07	0.15	-0.47	5.73	0.33
B2AS124	77.00		0.70	-4.83	0.98	-4.83	14.21	2.19	1.13	0.55	-0.01	0.96	0.20
B2AS134	76.40			-1.97		-1.97	15.78	0.89	1.01	0.21	-2.96	1.01	0.04

B E C K — — — — 2

WHOLE ROCK ANALYSIS

UNALTERED ROCK

SAMPLE ID	T1	T2	T3	T4	T5	F.A.	F.B.	F.C.	F.S.	F.K.	F'.K.	F.F.	F.H.
B2AS003						16.95	36.81	1.58	0.81	0.20	-1.64	1.02	0.08
B2AS007						0.65	28.99	0.26	0.63	0.17	-4.07	3.10	0.13
B2AS011						1.36	19.29	0.87	0.96	0.26	-3.07	0.96	0.04
B2AS013						5.58	28.76	0.32	0.73	0.12	-3.92	3.01	0.17
B2AS015						3.73	29.45	0.35	0.69	0.05	-3.43	6.47	0.17
B2AS016						1.28	29.94	0.41	0.63	0.11	-3.92	4.56	0.09
B2AS018						-0.69	18.63	0.27	0.91	0.35	-3.27	2.76	0.09
B2AS020						-0.17	20.95	0.48	0.82	0.30	-3.86	1.76	0.06
B2AS021						0.23	27.45	0.21	0.68	0.25	-2.57	18.99	0.23
B2AS026						0.20	20.80	0.35	0.79	0.29	-4.62	1.05	0.03
B2AS063		7.00				-0.01	15.99	0.16	0.99	0.41	-2.48	3.34	0.04
B2AS064		6.06				0.28	24.73	0.26	0.73	0.39	-2.90	4.31	0.05
B2AS072						-0.45	24.04	0.96	0.76	0.17	-3.25	1.49	0.07
B2AS076	76.00	5.79				-0.40	13.47	0.20	1.16	0.23	-3.13	2.69	0.05
B2AS081						0.22	23.10	0.29	0.76	0.35	-3.45	2.40	0.07
B2AS085						-0.34	20.03	0.23	0.82	0.24	-4.76	1.88	0.05
B2AS097						-0.23	20.67	0.32	0.80	0.13	-5.35	9.83	0.04
B2AS099						1.40	22.86	0.26	0.78	0.36	-3.68	2.59	0.08
B2AS100						0.93	27.71	0.20	0.67	0.02	-4.31	14.37	0.16
B2AS123A						-0.43	21.83	0.21	0.80	0.21	-3.71	6.98	0.13
B2AS1233	75.70					-0.36	17.83	4.04	1.07	0.23	-1.22	0.59	0.04
B2AS1438			0.52			4.99	28.33	1.58	0.79	0.27	-1.11	2.45	0.20
B2AS144						-0.64	19.29	0.27	0.86	0.18	-4.62	4.70	0.06
B2AS145						-0.40	28.46	0.23	0.63	0.37	-3.30	8.33	0.12

BECK - - - - 2

WHOLE ROCK ANALYSIS

SERICITIZATION + ALUMINA ALTERATION

SAMPLE ID	T1	T2	T3	T4	T5	F.A.	F.B.	F.C.	F.S.	F.K.	F'.K.	F.F.	F.H.
B2AS114			0.69	-5.01		-5.01	16.21	0.67	0.97	0.66	1.22	1.51	0.09
B2AS116			0.93	-9.95	0.19	-9.95	14.49	0.13	0.97	0.60	11.48	4.51	4.08
B2AS139			0.85	-4.47	0.62	-4.47	17.98	2.55	0.93	0.71	0.04	2.01	0.17

BECK

WHOLE ROCK ANALYSIS

ALUMINA ALTERATION (MAFIC)

SAMPLE ID	T1	T2	T3	T4	T5	F.A.	F.B.	F.C.	F.S.	F.K.	F'.K.	F.F.	F.H.
B2AS037			0.54	-3.31		-3.31	22.06	1.63	0.80	0.36	-1.29	1.52	0.09
B2AS042				-5.11		-5.11	26.48	0.64	0.63	0.34	-2.46	1.86	0.08
B2AS052				-4.68		-4.68	23.16	1.03	0.75	0.17	-2.02	4.78	0.13
B2AS053				-3.74		-3.74	19.08	0.54	0.85	0.42	-1.67	4.90	0.06
B2AS056				-7.52		-7.52	24.17	0.58	0.66	0.20	-2.58	3.90	0.21
B2AS060				-8.39		-8.39	20.24	0.38	0.76	0.29	-1.22	2.52	0.18
B2AS061			0.70	-3.89	0.97	-3.89	17.67	1.68	0.97	0.49	-0.53	1.89	0.16
B2AS070				-6.43		-6.43	19.99	0.58	0.81	0.14	-2.24	3.16	0.18
B2AS080		6.44		-7.53		-7.53	20.21	0.13	0.76	0.29	-1.53	8.10	0.16
B2AS088		9.49		-18.60		-18.60	27.98	0.14	0.52	0.10	0.56	7.73	0.30
B2AS089				-4.43		-4.43	20.80	0.76	0.82	0.22	-2.17	3.58	0.15
B2AS103				-5.33		-5.33	22.94	0.40	0.69	0.41	-1.79	2.29	0.05
B2AS106				-5.71		-5.71	20.83	0.45	0.79	0.15	-2.29	3.13	0.19
B2AS111				-3.57		-3.57	19.57	0.79	0.87	0.27	-2.17	2.79	0.11
B2AS120				-6.50		-6.50	17.95	0.67	0.90	0.20	-1.54	3.67	0.27
B2AS126				-3.77		-3.77	16.34	0.60	1.02	0.35	-1.36	4.65	0.19
B2AS127				-3.81		-3.81	21.89	0.51	0.80	0.09	-2.30	3.22	0.21
B2AS146				-3.40		-3.40	19.86	0.50	0.84	0.34	-2.34	2.60	0.13

B E C K - 1 & 2

STATISTICAL RESULTS

C O P P E R (<80 PPM)

SUM OF ALL SAMPLES:	7221.00
SUM OF ALL SQUARES:	243695.50
SUM OF CROSS-PRODUCTS:	350474.25
ARITHEMATIC MEAN:	18.85
STANDARD DEVIATION:	16.78
VARIABLE VARIANCE:	281.55

Z I N C

SUM OF ALL SAMPLES:	15945.00
SUM OF ALL SQUARES:	1082291.50
SUM OF CROSS-PRODUCTS:	68816.00
ARITHEMATIC MEAN:	41.63
STANDARD DEVIATION:	33.10
VARIABLE VARIANCE:	1095.48

L E A D

SUM OF ALL SAMPLES:	3548.00
SUM OF ALL SQUARES:	76318.00
SUM OF CROSS-PRODUCTS:	199579.50
ARITHEMATIC MEAN:	9.26
STANDARD DEVIATION:	10.67
VARIABLE VARIANCE:	113.74

BECK - 132

CORRELATIONS

COPPER (<80 PPM)

CU-ZN=	0.23
CU-PB=	0.03
ZN-PB=	0.38

B E C K - 1 & 2

C O P P E R (<80 PPM)

SAMPLES OF ANOMALIC VALUE

C O P P E R >= MEAN + 1 STD. DEV. (35.63 PPM)

SAMPLE ID	ASSAY PPM
B1AS026A	64
B1AS050	50
B1AS056	57
B1AS093	72
B1AS106	55
B1AS131	40
B1AS133	71
B1AS139	39
B1AS148	60
B1AS152	42
B1AS153	65
B1AS155	37
B1AS156	46
B1AS171	67
B1AS175	48
B1AS184	50
B1AS187	66
B1AS212	55
B1AS214	69
B1AS217	47
B1AS218	73
B1AS221	60
B1AS226	56
B1AS231	46
B1AS243	74
B1BS004	54
B1BS012	42
B2AS003	42
B2AS004	52
B2AS005	56
B2AS007	55
B2AS015	63
B2AS016	50
B2AS021	49
B2AS034	37
B2AS035	61
B2AS045	75
B2AS047	67
B2AS048	68
B2AS050	51
B2AS051	36
B2AS054	44
B2AS060	46
B2AS065	61
B2AS083	42
B2AS086	46
B2AS087	38
B2AS094	55
B2AS101	44
B2AS105	49

BECK - 1 & 2

COPPER (<80 PPM)

SAMPLES OF ANOMALIC VALUE

COPPER >= MEAN + 1 STD. DEV.
(35.63 PPM)

SAMPLE ID	ASSAY PPM
BE2AS107	65
BE2AS144	56
BE2AS111	40
BE2AS115	41
BE2AS114	64
BE2AS121	41
BE2AS145	53
BE2AS206	37

B E C K — 1 & 2

C O P P E R (<80 PPM)

SAMPLES OF ANOMALIC VALUE

C O P P E R >= MEAN + 2 STD. DEV.
(52.41 PPM)

SAMPLE ID	ASSAY PPM
B1AS0256A	64
B1AS0263	72
B1AS0963	55
B1AS1063	57
B1AS1363	51
B1AS1483	65
B1AS1553	57
B1AS1713	66
B1AS1817	65
B1AS2112	65
B1AS2211	67
B1AS2218	65
B1AS2221	67
B1AS2223	65
B1AS2243	67
B1BS0045	65
B2AS0057	57
B2AS0075	55
B2AS0135	55
B2AS0347	56
B2AS0478	67
B2AS0485	66
B2AS0547	65
B2AS0697	65
B2AS1074	55
B2AS1234	65
B2AS1345	65

B E C K - 1 & 2

C O P P E R (<80 PPM)

SAMPLES OF ANOMALIC VALUE

C O P P E R >= MEAN + 3 STD. DEV.
(69.19 PPM)

SAMPLE ID	ASSAY PPM
B1AS093	72
B1AS133	71
B1AS218	73
B1AS243	74
B2AS045	75

B E C K - 1 & 2

C O P P E R (<80 PPM)

SAMPLES OF ANOMALIC VALUE (EXTERNAL TO STUDIED POP.)

C O P P E R >= MEAN + 1 STD. DEV. (35.63 PPM)

SAMPLE ID	ASSAY PPM
B1AS017	120
B1AS038	300
B1AS079	160
B1AS099	120
B1AS105	110
B1AS126	370
B1AS145	500
B1AS150	190
B1AS181	270
B1AS186B	160
B1AS191	91
B1AS192	110
B1AS220	89
B1AS223	150
B1AS234	130
B2AS017	86
B2AS041	350
B2AS043	130
B2AS052	180
B2AS059	420
B2AS064	160
B2AS069	120
B2AS070	140
B2AS072	130
B2AS106	180
B2AS108	230
B2AS109	110
B2AS120	290
B2AS147	140

BECK - 1 & 2

COPPER (<80 PPM)

SAMPLES OF ANOMALIC VALUE
(EXTERNAL TO STUDIED POP.)

COPPER >= MEAN + 2 STD. DEV.
(52.41 PPM)

SAMPLE ID	ASSAY PPM
B1AS017	120
B1AS007	300
B1AS009	160
B1AS012	110
B1AS014	110
B1AS015	170
B1AS018	190
B1AS018 B	270
B1AS019	160
B1AS022	190
B1AS023	110
B1AS033	180
B1AS033	150
B2AS017	330
B2AS043	330
B2AS045	330
B2AS055	680
B2AS066	530
B2AS067	310
B2AS070	180
B2AS071	420
B2AS071	160
B2AS072	120
B2AS073	140
B2AS073	130
B2AS074	180
B2AS074	330
B2AS076	210
B2AS079	190
B2AS114	140

BECK -- 1 & 2

COPPER (<80 PPM)

SAMPLES OF ANOMALIC VALUE
(EXTERNAL TO STUDIED POP.)

COPPER >= MEAN + 3 STD. DEV.
(69.19 PPM)

SAMPLE ID	ASSAY PPM
B1AS0137	120
B1AS0138	300
B1AS0139	160
B1AS0905	122
B1AS1206	110
B1AS1245	137
B1AS1450	509
B1AS1516	1907
B1AS1516B	217
B1AS1689	691
B1AS1912	110
B1AS2220	185
B1AS2233	1205
B1AS2234	1213
B2AS0147	1856
B2AS0413	3538
B2AS0455	1148
B2AS0556	1426
B2AS0649	1160
B2AS0670	1140
B2AS0702	1138
B2AS1008	1238
B2AS1111	2310
B2AS1144	1190
B2AS1147	1240

B E C K — 1 & 2

STATISTICAL RESULTS

Z I N C (<150 PPM)

SUM OF ALL SAMPLES:	15894.00
SUM OF ALL SQUARES:	891116.50
SUM OF CROSS-PRODUCTS:	113352.00
ARITHEMATIC MEAN:	39.24
STANDARD DEVIATION:	25.73
VARIABLE VARIANCE:	661.80

C O P P E R

SUM OF ALL SAMPLES:	12260.00
SUM OF ALL SQUARES:	1495686.50
SUM OF CROSS-PRODUCTS:	527036.25
ARITHEMATIC MEAN:	30.27
STANDARD DEVIATION:	52.76
VARIABLE VARIANCE:	2783.56

L E A D

SUM OF ALL SAMPLES:	3676.00
SUM OF ALL SQUARES:	68958.00
SUM OF CROSS-PRODUCTS:	172245.50
ARITHEMATIC MEAN:	9.08
STANDARD DEVIATION:	9.39
VARIABLE VARIANCE:	88.10

BECK - 1 & 2

CORRELATIONS

ZINC (<150 PPM)

ZN-CU:	0.08
ZN-PB:	0.29
CU-PB:	0.01

B E C K - 1 & 2
****

Z I N C (<150 PPM)
****

SAMPLES OF ANOMALIC VALUE
****

Z I N C >= MEAN + 1 STD. DEV.
(64.97 PPM)

SAMPLE ID	ASSAY PPM
B1AS010	80
B1AS052	95
B1AS053	84
B1AS058	81
B1AS090	65
B1AS100	75
B1AS105	72
B1AS114	95
B1AS124	140
B1AS126	84
B1AS129	130
B1AS134	72
B1AS136	69
B1AS148	91
B1AS152	94
B1AS153	84
B1AS155	77
B1AS156	80
B1AS157	97
B1AS162	93
B1AS163	68
B1AS165	66
B1AS166	81
B1AS169	85
B1AS171	75
B1AS177	120
B1AS180	65
B1AS182	72
B1AS184	130
B1AS187	86
B1AS189	120
B1AS192	110
B1AS198	70
B1AS211	110
B1AS212	79
B1AS214	69
B1AS217	93
B1AS218	78
B1AS221	75
B1AS223	120
B1AS224	120
B1AS226	72
B1BS001	82
B1BS007	78
B1BS009	66
B1BS012	92
B2AS003	74
B2AS030	90
B2AS034	66
B2AS049	100

B E C K - 1 & 2

Z I N C (<150 PPM)

SAMPLES OF ANOMALIC VALUE

Z I N C >= MEAN + 1 STD. DEV.
(64.97 PPM)

SAMPLE ID	ASSAY PPM
B2AS062	75
B2AS064	97
B2AS065	97
B2AS067	97
B2AS081	84
B2AS089	79
B2AS091	97
B2AS117	101
B2AS145	109
B2AS147	76
B2AS201	105
B2AS211	84
B2AS212	

B E C K - 1 & 2

Z I N C (<150 PPM)

SAMPLES OF ANOMALIC VALUE

Z I N C >= MEAN + 2 STD. DEV.
(90.70 PPM)

SAMPLE ID	ASSAY PPM
B1AS052	95
B1AS114	95
B1AS129	140
B1AS148	130
B1AS152	91
B1AS157	94
B1AS162	93
B1AS177	120
B1AS184	130
B1AS189	120
B1AS192	110
B1AS211	110
B1AS217	93
B1AS223	120
B1AS224	120
B1BS012	92
B2AS049	100
B2AS065	99
B2AS117	91
B2AS145	100
B2AS147	91

B E C K - 1 & 2

Z I N C (<150 PPM)

SAMPLES OF ANOMALIC VALUE

Z I N C >= MEAN + 3 STD. DEV.
(116.42 PPM)

SAMPLE ID	ASSAY PPM
B1AS124	140
B1AS129	130
B1AS177	130
B1AS184	130
B1AS189	120
B1AS223	120
B1AS224	120

B E C K - 1 & 2

Z I N C (<150 PPM)

SAMPLES OF ANOMALIC VALUE
(EXTERNAL TO STUDIED POP.)

Z I N C >= MEAN + 1 STD. DEV.
(64.97 PPM)

SAMPLE ID	ASSAY PPM
B1AS011	320
B1AS127	190
B1AS149	150
B1AS200	200
B1AS231	180
B1AS233	150
B2AS023	150
B2AS041	330

B E C K — 1 & 2

Z I N C (<150 PPM)

SAMPLES OF ANOMALIC VALUE (EXTERNAL TO STUDIED POP.)

Z I N C >= MEAN + 2 STD. DEV.
(90.7o PPM)

SAMPLE ID	ASSAY PPM
B1AS011	320
B1AS127	190
B1AS149	150
B1AS200	200
B1AS223	180
B1AS226	150
B2AS033	150
B2AS041	330

B E C K - 1 & 2

Z I N C (<150 PPM)

SAMPLES OF ANOMALIC VALUE
(EXTERNAL TO STUDIED POP.)

Z I N C >= MEAN + 3 STD. DEV.
(116.42 PPM)

SAMPLE ID	ASSAY PPM
B1AS011	320
B1AS127	190
B1AS149	150
B1AS200	200
B1AS231	180
B1AS233	150
B2AS023	150
B2AS041	330

B E C K - 1 & 2

STATISTICAL RESULTS

L E A D (< 16 PPM)

SUM OF ALL SAMPLES:	2706.00
SUM OF ALL SQUARES:	23562.00
SUM OF CROSS-PRODUCTS:	116791.50
ARITHEMATIC MEAN:	7.14
STANDARD DEVIATION:	3.35
VARIABLE VARIANCE:	11.22

C O P P E R

SUM OF ALL SAMPLES:	11598.50
SUM OF ALL SQUARES:	1444548.25
SUM OF CROSS-PRODUCTS:	497597.25
ARITHEMATIC MEAN:	30.60
STANDARD DEVIATION:	53.69
VARIABLE VARIANCE:	2882.54

Z I N C

SUM OF ALL SAMPLES:	14940.00
SUM OF ALL SQUARES:	909494.50
SUM OF CROSS-PRODUCTS:	93944.00
ARITHEMATIC MEAN:	39.42
STANDARD DEVIATION:	29.12
VARIABLE VARIANCE:	848.06

BECK - 1 & 2

CORRELATIONS

LEAD (< 16 PPM)

PB-CU: 0.16

PB-ZN: 0.27

CU-ZN: 0.07

B E C K - 1 & 2

L E A D (< 16 PPM)

SAMPLES OF ANOMALIC VALUE

L E A D >= MEAN + 1 STD. DEV.
(10.49 PPM)

SAMPLE ID	ASSAY PPM
B1AS001	14
B1AS017	14
B1AS018	14
B1AS019	14
B1AS036	14
B1AS060	14
B1AS064	14
B1AS075	14
B1AS076	14
B1AS085	14
B1AS1O9	14
B1AS112	14
B1AS114	14
B1AS145	14
B1AS155	14
B1AS175	14
B1AS178	14
B1AS180	14
B1AS187	14
B1AS190	14
B1AS191	14
B1AS199	14
B1AS201	14
B1AS211	14
B1AS214	14
B1AS234	14
B2AS006	14
B2AS010	14
B2AS014	14
B2AS016	14
B2AS017	14
B2AS022	14
B2AS024	14
B2AS025	14
B2AS045	14
B2AS055	14
B2AS068	14
B2AS098	14
B2AS1O8	14
B2AS112	14
B2AS207	14
B2AS209	14

BECK - 1 & 2

LEAD (< 16 PPM)

SAMPLES OF ANOMALIC VALUE

LEAD >= MEAN + 1 STD. DEV. (10.49 PPM)

SAMPLE ID	ASSAY PPM
B2AS211	14
B2AS212	14

BECK - 1 & 2

LEAD (< 16 PPM)

SAMPLES OF ANOMALIC VALUE

LEAD >= MEAN + 2 STD. DEV.
(13.84 PPM)

SAMPLE ID	ASSAY PPM
B1AS001	14
B1AS017	14
B1AS019	14
B1AS076	14
B1AS078	14
B1AS080	14
B1AS124	14
B1AS177	14
B1AS179	14
B1AS191	14
B1AS198	14
B1AS201	14
B1AS211	14
B1AS218	14
B2AS013	14
B2AS030	14
B2AS147	14
B2AS207	14
B2AS209	14
B2AS212	14

B E C K - 1 & 2
****

L E A D (< 16 PPM)
****

SAMPLES OF ANOMALIC VALUE
****
(EXTERNAL TO STUDIED POP.)

L E A D >= MEAN + 1 STD. DEV.
(10.49 PPM)

SAMPLE ID	ASSAY PPM
B1AS010	20
B1AS011	100
B1AS029	16
B1AS030	16
B1AS072	18
B1AS086	16
B1AS091	16
B1AS114	64
B1AS115	34
B1AS116	34
B1AS118	16
B1AS120	16
B1AS130	50
B1AS164	84
B1AS165	60
B1AS166	78
B1AS167	74
B1AS168	36
B1AS169	30
B1AS170	44
B1AS176	22
B1AS177	46
B1AS188	20
B1AS189	20
B1AS192	16
B1AS197	16
B1AS212	20
B1AS221	20
B1AS233	120
B2AS041	18
B2AS048	20
B2AS067	22
B2AS074	46
B2AS138	24

BECK - 1 & 2

LEAD (< 16 PPM)

SAMPLES OF ANOMALIC VALUE
(EXTERNAL TO STUDIED POP.)

LEAD >= MEAN + 2 STD. DEV.
(13.84 PPM)

SAMPLE ID	ASSAY PPM
B1ASO10	20
B1AASSO119	106
B1AASSO23	16
B1AASSO3	16
B1AASSO326	18
B1AASSO786	16
B1AASSO91	16
B1AASS114	64
B1AASS1145	34
B1AASS1156	34
B1AASS1168	16
B1AASS11180	16
B1AASS11200	150
B1AASS11604	408
B1AASS11656	678
B1AASS11667	734
B1AASS11678	604
B1AASS1169	342
B1AASS1170	426
B1AASS1176	426
B1AASS1178	206
B1AASS1189	216
B1AASS11992	166
B1AASS12072	112
B1AASS12213	1
BB12AASSS20431	80
BB2AASSO487	122
BB2AASSO667	246
BB2AASSO748	24
BB2AASS13	2

B E C K - 1 & 2

L E A D (< 16 PPM)

SAMPLES OF ANOMALIC VALUE

L E A D >= MEAN + 3 STD. DEV.
(17.19 PPM)

SAMPLE ID	ASSAY PPM

B E C K - 1 & 2

L E A D (< 16 PPM)

SAMPLES OF ANOMALIC VALUE
(EXTERNAL TO STUDIED POP.)

L E A D >= MEAN + 3 STD. DEV.
(17.19 PPM)

SAMPLE ID	ASSAY PPM
B1ASO10	20
B1ASO11	100
B1ASO72	18
B1AS1145	64
B1AS1156	34
B1AS1163	44
B1AS1304	58
B1AS1645	40
B1AS1656	68
B1AS1667	76
B1AS1678	46
B1AS1690	64
B1AS1706	42
B1AS1778	42
B1AS1878	66
B1AS1892	00
B1AS2121	00
B1AS2233	00
B1AS2024	1 20
B2AS0468	18
B2AS0674	02
B2AS0738	64
B2AS1338	42

0.00*

850.25+
1,067.50+
30.00+
2,808.00+
2,544.00+
1,000.00+
1077.15 ~~1,644.75+~~
235.40+
160.00 340.00+
0 ~~84.50+~~
1,005.00+
178.30+
40.00+
~~12,517.70*~~
11,685.60

~~1,280.55~~

212

0.00*

850.25+
1,067.50+
5,472.00+
~~5,472.00+~~
~~5,472.00-~~
3,244.75+
235.40+
424.50+
1,223.30+
12,517.70*

0.00*

0.00*

0.00*

0.00*

X-RAY ASSAY LABORATORIES LIMITED

1885 LESLIE STREET, DON MILLS, ONTARIO M3B 3J4

PHONE 416-445-5755 TELEX 06-986947

INVOICE 15558 REF. FILE 11208-L3 19-AUG-82

TO: UMEX CORPORATION LIMITED
ATTN: DR. T. VERBEEK, VICE PRESIDENT
1935 LESLIE STREET
DON MILLS, ONTARIO M3B 2M3

CUSTOMER NO. 571

DATE SUBMITTED
29-JUL-82

126 ROCKS

WERE ANALYSED.

		METHOD	CODE	UNIT COST	AMOUNT
126	WHOLE ROCK <301		6, 0	20.50	2583.00
126	PREP. ROCK		1, 0	2.50	315.00
					$ 2898.00

Beck 7708

TERMS NET 30 DAYS 1.5% PER MONTH INTEREST ON ACCOUNT OVER 30 DAYS

X-RAY ASSAY LABORATORIES LIMITED

1885 LESLIE STREET, DON MILLS, ONTARIO M3B 3J4

PHONE 416-445-5755 TELEX 06-986947

INVOICE 15559 REF. FILE 11229-L3 19-AUG-82

TO: UMEX CORPORATION LIMITED
ATTN: DR. T. VERBEEK, VICE PRESIDENT
1935 LESLIE STREET
DON MILLS, ONTARIO M3B 2M3

CUSTOMER NO. 571

DATE SUBMITTED
30-JUL-82

96 ROCKS

WERE ANALYSED.

	METHOD	CODE	UNIT COST	AMOUNT
96	WHOLE ROCK <101	6, 0	24.00	2304.00
96	PREP. ROCK	1, 0	2.50	240.00
				$ 2544.00

Beck 7708

TERMS NET 30 DAYS 1.5% PER MONTH INTEREST ON ACCOUNT OVER 30 DAYS

X-RAY ASSAY LABORATORIES LIMITED

1885 LESLIE STREET, DON MILLS, ONTARIO M3B 3J4

PHONE 416-445-5755 TELEX 06-986547

INVOICE 15468 REF. FILE 11264-M3 11-AUG-82

TO: UNEX CORPORATION LIMITED
ATTN: J.J. LEFEBVRE
1903 LESLIE STREET
DON MILLS, ONTARIC M3B 2M3

CUSTOMER NO. 571

DATE SUBMITTED
5-AUG-82

2 PULPS ON HAND RE: W.O.#11123-RPT.#15411

WERE ANALYSED.

	METHOD	CODE	UNIT COST	AMOUNT
2 CU %	XRF	5, 0	6.00	12.00
2 ZN %	XRF	5, 0	7.00	14.00
MINIMUM CHARGE				30.00

INVOICE PLEASE PAY THIS AMOUNT
Please

Beek 7708

TERMS NET 30 DAYS 1.5% PER MONTH INTEREST ON ACCOUNT OVER 30 DAYS

XRAL

X-RAY ASSAY LABORATORIES
LIMITED

1885 LESLIE STREET • DON MILLS ONTARIO M3B 3J4 • (416) 445-5755

VOICE TO:
UREX CORPORATION LIMITED
ATTN. R. DAVEY
1985 LESLIE STREET
DON MILLS, ONTARIO
M3B 2M3

COPY TO: SAME

SUBMITTED TO
UREX CORPORATION LIMITED
ATTN. R. DAVEY
1985 LESLIE STREET
DON MILLS, ONTARIO
M3B 2M3

16157 16157	15-OCT-82	11787 11787	22-SEP-82 22-SEP-82

TERMS
TERMS NET 30 DAYS TERMS NET 30 DAYS
1.5% PER MONTH INTEREST ON ACCOUNT OVER 30 DAYS

CLIENT'S P.O. NO.	CLIENT PROJECT NO.		TYPE OF SAMPLES SUBMITTED
			ROCK

NO. PKGS	SHIPPED VIA	WAY BILL NO.	SHIPPED FROM
1 BAG BAG	SELF		

	QUANTITY	DESCRIPTION	METHOD			AMOUNT
1.	17	WHOLE ROCK <1000	Whole Rock < 1000	6, 0, 0, 0, 0	17.50	297.50
2	17	PREPARATION ROCK	PREPARATION Rock	1, 0, 0, 0, 0	2.50	42.50
						$ 340.00
						-180.00
						160.00

340·00+
84·50+
424·50*

less 9 samples from D4

7708

SHIPPING CHARGES	CUSTOM BROKERAGE	TELEX	MINIMUM CHARGES
OTHER			SURCHARGE - RUSH SERVICE

TOTAL $ 340.00

TRIPLICATE COPY

XRAL

X-RAY ASSAY LABORATORIES
LIMITED

1885 LESLIE STREET • DON MILLS ONTARIO M3B 3J4 • (416) 445-5755

COPY TO.

ICE TO:

UNEX CORPORATION LIMITED
ATTN: R. CAVEN
1985 LESLIE STREET
DON MILLS, ONTARIO
M3B 2M3

MITTED TO.

UNEX CORPORATION LIMITED
ATTN: R. CAVEN
1985 LESLIE STREET
DON MILLS, ONTARIO
M3B 2M3

16215	20-OCT-82	11264	22-OCT-82

TERMS

TERMS NET 30 DAYS
1.5% PER MONTH INTEREST ON ACCOUNT OVER 30 DAYS

TS P.O. NO.	CLIENT PROJECT NO.		TYPE OF SAMPLES SUBMITTED
			PULP

# PKGS.	SHIPPED VIA	WAY BILL NO.	SHIPPED FROM
	R. POST C06111421		

QUANTITY	DESCRIPTION & CODE	ROCK CODE	UNIT PRICE	AMOUNT
13	AU FABCP	10, 7, 0, 0, 0	6.50	84.50
				$ 84.50

B4

7708

SHIPPING CHARGES	CUS. OM BROKERAGE	TELEX	MINIMUM CHARGES
OTHER			SURCHARGE - RUSH SERVICE

TOTAL $ 84.50

IPLICATE COPY

X-RAY ASSAY LABORATORIES LIMITED

1885 LESLIE STREET, DON MILLS, ONTARIO M3B 3J4

PHONE 416-445-5755 TELEX 06-986947

INVOICE 1596C REF. FILE 11616-83 24-SEP-82

TO: UMEX CORPORATION LIMITED
ATTN: R. CAVEN
1935 LESLIE STREET
DON MILLS, ONTARIO M3B 2M3

CUSTOMER NO. 571

DATE SUBMITTED
3-SEP-82

80 ROCKS

WERE ANALYSED.

	METHOD	CODE	UNIT COST	AMOUNT
80	WHOLE ROCK <100G	6, G	17.5G	1400.00
80	PREP. ROCK	1, G	2.5G	200.00
				$ 1600.00

Back

7708

TERMS NET 30 DAYS 1.5% PER MONTH INTEREST ON ACCOUNT OVER 30 DAYS

X-RAY ASSAY LABORATORIES LIMITED

1885 LESLIE STREET, DON MILLS, ONTARIO M3B 3J4

PHONE 416-445-5755 TELEX 06-986947

INVOICE 15961 REF. FILE 11621-A4 24-SEP-82

TO: UMEX CORPORATION LIMITED
ATTN: R. CAVEN
1935 LESLIE STREET
DON MILLS, ONTARIO M3B 2M3

CUSTOMER NO. 571

DATE SUBMITTED
3-SEP-82

255 ROCKS

WERE ANALYSED.

		METHOD	CODE	UNIT COST	AMOUNT
255	CU PPM	DCP	7, C	C.9C	229.5C
255	ZN PPM	DCP	7, C	C.9C	229.5C
255	PB PPM	DCP	7, C	C.9C	229.5C
255	DIGESTICN		7, C	1.25	318.7[illegible]
255	PREP. ROCK		1, C	2.5C	637.5C
					$ 1644.7[illegible]

Jan 28
sample of 34

Beck.

Total 1077.15

7708

TERMS NET 3C DAYS 1.5% PER MONTH INTEREST CN ACCCUNT CVER 3C DAYS

XRAL

X-RAY ASSAY LABORATORIES LIMITED

1885 LESLIE STREET • DON MILLS ONTARIO M3B 3J4 • (416) 445-5755

COPY TO:

CE TO:

UNEX CORPORATION LIMITED
ATTN: R CAVEN
1935 LESLIE STREET
DON MILLS, ONTARIO
M3B 2N3

TTED TO:

UNEX CORPORATION LIMITED
ATTN: R CAVEN
1935 LESLIE STREET
DON MILLS, ONTARIO
M3B 2N3

CUSTOMER NO. 571

INVOICE NO.	INVOICE DATE	PROFORMA NO.	PROFORMA DATE
16457	12-NOV-82	12196	2-NOV-82

TERMS

TERMS NET 30 DAYS
1.5% PER MONTH INTEREST ON ACCOUNT OVER 30 DAYS

S.P.O. NO.	CLIENT PROJECT NO.		TYPE OF SAMPLES SUBMITTED
			ROCK COARSE PULP PULP

PKGS	SHIPPED VIA	WAY BILL NO.	SHIPPED FROM
BAG			

9	WHOLE ROCK <1000		6, 0, 0, 0, 0	17.50	157.50
10	DIGESTION		7, 0, 0, 0, 0	1.25	12.50
9	CO PPM	DCP	7, 0, 0, 0, 0	0.90	8.10
10	NI PPM	DCP	7, 0, 0, 0, 0	0.90	9.00
8	CU PPM	DCP	7, 0, 0, 0, 0	0.90	7.20
9	ZN PPM	DCP	7, 0, 0, 0, 0	0.90	8.10
10	PB PPM	DCP	7, 0, 0, 0, 0	0.90	9.00
9	PREPARATION ROCK		1, 0, 0, 0, 0	2.50	22.50
1	PREPARATION COARSE PULPS		1, 0, 0, 0, 0	1.50	1.50

7708

SUB-TOTAL $ 235.40

SHIPPING CHARGES	CUSTOM BROKERAGE	TELEX	MINIMUM CHARGES
OTHER			SURCHARGE - RUSH SERVICE

TOTAL $ 235.40

ORIGINAL INVOICE

MEX INC. | Nº GJ232 | year 1992

DATE	WORDINGS	G/L ACCOUNT	COST ACCOUNT Nº	√	DEBIT	CREDIT
31		7708		✓	235 Ltd	
		1120-H		✓		235 Ltd

MADE BY: AC | AUDITED BY:

REMARKS

To offset invoice # 16457 from X-Ray against A/c #1120-4. Joint Venture Partners Receivable

AMENDED COPY

FROM: ALICE KWONG, UMEX INC., 1355 LESLIE ST. DON MILLS, ONTARIO M3B 2M3

DEPARTMENT:

X-RAY ASSAY LABORATORIES LTD.
1885 LESLIE STREET
DON MILLS, ONTARIO M3B 3J4

ATTENTION : GRACE PUN

DATE: NOV. 8, 1982

SUBJECT: STATEMENT OF YOUR ACCOUNT

MESSAGE

BALANCE DUE FROM YOU AS OF NOVEMBER 8, 1982 :

UMEX INVOICES :

	$
82-326	25.00
82-333	40.00
82-353	1197.00
	$1262.00

A Kwong

LESS :

X-RAY INVOICES :

	$
1615-7	340.00
16215	84.50
	424.50

NET TOTAL DUE FROM X-RAY $ 837.50

USE LOWER PORTION FOR REPLY

REPLY FROM

DATE

X-RAY ASSAY LABORATORIES
LIMITED

1885 LESLIE STREET • DON MILLS ONTARIO M3B 3J4 • (416) 445-5755

E TO: UMEX
UNEX CORPORATION LIMITED
ATTN: J.J. LEFEBVRE LEFEBVRE
1903 LESLIE STREET
DON MILLS, ONTARIO
M3B 2M3

COPY TO:

TTED TO:
UNEX CORPORATION LIMITED
ATTN. J.J. LEFEBVRE
1903 LESLIE STREET
DON MILLS, ONTARIO
M3B 2M3

CUSTOMER NO. 571

INVOICE NO.	INVOICE DATE	CUSTOMER P.O.	DATE SUBMITTED
14779	23-DEC-82	12544	20-DEC-82

TERMS

TERMS NET 30 DAYS
1.5% PER MONTH INTEREST ON ACCOUNT OVER 30 DAYS

S P.O. NO.	CLIENT PROJECT NO.		TYPE OF SAMPLES SUBMITTED
			ROCK WHOLE CORE SPLIT CORE PULP

PKGS	SHIPPED VIA	WAY BILL NO.	SHIPPED FROM
	SELF		

	ANALYSIS	DESCRIPTION	METHOD	UNIT PRICE	AMOUNT
1.	9	RARE EARTH GROUP	NA	20, 14, 0, 0, 0	90.00	810.00
2.	9	GD	NA	20, 14, 0, 0, 0	20.00	180.00
3.	2	PREPARATION ROCK		1, 0, 0, 0, 0	2.50	5.00
4.	3	PREP. WHOLE CORE		1, 0, 0, 0, 0	2.50	7.50
5.	1	PREP. SPLIT CORE		1, 0, 0, 0, 0	2.50	2.50

7708

SUB-TOTAL $ 1005.00

SHIPPING CHARGES	CUSTOM BROKERAGE	TELEX	MINIMUM CHARGES

OTHER	SURCHARGE - RUSH SERVICE

TOTAL $ 1005.00

RETURN THIS COPY WITH YOUR PAYMENT

X-RAY ASSAY LABORATORIES
LIMITED

1885 LESLIE STREET • DON MILLS ONTARIO M3B 3J4 • (416) 445-5755

COPY TO:

E TO:
UNEX CORPORATION LIMITED
ATTN. DR. T. VERBEEK, VICE PRESIDENT
1935 LESLIE STREET
DON MILLS, ONTARIO
M3B 2M3

TTED TO:
UNEX CORPORATION LIMITED
ATTN. DR. T. VERBEEK, VICE PRESIDENT
1935 LESLIE STREET
DON MILLS, ONTARIO
M3B 2M3

CUSTOMER NO. 571

[illegible]	[illegible]	[illegible]	[illegible]
82419	19-JAN-83	12571	22-DEC-82

TERMS

TERMS NET 30 DAYS
1.5% PER MONTH INTEREST ON ACCOUNT OVER 30 DAYS

S P.O. NO.	CUSTM PROJECT NO.		TYPE OF SAMPLES SUBMITTED
			SPLIT CORE

PKGS	SHIPPED VIA	WAY BILL NO	SHIPPED FROM
845	SELF		DON MILLS

5	WHOLE ROCK <1000		6, 0, 0, 0, 0	17.50	87.50
1	CU %	XRF	5, 0, 0, 0, 0	6.00	6.00
1	ZN %	XRF	5, 0, 0, 0, 0	7.00	7.00
1	PB %	XRF	5, 0, 0, 0, 0	7.00	7.00
10	DIGESTION		7, 0, 0, 0, 0	1.25	12.50
9	CU PPM	DCP	7, 0, 0, 0, 0	0.90	8.10
9	ZN PPM	DCP	7, 0, 0, 0, 0	0.90	8.10
10	AG PPM	DCP	7, 0, 0, 0, 0	0.90	9.00
9	PB PPM	DCP	7, 0, 0, 0, 0	0.90	8.10
10	PREPARATION SPLIT CORE		1, 0, 0, 0, 0	2.50	25.00

7708

Roger Laroche

A. Patton

SUB-TOTAL $ 178.30

SHIPPING CHARGES	CUSTOM BROKERAGE	TELEX	MINIMUM CHARGES
OTHER			SURCHARGE - RUSH SERVICE

TRUCK PAYABLE $ 178.30

RETURN THIS COPY WITH YOUR PAYMENT

INVOICE

X-RAY ASSAY LABORATORIES

LIMITED

1885 LESLIE STREET DON MILLS, ONTARIO M3B 3J4 445-5755

Umex Corporation Limited
Attn: JJ Lefebvre
1903 Leslie Street
Don Mills, Ontario
M3B 2M6

DATE Jan 31, 1983

INVOICE M 000886

Customer# 571

ASSAY REPORT NO.

ITEM		PRICE	AMOUNT
	Re: Report & invoice# 16779 Dec23m1982		
2	Chondite Plot	@$ 20.00	$ 40.00

7708 Roger Laine

Jay Patterson

TERMS. NET 30 DAYS

UMEX INC.

0292

1935 LESLIE STREET, DON MILLS, ONTARIO, CANADA M3B 2M3

CANADIAN IMPERIAL BANK OF COMMERCE
1865 LESLIE STREET (NEAR YORK MILLS)
DON MILLS, ONTARIO

September 8, 1982

Pay $1874.60

$ 1874.60

PAY PAYEZ
TO THE ORDER OF
A L'ORDRE DE

X-Ray Assay Laboratories Ltd.
1865 Leslie St.
Don Mills, Ontario
M3B 3J4

UMEX INC.

PER _____

PER NOT NEGOTIABLE

UMEX INC.

PLEASE DETACH BEFORE DEPOSITING
S.V.P. DÉTACHEZ AVANT D'ENCAISSER

DESCRIPTION	SUPPLIER FOURNISSEUR	YOUR INVOICE NO. NO. DE FACTURE	AMOUNT MONTANT	ACCOUNT NO. NO. DE COMPTE
As per attached statement of account date: September 1, 1982			5472.00 (3597.40)	7708 1120-4
		TOTAL	1874.60	

0292

UMEX INC.

1935 LESLIE STREET, DON MILLS, ONTARIO, CANADA M3B 2M3

1540 0538

CANADIAN IMPERIAL BANK OF COMMERCE
1065 LESLIE STREET (NEAR YORK MILLS)
DON MILLS, ONTARIO

October 18, 1982

Canada 2007.75 CS

$ 2007.75

UMEX INC.

PAY / PAYEZ
TO THE ORDER OF / A L'ORDRE DE

X-Ray Assay Laboratories Ltd.
1885 Leslie St.
Don Mills, Ont. M3B 3J4

PER _____

PER NOT NEGOTIABLE

UMEX INC.

PLEASE DETACH BEFORE DEPOSITING
S.V.P. DÉTACHEZ AVANT D'ENCAISSER

DESCRIPTION	SUPPLIER FOURNISSEUR	YOUR INVOICE NO. NO. DE FACTURE	AMOUNT MONTANT	ACCOUNT NO. NO. DE COMPTE
See attached statement of account dated October 14, 1982			3244.75 (1237.00)	7703 1130-4
		TOTAL	2007.75	

1540 0538

X-RAY ASSAY LABORATORIES
LIMITED

1885 LESLIE STREET • DON MILLS ONTARIO M3B 3J4 • (416) 445-5755

BILL TO:

COPY TO:

SUBMITTED TO:

INVOICE NO.	INVOICE DATE	WORK ORDER NO.	SAMPLES SUBMITTED
17347	21-NOV-83	12794	[illegible]

TERMS

TERMS NET 30 DAYS
1.5% PER MONTH INTEREST ON ACCOUNT OVER 30 DAYS

CLIENT P.O. NO.	CLIENT PROJECT NO.		TYPE OF SAMPLES SUBMITTED
			ROCK PULP

F. PKGS	SHIPPED VIA	WAY BILL NO.	SHIPPED FROM
1 BAG	SELF		

	NO. SAMPLES	DESCRIPTION		PREPARATION	PRICE/SAMPLE	AMOUNT
1.	10	RARE EARTH GROUP	NA		14, 20, 0, 0, 0	90.00	900.00
2.	10	LI	AA		8, 0, 0, 0, 0	5.00	50.00
3.	10	B	DCP		7, 0, 0, 0, 0	5.50	55.00
4.	9	PREPARATION ROCK			1, 0, 0, 0, 0	2.50	22.50
5.	2	CHONDRITE PLOTS			15, 0, 0, 0, 0	20.00	40.00

7708

T. Taki

SUB-TOTAL $ 1067.50

SHIPPING CHARGES	CUSTOM BROKERAGE	TELEX	MINIMUM CHARGES	
OTHER			SURCHARGE - RUSH SERVICE	

TOTAL IN CANADIAN FUNDS $ 1067.50

PLICATE COPY

RETAIN THIS COPY FOR FOLLOW-UP

FROM: ALICE KWONG UMEX INC. DEPARTMENT: 1935 LESLIE ST. DON MILLS, ONTARIO M3B 2M3

X-RAY ASSAY LABORATORIES LTD.
1285 LESLIE ST.
DON MILLS, ONTARIO M3B 3J4

ATTENTION: GRACE PUN

DATE: FEBRUARY 7, 1983

SUBJECT: STATEMENT OF YOUR ACCOUNT

MESSAGE

BALANCE DUE YOUR A/C OF FEBRUARY 7, 1983 :

UMEX INVOICE :	83-032		$1,197.00
LESS :			
X-RAY INVOICES :	16779	$1,005.00	
	16919	178.30	
	M000886	40.00	
		$1,223.30	
TOTAL DUE X-RAY			($ 26.30)

A Kwong

USE LOWER PORTION FOR REPLY — REPLY FROM — DATE

UMEX INC.

No. 5135
year 1982

	DATE M	DATE D	ORDINGS	G/L ACCOUNT	COST ACCOUNT Nº	√	DEBIT	CREDIT
1	10	31		7708		✓	442450	
2				1120-H		✓		442450
3								
4								
5								
6								
7								
8								
9								
10								
11								
12								
13								
14								
15								
16								
17								
18								
19								
20								

MADE BY HE | AUDITED BY

REMARKS

To record the attached invoices from X-Ray as expenses & reduce A/R from X-Ray.

1016 1017

UMEX INC.

1935 LESLIE STREET, DON MILLS, ONTARIO, CANADA M3B 2M3

CANADIAN IMPERIAL BANK OF COMMERCE
1865 LESLIE STREET (NEAR YORK MILLS)
DON MILLS, ONTARIO

February 11, 1983

26 DLS 30 CTS

$ 26.30

PAY / PAYEZ TO THE ORDER OF / A L'ORDRE DE

X-Ray Assay Laboratories
1885 Leslie St.
Don Mills, Ont. M3B 3J4

UMEX INC.

PER

PER NOT NEGOTIABLE

UMEX INC.

PLEASE DETACH BEFORE DEPOSITING
S.V.P. DÉTACHEZ AVANT D'ENCAISSER

DESCRIPTION	SUPPLIER FOURNISSEUR	YOUR INVOICE NO. NO. DE FACTURE	AMOUNT MONTANT	ACCOUNT NO. NO. DE COMPTE
See attached statement of your account, as of Feb. 7, 1983			(1197.00) 1223.30	1120-4 3045
		TOTAL	26.30	

1018 1017

XRAL

X-RAY ASSAY LABORATORIES
LIMITED

1885 LESLIE STREET • DON MILLS ONTARIO M3B 3J4 • (416) 445-5755

VOICE TO:

UNEX CORPORATION LIMITED
ATTN: DR. T. VERMEER, VICE PRESIDENT
1935 LESLIE STREET
DON MILLS, ONTARIO
M3B 2M3

COPY TO:

MITTED TO:

UNEX CORPORATION LIMITED
ATTN: DR. T. VERMEER, VICE PRESIDENT
1935 LESLIE STREET
DON MILLS, ONTARIO
M3B 2M3

INVOICE NO.	INVOICE DATE	WORK ORDER NO.	DATE SUBMITTED
17188	25-FEB-83	12906	18-FEB-83

TERMS

TERMS NET 30 DAYS
1.5% PER MONTH INTEREST ON ACCOUNT OVER 30 DAYS

OTS P.O. NO.	CLIENT PROJECT NO.		TYPE OF SAMPLES SUBMITTED
			SPLIT CORE PULP

NO. OF PKGS	SHIPPED VIA	WAY BILL NO.	SHIPPED FROM
3 BAGS	SELF & ONAPAD NO. 12571		

	QUANTITY	CODE	DESCRIPTION	METHOD	XRAL CODE	UNIT COST	AMOUNT
1.	34	AU		FADCP	10, 7, 0, 0, 0	6.50	221.00
2.	28	WHOLE ROCK <1000			6, 0, 0, 0, 0	17.50	490.00
3.	7	1ST ELEMENT CHARGE		DCP	7, 0, 0, 0, 0	1.25	8.75
4.	1	NI PPM		DCP	7, 0, 0, 0, 0	0.90	0.90
5.	7	CU PPM		DCP	7, 0, 0, 0, 0	0.90	6.30
6.	6	ZN PPM		DCP	7, 0, 0, 0, 0	0.90	5.40
7.	6	PB PPM		DCP	7, 0, 0, 0, 0	0.90	5.40
8.	45	PREPARATION	SPLIT CORE		1, 0, 0, 0, 0	2.50	112.50

613 - 495 - 4189
613 - 495 - 4089

7708

SUB-TOTAL $ 850.25

SHIPPING CHARGES	CUSTOM BROKERAGE	TELEX	MINIMUM CHARGES	
				850.25
AIR CHARGES	OTHER		SURCHARGE - RUSH SERVICE	

TOTAL CANADIAN FUNDS $ 850.25
850.25

PLICATE COPY

APPENDIX 3

Diamond drill holes location and description.

Analyses on drill holes samples.

UNION MINIERE EXPLORATIONS AND MINING CORPORATION LIMITED

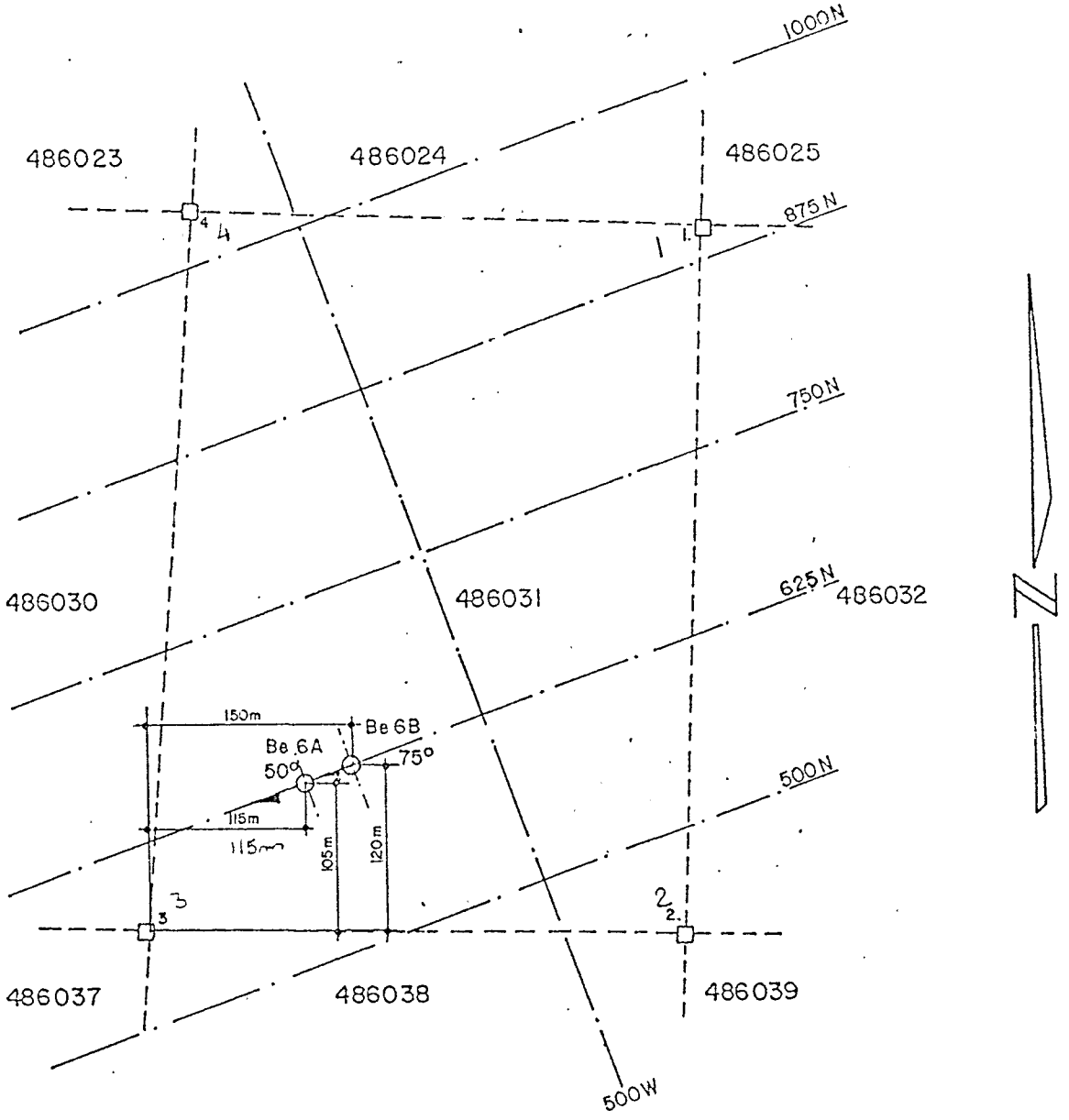
DRILL RECORD.

AREA BECK Hole No. B-6A Depth: 145'(44.2 m) Drilled By: Armstrong

ANOMALY: Beck 1 West (B-1) Bearing and Dip: 250°/-50° Started: Nov. 22/82 Machine: Described By:

CLAIM: Pa 486031 Local Coord. X= 625NY= 600W Z= 427 m Completed: Dec. 5/82 Diam Drill: AQ J.-J. Lefebvre

Depth From	Depth To	% Core	Description & Lithology	Mineralization	Dip .	No. of Sampl
0	145.0		Overburden Drill hole stopped in overburden because of broken drill rods.			



1": 5000 1cm

Roger J. Cavén, P.Eng.
Chief Geophysicist.

Location D.D.H. Be 6A & 6B

Scale: 1:5000

UMEX Inc.

REGISTERED PROFESSIONAL ENGINEER
Roger J. Cavén
PROVINCE OF ONTARIO

UNION MINIERE EXPLORATIONS AND MINING CORPORATION LIMITED

DRILL RECORD.

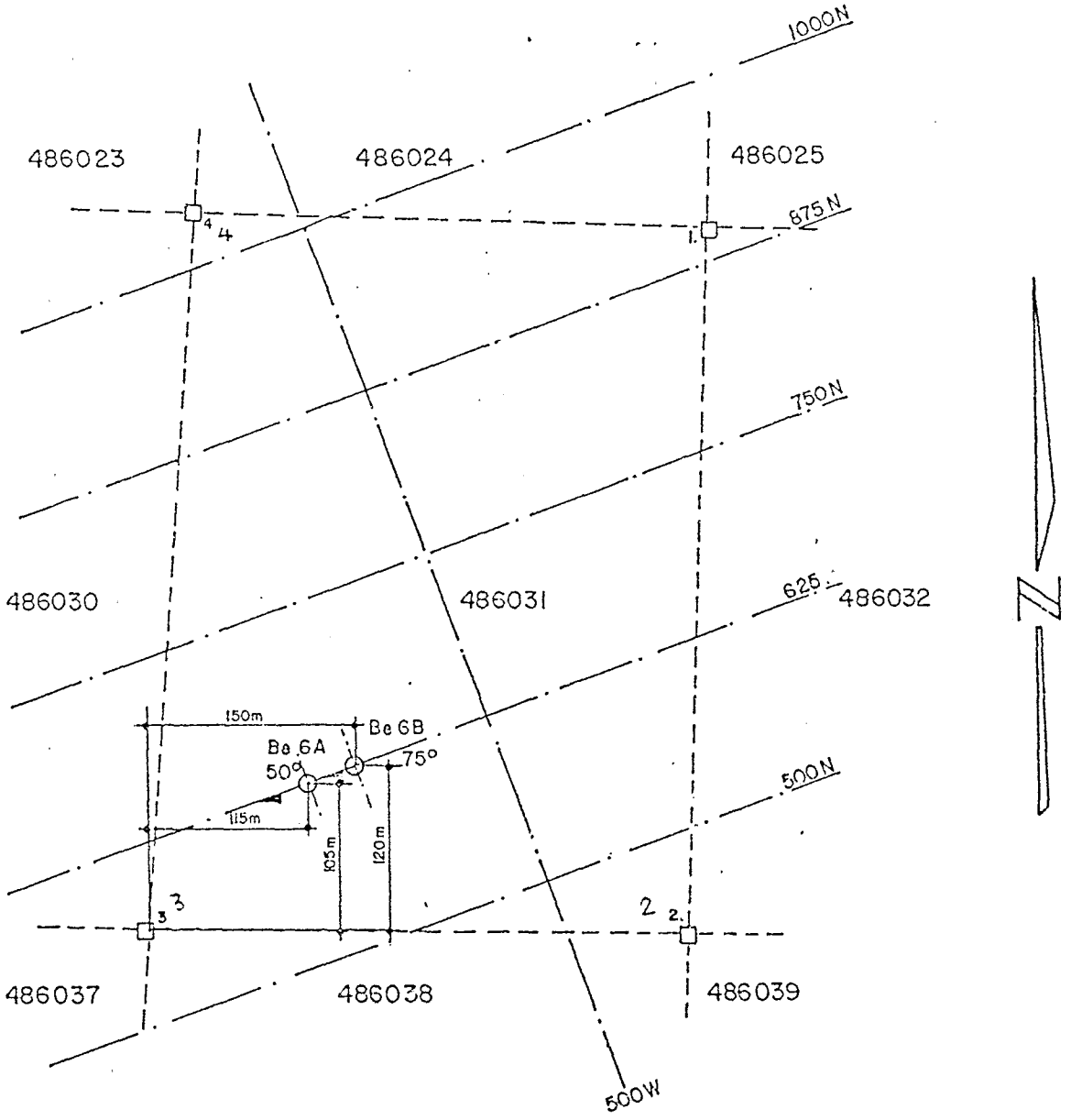
AREA BECK Hole No. B-6B Depth: 507'(154.5m) Drilled By: Armstrong Described By:

ANOMALY: Beck 1 West (B-1) Bearing and Dip: 250°/-75° Started: Dec. 12/82 Machine:

CLAIM: Pa 486031 Local Coord. X= 638.5W Y= 625N Z= 428 m Completed: Jan. 10/83 Diam Drill: AQ J.-J. Lefebvre

Depth (ft.) From	Depth (ft.) To	% Core	Description & Lithology	Mineralization	Dip to C.A.	No. of Sample.
0.0	172.0		Casing (Overburden: gravel and boulders)			
72.0	175.0		Mafic tuff - fractured, massive, dark grey green and medium grained chlorite (actinolite) rich rock			
75.0	293.0		Quartz porphyry rhyodacite tuff		176.0 40°	
			-175.0-195.0 - strongly foliated, whitish - very fine grained, slightly sericitized and propylitized. - rare thin quartz lenses and veins containing very rare specks of sulfide (Py - Cp ?) - rare dissemination of blue quartz - numerous fractures and microfaults.			
		Poor recovery between 180 and 196'				
			-195.0-207.0 - fine grained, poorly foliated to massive greenish white rhyodacitic tuff with white phenocrysts of quartz - very weak sericitization - propylitization vanishes at 205.0			
			-207.0-293.0 - fine grained, massive felsic tuff, light grey in color with a faint lilac tint - clearly a crystal tuff between 207.0 and 237.0' - loc. carbonate and sericite-rich stringers - very rare and extremely fine grains of pyrite - numerous thin quartz veins containing a very week pyritic mineralization - from 263, veins with quartz, carbonate and possible epidote and rare specks of pyrite - from 255, weak pervasive propylitization associated with a rather marked sericitization		223.0 51° 289.0 52°	

Depth (ft.) From	Depth (ft.) To	% of Core	Description & Lithology	Mineralization	Dip to C.A.	No. of Samp
93.0	299.0		Sericitized andesitic zone			
99.0	346.5		Dacitic tuff or tuffaceous material - well sericitized, strongly foliated fine dacitic tuff containing small blue quartz phenocrysts - quartz vein between 319 and 321.0'		318.0 57°	
46.5	380.0		Dacitic tuff, weakly foliated, containing minor garnet and local staurolite crystallizations (plus tourmaline, pyrite and pyrrhotite) 349.0-355.0'			
80.0	411.0		Amphibole porphyry mafic intrusive - massive, actinolite-chlorite-plagioclase rock with minor magnetite and very rare garnets. - some calcite-quartz veins contain rare tiny grains of pyrite and chalcopyrite - the rock may be composed of minor cummingtonite	trace py-cp		
11.0	449.0		Crystal dacitic tuff - rare garnet dissemination - local accumulations of staurolite		440.0 53°	
49.0	493.0		Fine dacitic tuff - grey in colour, fine grained and poorly foliated - containing rare small garnets - well foliated garnet, amphibole-rich andesitic lapilli tuff between 473 and 481' (abundant pyrrhotite) - abundant patches of pyrrhotite mineralizations	abundant po (loc. up to 15%)		
493.0	502.5		Weakly foliated actinolite-chlorite rock - numerous quartz-carbonate veins, some associated with minor chalcopyrite and pyrrhotite mineralizations	trace py-cp		
502.5	507.0		Well foliated, light grey, rhyodacitic lapilli tuff.			
	507.0		END OF HOLE			



1":5000 1cm

REGISTERED PROFESSIONAL ENGINEER
Roger J. Cavén
PROVINCE OF ONTARIO

April 7/83

Roger J. Cavén, P.Eng. Chief Geophysicist.	Location D.D.H. Be 6A & 6B Scale: 1:5000 UMEX Inc.

UNION MINIERE EXPLORATIONS AND MINING CORPORATION LIMITED

DRILL RECORD.

AREA Beck | Hole No. B-7 | Depth: 500' (152.4 m) | Drilled By: Armstrong | Described By:

ANOMALY: Beck 1 | Bearing and Dip: 250°/-50° | Started: Oct.20/82 | Machine:

CLAIM: creek north Pa 486065 | Local Coord. X= 284E Y= 125S Z= 421 m | Completed: Oct. 29/82 | Diam Drill: AQ | J.-J. Lefebvre

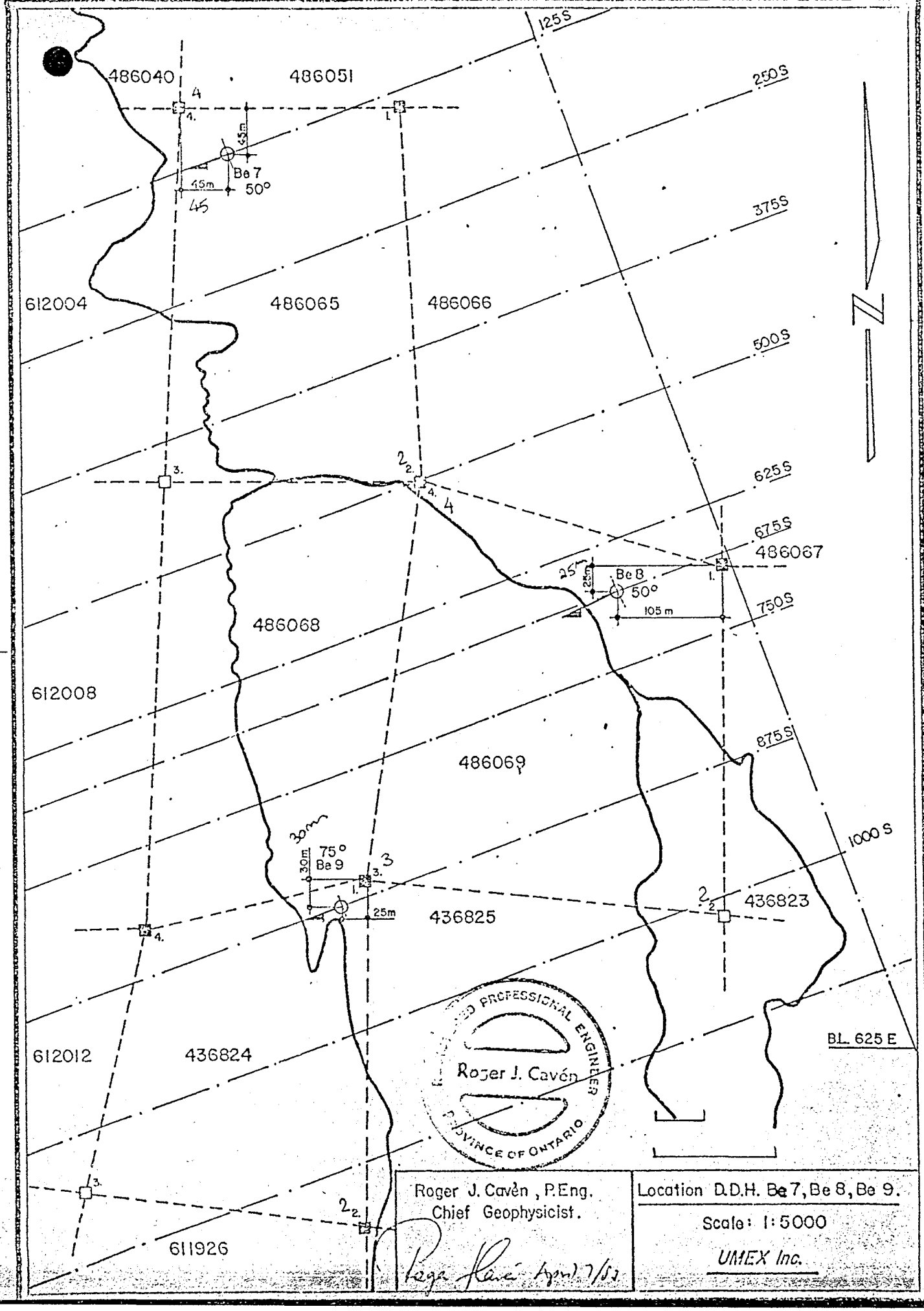
Depth From	Depth To	% Core	Description & Lithology	Mineralization	Dip	No. of Sample
0.0	34.0		Casing			
34.0	38.0		Altered felsic lapilli tuff - silicified and sericitized, well foliated tuff locally containing some chlorite - abundant tourmaline and minor andalusite - very rare pyrite dissemination.			
38.0	44.0		Altered fine mafic tuff - moderately foliated, dark green, chlorite-actinolite garnet rock - garnets are rather abundant - finely disseminated magnetite, rare tiny crystals of pyrite - thin quartz veins are frequent			
44.0	80.0		Altered felsic (?) lapilli-tuff - andalusite, silica, sericite rich rock with abundant tourmaline - locally well marked foliation - fine pyrite-pyrrhotite dissemination			
80.0	87.5	80-87' 50% recovery	Fracture zone - greenish white clay-rich fragments chlorite-sericite schist - fragments of garnet-rich amphibolite			
87.5	88.5		Andesitic tuff - dark, massive, fine grained amphibole, biotite rock with abundant fine garnets - very abundant extremely fine disseminations of pyrrhotite	Po loc. up to 10%		
88.5	107.0		Felsic volcanic breccia - heterolitic breccia predominantly composed of felsic fragments			

Depth From	Depth To	% of Core	Description & Lithology	Mineralization	Di	No of Samp
88.5	107.0		(Cont'd) - fragments variable in size (half a cm up to 10 cm) - well oriented rock with flattened fragments (some small fragments are rounded) - rock mainly unaltered (weak sericite in the matrix?) - at 96' small vein in quartzitic lens with minor chalcopyrite			
107.0	157.0		Felsic Tuff - pinkish cream, slightly oriented, felsic tuff; locally lapilli-tuff - from 118.0 these tuffs are progressively affected by sericitization accompanied by abundant tourmaline - at 107.0' and 113.0', 5" band of mafic material (amph. chlorite, rare garnet) + abundance of disseminated pyrite and pyrrhotite (tr. of chalcopyrite) - sericitization increases to a maximum at 140' up to 3-4% tourmaline - typical lapilli-tuff from 140'	Py, Po (Cp)		
157.0	176.0		Sericitized Andesitic tuff - well foliated light grey rock - abundant partly silicified mafic lenses containing amphibole, chlorite, some garnets, magnetite and pyrrhotite - between the mafic lenses most of the mafic minerals have been altered to give sericite, chlorite, chloritoide and tourmaline assemblages.			
176.0	199.0		Chlorite-sericite schist - well foliated greenish rock rich in sericite, chlorite and quartz - rare very small stringers of pyrrhotite and chalcopyrite - locally, nice concentration of tourmaline - Andalusite is locally present	tr. Po Cp		
199.0	211.0		Mafic (basaltic) tuff? - massive, very fine grains, dark green rock - amphibole, chlorite and biotite are major components - rare veins and streaks of quartz and carbonate.			

Depth From	Depth To	% of Core	Description & Lithology	Mineralization	Dip	No of Samp
211.0	217.5		Sericitized andesitic tuff - well foliated, silicified mafic tuff - rich in sericite and chlorite, rare garnets - minor pyrite in the more mafic bands, tourmaline			
217.5	225.0		Sericite schist - schistosed sericite quartz (chlorite) rock - quartz vein between 222-297			
225.0	261.5		Altered mafic to intermediate volc. rock - poorly foliated amph. chlorite garnet rock - very abundant quartz phenocrysts, local patchy silicification - rare and fiffuse crystallizations of fine pyrrhotite - local tuff or lapilli tuff textures - between 253' and 255' bleaching and quartz-muscovite veins	less 1% Po		
261.5	262.0		Zone with siliceous nodules and very thin graphitic layers		262' 22° to	CA
262.0	279.0		Biotite rich mafic rock - fine, rather massive, dark green - frequent thin quartz and carbonate veins - extremely fine pyrrhotite-chalcopyrite dissemination	tr. Po Cp		
279.0	283.0		Progressive change to			
283.0	304.0		Grey, felsic tuff - possibly epiclastic (?) - weakly sericitized - small fragments (1-3 cm) - between 293 and 300' lapilli tuff to breccia - more intense sericitization + andalusite between 283 and 285 - locally the rock contains rather abundant chlorite and traces of chalcopyrite		302' 21° to	CA

Depth From	Depth To	% of Core	Description & Lithology	Mineralization	Dip	No. of Sampl
304.0	329.0		Biotite rich mafic rock (ref. 262-279)			
329.0	382.0		White rock, almost massive, very fine sericitic foliation - granular and rich in silica - loc. chlorite rich + abundant andalusite - locally fine sulphide rich lenses (pyrite + chalcopyrite) - more basic between 337.5 and 345.5 - amph. and garnets between 344.5 and 345.5	tr. Cp-Py	371' 12° to	CA
382.0	388.5		Chlorite-sericite schists - zones of more mafic material (chlorite) with fine fractures coated with pyrite - local andalusite concentrations	loc. up to 1% Py		
388.5	394.5		Felsic lapilli tuff? altered - numerous quartz patches and veins - rare Py concentrations in thin mafic lenses. - loc. andalusite rich' at 393' qtz tourmaline rich vein (1")			
394.5	420.0		Sericite schist - very finely foliated - a few qtz veins with pyrite disseminations - richer in chlorite between 403 and 420.0'	tr. Py	408' 5° to	CA
420.0	444.0		Chlorite-sericite schist - similar rock, richer in chlorite - more mafic zones with loc. concentrations of pyrite and pyrrhotite - zones of very fine, contorted foliation - locally more sericite-rich with andalusite		442' 15° to	CA
444.0	451.0		Basalt flow? intrusive? - poorly foliated, non or weakly altered mafic, fine and massive rock with rare dispersed garnets.			

Depth From	Depth To	% of Core	Description & Lithology	Mineralization	Dip	No. of Samp
451.0	477.5		Chlorite-sericite schist - loc. andalusite and qtz veins - abundant pyrite and pyrrhotite as disseminated min. or as stringers parallel to foliation - at about 460' staurolite crystallizations - lenses of mafic to intermediate material relatively enriched in pyrrhotite and pyrite	Po + Py up to 5% loc.	453' 25° to	CA
477.5	500.0		Strongly but irregularly sericitized mafic to intermediate volc.? material remarkably rich in large, pinkish, quartz phenocrysts. - Rare disseminated pyrite		496' 21° to	CA
	500.0		END OF HOLE			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Be 9
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30m
25m
Roger J. Cavén
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PROVINCE OF ONTARIO
Roger J. Cavén, P.Eng.
Chief Geophysicist.
Location D.D.H. Be 7, Be 8, Be 9.
Scale: 1:5000
UMEX Inc.

UNION MINIERE EXPLORATIONS AND MINING CORPORATION LIMITED
DRILL RECORD.

AREA: BECK | Hole No.: B-8 | Depth: 400' (121.9 m) | Drilled By: Armstrong | Described By:

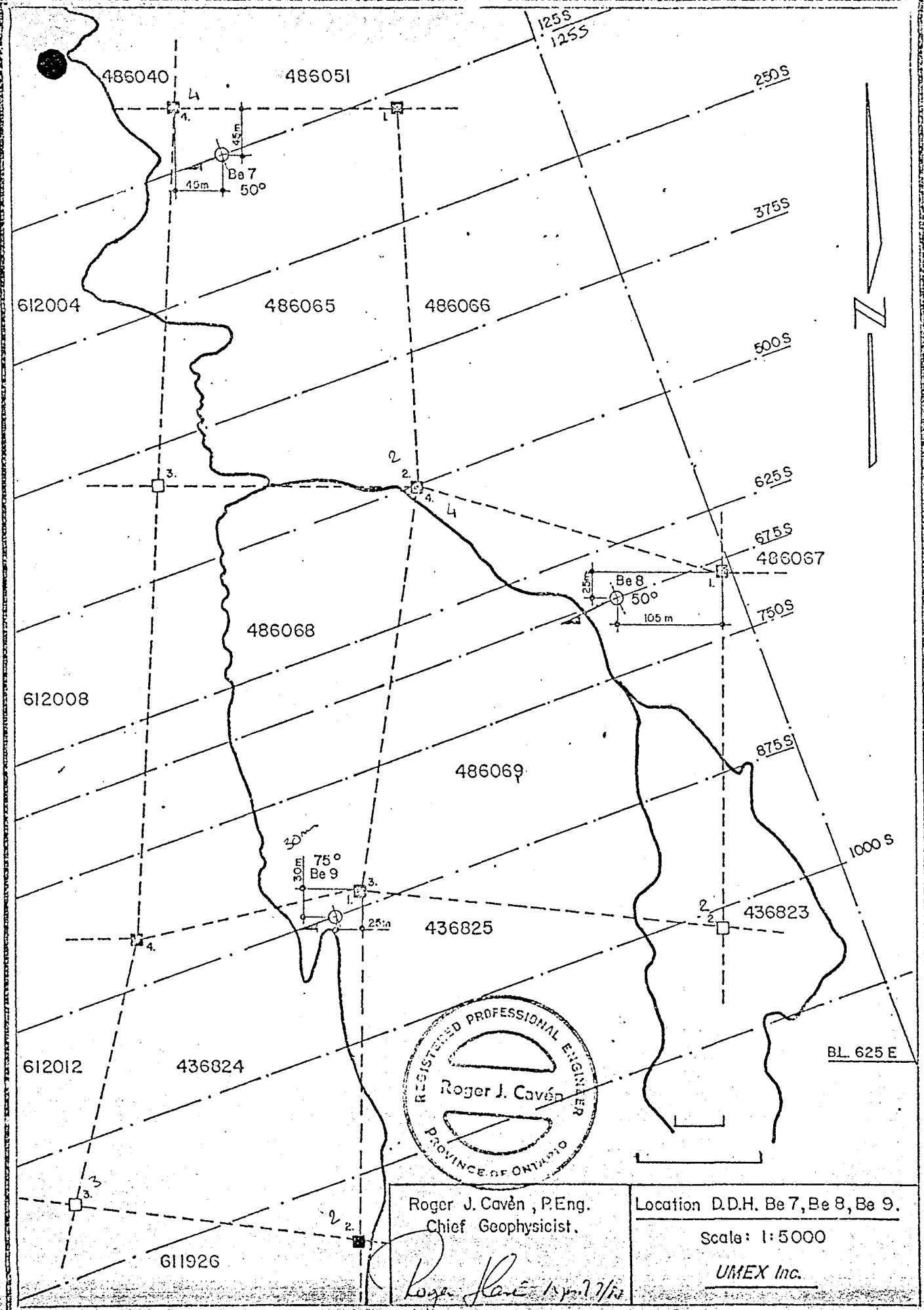
ANOMALY: Beck 1 | Bearing and Dip: 255°/-50° | Started: Nov. 7/82 | Machine:

CLAIM: Pa 486069 | Local Coord. X= 506E Y=675S Z= | Completed: Nov. 17/82 | Diam Drill: AQ | J.-J. Lefebvre

Depth From	Depth To	% Core	Description & Lithology	Mineralization	Dip to CA	No. of Sample
0.0	10.0		Casing			
10.0	17.5		Intermediate tuff lapilli - grey in color, poor foliation - numerous mafic lenses (cummingtonite possible) - locally bleached (incipient sericitization) 17.5 abnormal contact (fault, fracture?)		33°(fracture	
17.5	25.5		Andesitic tuff - dark blue, moderate foliation - numerous mafic lenses between 22' and 25.5' dacitic to andesitic tuff with small cherty lenses		19'-29° 22'-36°	
25.5	41.0		Altered intermediate tuff (?) - finely foliated, white rock, progressively massive - some amphibolitic lenses - rock remarkably rich in silica, sericite and andalusite - at the end, some fragment lapilli sized - very rare pyrite	trace py		
41.0	72.0		Volcanic breccia - white, massive rhyolitic breccia with fragments up to 2' - poor matrix, rich in silica and sericite - frequent pods and stringers of pyrite - between 59.5 and 72' weathered fractured zone	Pyrite locally up to 5%	65'-18°	
72.0	85.3		Deeply altered rock - rich in quartz and sericite, white rock - possibly a felsic lapilli tuff with some quartz veins no sulphides		82'-21°	

Depth From	Depth To	% of Core	Description & Lithology	Mineralization	Dip	No. of Samp
85.3	93.0		Similar rock as above, but a little coarser - tuff lapilli? white in colour - breccia possible between 87 and 89'			
93.0	127.5		Altered andesitic (?) tuff - foliated, light grey rock with dots, patches and lenses of biotite - rich in tourmaline - tuff lapilli at 100', 120' - chloritized mafic zone between 103 and 106' and 107.5-109.0 with oxydized magnetite - at 123', one foot of garnet rich amphibolite (+magnetite) - at 125.6, half a foot of amphibolite		119'- 122'-	26° 22°
127.5	143.0		Felsic lapilli tuff well sericitized			
143.0	146.5		Very altered andesitic tuff			
146.5	181.0		Deeply altered lapilli tuff - very siliceous, heterogeneous rock with abundant sericite and siderite veins - patches and veins rich in quartz - fracturations at 179' (very siliceous zone)		148' 155'	-28° -21°
181.0	205.0		Deeply altered tuff - locally quartz-sericite schist with contorted foliation - rare biotitic lenses - originally the rock could have been dacitic or andesitic in composition			
205.0	244.0		Fine felsic tuff (?) - light grey in color - apparently deeply altered, massive, medium grained - possibly a relatively coarse sediment or undefined alteration - andesitic intrusive intersected between 216 and 217' 224 and 231.5 232.5 and 244.0' - thick siderite vein at 237'		214'	-22°

Depth From	Depth To	% of Core	Description & Lithology	Mineralization	Dip	No. of Sampl
244.0	267.5		Sericite schist, very siliceous, contorted foliation			
267.5	296.0		Altered andesitic tuff with garnet rich mafic lenses and fine sediments	section of silica iron formation		
296.0	325.5		Contorted sericite-chlorite schist chloritic zone between 316 and 317 318 and 319 with sphalerite mineralization numerous quartz veins between 319 and 324'	Sp. 2-3%		
325.5	341.0		Andesitic intrusive associated with quartz and carbonate veins			
341.0	352.0		Deeply altered, massive, coarse material - massive sericite-chlorite rock (?) with patches of pyrite and pyrrhotite	3% Py Po		
352.0	360.5		Andesite spotted with cummingtonite and carbonate - fine dissemination of pyrite, pyrrhotite and possibly chalcopyrite	minor Py Po		
360.5	373.5		Deeply altered tuff with local cummingtonized mafic lenses - intense sericitization and abundant quartz phenocrysts - disseminated pyrite - contorted foliation	trace py		
373.5	400.0		Altered mafic rock with numerous carbonate veins (siderite ?)			
	400.0		END OF HOLE			



Roger J. Cavén, P.Eng.
Chief Geophysicist.

Location D.D.H. Be 7, Be 8, Be 9.

Scale: 1:5000

UMEX Inc.

UNION MINIERE EXPLORATIONS AND MINING CORPORATION LIMITED
DRILL RECORD.

AREA: BECK | Hole No.: B-9 | Depth: 780' (237.7 m) | Drilled By: Armstrong | Described By:

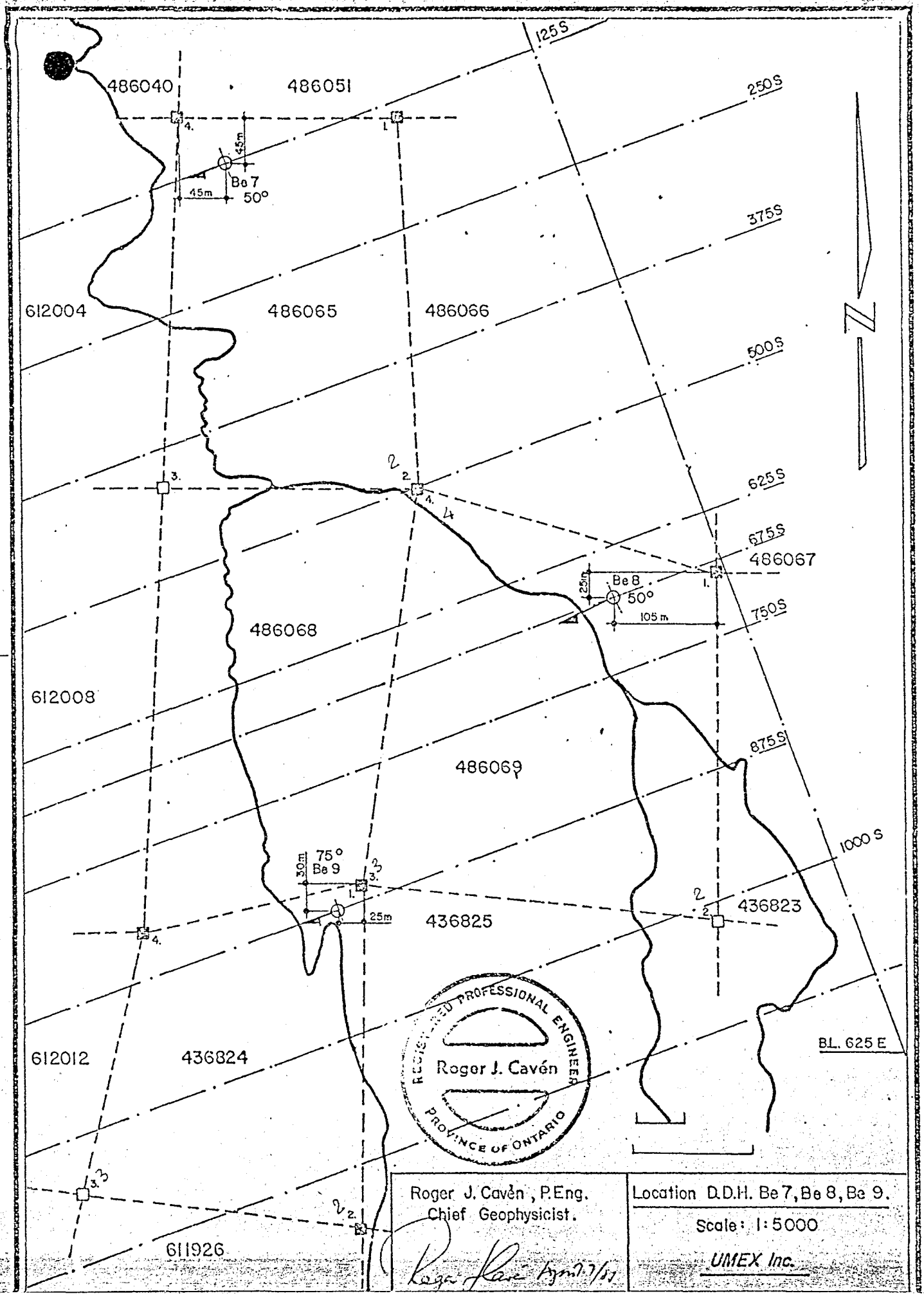
ANOMALY: Beck 1 South (B-1) | Bearing and Dip: 250°/-75° | Started: Jan. 18/83 | Machine:

CLAIM: Pa 436824 | Local Coord. X= 125E Y= 875S Z= | Completed: Feb. 4/83 | Diam Drill: AQ | J.-J. Lefebvre

Depth From	Depth To	% Core	Description & Lithology	Mineralization	Dip to CA	No. of Sample.
0.0	84.0		Casing			
84.0	179.5		Coarse mafic (gabbro) intrusive - Massive green rock, locally slightly foliated - 84' to 125', rather massive amphibole porphyry metagabbro minor thin qtz-carbonate (epidote) veins - 125' to 179.5' massive and much coarser (amph. crystals up to 1.5 cm) locally weak interstitial Cp Py Po mineralization	3-4% sulfides as stringers between ±71.5 and 173.0		
179.5	188.0		Finely foliated metasediments - lilac grey sericite-biotite rich, fine grained rock - greenish massive to poorly foliated chlorite-sericite rock - fine dissemination of pyrrhotite and minor chalcopyrite	tr. Po Cp	180' 37.5°	
188.0	448.0		Deeply altered rock (tuffaceous sediments ? or felsic tuffs) - highly silicified, locally sericitized light grey, massive to poorly foliated rock, loc. quite abundant andalusite (alteration of more mafic zones may contain some staurolite) - numerous diffuse stringers of pyrite and pyrrhotite - between 227.5 and 230';234.0 and 328' finely foliated garnet amphibolite - between 241.0 and 260.0' intercalation of finely foliated chlorite-sericite schists (altered meta-andesites?) - from about 280': quartz-sericite-andalusite schist - concentration of pyrite stringers between 399.0 to 406.0 410.0 to 430.0	(Po) Py loc. up to 5% tr. py up to 15% Py	277' 31.5° 360' 42.5° 434' 33.5°	

Depth From	Depth To	% of Core	Description & Lithology	Mineralization	Dip	No. of Sample
448.0	460.0		Deeply altered rock (andesitic tuff?) abundant stringers of pyrite	loc. up to 20% Py		
460.0	518.0		Deeply altered rock (mafic flow or tuff?) - well foliated, medium grey, quartz, sericite, andalusite (?) staurolite, amphibole rock - disseminated, fine grained pyrite and pyrrhotite (concentrated in more mafic bands and lenses) rare garnets	up to 10% Py Po between 465.0 and 468' trace cp	468' 28.5°	
518.0	540.0		Less altered, massive mafic rock - massive, dark green, rich in chlorite and magnetite - locally, abundance of garnet			
540.0	562.0		Massive, mafic rock, metabasalt? - massive, dark green, amphibolite rich rock - medium grained, partly recrystallized			
562.0	602.5		Altered intermediate tuff (metaandesite) - banded, silicified rock, rich in quartz phenocrysts - locally abundant crystallizations of garnet, staurolite, alumino-silicates - stringers of pyrite and pyrrhotite between 562.0 and 569.0	Po and Py up to 10%	563' 28.5°	
602.5	729.0		Quartz porphyry, sericite-chlorite schist - weakly foliated, grey green rock - composed mainly of sericite, chlorite and minor andalusite - very fine dissemination of pyrite and pyrrhotite - possibly an altered mafic to intermediate rock	tr. Py Po	605' 31.5°	

Depth From	Depth To	% of Core	Description & Lithology	Mineralization	Dip	No. of Sampl
729.0	780.0		- Foliated to banded light grey and green rock - mainly composed of chlorite-sericite-quartz and patches of actinolite - tiny garnets less locally associated with amph. patches - rare thin quartz veins - few blue quartz	very variable from 65° to 10°	670' 21°	
	780.0		END OF HOLE			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75°
Be 9
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Scale: 1:5000
UMEX Inc.

DIAMOND DRILL HOLES

RESULTS OF ANALYSES

Sample No.			Cu %	Cu ppm	Ni %	Ni ppm	Zn %	Zn ppm	Ag ppm	Pb ppm	Au oz/t
	BECK 1										
29407	(134.0-138.5)	4.5	-	42	-	-	-	35	-	-	<.001
29408	(163.0-167.0)	4.0	tr.	-	.01	-	-	-	-	-	<.001
29409	(167.0-172.0)	5.0	.01	-	.01	-	-	-	-	-	<.001
29410	(172.0-177.0)	5.0	.01	-	.02	-	-	-	-	-	<.001
29411	(178.5-182.5)	4.0	-	92	-	64	-	-	-	-	<.001
29412	(184.5-187.0)	2.5	-	55	-	54	-	-	-	-	<.001
	BECK 2										
29405	(135.5-136.5)	1.0	-	76	-	-	-	62	-	20	<.001
29406	(148.5-152.0)	3.5	-	28	-	-	-	15	-	10	<.001
	BECK 3										
29401	(227.5-231.0)	3.5	-	100	-	-	-	71	1	20	-
29402	(254.0-255.5)	1.5	-	3560	-	-	-	75	2	16	-
29403	(255.5-256.0)	0.5	-	13600	-	-	-	200	4	12	.003
29404	(256.0-257.0)	1.0	-	270	-	-	-	29	<1	12	-
	BECK 4										
29413	(117.0-122.4)	5.4	-	13	-	-	-	28	-	-	-
29486	(181.5-183.25)	1.75	-	760	-	-	-	270	2	-	.001
29487	(191.5-192.5)	1.0	-	470	-	-	-	170	1	-	<.001
29414	(217.0-224.5)	7.5	-	26	-	-	-	140	<1	-	-
29415	(305.0-310.0)	5.0	-	28	-	-	-	58	<1	-	-
	BECK 5										
29488	(409.0-411.0)	2.0	-	120	-	-	-	200	2	32	.004
29489	(416.5-418.0)	1.5	-	58	-	-	-	62	1	24	<.001

Sample No.			Cu %	Cu ppm	Ni %	Ni ppm	Zn %	Zn ppm	Ag ppm	Pb ppm	Au ppb
	BECK 6										
38011	(319.0-320.5)	1.5	-	-	-	-	-	-	-	-	< 2
38012	(473.0-481.0)	8.0	-	56	-	-	-	95	-	16	< 2
38013	(498.0-499.0)	1.0	-	-	-	-	-	-	-	-	< 2
	BECK 7										
38007	(44.5- 55.0)	10.5	-	13	-	-	-	40	0.5	6	< 2
38008	(55.0- 65.0)	10.0	-	29	-	-	-	130	0.5	10	< 2
38009	(438.0-440.0)	2.0	-	170	-	-	-	120	0.5	12	12
38010	(474.0-475.5)	1.5	-	28	-	-	-	24	< 0.5	12	8
38019	(87.5- 88.5)	1.0	-	-	-	-	-	-	-	-	2
38020	(221.5-224.5)	3.0	-	-	-	-	-	-	-	-	5
38021	(251.0-261.0)	10.0	-	17	-	-	-	76	-	10	< 2
38022	(345.5-354.5)	9.0	-	18	-	-	-	8	-	8	< 2
38023	(384.0-387.0)	3.0	-	-	-	-	-	-	-	-	< 2
38024	(394.5-416.0)	21.5	-	-	-	-	-	-	-	-	16
38025	(495.0-499.5)	4.5	-	-	-	-	-	-	-	-	< 2
	BECK 8										
38001	(24.0- 30.0)	6.0	-	29	-	-	-	110	< 0.5	8	11
38002	(30.0- 40.0)	10.0	-	20	-	-	-	32	< 0.5	2	< 2
38003	(40.0- 50.0)	10.0	-	23	-	-	-	26	< 0.5	4	< 2
38004	(50.0- 60.0)	10.0	-	24	-	-	-	35	< 0.5	4	< 2
38005	(60.0- 70.0)	10.0	-	19	-	-	-	24	< 0.5	2	< 2
38006	(317.8-319.2)	1.4	0.01	-	-	-	0.76	-	< 0.3	-	2
38014	(179.0-180.0)	1.0	-	-	-	-	-	-	-	-	< 2
38015	(236.5-238.0)	1.5	-	-	-	-	-	-	-	-	< 2
38016	(320.0-324.0)	4.0	-	-	-	-	-	-	-	-	< 2
38017	(335.0-341.0)	6.0	-	-	-	-	-	-	-	-	< 2
38018	(375.5-377.5)	2.0	-	-	-	-	-	-	-	-	< 2

Sample No.			Cu %	Cu ppm	Ni %	Ni ppm	Zn %	Zn ppm	Ag ppm	Pb ppm	Au ppb
	BECK 9										
38026	(171.5-173.0)	1.5	-	1100	-	84	-	-	-	-	12
38027	(218.0-219.0)	1.0	-	-	-	-	-	-	-	-	20
38028	(225.0-227.5)	2.5	-	-	-	-	-	-	-	-	< 2
38029	(399.0-406.0)	7.0	-	-	-	-	-	-	-	-	3
38030	(410.0-430.0)	20.0	-	25	-	-	-	21	-	4	< 2
38031	(448.0-460.0)	12.0	-	130	-	-	-	140	-	4	410
38032	(465.0-468.0)	3.0	-	170	-	-	-	28	-	4	240
38033	(503.5-509.0)	5.5	-	-	-	-	-	-	-	-	14
38034	(562.0-569.0)	7.0	-	-	-	-	-	-	-	-	9

UNION MINIERE EXPLORATIONS AND MINING CORPORATION LIMITED
DRILL RECORD.

AREA: BECK | Hole No.: Be # 1 | Depth: 401' | Drilled By: Dominik | Described By: P. Burchell
ANOMALY: B2 | Bearing and Dip: 250°/-50° | Started: Oct. 19/80 | Machine: Inspiration
CLAIM: | Local Coord. X= Y= Z= L1250N; 562.5E | Completed: Oct. 23/80 | Diam Drill: AQ

Depth From	Depth To	% Core	Description & Lithology	Mineralization	Dip to C.A.	No. of Sampl
0	23.5		Casing			
23.5	45.0	95% recovery	Lapilli Tuff (intermediate to mafic) - dark gray in colour - approximately andesitic in composition - fine to medium grained - about 90% crystals, 10% glass - crystals average 8 to 10 mm in size - mostly amphiboles randomly arranged - glassy matrix composed of combination of quartz and calcite - trace py and cp as small blebs - weakly foliated at 45° to C.A.	trace py, cp	45°	
45.0	51.5	100% recovery	Amphibole schist - dark gray in colour - fine grained - strongly foliated at 45° to C.A. - thin quartz banding parallel to foliation - weakly magnetic - stringers of py and po - about 10% sulphides - unknown peacock blue mineral along fracture cleavage	py, po (10%)	45°	
51.5	67.0		Lapilli Tuff - as previously described (from 23.5' to 45.0') - locally biotite rich	trace py, cp		

Be # 1

Depth From	Depth To	% of Core	Description & Lithology	Mineralization	Dip C.A.	No. of Sample
67.0	102.0		Intermediate to Mafic Tuff	barren		
			- very fine grained - almost a glass		60°	
			- medium gray in colour			
		100%	- locally biotite rich along fracture cleavages			
			- dacitic to andesitic in composition			
			- increasingly quartz rich down the hole			
			- weakly foliated at 60° to C.A. at 90'			
			- slightly coarser grained at the end of the section			
			- barren of visible sulphides			
			- contact at 102' is distinct			
			- intermediate tuff (above contact) is brecciated			
			- matrix composed of small calcite stringers			
102.0	104.0		Mafic Tuff			
			- very fine grained	barren		
			- dark gray to black in colour		60°	
		100%	- locally biotite rich			
			- basaltic in composition			
			- weak foliation at 60° to C.A.			
			- barren of visible sulphides			
104.0	119.5		Intermediate to Mafic Tuff			
			- as previously described (67.0' to 102.0')	barren		
		100%	- locally epidote rich along fracture cleavages			
119.5	206.5		Mafic Tuff			
			- as previously described (from 102.0' to 104.0')			
			- gradational contact with above unit			
		95%	124.0 to 130.0 - strongly foliated at 45° to C.A.			
			- locally amphibole rich			
			- thin biotite bands parallel to foliation			
			130.0 to 131.0 - mottled appearance due to quartz enrichment			
			131.0 to 134.0 - as previously described 124' to 130'			

Be # 1

Depth From	Depth To	% of Core	Description & Lithology	Mineralization	Zip	No of Samp
119.5	206.5		(Cont'd.)			
			134.0 to 138.5 - mottled appearance - locally epidote rich - slightly vuggy - subhedral quartz crystals in open vugs - fracture fill py, po and cp - about 10% sulphides - weakly magnetic - 1" massive py, po at 137'	py, po, cp (10% sulphides)		
			138.5 to 140.0 - mottled appearance from sphalerite (?) or garnet clusters - about 10 to 15% - locally biotite and epidote rich - about 1% to 2% sulphides - py and po	py, po sph (?)		
			140.0 to 142.5 - as previously described 134 to 138.5' - about 2% sulphides	py, po, cp (2% sulphides)		
			142.5 to 143.5 - as previously described 138.5 to 140'	py, po, sph (?)		
			143.5 to 144.5 - as previously described 131 to 134' - minor py, po, cp	py, po, cp		
			144.5 to 146.5 - as previously described 138.5 to 140'	py, po, sph(?)		
			146.5 to 148.0 - as previously described 131 to 134'	py, po		
			148.0 to 150.0 - as previously described 138.5 to 140'	py, po, sph(?)		
			150.0 to 154.0 - as previously described 131 to 134' - 1" massive py zone at 152'	py, po		
			154.0 to 159.0 - as previously described 138.5 to 140'	py, po, sph(?)		
			159.0 to 162.0 - as previously described 131 to 134'	py, po		
			162.0 to 165.0 - as previously described 138.5 to 140'	py, po, sph(?)		

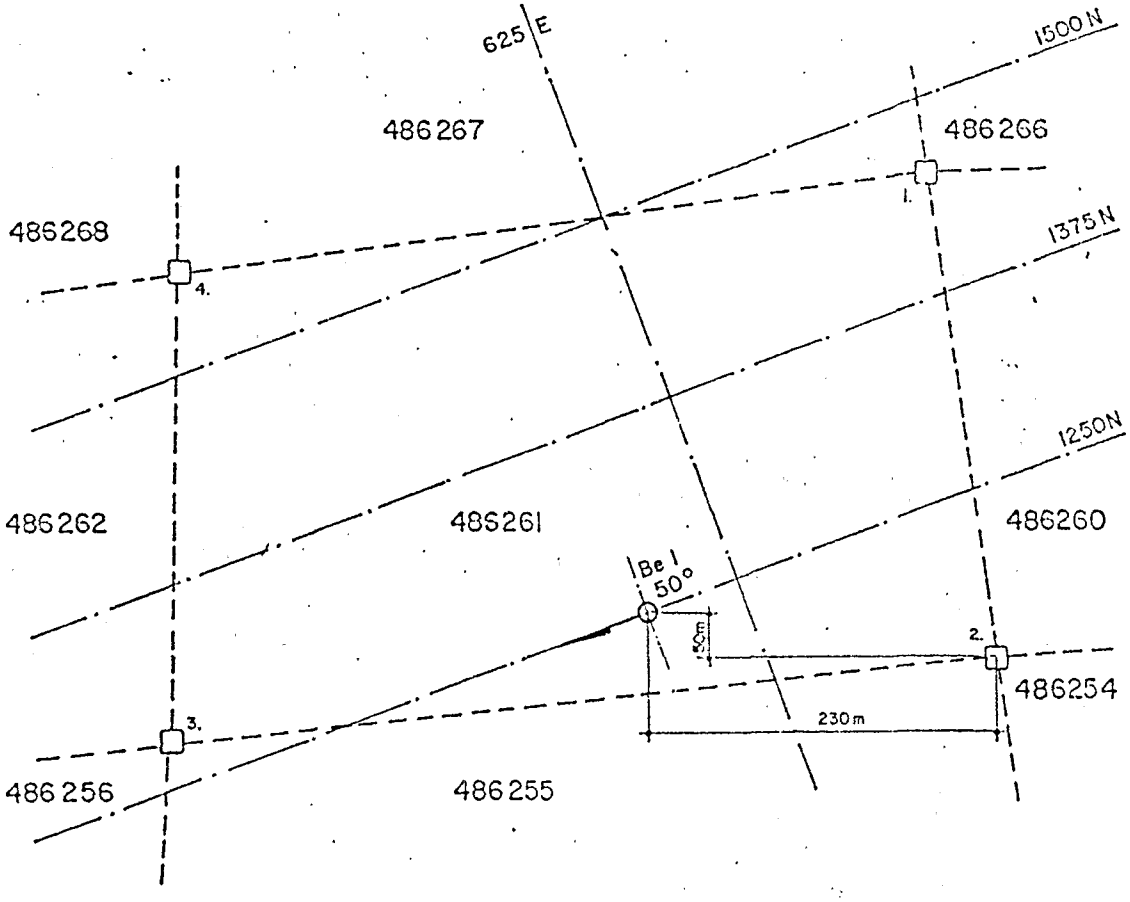
Depth From	Depth To	% of Core	Description & Lithology	Mineralization	Dip to C.A.	No. of Samp
119.5	206.5		(cont'd.)			
			165.0 to 180.0 - as previously described 131 to 134' - several 1" massive py, po zones - weakly magnetic - common thin veins of py, po - about 5% sulphides	py, po		
			180.0 to 182.5 - as previously described 138.5 to 140' - 1" massive py zone at 182' - very vuggy	py, po, sph(?)		
			182.5 to 185.5 - as previously described 131 to 134' - disseminated and fracture fill py, po - about 5% sulphides	py, po		
			185.5 to 196.0 - as previously described 138.5 to 140' - semi massive sulphides throughout - about 10% sulphides	py, po, sph(?)		
			196.0 to 198.5 - as previously described 131 to 134' - minor cp at 197.75'	py, po, cp		
			198.5 to 201.0 - as previously described 138.5 to 140'	py, po, sph(?)		
			201.0 to 205.0 - as previously described 131 to 134'	py, po		
			205.0 to 206.5 - as previously described 138.5 to 140'	py, po, sph(?)		
206.5	214.0	90%	Intermediate to Mafic Tuff - fine grained, gray in colour - muscovite and quartz rich - approximately dacitic to andesitic - foliation at 45° to C.A. - less than 1% po and py	py, po (< 1%)	45°	

Be # 1

52 J/02 NE-0051 #2

Depth From	Depth To	% of Core	Description & Lithology	Mineralization	Fig	No. of Samp
214.0	281.0		Mafic Tuff - as previously described 131 to 134'	py, po | - some small mottled zones (as previously described 138.5-140')(3% sulphides - quartz rich locally - fracture fill py and po - about 3% sulphides - locally calcite rich (up to 1" veins) - some small brecciated zones - around 280', becoming more quartz rich - composition intermediate to mafic - gradational change		
281.0	326.5		Intermediate to Mafic Tuff - as previously described 200.5 to 214.0' - small zones of mottled garnetiferous mafic tuff - thinly banded py and po - about 5% sulphides	py, po		
326.5	401.0		Intermediate Tuff - dacitic in composition - fine grained - gray in colour - small lapilli tuff zones - quartz rich zones - thinly banded biotite and po, py - about 2% sulphides - common calcite enrichment	py, po		
	401.0		END OF HOLE <u>Acid Tests</u> -45° @ 200' -43° @ 400'			

52J/02NE-0051 #3



N

Roger J. Cavell, P. Eng.
Chief Geophysicist

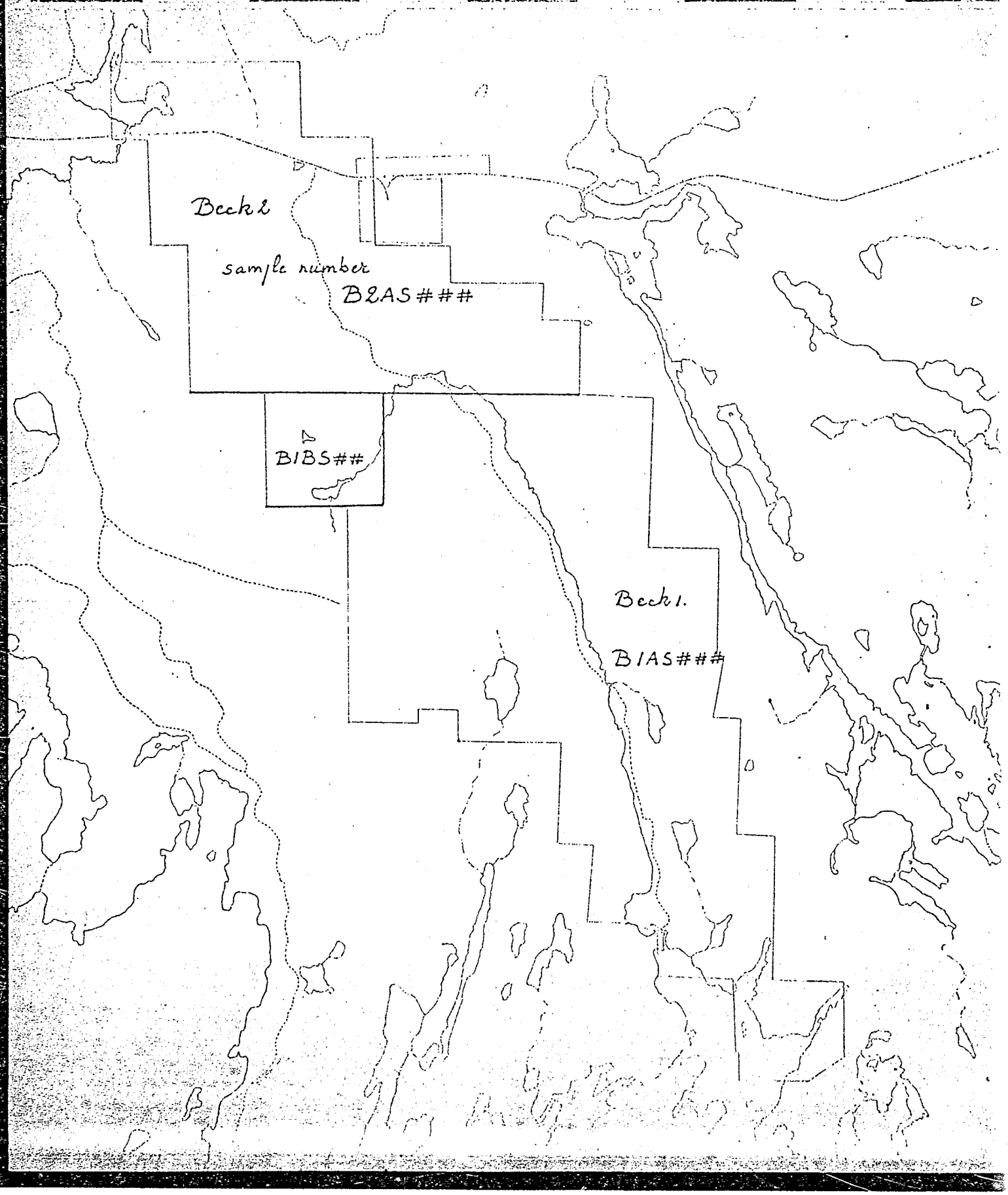
Location D.D.H. Be 1

Scale : 1:5000

UMEX Inc.

Beck 1 and 2 claim block

surface sample numbering



FWM

Ministry of Natural Resources
Ontario

Mining Lands

Report of Work
(Geophysical, Geological, Geochemical and Expenditures)

The Mining Act

52J/02NE (62) #83-41

2.5564 52J/02NE-0051

Instructions: – Please type or print.
– If number of mining claims traversed exceeds space on this form, attach a list.
Note: – Only days credits calculated in the "Expenditures" section may be entered in the "Expend. Days Cr." columns.
– Do not use shaded areas below.

Type of Survey(s)	Township or Area
Geological Survey	Beckington Lake Area M-1740

Claim Holder(s)	Prospector's Licence No.
UMEX Inc.	T-133

Address: 1935 Leslie Street, Don Mills, Ontario, M3B 2M3

Survey Company	Date of Survey (from & to)	Total Miles of line Cut
UMEX Inc.	22 04 82 (Day Mo. Yr.) 09 08 82 (Day Mo. Yr.)	Part of previous gri

Name and Address of Author (of Geo-Technical report): J.-J. Lefebvre, UMEX Inc., 1935 Leslie Street, Don Mills, Ontario, M3B 2M3

Credits Requested per Each Claim in Columns at right

Special Provisions		Days per Claim
For first survey: Enter 40 days. (This includes line cutting)	Geophysical	
	· Electromagnetic	
	· Magnetometer	
For each additional survey: using the same grid: Enter 20 days (for each)	· Radiometric	
	· Other	
	Geological	20
	Geochemical	

Man Days		Days per Claim
Complete reverse side and enter total(s) here	Geophysical	
	· Electromagnetic	
	· Magnetometer	
	· Radiometric	
	· Other	
	Geological	
	Geochemical	

Airborne Credits		Days per Claim
Note: Special provisions credits do not apply to Airborne Surveys.	Electromagnetic	
	Magnetometer	
	Radiometric	

Expenditures (excludes power stripping)

Type of Work Performed

Performed on Claim(s)

Calculation of Expenditure Days Credits

Total Expenditures $ ÷ 15 = Total Days Credits

Instructions: Total Days Credits may be apportioned at the claim holder's choice. Enter number of days credits per claim selected in columns at right.

Mining Claims Traversed (List in numerical sequence)

Mining Claim Prefix	Mining Claim Number	Expend. Days Cr.
Pa	486271 etc..	
		20
	See attached	
	appendix A	

Mining Claim Prefix	Mining Claim Number	Expend. Days Cr.

RECEIVED
JUN 9 1983
MINING LANDS SECTION

PATRICIA MINING DIV.
RECEIVED
APR 12 1983
A.M. 7 8 9 10 11 12 1 2 3 4 5 6 P.M.

Pa. 436823

Total number of mining claims covered by this report of work: 127

per revised statement

For Office Use Only

Total Days Cr. Recorded	Date Recorded	Mining Recorder
2540	April 12, 1983	
	Date Approved as Recorded	Branch Director

Date: April 8, 1983 Recorded Holder or Agent (Signature): Roger J. Cavén

Certification Verifying Report of Work

I hereby certify that I have a personal and intimate knowledge of the facts set forth in the Report of Work annexed hereto, having performed the work or witnessed same during and/or after its completion and the annexed report is true.

Name and Postal Address of Person Certifying: Roger J. Cavén, UMEX Inc., 1935 Leslie Street, Don Mills, Ontario, M3B 2M3

Date Certified: April 8, 1983 Certified by (Signature): Roger J. Cavén

1362 (81/9)

Geol. Geol. 83-42 Geol. 2.5564

525/02 NE-0051 #6

Pa 486071	✓	Pa 486022	✓	96	✓
72	✓	✓ 23	✓	97	✓
✓ 73	✓	24	✓	✓ 486102	✓
74	✓	25	✓	03	✓
75	3/4	26	✓	04	✓
77	✓	30	✓	09	✓
78	✓	31	✓	10	✓
79	✓	32	✓	11	✓
80	✓	33	✓	12	✓
		38	✓	16	✓
Pa ✓ 136823	✓	39	✓	17	✓
24	✓	40	✓	18	✓
25	✓	47	✓	19	✓
26	✓	49	✓	20	✓
28	✓	50	✓	21	✓
29	✓	52	✓	25	✓
30	✓	59	✓	26	✓
31	✓	60	✓	27	✓
32	✓	62	✓	28	✓
33	✓	63	✓	29	✓
34	✓	65	✓	30	✓
35	1/2	66	✓	31	✓
38	✓	68	✓	32	✓
		69	✓	34	✓
Pa 437823	✓	87	✓	35	✓
24	✓	88	✓	36	✓
25	✓	89	✓	✓ 486254	✓
26	1/4	90	θ	55	✓
✓ 27	✓	92	✓	56	✓
28	✓	93	✓	57	✓
29	✓	94	✓	58	✓
30	✓	95	✓	60	✓

	Geol	Geoch		Geol	Geoch	52J/02NE-0051	#7
4862	✓	Ø	Pa 487 [illegible]	½			
[illegible] ✓	✓	Ø	[illegible]	Ø			
[illegible]	✓	Ø	[illegible]	½		* claims not coloured	
[illegible]	✓	Ø	[illegible]	¼		in yellow were not	
[illegible]	✓		[illegible]	Ø		indicated on the	
[illegible]	✓		39	Ø		maps provided	
[illegible]	✓		40	Ø		for Geological survey	
[illegible]	✓		Pa 6[illegible]26	✓			
[illegible]	✓		612002	Ø			
			[illegible]	✓			
Pa 4863[illegible]	½		[illegible]	✓			
✓ [illegible]	½		06	Ø			
[illegible]	✓		[illegible]	✓			
4870[illegible]	✓		[illegible]	✓			
[illegible]	✓		[illegible]	✓			
[illegible]	✓		[illegible]	✓			
[illegible]	✓						

52 J/02 NE-0051 #8

APPENDIX "A"

GEOLOGICAL SURVEY

BOUCHER TWP. - M.1664

Pa 486271
486272
486273

Pa 486274
486275
486277

Pa 486278
486279
486280

BECKINGTON LAKE - M.1740

Pa 436823
436824
436825
436826
436828
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436830
436831
436832
436833
436834
436835
436838

Pa 437423
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Pa 486022
486023
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Pa 486047
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Pa 486254
486255
486256
486257
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486260
486261
486262
486263
486264
486266
486267
486268
486269
486270

Pa 486309
486311
486312

M.T.C. Gravel Pit No. 1654

Gravel File Nº 182282

PROJECTED LINE

Harris Lake

BOUCHER TOWNSHIP
M-1664
SCALE: 1 INCH = 40 CHAINS
40 chains

CU
2.556 ha

MTC Gravel Pit NR IF-27

7 Feb. 3/84

HEVRIER TWP.

BECKINGTON LAKE
M-1740
Scale: 1" = 40 CHAINS

CU

CU

CU

CU

Beckington

Lake

Richan Lake

Wellington

Quiatte

Couture

Sturgeon Lake

Sturgeon Bay

Mitchell

Queens

SAVANT LAKE INTERMEDIATE AERODROME FILE 97677

PHILLIPS & RENNER, O.L.S. 1931 LINE

SV 378

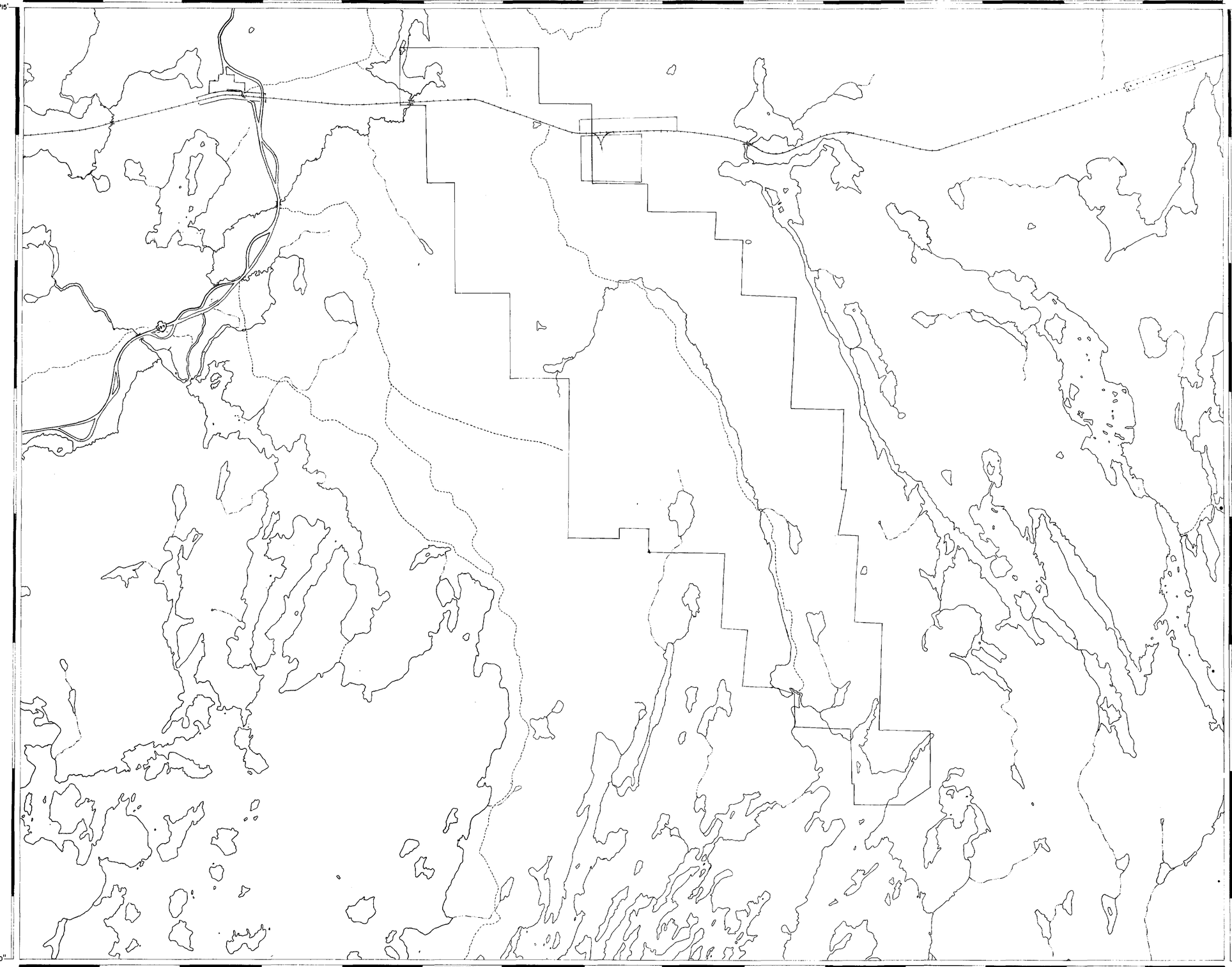
525/02NE-0051,#1

90°45'

90°30'

50°15'

50°15'



50°07'30"

50°07'30"

90°45'

90°30'

Figure No. 1

BECK 1 & 2 AREA

LOCATION MAP

Scale: 2" = 1 Mile

UMEX CORPORATION LTD.

DRAWN BY:
DATE:
SURVEYED BY:

DWG. No. 25564

52J/02NE-0051,#2

FIG. 2

GEOLOGY

ABREVIATIONS		LEGEND
a	breccia- tuff	GRANODIORITE
b	lapilli- tuff	MAFIC METAVOLCANICS
And	andalusite	SIL. IRON FORMATION COMPLEX
Chd	chloritoide	INTERMEDIATE METAVOLCANICS
Chl	chlorite	FELSIC METAVOLCANICS
Cp	chalcopyrite	1 Epiclastic tuffs
Cs	chlorite stringers	2 Pyroclastic tuffs & lapillis
fels	felsic	3 Pyroclastic breccia
Gt	garnet	4 Crystal tuffs
Ky	kyanite	O 84 SAMPLE & NUMBER
Mt	magnetite	FIELD OBSERVATION
Po	pyrrhotite	MAFIC
Py	pyrite	INTERMEDIATE
Qz	quartz veins	SERICITIZATION
S	sulfides	ALUMINE RICH
Si	silicification	SERICITIZATION & ALUMINE RICH
Sid	siderite	
Sl	sillimanite	
St	staurolite	
o	feldspar porphyry	
+	quartz porphyry	

Located Claim Post.
Assumed location of C.P.

SCALE : 1" = 125 m

BECK AREA
GRID B2

DWG. Nº 1.

J.J. LEFEBVRE, PH.D.
Research Geologist

UMEX Inc.

52J/02NE-0051, #3

25564

1000 W
750 W
500 W
250W
B.L.O.
250 E
500 E
750 E
1000 E
1250 E
1500E
1750 E
2000 E

486097 — Pinus banksiana, Picea glauca

486104 — Pinus banksiana

486112 — rare Betula papyfera

486113 — Pinus banksiana

Picea mariana

486121

GREAT LAKES PAPER CAMP

486111 — and Abies balsamea

486096 — Pinus banksiana, Picea glauca

Pinus banksiana, Picea glauca, Thuja occidentalis

486103 — Pinus banksiana

Pinus banksiana

486110

Pinus banksiana

486120

rare Betula papyfera (Abies balsamea ?)

486102 — Pinus banksiana

486119

GRAVEL PIT

486109 — Pinus banksiana

Alnus rugosa

486128

486101

Pinus banksiana

Picea maniana

Alnus rugosa

(Thuja occidentalis 486108

(Picea maniana)

486118

Pinus banksiana

486127

Pinus banksiana

486117

486107

486126

486106

486116 — Pinus banksiana

486125

486115

Pinus banksiana

some Picea maniana

486124

486105

486114

486914

486123

ALL CLAIMS COVERED BY GLACIAL SANDY OVERBURDEN.

G. J. Lefebvre M.Sc.

1250 S
1000 S
750 S
500 S
250S
00

J.J. LEFEBVRE, PH.D.
Research Geologist

FIG. 3

UMEX Inc.

GEOLOGY

ABREVIATIONS

a	breccia - tuff
b	lapili - tuff
And	andolusite
Chd	chloritoide
Chl	chlorite
Cp	chalcopyrite
Cs	chlorite stringers
fels	felsic
Gt	garnet
Ky	kyanite
Mt	magnetite
Po	pyrrhotite
Py	pyrite
Qz	quartz veins
S	sulfides
Si	silicification
Sid	siderite
Sl	sillimanite
St	staurolite
o	feldspar porphyry
+	quartz porphyry

LEGEND

- GRANODIORITE
- MAFIC METAVOLCANICS
- SIL. IRON FORMATION COMPLEX
- INTERMEDIATE METAVOLCANICS
- FELSIC METAVOLCANICS
- 1 Epiclastic tuffs
- 2 Pyroclastic tuffs & lapilis
- 3 Pyroclastic breccia
- 4 Crystal tuffs
- SAMPLE & NUMBER
- FIELD OBSERVATION
- MAFIC
- INTERMEDIATE
- SERICITIZATION
- ALUMINE RICH
- SERICITIZATION & ALUMINE RICH

Located Claim Post.
Assumed location of C.P.

SCALE : 1" = 125 m

BECK AREA

GRID B2

DWG. Nº 2.

BRUNING 250-10-70 - M.L.

52J02NE0037 52J02NE0051 BECKINGTON LAKE

230

52J/02NE-0051,#4

25564

52J/02NE-0051,#5

ABREVIATIONS

a	breccia-tuff
b	lapili-tuff
And	andolusite
Chd	chloritoide
Chl	chlorite
Cp	chalcopyrite
Cs	chlorite stringers
fels	felsic
Gt	garnet
Ky	kyanite
Mt	magnetite
Po	pyrrhotite
Py	pyrite
Qz	quartz veins
S	sulfides
Si	silicification
Sid	siderite
Sl	sillimanite
St	staurolite
o	feldspar porphyry
+	quartz porphyry

FIG. 4 GEOLOGY

LEGEND

- MAFIC METAVOLCANICS
- SIL. IRON FORMATION COMPLEX
- METASEDIMENTS
- INTERMEDIATE METAVOLCANICS
- FELSIC METAVOLCANICS
- SAMPLE & NUMBER
- FIELD OBSERVATION
- MAFIC
- INTERMEDIATE
- SERICITIZATION
- ALUMINE RICH
- SERICITIZATION & ALUMINE RICH
- Located Claim Post.
- Assumed location of C.P.

SCALE : 1"=125m

BECK AREA

GRID B1

DWG. Nº 3.

UMEX Inc

J.J. LEFEBVRE, PH.D.
Research Geologist

52J/02NE-0051,#5

ABREVIATIONS

a	breccia - tuff
b	lapili - tuff
And	andalusite
Chd	chloritoide
Chl	chlorite
Cp	chalcopyrite
Cs	chlorite stringers
fels	felsic
Gt	garnet
Ky	kyanite
Mt	magnetite
Po	pyrrhotite
Py	pyrite
Qz	quartz veins
S	sulfides
Si	silicification
Sid	siderite
Sl	sillimanite
St	staurolite
o	feldspar porphyry
+	quartz porphyry

1500W
1250 W
1000 W
750W
500W
250W
B.L.O.
250E
500E
625E B.L.
750E
1000E
1250E
1500 E

1250 S 1000 S 750 S 500S 250 S 0 0 250N 500N 750 N

612012 612007 612003 612008 612004 611926 436824 436828 436825 436826 436823 436827 487062 486067 486315 486314 486313 486068 486069 486065 486066 486052 486051 486050 486048 486049 486047 486046 486045 486044 486043 486042 486041 486040 486039 486038 486037 486036 486035 486034 486033 486032 486031 486030 486029 486028 486027 486026 486025 486024

612007 612003 612012 611926 612008 612004 436824 436828 436825 436826 436823 436827 487062 486068 486069 486065 486066 486052 486051 486050 486067 486315 486314 486313 486049 486047 486048 486046 486045 486044 486043 486042 486041 486040 486039 486038 486037 486036 486035 486034 486033 486032 486031 486030 486029 486028 486027 486026 486025 486024

Gabbro Gabbro
LAKE LAKE
NO OUTCROPS
Mafic metavolcanics
Felsic metavolcanics
Felsic Metavolcanics
Mafic metavolcanics
Felsic meta volcanics
Intermediate metavol.
Sil. Iron Formation
Sil. Iron Formation
Alnus rugosa RIVER SEDIMENTS
Larix laricina
Thuja occidentalis and
Populus balsami- fera
RIVER SEDIMENTS
Felsic metavolcanics
Mafic metavolcanics
Felsic Metavolc.
Mafic metavolc.
Felsic Metavolcanics
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Felsic metavolcanics
Mafic metavolcanics
Felsic metavolcanics
Mafic metavolcanics
Metasediments
Mafic metavolcanics
Felsic metavolcanics
mafic flows.
mafic flows
Picea mariana
rare populus balsamifera
Thuja occidentalis
Alnus rugosa

FIG. 5

Located Claim Post.
Assumed location of C.P.

LEGEND

- SAMPLE & NUMBER
- FIELD OBSERVATION
- MAFIC
- INTERMEDIATE
- SERICITIZATION
- ALUMINE RICH
- SERICITIZATION & ALUMINE RICH
- MAFIC METAVOLCANICS
- SIL. IRON FORMATION COMPLEX
- METASEDIMENTS
- INTERMEDIATE METAVOLCANICS
- FELSIC METAVOLCANICS

GEOLOGY

J.J. LEFEBVRE, PH.D.
Research Geologist

SCALE: 1" = 125m

BECK AREA

GRID B I

DWG. Nº 4.

52J02NE0037 52J02NE0051 BECKINGTON LAKE

250

52J/02NE-0051,#6

M.Sc.

UMEX Inc.

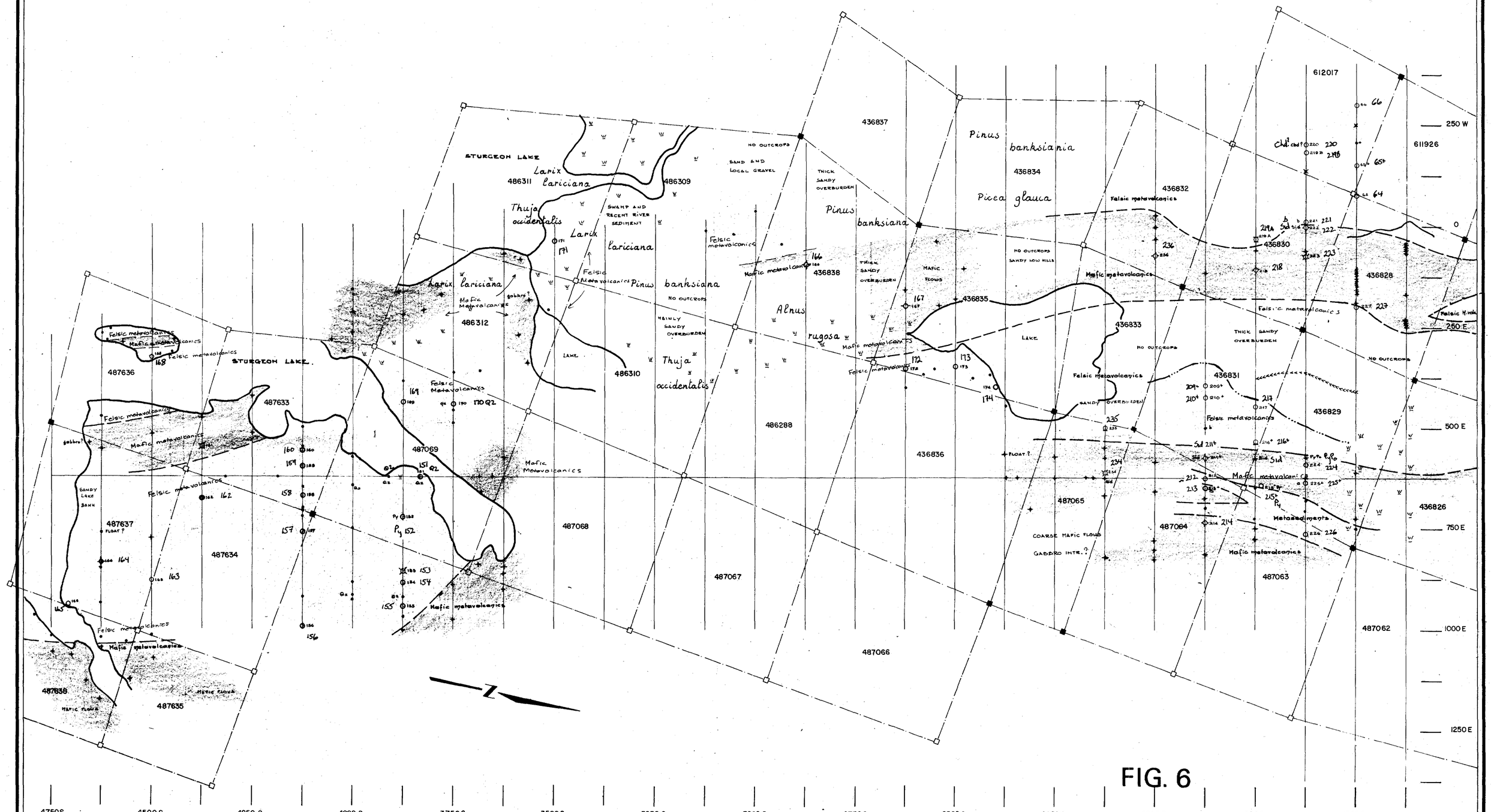

FIG. 6

ABREVIATIONS

○	feldspar porphyry	Mt	magnetite	a	breccia-tuff
+	quartz porphyry	Po	pyrrhotite	b	lapili-tuff
		Py	pyrite	And	andalusite
		Qz	quartz veins	Chd	chloritoïde
		S	sulfides	Chl	chlorite
		Si	silicification	Cp	chalcopyrite
		Sid	siderite	Cs	chlorite stringers
		Si	sillimanite	fels	felsic
		St	staurolite	Gt	garnet
				Ky	kyanite

○84 SAMPLE & NUMBER
• FIELD OBSERVATION
MAFIC
INTERMEDIATE
SERICITIZATION
ALUMINE RICH
SERICITIZATION & ALUMINE RICH

UMEX Inc.

GEOLOGY

LEGEND

- MAFIC METAVOLCANICS
- SIL. IRON FORMATION COMPLEX
- METASEDIMENTS
- INTERMEDIATE METAVOLCANICS
- FELSIC METAVOLCANICS

J.J. LEFEBVRE, PH.D.
Research Geologist

Located Claim Post.
Assumed location of C.P.

SCALE : 1" = 125m

BECK AREA
GRID B1

DWG. Nº 5.

52J02NE0037 52J02NE0051 BECKINGTON LAKE

260

52J/02NE-0051,#7

BRUNING 250-10-70 - Mix.

2.5564

FIG. 7

Na DEPLETION

- ◎ < 0.5 % Na_2O
- ⊠ < 1.0
- ⊡ < 2.0
- ○ > 2.0

1.23 Na_2O content in %

UMEX INC.

- ✚ Located Claim Post
- ✛ Assumed location of C.P.

SCALE : 1" = 125 m

BECK AREA

GRID B2

DWG. Nº 1.

J.J. LEFEBVRE, PH.D.
Research Geologist

POWER LINE

CANADIAN NATIONAL RAILWAY

CHIVELSTON LAKE

1000W — 750W — 500W — 250W — B.L.O. — 250E — 500E — 750E — 1000E

0-0 — 250 N — 500 N — 750 N — 1000 N — 1250 N — 1500 N — 1750 N — 2000 N — 2250 N — 2500 N — 2750 N — 3000 N

52J/02NE-0051, #8

52J02NE0037 52J02NE0051 BECKINGTON LAKE

270

2556 alys

BRUNING 25-10-70 - M1x

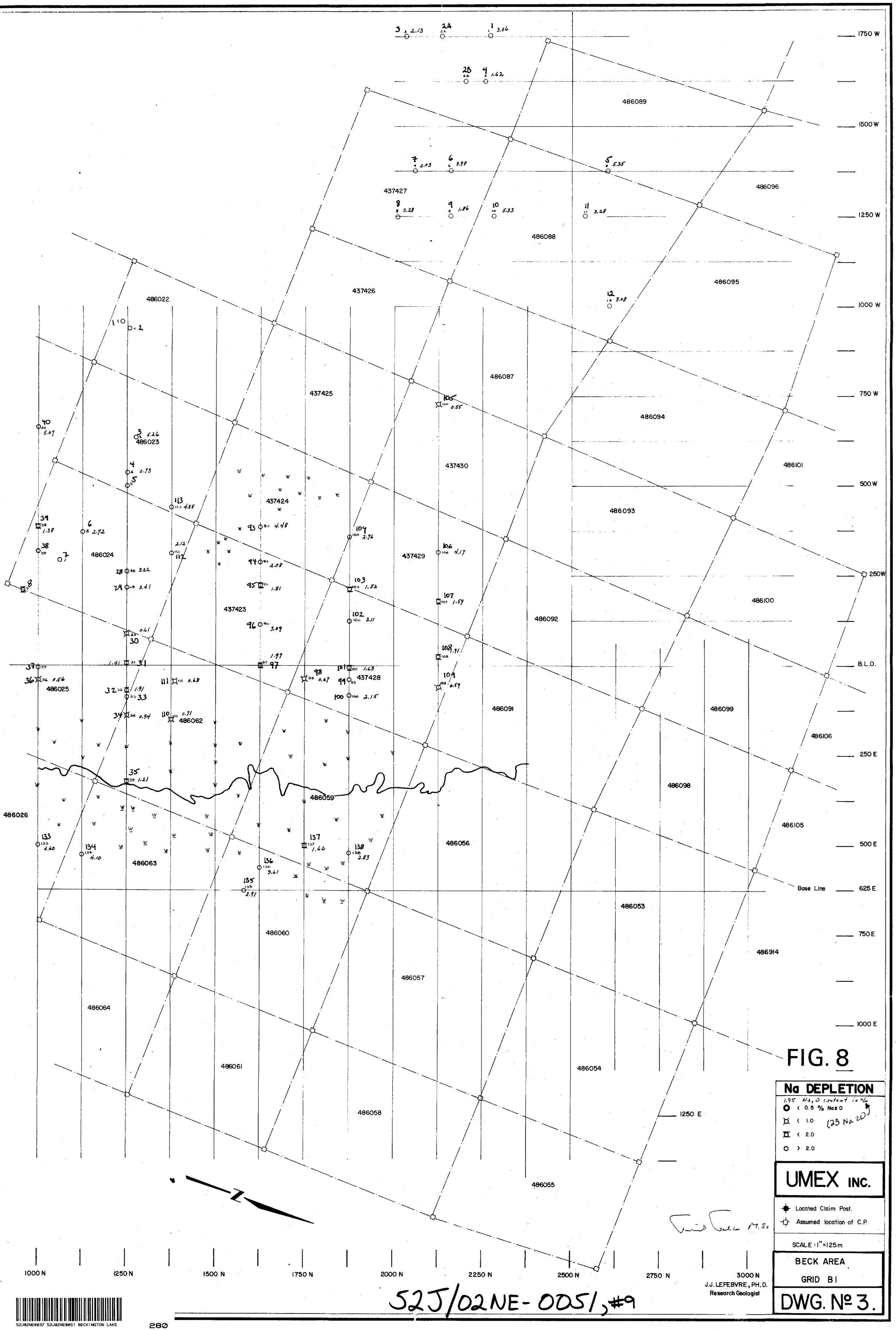

FIG. 8

52J/02NE-0051,#9

FIG. 9

Na DEPLETION

1.63 Na_2O content in %

- ○ < 0.5 % Na_2O
- ⌘ < 1.0 1.47 Na_2O
- ⌑ < 2.0
- ○ > 2.0

Located Claim Post.

Assumed location of C.P.

SCALE: 1" = 125m

BECK AREA

GRID B I

DWG. Nº 4.

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Research Geologist

UMEX INC.

52J02NE0037 52J02NE0051 BECKINGTON LAKE

290

52J/02NE-0051, #10

612017

611926

436837

436834

436832

436838

436835

436833

436830

436828

436831

436829

436836

487065

487064

436826

487636

487633

486311

486309

486312

486310

486288

487069

487637

487634

487068

487067

487066

487063

487062

250 W

0

250 E

500 E

750 E

1000 E

1250 E

4750S

4500 S

4250 S

4000 S

3750S

3500S

3250 S

3000 S

2750S

2500 S

2250 S

2000 S

1750S

1500S

FIG. 10

Na DEPLETION

1.57 Na_2O content in %

O < 0.5 % Na_2O

☆ < 1.0

⌑ < 2.0

O > 2.0

1.47 Na_2O

Located Claim Post.

Assumed location of C.P.

SCALE: 1" = 125m

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Research Geologist

BECK AREA
GRID B1

DWG. Nº 5.

UMEX INC.

52J02NE0037 52J02NE0051 BECKINGTON LAKE

300

52J/02NE-0051, #11

BRUNING 250-10-70 - MIX

25564dwg

POWER LINE

CANADIAN NATIONAL RAILWAY

CHIVELSTON LAKE

1000W
750W
500W
250W
B.L.O.
250E
500E
750E
1000E

0-0 250 N 500 N 750 N 1000 N 1250 N 1500 N 1750 N 2000 N 2250 N 2500 N 2750 N 3000 N

486122 486131 486136 486130 486135 486129 486134 486128 486133 486127 486132 486258 486264 486257 486263 486256 486262 486255 486261 486254 486260 486266 486268 486267 486269 486270 486274 486273 486272 486271 486276 486275 486280 486279 486278 486277

FIG. 11

UMEX INC.

SATURATION INDEX

- F.A. < -10
- < -3.3
- > -3.3

Located Claim Post
Assumed location of C.P.

SCALE: 1" = 125 m

BECK AREA
GRID B2

DWG. Nº 1.

J.J. LEFEBVRE, PH.D.
Research Geologist

52J/02NE-0051,#12

52J02NE0037 52J02NE0051 BECKINGTON LAKE

310

BRUNING 250-10-70 - MI-

25564

52J02NE0037 52J02NE0051 BECKINGTON LAKE

320

1500W

1250 W

1000 W

750W

500W

250W

B.L.O.

250E

500E

625E B.L.

750E

1000E

1250E

1500E

1250 S 1000 S 750 S 500S 250 S 0 0 250N 500N 750 N

611926 612012 612007 612003 612008 612004 612012 436824 436828 436825 436826 436823 487062

486037 486030 486038 486031 486039 486024 486032 486040 486025 486033 486065 486026 486051 486066 486049 486047 486052 486067 486050 486048 486315 486314 486313

LAKE LAKE

A511

Located Claim Post.

Assumed location of C.P.

SCALE: 1" = 125m

FIG.13

SATURATION INDEX

F.A. < -10

< -3.3

> -3.3

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BECK AREA

GRID B I

DWG. Nº 4.

UMEX INC.

52J02NE0037 52J02NE0051 BECKINGTON LAKE

330

52J/02NE-0051, #14

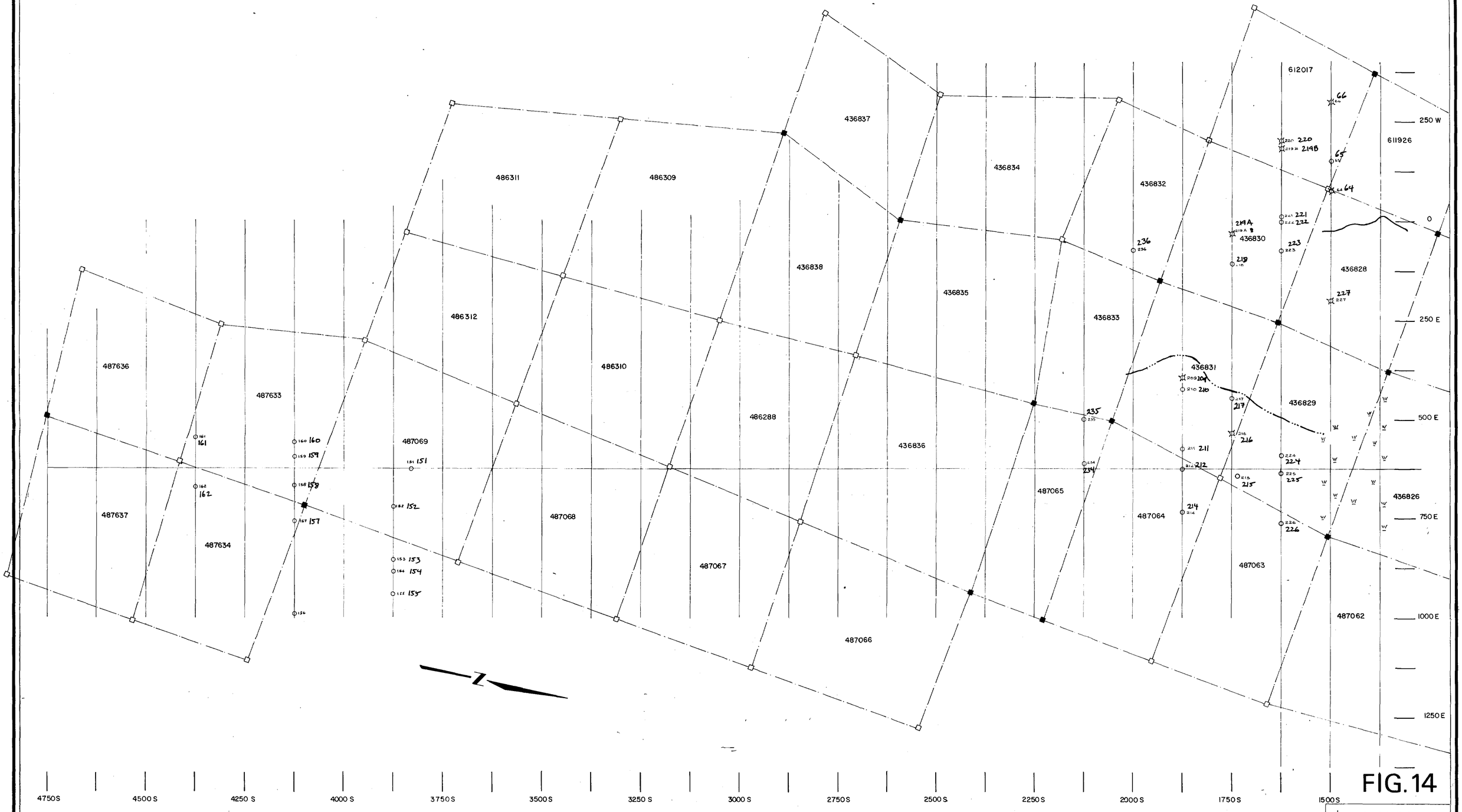

FIG. 14

Located Claim Post.
Assumed location of C.P.

SCALE : 1" = 125m

UMEX INC.

SATURATION INDEX

F.A. < -10
< -3.3
> -3.3

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Research Geologist

BECK AREA
GRID BI

DWG. Nº 5.

52J/02NE-0051, #15

52J02NE0037 52J02NE0051 BECKINGTON LAKE

340

BRUNING 250-10-70 - Mix

2.5564 dup

POWER LINE

CANADIAN NATIONAL RAILWAY

CHIVELSTON LAKE

1000W — 750W — 500W — 250W — B.L.O. — 250E — 500E — 750E — 1000E

0-0 — 250 N — 500 N — 750 N — 1000 N — 1250 N — 1500 N — 1750 N — 2000 N — 2250 N — 2500 N — 2750 N — 3000 N

FIG. 15

UMEX INC.

SILIFICATION

- IMPORTANT : SiO2 > 75% - FS > 1
- MODERATE : FS < 1
  63% - Si content
- Located Claim Post
- Assumed location of C.P.

SCALE : 1" = 125 m

BECK AREA

GRID B2

DWG. Nº 1.

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Research Geologist

52J/02NE-0051, #16

2.556 Y days

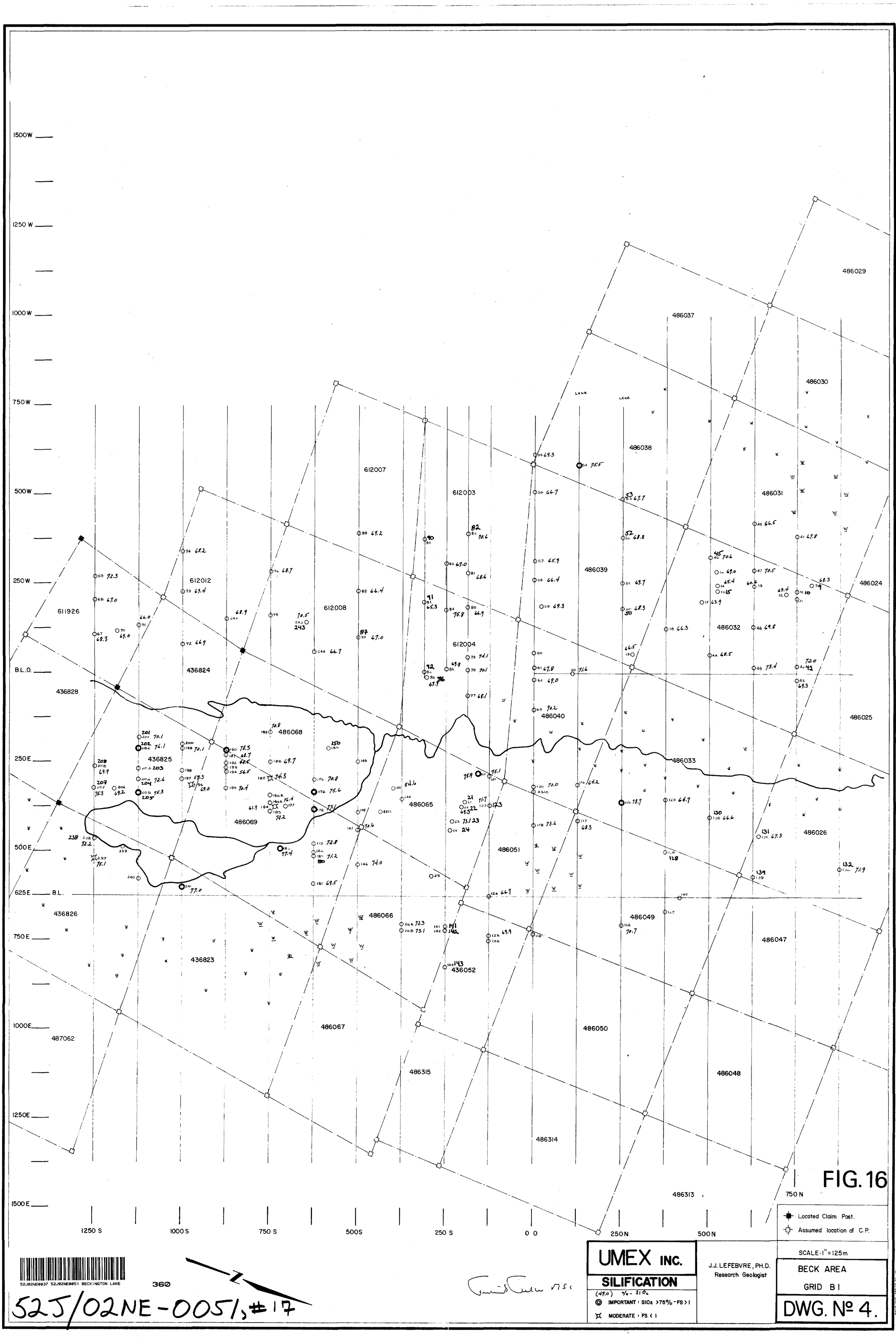

FIG. 16

Located Claim Post.
Assumed location of C.P.

SCALE: 1" = 125m

UMEX INC.

SILIFICATION

(49.0) % - SiO_2

IMPORTANT : SiO_2 > 75% - FS > 1

MODERATE : FS < 1

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Research Geologist

BECK AREA
GRID B I

DWG. Nº 4.

BRUNING 25 1/2-70 - Mix

FIG. 17

Mn ANOMALIES

0.04 Mn Content in %

- HIGHLY ANOMALOUS ROCKS
- ANOMALOUS ROCKS
- WEAKLY ANOMALOUS ROCKS

UMEX INC.

- Located Claim Post.
- Assumed location of C.P.

SCALE : 1" = 125 m

BECK AREA

GRID B1

DWG. Nº 3.

J.J. LEFEBVRE, PH.D.
Research Geologist

M.Sc.

52J/02NE-0051, #18

52J02NE0037 52J02NE0051 BECKINGTON LAKE

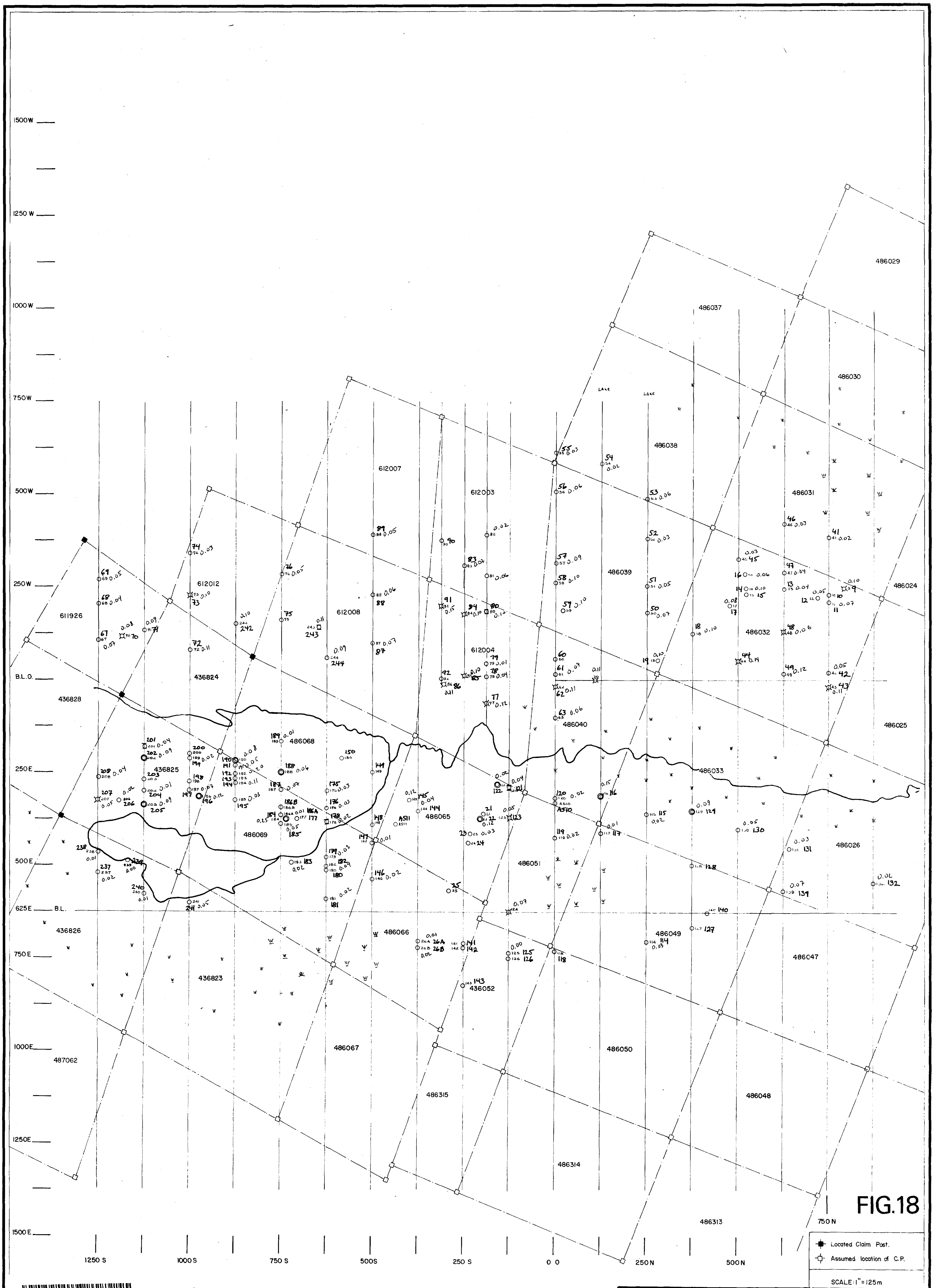

FIG.18

Mn ANOMALIES

0.03 MnO content in %

- HIGHLY ANOMALOUS ROCKS
- ANOMALOUS ROCKS
- WEAKLY ANOMALOUS ROCKS

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Research Geologist

BECK AREA
GRID B1

UMEX INC.

DWG. Nº 4.

52J02NE0037 52J02NE0051 BECKINGTON LAKE

380

52J/02NE-0051, #19

2.5564 rlup

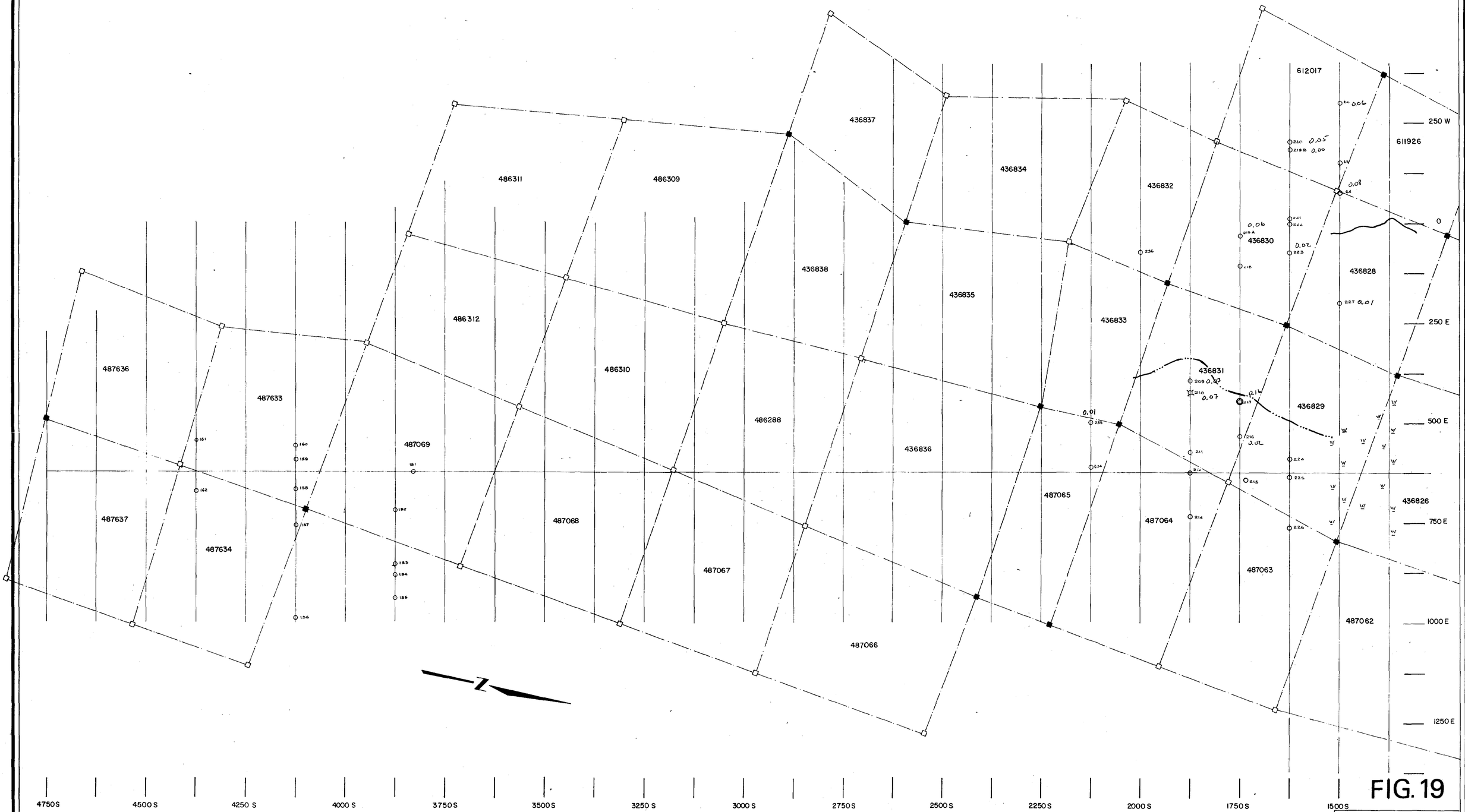

FIG. 19

Located Claim Post.
Assumed location of C.P.

SCALE : 1" = 125m

Mn ANOMALIES
0.03 MnO content in %
HIGHLY ANOMALOUS ROCKS
ANOMALOUS ROCKS
WEAKLY ANOMALOUS ROCKS

J.J. LEFEBVRE, PH.D.
Research Geologist

BECK AREA
GRID B1

DWG. Nº 5.

UMEX INC.

52J02NE0037 52J02NE0051 BECKINGTON LAKE

390

52J/02NE-0051, #20

BRUNING 250-10-70 - Mix.

2.5564 dups

BRUNING 250-10-70-Mix.

52J02NE0037 52J02NE0051 BECKINGTON LAKE

400

2.556 4 relup

BEARING 255 (T) 70 MIN

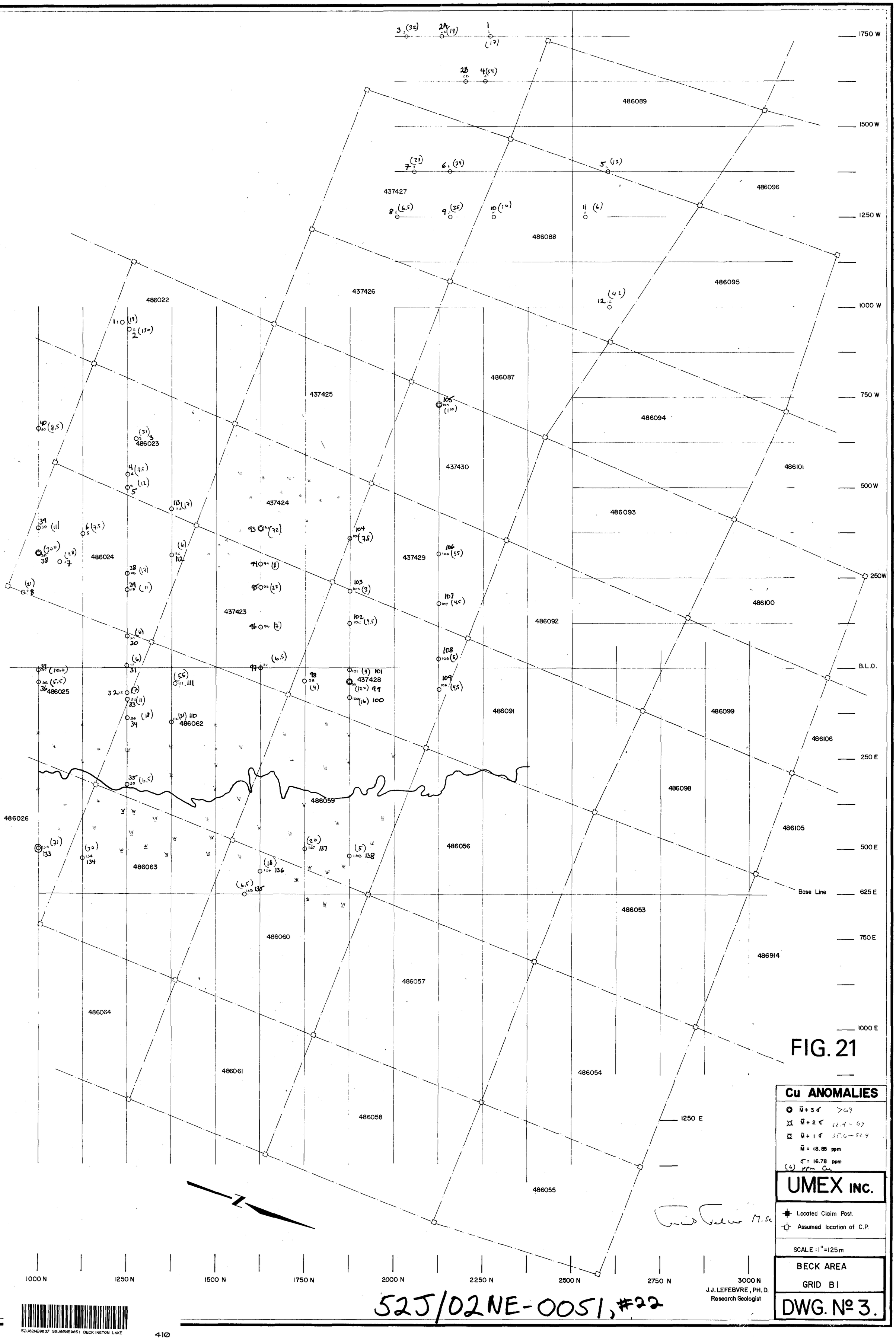

FIG. 21

Cu ANOMALIES

- ⊙ $\bar{M}+3\sigma$ >69
- ⊠ $\bar{M}+2\sigma$ 52.4 – 69
- ⊡ $\bar{M}+1\sigma$ 35.6 – 52.4
- $\bar{M}$ = 18.85 ppm
- σ = 16.78 ppm
- (6) ppm Cu

UMEX INC.

- ✚ Located Claim Post.
- ⌖ Assumed location of C.P.

SCALE : 1"=125m

BECK AREA

GRID B1

DWG. Nº 3.

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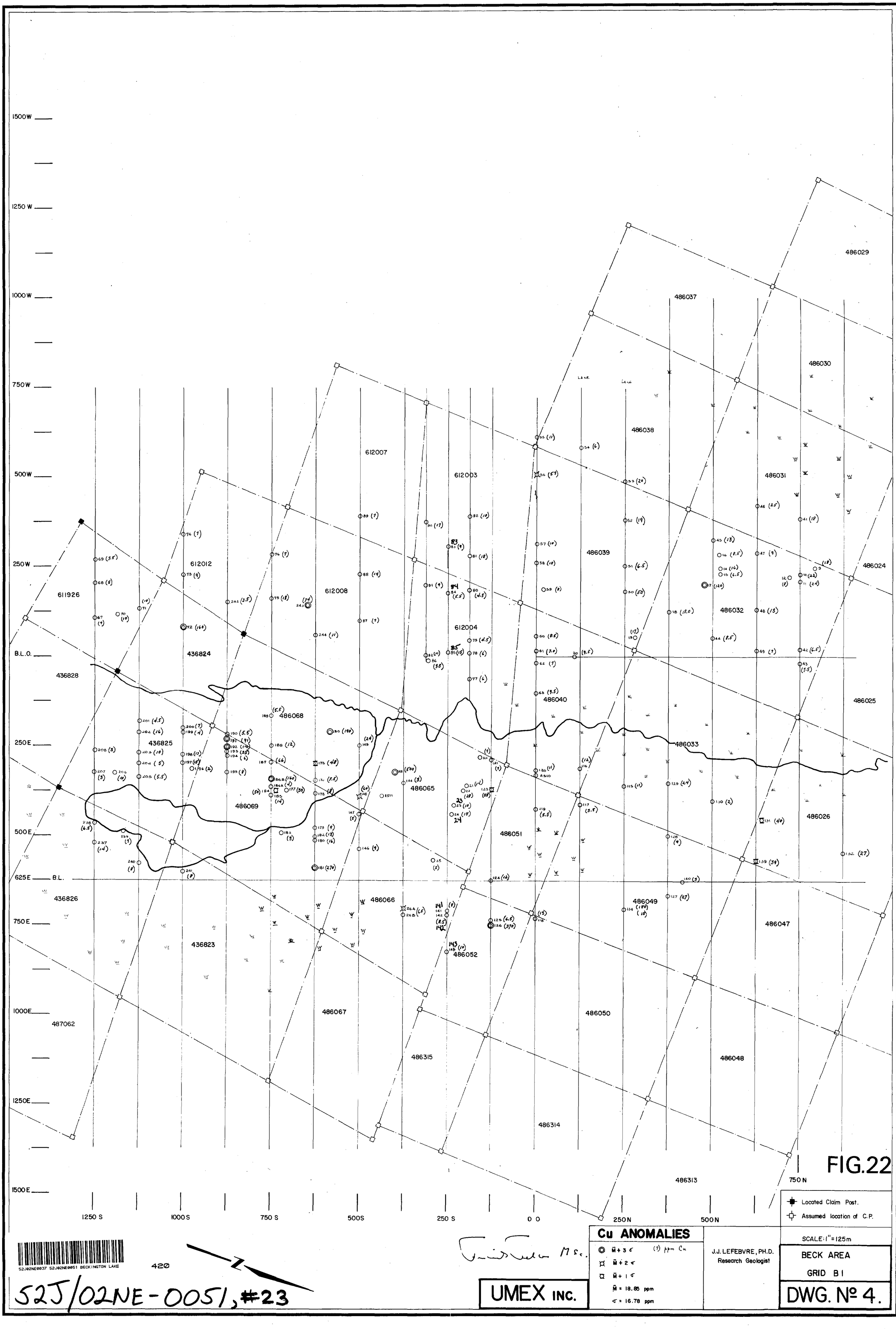
Research Geologist

52J/02NE-0051, #22

2.5SL4 dump



STURGEON LAKE

STURGEON LAKE.

LAKE

N

487636 487633 487637 487634 487638 487635

486311 486309 486312 486310 487069 487068 487067 487066

436837 436834 436832 436838 436835 436833 436830 436831 436829 436836 487065 487064 487063 487062 436828 436826

612017 611926

250 W 0 250 E 500 E 750 E 1000 E 1250 E

4750S 4500S 4250S 4000S 3750S 3500S 3250S 3000S 2750S 2500S 2250S 2000S 1750S 1500S

FIG. 23

Cu ANOMALIES

- ○ M̄ + 3 σ (42) Cu in ppm
- ⌧ M̄ + 2 σ
- ⌑ M̄ + 1 σ
- M̄ = 18.85 ppm
- σ = 16.78 ppm

UMEX INC.

J.J. LEFEBVRE, PH.D.
Research Geologist

- ✱ Located Claim Post.
- ⌖ Assumed location of C.P.

SCALE : 1" = 125m

BECK AREA
GRID B1

DWG. Nº 5.

52J02NE0037 52J02NE0051 BECKINGTON LAKE

430

52J/02NE-0051, #24

BRUNING 250-10-70 - Mfr.

FIG. 24

Zn ANOMALIES

- ⊙ $\bar{M} + 3\sigma$
- ⊠ $\bar{M} + 2\sigma$
- ⊡ $\bar{M} + 1\sigma$
- $\bar{M}$ = 39.24 ppm
- σ = 25.73 ppm
- (72) Zinc content in ppm

UMEX INC.

- ✱ Located Claim Post.
- ✛ Assumed location of C.P.

SCALE : 1" = 125 m

BECK AREA

GRID B2

DWG. Nº 1.

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Research Geologist

52J/02NE-0051, #25

52J02NE0037 52J02NE0051 BECKINGTON LAKE

440

BRUNING 250-10-70 - Min.

BRUNTING 250.10.70 - MI.

FIG. 25

Zn ANOMALIES

- ◎ $\bar{M} + 3\sigma$
- ⊠ $\bar{M} + 2\sigma$
- ⊡ $\bar{M} + 1\sigma$
- $\bar{M}$ = 39.24 ppm
- σ = 25.73 ppm
- (72) Zinc content in ppm

UMEX INC.

- Located Claim Post.
- Assumed location of C.P.

SCALE : 1" = 125 m

BECK AREA

GRID B1

DWG. Nº 3.

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Research Geologist

52J/02NE-0051, #26

25564

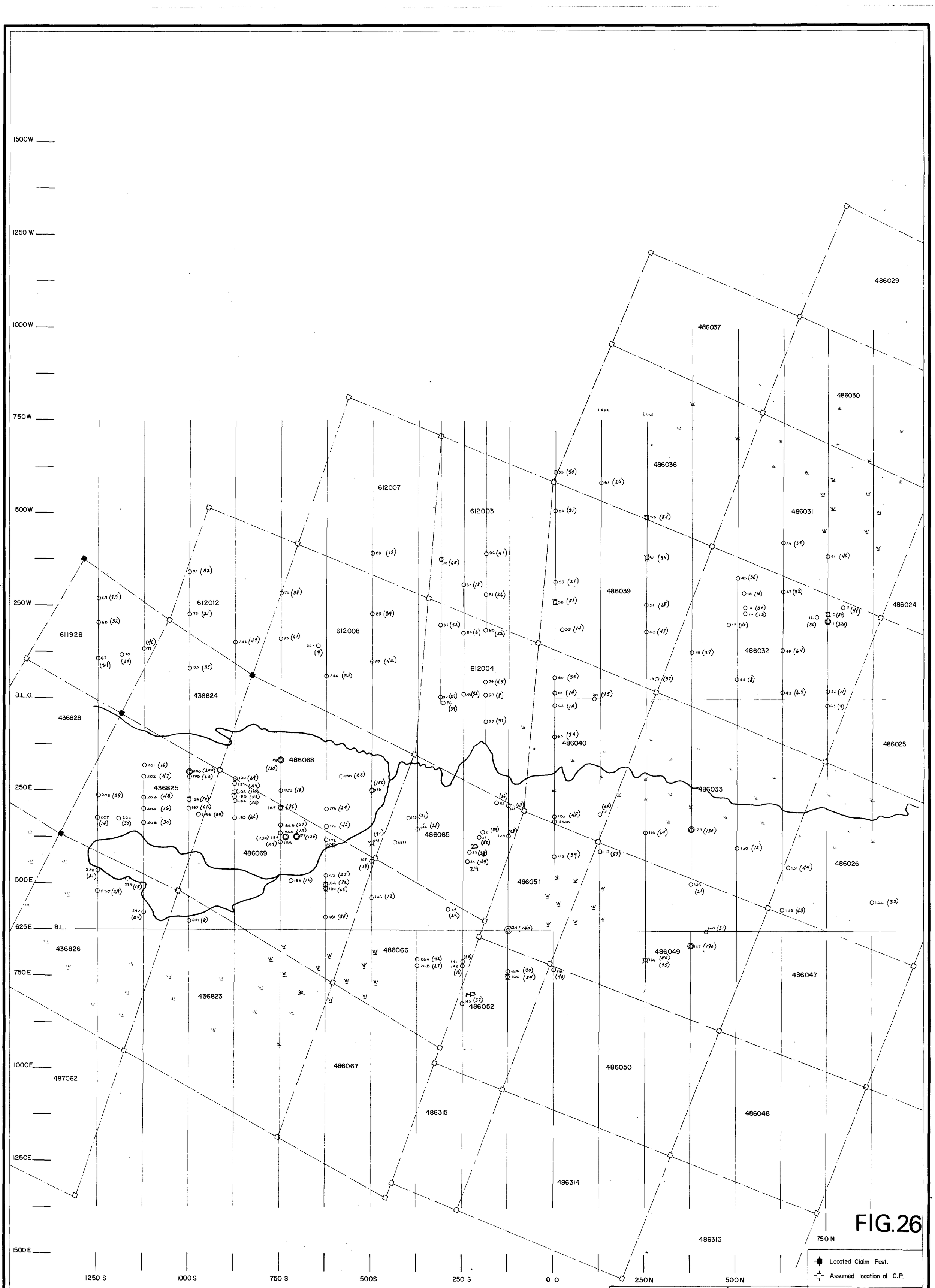

FIG.26

Zn ANOMALIES	
○ $\bar{M}+3\sigma$	
⌑ $\bar{M}+2\sigma$	
⌑ $\bar{M}+1\sigma$	
$\bar{M}$ = 39.24 ppm	
σ = 25.73 ppm	

J.J. LEFEBVRE, PH.D.
Research Geologist

Located Claim Post.
Assumed location of C.P.

SCALE: 1" = 125m

BECK AREA
GRID B1

DWG. Nº 4.

UMEX INC.

52J02NE0037 52J02NE0051 BECKINGTON LAKE

460

52J/02NE-0051, #27

2.5564

STURGEON LAKE

STURGEON LAKE.

LAKE

612017

611926

436837

436834

436832

436838

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436826

487636

487633

487637

487634

487638

487635

487069

486311

486309

486312

486310

486288

487068

487067

487066

487065

487064

487063

487062

250 W

0

250 E

500 E

750 E

1000 E

1250 E

4750 S

4500 S

4250 S

4000 S

3750 S

3500 S

3250 S

3000 S

2750 S

2500 S

2250 S

2000 S

1750 S

1500 S

FIG. 27

Zn ANOMALIES

- $\bar{M} + 3\sigma$
- $\bar{M} + 2\sigma$
- $\bar{M} + 1\sigma$
- $\bar{M}$ = 39.24 ppm
- σ = 25.73 ppm
- (74) Zinc content in ppm

Located Claim Post.

Assumed location of C.P.

SCALE : 1" = 125m

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Research Geologist

UMEX INC.

BECK AREA
GRID B1

DWG. Nº 5.

52J/02NE-0057, #28

52J02NE0037 52J02NE0051 BECKINGTON LAKE

470

BRUNING 250-10-70 - Mix.

2556

POWER LINE

CANADIAN NATIONAL RAILWAY

CHIVELSTON LAKE

1000W
750W
500W
250W
B.L.O.
250E
500E
750E
1000E

0-0 250 N 500 N 750 N 1000 N 1250 N 1500 N 1750 N 2000 N 2250 N 2500 N 2750 N 3000 N

486121 486122 486127 486128 486129 486130 486131 486132 486133 486134 486135 486136 486254 486255 486256 486257 486258 486260 486261 486262 486263 486264 486266 486267 486268 486269 486270 486271 486272 486273 486274 486275 486276 486277 486278 486279 486280

FIG. 28

Pb ANOMALIES

- ⊙ $\bar{M}+3\sigma$
- ⊠ $\bar{M}+2\sigma$
- ⊡ $\bar{M}+1\sigma$
- $\bar{M}$ = 7.14 ppm
- σ = 3.35 ppm
- (12) Lead content in ppm

UMEX INC.

- Located Claim Post.
- Assumed location of C.P.

SCALE : 1" = 125 m

BECK AREA

GRID B2

DWG. Nº 1.

J.J. LEFEBVRE, PH.D.
Research Geologist

52J/02NE-0051, #29

52J02NE0037 52J02NE0051 BECKINGTON LAKE

480

BRUNING 250-10-70 - Mtx.

2.556 values

BRUNING 25-10-70-MM

FIG. 29

Pb ANOMALIES

- ⊙ M̄ + 3σ
- ⌑ M̄ + 2σ
- ⊡ M̄ + 1σ
- M̄ = 7.14 ppm
- σ = 3.35 ppm
- (8) LEAD CONTENT IN PPM

UMEX INC.

- Located Claim Post.
- Assumed location of C.P.

SCALE : 1" = 125 m

BECK AREA

GRID B1

DWG. Nº 3.

J.J. LEFEBVRE, PH.D.
Research Geologist

52J/02NE-0051,#30

52J02NE0037 52J02NE0051 BECKINGTON LAKE


1500W
1250 W
1000W
750W
500W
250W
B.L.O.
250E
500E
625E B.L.
750E
1000E
1250E
1500E
1250 S
1000S
750 S
500S
250 S
0 0
250N
500N
750N
486029
486037
486030
486038
486031
486024
486039
486032
486025
486033
486026
486047
486048
486049
486050
486051
486052
486313
486314
486315
486065
486066
486067
486068
486069
486040
612007
612003
612004
612008
612012
611926
436824
436825
436826
436823
436828
487062
LAKE
FIG.30
Located Claim Post.
Assumed location of C.P.
SCALE: 1"=125m
Pb ANOMALIES
M̄ + 3 σ
M̄ + 2 σ
M̄ + 1 σ
M̄ = 7.14 ppm
σ = 3.35 ppm
(4) LEAD CONTENT IN PPM
J.J. LEFEBVRE, PH.D.
Research Geologist
BECK AREA
GRID B1
DWG. Nº 4.
UMEX INC.
M.Sc
500
52J02NE0037 52J02NE0051 BECKINGTON LAKE
52J/02NE-0051, #31

STURGEON LAKE

STURGEON LAKE

LAKE

487636 487633 487637 487634 487638 487635

486311 486309 486312 486310 487069 487068 487067 487066

486288 436838 436837 436834 436832 436835 436833 436836 487065 487064 487063 487062

612017 611926 436830 436828 436831 436829 436826

161 (4) 160 (4) 159 (2) 158 (2) 157 (8) 164 (4) 164 (84) 163 (4) 165 (60) 156 (10) 152 (12) 153 (10) 154 (4) 155 (12) 151 (2) 169 (30) 170 (44) 181 (14) 166 (78) 167 (74) 172 (10) 173 (10) 174 (2) 235 (4) 234 (12) 238 (10) 218 (14) 219A (4) 220 (4) 219B (4) 219 (2) 64 (12) 66 (8) 65 (2) 221 (20) 222 (8) 223 (6) 227 (2) 209 (4) 210 (2) 217 (10) 216 (2) 211 (12) 212 (20) 213 (4) 214 (14) 224 (4) 225 (8) 226 (10)

250 W 0 250 E 500 E 750 E 1000 E 1250 E

4750S 4500 S 4250 S 4000 S 3750S 3500S 3250 S 3000 S 2750S 2500 S 2250 S 2000 S 1750S 1500 S

FIG. 31

Pb ANOMALIES

- ◎ $\bar{M}+3\sigma$
- ☒ $\bar{M}+2\sigma$
- ◻ $\bar{M}+1\sigma$
- $\bar{M}$ = 7.14 ppm
- σ = 3.35 ppm
- (12) Lead content in ppm

J.J. LEFEBVRE, PH.D.
Research Geologist

- ✸ Located Claim Post.
- ✣ Assumed location of C.P.

SCALE: 1"= 125m

BECK AREA
GRID B1

UMEX INC.

DWG. Nº 5.

52J02NE0037 52J02NE0051 BECKINGTON LAKE

510

52J/02NE-0051,#32

25564