

**2006 GEOLOGICAL and GEOCHEMICAL
ASSESSMENT REPORT
ON THE KLONDIKE PROPERTY**

Comprising the Following Claims:

IDA 1-14, 17-23 and ORO 1-21, 25-28

Located in the
Hamilton Creek Area
Dawson Mining District
Yukon Territory, Canada
N.T.S. 116A/04

Latitude: 64° 09' N
Longitude: 137° 35' W

Prepared for

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EXECUTIVE SUMMARY

The Klondike property consists of 46 quartz mining claims registered in the name of 650399 B.C. Inc., a wholly owned subsidiary of Alexco Resource Corp. (Alexco). It is located within the Tintina Gold Belt, 90 kilometers east of Dawson City, central Yukon Territory.

The Klondike property is located within the Selwyn Basin, which consists of a broad package of Paleozoic sediments extending east-southeast from northwest of Dawson City to the Yukon-Northwest Territory border north of the major northwest-southeast trending Tintina Fault. This stratigraphy consists of shallow shelf to off-shelf marine clastic and chemical sediments, as well as basinal clastic sediments derived from the Ancient North American Platform to the northeast. The Mid-Cretaceous Tombstone-Tungsten Plutonic Suite (95-89Ma) has been emplaced within the Selwyn Basin. Monzonitic to quartz monzonitic members of this suite occur along an east-southeast trending belt extending for over 500 kilometres from northwest of Dawson City to the Yukon-Northwest Territory border.

The Klondike property is situated along an east-west strike of the “Reserve Trend” gold deposits of the Brewery Creek property 30 kilometers to the west (also held by Alexco Resource Corp.) and was staked over significant gold geochemical anomalies. Exploration targets on the property include intrusion related gold (as seen at Fort Knox, Donlin Creek and numerous other properties in the Tintina Gold Belt) and Carlin-style sediment hosted gold. The Klondike property is underlain by three major sedimentary sequences of the Road River Group: a Lower Silurian turbidite sequence consisting of sandstone, siltstone and quartzite; a middle unit consisting of Duo Lake Formation chert with minor siliceous shale, and an upper unit of non-siliceous siltstone, mudstone, shale and minor limestone, possibly of the Steel Formation. Three Cretaceous quartz monzonite stocks, less than 600 metres in diameter, and several east-west trending dikes have been emplaced into this sequence, causing moderate hornfelsing of country rock. A suite of late stage bleached, argillically altered quartz porphyritic dikes less than two metres wide has been emplaced along east-west trending fault zones.

The 2006 field program consisted of a one-day field excursion with a crew of four geologists. The geologists were divided into two teams to conduct mapping, and rock and soil sampling in two traverses across the property. Work focused on gathering geological information on mineralization styles as seen in various lithologies, prospecting beyond the limits of previous work and confirming historical rock and soil geochemical results.

Assay results from all intrusive rock samples returned less than 0.17 parts per million gold, although few of these samples contained veining. Several samples taken from strongly clay altered and oxidized zones (probable fault structures) with variable malachite/crysocolla, green scorodite staining and disseminated pyrite contained background levels of gold with arsenic values to >10,000 parts per million, up to 1.21% copper and anomalous antimony and silver.

Two hornfelsed sedimentary rock samples containing quartz-tourmaline+/-arsenopyrite veins returned the best gold grades. The first returned 1.98 part per million gold, 2000 parts per million arsenic, 76 parts per million bismuth, 98 parts per million lead and 100 parts per million antimony. The second sample contained narrow (<1cm) quartz-tourmaline vein and considerable arsenopyrite with anomalous assay values of 0.81 parts per million gold, 8280 parts per million arsenic, 264 parts per million bismuth, 59 parts per million lead, 168 parts per million antimony and elevated copper at 252 parts per million. All other hornfelsed sediment rock samples contained either quartz veins, tourmaline veins or quartz-tourmaline veins but showed little anomalous gold mineralization, ranging from 0.02 – 0.14 parts per million gold.

Geochemical results for rock samples showed gold in intrusive samples correlated with chromium, lead, antimony and vanadium concentrations but not arsenic. Samples from sedimentary rocks have gold correlating with numerous elements including arsenic, bismuth, lead, antimony as well as elements associated with hornfelsing such as potassium, suggesting that gold is associated with base metal sulphide veining within base metal enriched hornfelsed sediments.

Soil samples show sporadic anomalous gold values (up to 1.04 parts per million) associated with all lithologies, often higher than nearby rock samples taken in 2006. Most soil samples show elevated arsenic levels and higher overall bismuth, lead, antimony and zinc values than seen in rocks samples. Soil geochemistry overall showed a

weak correlation of gold grades with lead values, but no association with arsenic, antimony or other base metals. A moderate to strong correlation amongst arsenic, bismuth, silver, copper, lead, antimony and zinc point to a pervasive base metal sulphide phase. A probable separate gold – sulphide mineralizing phase appears to be more discrete and is likely structurally controlled.

The 2006 rock sample results failed to repeat historical gold grades found in the intrusive units and only sporadically corresponded to historical gold grades in the sediments, otherwise returning far lower values. This is attributed to strong structural control of the mineralization with possible multiple veining events, not all of which would be mineralized.

Recommendations for future work include a new compilation of all assay results to identifying prospective areas to target with a field program, followed by detailed mapping and sampling to define the extents of mineralization, possible fault or vein controls and to delineate possible drill targets. The hornfelsed sediments, particularly where they host quartz-tourmaline breccias, appear to be the most prospective targets as sediment and breccia hosted gold deposits. Systematic mapping and sampling of vein types, orientations and densities in all the intrusive bodies is recommended to test the potential for a Fort Knox style gold deposit. The prospective targets would then be tested with a preliminary drill program, to see if further drilling is warranted.

TABLE OF CONTENTS

	Page
EXECUTIVE SUMMARY	2
1.0 INTRODUCTION	6
2.0 PROJECT DESCRIPTION AND LOCATION.....	6
3.0 ACCESSIBILITY, CLIMATE, LOCAL RESOURCES, INFRASTRUCTURE AND PHYSIOGRAPHY.....	10
4.0 HISTORY	10
4.1 Regional Exploration History and Competitor Activity	
4.2 Property Exploration History	
5.0 2006 EXPLORATION PROGRAM.....	12
5.1 Soil and Rock Sampling Methodology, Preparation and Analysis	
6.0 GEOLOGICAL SETTING	13
6.1 Regional Geology	
6.2 Property Geology	
7.0 2006 EXPLORATION RESULTS.....	17
7.1 Results-Mapping and Rock Sampling	
7.2 Results-Soil Sampling	
8.0 CONCLUSIONS.....	20
9.0 RECOMMENDATIONS.....	22
10.0 REFERENCES.....	23
CERTIFICATES OF QUALIFICATIONS.....	25

LIST OF FIGURES	Page
Figure 1: Property Location and Surrounding Claims.....	7
Figure 2: Property Claim Holdings	9
Figure 3: Regional Geology.....	14
Figure 4: Property Geology with 2006 Rock and Soil Sample Locations...	18

LIST OF TABLES	Page
Table 1: Status of Claim Holdings.....	8
Table 2: List of Geological Formations.....	16

LIST OF APPENDICES
Appendix 1: Personnel and Contractors
Appendix 2: Statement of Expenditures
Appendix 3: Rock Sample Descriptions
Appendix 4: Soil Sample Descriptions
Appendix 5: ALS Chemex Laboratory Certificates

1.0 INTRODUCTION

This report presents the results of the 2006 field program conducted on the Klondike property, located 90 kilometers east of Dawson City within the Tintina Gold Belt of the Yukon Territory (Figure 1). The exploration program consisted of geological mapping and rock and soil sampling conducted on September 3, 2006. Planning, logistics and field work were conducted by NovaGold Resource Inc. exploration personnel on behalf of 650399 BC Ltd. Fireweed Helicopters Ltd provided transportation to the property.

The Klondike property consists of 46 quartz mining claims covering 960 hectares within NTS Sheets 116A/04 in the Dawson Mining District (Figure 2). The claims are currently registered in the name of 650399 B.C. Inc., a wholly owned subsidiary of Alexco Resource Corp. (Alexco), and are all in good standing.

A summary of expenditures for the program is presented in Appendix 2.

The reference datum used is UTM NAD83 Zone 8, unless otherwise noted.

The report was prepared in accordance with the guidelines of the Yukon Quartz Mining Act and is based on field observations made by the NovaGold geologists and geochemical data obtained from samples submitted to an accredited laboratory, with oversight from Qualified Person Mike Stammers of NovaGold Resources Inc. Background information is based on data and geological information gathered from public sources, assessment files and internal company reports and memorandum.

2.0 PROJECT DESCRIPTION AND LOCATION

The Klondike property is located at 64°09' North latitude, 137°35' West longitude on NTS Map Sheet 116A/04 within the Dawson Mining district of the Yukon Territory. The property lies 90 kilometres east of Dawson city, thirty kilometres east of the Brewery Creek property, and within the southern foothills of the Ogilvie Mountains.

Property Holdings

The Klondike Property consists of 46 quartz mining claims (IDA 1-14, 17-23 and ORO 1-21, 25-28) covering 960 hectares within NTS Sheets 116A/04 in the Dawson Mining District (Figure 2). The claims are registered in the name of 650399 B.C. Inc., a wholly owned subsidiary of Alexco Resource Corp., and are all in good standing. Table 1 provides listings of the property holdings for the claim block.

Property Agreement

On February 1, 2005, Alexco Resource Corporation acquired all the issued shares of the company 650399 BC Ltd., (Spectrumsub-a subsidiary of NovaGold) from NovaGold Canada Inc. Through this agreement, Alexco acquired the retained assets of Spectrumsub in British Columbia and the Yukon, including the Klondike property, subject to underlying agreements.

Land Use and Environmental

Activities on the property have been conducted under a current class III Quartz Mining Land Use Permit, approval number LQ00030 with an expiry date of 30 September 2008.



Transportation

-  Cut line
-  Ferry route
-  Limited-use road
-  Railway
-  Road
-  Trail

Quartz Claims

- ☐ Active
☐ Expired
 Quartz
☐ Active
☐ Expired

ALEXCO RESOURCE CORP

Klondike Property, Yukon
Dawson Mining District

Figure 1: Klondike Property Location

January 26, 2006



Scale: 1:323,913

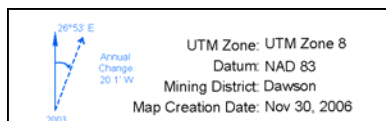
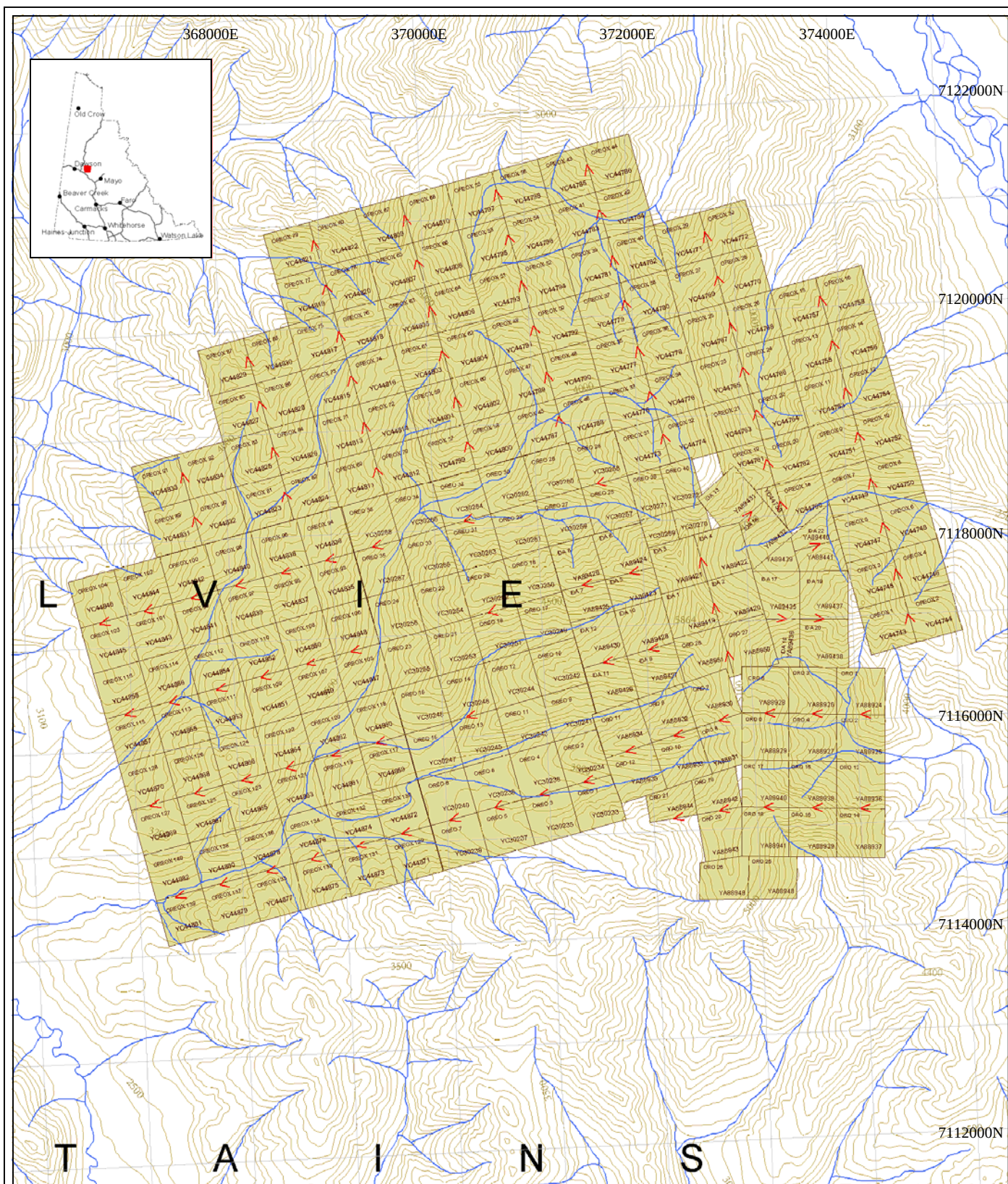
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TABLE 1 - Claim Status after 2006 Filing

Claim Name	Claim Number	Grant Number	Claim Expiry Date	Claim Expiry after Filing*	Claim Name	Claim Number	Grant Number	Claim Expiry Date	Claim Expiry after Filing*
Ida	1	YA89419	2/20/2007	2/20/2010	Oro	3	YA88926	2/20/2007	2/20/2010
Ida	2	YA89420	2/20/2007	2/20/2010	Oro	4	YA88927	2/20/2007	2/20/2010
Ida	3	YA89421	2/20/2007	2/20/2010	Oro	5	YA88928	2/20/2007	2/20/2010
Ida	4	YA89422	2/20/2007	2/20/2010	Oro	6	YA88929	2/20/2007	2/20/2010
Ida	5	YA89423	2/20/2007	2/20/2010	Oro	7	YA88930	2/20/2007	2/20/2010
Ida	6	YA89424	2/20/2007	2/20/2010	Oro	8	YA88931	2/20/2007	2/20/2010
Ida	7	YA89425	2/20/2007	2/20/2010	Oro	9	YA88932	2/20/2007	2/20/2010
Ida	8	YA89426	2/20/2007	2/20/2010	Oro	10	YA88933	2/20/2007	2/20/2010
Ida	9	YA89427	2/20/2007	2/20/2010	Oro	11	YA88934	2/20/2007	2/20/2010
Ida	10	YA89428	2/20/2007	2/20/2010	Oro	12	YA88935	2/20/2007	2/20/2010
Ida	11	YA89429	2/20/2007	2/20/2010	Oro	13	YA88936	2/20/2007	2/20/2010
Ida	12	YA89430	2/20/2007	2/20/2010	Oro	14	YA88937	2/20/2007	2/20/2010
Ida	13	YA89431	2/20/2007	2/20/2010	Oro	15	YA88938	2/20/2007	2/20/2010
Ida	14	YA89432	2/20/2007	2/20/2010	Oro	16	YA88939	2/20/2007	2/20/2010
Ida	17	YA89435	2/20/2007	2/20/2010	Oro	17	YA88940	2/20/2007	2/20/2010
Ida	18	YA89436	2/20/2007	2/20/2010	Oro	18	YA88941	2/20/2007	2/20/2010
Ida	19	YA89437	2/20/2007	2/20/2010	Oro	19	YA88942	2/20/2007	2/20/2010
Ida	20	YA89438	2/20/2007	2/20/2010	Oro	20	YA88943	2/20/2007	2/20/2010
Ida	21	YA89439	2/20/2007	2/20/2010	Oro	21	YA88944	2/20/2007	2/20/2010
Ida	22	YA89440	2/20/2007	2/20/2010	Oro	25	YA88948	2/20/2007	2/20/2010
Ida	23	YA89441	2/20/2007	2/20/2010	Oro	26	YA88949	2/20/2007	2/20/2010
Oro	1	YA88924	2/20/2007	2/20/2010	Oro	27	YA88950	2/20/2007	2/20/2010
Oro	2	YA88925	2/20/2007	2/20/2010	Oro	28	YA88951	2/20/2007	2/20/2010

* Expiry claim dates based on approval of assessment work



ALEXCO RESOURCE CORP
 Klondike Property, Dawson Mining District, Yukon Territory
 Figure 2: IDA-ORO Claims Holdings
 January 26, 2007

3.0 ACCESSIBILITY, CLIMATE, LOCAL RESOURCES, INFRASTRUCTURE AND PHYSIOGRAPHY

Access to the Klondike property is via helicopter from the “Ditch Road” extending from the Dempster Highway to the Brewery Creek mine. Lodging and limited services are provided at “Klondike Corner”, located at the intersection of Klondike Highway (Yukon Highway #2) and the Dempster Highway (Highway #5) sixty kilometres to the west.

An interior continental climate with fairly low precipitation (40 cm annually), warm summers and cold winters typifies the area. Permafrost is discontinuous, present only on the steeper north and east facing slopes and low, marshy, forested areas. The property is normally snow free from mid June to late September.

The Klondike property is situated on a prominent set of ridges within the largely unglaciated southern foothills of the Ogilvie Mountains, between Aussie Creek to the west and Hamilton Creek to the east. Topography consists of steep terrain in central areas with abundant outcrop and talus exposure, flanked by more moderate east-west trending ridges. Elevations range from 3,500 to 5,800 feet. Areas above 4,000 feet are typified by alpine vegetation and talus cover while vegetation along lower elevations consists of black spruce, poplar, alder and willow. Glaciation affected only the larger stream valleys such as Hamilton and Brewery Creeks, bypassing areas of higher elevation. As a result outcrop exposure is poor (~5%) except on ridge tops and incised drainage channels and gullies. A large portion of the Klondike property is covered by felsenmeer and talus fines.

4.0 HISTORY

4.1 Regional Exploration History and Competitor Activity

Limited exploration occurred in the Klondike property area prior to staking by Rio Tinto Canadian Exploration Ltd. (Riocanex) in 1979. After the discovery of the Brewery Creek intrusion-related gold deposits in 1987 by Noranda Exploration Co. Ltd. (Noranda), many other claims were established in the district along trend with Brewery Creek and covering other Cretaceous intrusive bodies. Many of these claims have since lapsed. The OREO and OREOX claims, staked by Shawn Ryan in 2004 and 2006 respectively, surround the IDA-ORO claims to the east, north and west. The AUSSIE 1-36 claims lie sixteen kilometres to the southwest and were staked by Archer Cathro & Associates (1981) Ltd. in 2004. A large scattered land package staked in the late 1990's lies nineteen kilometres or more to the southwest, partially surrounding the Brewery Creek claims, and consists of the OKI, LOKEY, SMOKI claims held by Core Exploration Ltd., the OBI and YES claims held by International Kodiak Resources Inc, and the OB and DOKI claims divided between Core Exploration Ltd. and International Kodiak Resources Inc.

4.2 Property Exploration History

Adapted from Schulze and Johnson, 2000

The Klondike property was originally staked as the IDA 1-120 claims by Rio Tinto Canadian Exploration Ltd. (Riocanex) in 1979. It was staked to cover an arsenic, mercury, and antimony silt anomaly detected during the “Aurora Gold Project” which followed up regional stream sediment mercury anomalies reported by the Geological Survey of Canada. Riocanex conducted exploration from 1979 to 1981 with programs of rock and soil sampling, geological mapping, followed by blast trenching during which they identified a broad area of anomalous gold, arsenic (As), antimony (Sb), and mercury (Hg) on the property with a 500 metre by 600 metre zone of anomalous gold in rock across the central portion of the property and another 300 metre by 800 metre zone averaging 500 parts per billion gold in rock across the northern portion of the property. The claims were dropped by Rio Algom Ltd. in 1986 when the company decided to focus exclusively on base metal mining and exploration.

In 1987 Noranda Exploration Company Ltd. staked the IDA 1-23 and ORO 1-28 claims and conducted surface exploration (geological mapping, trenching, soil, and rock sampling) from 1987 to 1989 focussed on the intrusive-sediment contact zones, largely ignoring the intrusive bodies. Soil results indicated a strong correlation between arsenic, antimony and gold; rock sampling returned many well mineralized intercepts in many different areas of the property (Duke, 1990; MacKay, 1989; Copeland, 1988). The property was transferred to Hemlo Gold Mines Inc. (Hemlo) in early 1995.

In 1995, Orinoco Gold (Orinoco) optioned the property from Hemlo and commissioned Aurum Geological Services Inc. (Aurum) to conduct a brief work program during August and September of 1995 focused primarily on potential for intrusive hosted, bulk tonnage gold mineralization. Three main areas of interest were outlined: an 800 metre by 300 metre zone hosting abundant rock samples with gold values exceeding 1.0 grams per tonne gold, extending along the central ridge in north-central areas; a zone of anomalous gold values in rock measuring 600 metres x 300 metres, extending from just south of the northern stock to the central stock, returned values to 3.28 grams per tonne gold / 5 metres and 1.15 grams per tonne gold/ 10 metres; and mineralization found within both the southern intrusive (values from 2.07 to 9.27 grams per tonne gold from three of four rock samples collected) and the central stock (values of 1.43 and 4.84 grams per tonne from arsenopyrite-enriched equigranular monzonite with narrow quartz veins) (Doherty, 1995).

Contour soil lines completed in 1995 involving systematic soil sampling at 50 metre intervals along the northwest property margin returned several sequential values exceeding 500 parts per billion gold with individual values to 1,250 parts per billion gold. Orinoco also repeated many anomalous values obtained from previous rock sampling achieving numerous multi-gram gold values from altered intrusive rocks, sedimentary rocks along intrusive contact zones, and sediment-hosted structural zones. Sampling within central areas returned values as high as 13.5 grams per tonne gold. Reconnaissance rock sampling along southern areas returned encouraging gold values to 9.3 grams per tonne within weakly veined quartz monzonite.

In mid-1999, NovaGold Resources Inc. acquired a 100% interest in the property and conducted a field program focussed on geological mapping and rock sampling for diamond drill targeting. Work was conducted across sediment-hosted mineralization north of the northern stock, with lesser exploration across trenches within the central area and trenches across an eastern spur ridge. A brief visit was made to the south-eastern area where high gold values were reported from 1995 exploration; however, significant mineralization was not noted in 1999. Although many trenches were re-sampled and select grab samples taken, most samples failed to repeat high rock values returned from previous exploration.

Re-sampling of ridgeline trenches and showings within brecciated deformed chert to fine clastic Road River Group sediments with abundant tourmaline +/- arsenopyrite veining returned anomalous gold values to 256 parts per billion gold. Re-sampling of a trench previously returning 1 gram per tonne/ 8 metres returned 531 parts per billion gold/ 8 metres. A sample of a "punky, sheared arsenopyrite vein" returned 417 parts per billion gold, with 180.3 grams per tonne silver, 2.06% lead and 0.56% antimony, indicating a separate pulse of fluid emplacement. A small limonitic skarn occurrence returned 645 parts per billion gold with 0.23% copper and >1.0% arsenic.

Sampling of strongly deformed arsenical tourmaline-rich sediments to the northwest, uphill of the pronounced north-west boundary soil anomaly identified in 1995, returned gold values to 1.65 grams per tonne gold, with three values exceeding 1.0 grams per tonne gold. Gold is associated with anomalous silver to 26 grams per tonne, weakly anomalous copper to 195 parts per million, moderately anomalous lead to 462 parts per million, and strongly anomalous values of 2.94% arsenic, 477 parts per million antimony, and 180 parts per million bismuth. This suggests either the presence of property-scale zonation, or of a separate fairly widespread mineralizing episode. These samples were obtained from near the north property boundary. This style of mineralization, also recognized by Aurum, may represent a significant exploration target.

Re-sampling of a trench within the central area returned a value of 1.68 grams per tonne gold/ 7 metres, with a similar pathfinder element signature to that of most of the ridgeline sampling. A select grab sample of tourmaline breccia within a trench roughly one kilometre south-east of the ridgeline sampling returned 2.27 grams per tonne gold, with strongly anomalous arsenic, bismuth, and antimony values, suggesting the presence of an arsenic vein.

Alexco Resource Corporation acquired all the issued shares of the company 650399 BC Ltd., (Spectrumsub-a subsidiary of NovaGold) and the retained assets of Spectrumsub in British Columbia and the Yukon, including the Klondike property, from NovaGold Canada Inc. in February of 2005.

5.0 2006 EXPLORATION PROGRAM

The 2006 field program consisted of a one-day field excursion with a crew of four geologists. The geologists were divided into two teams to conduct mapping, and rock and soil sampling in two traverses across the property. The Klondike property is situated along an east-west structural extension of the “Reserve Trend” gold deposits of the Brewery Creek property 30 kilometers to the west (also held by Alexco Resource Corp.) and was staked over significant gold geochemical anomalies. Exploration targets on the property include intrusion related gold (as seen at Fort Knox, Donlin Creek and numerous other properties in the Tintina Gold Belt) and Carlin-style sediment hosted gold. The 2006 field program focused on gathering geological information on mineralization styles as seen in various lithologies, prospecting beyond the limits of previous work and confirming historical rock and soil geochemical results.

5.1 Rock and Soil Sampling Methodology, Preparation and Analysis

All rock and soil sample characteristics were recorded in the field and entered into standardized spreadsheets (Appendix 2 and 3). Criteria for each sample included: UTM location, sample type, width of chip sampling, color, lithology, alteration, mineralization and a brief description. In addition, texture and organic content, and horizon sampled were recorded for soil samples. Twenty-seven soil samples and sixteen rock samples were taken in 2006. Sample locations are shown in Figure 4.

Samples were sent to ALS Chemex Labs in North Vancouver, B.C. Soil and rock samples were analyzed by gold fire assay using a 30gm sample (procedure code AU-AA25) and by ICP for a 33-element excluding mercury package using “near total” four acid digestion (procedure code ME-ICP61). Standards were inserted into each of the rock and soil sample batches for assay quality control. Laboratory certificates are found in Appendix 4.

6.0 GEOLOGICAL SETTING

6.1 Regional Geology

Adapted from Schulze and Johnson, 2000

The Klondike property is situated within the western portion of the Selwyn Basin, part of the Ominica Belt (Wheeler, et al., 1991; Murphy, et al., 1993) as shown on Figure 3. The regional geology of this area of the Yukon has been mapped by Green (1972), at 1:250,000 scale. More detailed 1:50,000 scale mapping has been completed on the map sheets to the southeast of the Klondike property (Murphy, et al., 1993; Murphy and Heon, 1994).

The Klondike property is located within the Selwyn Basin, which consists of a broad package of Paleozoic sediments extending east-southeast from north-west of Dawson City to the Yukon-Northwest Territory border north of the major northwest-southeast trending Tintina Fault. This stratigraphy consists of shallow shelf to off-shelf marine clastic and chemical sediments, as well as basinal clastic sediments derived from the Ancient North American Platform to the northeast. Ages of deposition range from Late Precambrian to Permian. At least two major episodes of rifting have occurred: the first during deposition of the Late Precambrian Hyland Group sediments, and the second during deposition of the Devonian-Mississippian Earn Group sediments (Table 2, Figure 3). These major rift zones often host poorly sorted coarse clastic sediments, such as debris flows or turbidite horizons. Several episodes of continental uplift have led to periods of increased erosion and resulting continental margin or miogeosynclinal deposition, resulting in the creation of sequences of comparatively high energy, shallow water sediments, often coarsely grained and variably calcareous. These are separated by strata formed under deeper, quieter water conditions, resulting in formation of fine clastic sediments and chert. The Mid-Cretaceous Tombstone-Tungsten Plutonic Suites (95-89Ma) consisting primarily of monzonitic to quartz-monzonitic intrusive structures has been emplaced within the Selwyn Basin. Members of this suite occur along an east-southeast trending belt extending for over 500 kilometres from northwest of Dawson City to the Yukon-Northwest Territory border.

Felsic Cretaceous intrusive bodies of the 89-95 Ma Tombstone Suite are known to host low grade Fort Knox style intrusive hosted gold mineralization at the Fort Knox and Dublin Gulch deposits, and the Clear Creek, Red Mountain, and Scheelite Dome prospects. Intrusive bodies range in size from meter-scale dikes to stocks covering several square kilometres (Murphy, et al., 1993).

Extensive thrust faulting along the entire extent of the Selwyn Basin began during Late Jurassic time. Most thrust faults are oriented roughly east-southeast, and dip to the southwest, subparallel to the overall east-southeast trend of stratigraphy. Several major regional thrust faults were formed including the Dawson Thrust, Tombstone Thrust, and Robert Service Thrust. This regional lineation has been overprinted by a slightly less pronounced northeast-southwest lineation, marked by high angle orthogonal faults suggesting the compressional regime was followed by an extensional tectonic regime.

The Robert Service Thrust underlies and defines one of the largest thrust sheets in the Canadian Cordillera (Murphy et al., 1993). It extends eastward from Dawson City area through the Keno Hill area into the Lansing region. The Robert Service thrust typically juxtaposes Upper Proterozoic Hyland Group rocks (PCH) on the upper plate over Mississippian Keno Hill Quartzite and Triassic-Jurassic schist (TrJs) on the lower plate. The Tombstone Thrust typically juxtaposes Proterozoic and Paleozoic Selwyn Basin rocks over Devonian to Late Jurassic footwall sediments (Murphy, et al, 1993, Abbott, 1993). Structural evidence suggests early north-west movement, followed by north-east translation of the Tombstone thrust sheet and underlying Paleozoic rocks along the Tombstone Thrust plane (Roots, 1993; Murphy and Heon, 1994).

Regional metamorphism has imprinted a greenschist facies metamorphic mineral assemblage on rocks of the Hyland Group and Road River Group. Contact metamorphic aureoles consist of biotite hornfels enriched in iron and, locally, precious and base metals. Often the larger intrusions have a low magnetic signature surrounded by an area of high magnetic relief related to the hornfelsed zone.

This is not a legal document. The information shown on this map is compiled from various sources and is subject to revision.

ALEXCO RESOURCE CORP
Klondike Property,
Dawson Mining District, YT
Figure 3: Regional Geology
January 26, 2007

This is not a legal document. The information shown on this map is compiled from various sources and is subject to revision.

ALEXCO RESOURCE CORP
Klondike Property,
Dawson Mining District, YT
Figure 3: Regional Geology
January 26, 2007

6.2 Regional Deposit Metallogeny

Excerpt from Schulze and Johnson, 2000

“The Klondike property is located on the northern side of the McQuesten Mineral Belt, described by Aho (1962) as a 30-50 km wide, 40 km long east-west trending belt consisting of a major transverse zone of east-northeast trending folds, Cretaceous felsic intrusions, and related Au, Sn, W and Ag mineralization. The Klondike property shares many similarities with active exploration targets within this belt, including the Dublin Gulch deposit and the Clear Creek, Scheelite Dome and Red Mountain prospects, as well as with the Brewery Creek Reserve Trend. All bulk mineable gold targets in this belt are related to the 89-105 Ma Tombstone Suite intrusives. Intrusion of alkaline felsic stocks parallel to the fold axis has resulted in fault-controlled mineralization spatially related to the stocks. Mineralization consists of: Fort Knox style gold-bismuth and arsenopyrite in sheeted veins and disseminations within the intrusions, tin-tungsten and gold skarns, silver-lead-zinc veins, and silver-lead-antimony veins. Mineralization associated with felsic stocks occurs at the Clear Creek, Red Mountain, Dublin Gulch, and Scheelite Dome properties (Aho, 1963; Emond, et al., 1992; Emond, 1992) along southern regions of the belt, and at the Brewery Creek, Panorama Ridge, Klondike, Antimony Mountain and Lorrie properties along the northern flank of the McQuesten Mineral Belt. Geochemically, the intrusions and proximal reactive or porous sedimentary units show a strong Au, As, Bi, Sb, +/- Hg and Pb geochemical signature.”

6.3 Property Geology

Excerpt from Schulze and Johnson, 2000

“The Klondike property was mapped in detail by geologists with Rio Tinto Canadian Exploration Ltd. The following report draws heavily on the referenced reports, as well as the 1995 Orinoco exploration Inc. report conducted by Aurum Geological Consultants Inc.

The Klondike Property is underlain by three major sedimentary sequences of the Ordovician to early Devonian Road River Group: a Lower Silurian turbidite sequence consisting of sandstone, siltstone, quartzite with minor chert and black shale; a middle unit up to 150 metres thick consisting of Duo Lake Formation chert with minor siliceous shale, and a 50m to 100m thick unit of non-siliceous siltstone, mudstone, shale and minor limestone (Doherty, 1995, after Riocanex report), which may belong to the Steel Formation. This sedimentary package has been asymmetrically folded into a series of syncline/anticlines oriented along a northwest trending axis (Figure 4).

Three Cretaceous quartz monzonite stocks and several east-west trending dikes have been emplaced into this sequence, causing localized hornfelsing of country rock. All stocks are less than 600 meters in diameter, and display a progression from an equigranular fabric in core areas towards increasingly porphyritic phases towards contact zones. The intrusives contain 5-10% mafic minerals, predominantly biotite with local areas of hornblende enrichment. Feldspar phenocrysts up to 2 cm in length compose 10 to 20% of the intrusive unit. Areas of tightly spaced joint sets oriented at 080°-170° and 030°-070° respectively, and rare quartz veining up to 2 cm in width occur within the stocks. A suite of late stage bleached, argillically altered quartz porphyritic dikes less than two metres wide has been emplaced along east-west trending fault zones. Thermal metamorphism of adjacent country rock has occurred, with fine grained biotite hornfelsing associated with up to 5% pyrrhotite, lesser arsenopyrite and rare chalcopyrite. Areas of tourmaline breccia along intrusive margins are common and pink axinite has been noted locally. Both the tourmaline and axinite reflect the primary high boron content of the intrusion.

The stocks and dikes exposed on the Klondike property display a strong east-west (90° - 110°) lineation, similar to that of the structural setting and mineralized trend at the Brewery Creek property. Both properties lie along a 070° trend that extends from Brewery Creek to the Klondike property. The Clear Creek, Red Mountain and Dublin Gulch properties lie along a parallel 070° trend to the south. Murphy and Heon, 1994 discuss an east-northeast trending fracture zone that hosts mineralized breccia zones parallel to, and along strike of, the McQuesten Antiform which defines the McQuesten Mineral Belt.”

Table 2: Klondike Property Stratigraphic Table

Age	Group	Formation (Lithology)	Geology Map Designation	Rock Code	Description
Mid-Cretaceous	Tombstone-Tungsten Plutonic Suite (Selwyn Plutonic Suite)	Monzonite, Quartz Monzonite Coeval South Fork Volcanics	Kqm, Kg	QM, MO	Felsic to intermediate quartz monzonitic, , monzonitic, to quartz dioritic intrusives. The name "Selwyn Suite" often applies to eastern portion of the suite. Anvil Intrusives and coeval South Fork Volcanics now considered part of Tombstone Suite; varying phases due to different fractionation states rather than a separate major intrusive event.
Ordovician- Early Devonian	Road River Group	Steel Formation	(OSDr)	SS	Weakly to moderately calcareous orange weathering mudstone to siltstone, often bioturbated reflecting oxygenated bottom water conditions. Baritic horizons often form distinctive upper members near top of formation.
Ordovician- Early Devonian	Road River Group	Duo Lake Formation	Osd (OSDr)	CH, SLT, ARG	Thin to medium bedded chert, weathers blue-grey to buff, often limonitic; lesser siltstone to mudstone, fractured to brecciated.

7.0 2006 EXPLORATION RESULTS

The 2006 field program consisted of a one-day field excursion with a crew of four geologists. The geologists were divided into two teams to conduct mapping and rock and soil sampling in two traverses across the property. The traverses began in the central portion of the property near a 1989 Noranda trench (intercept of 2022 parts per billion gold over one metre) and extended north into the massive northern intrusive stock, from there branching east and west along the ridge tops to the property limits. The 2006 field program focused on gathering geological information on mineralization styles as seen in various lithologies, prospecting beyond the limits of previous work and confirming historical rock and soil geochemical results.

7.1 Mapping and Rock Sample Results

Mapping in 2006 confirmed the lithological contacts seen in historical maps. The lithologies seen on the traverses included the intrusive phases (seen as massive bodies and as narrow sills) and variably hornfelsed sediments with localized tourmaline-quartz breccias.

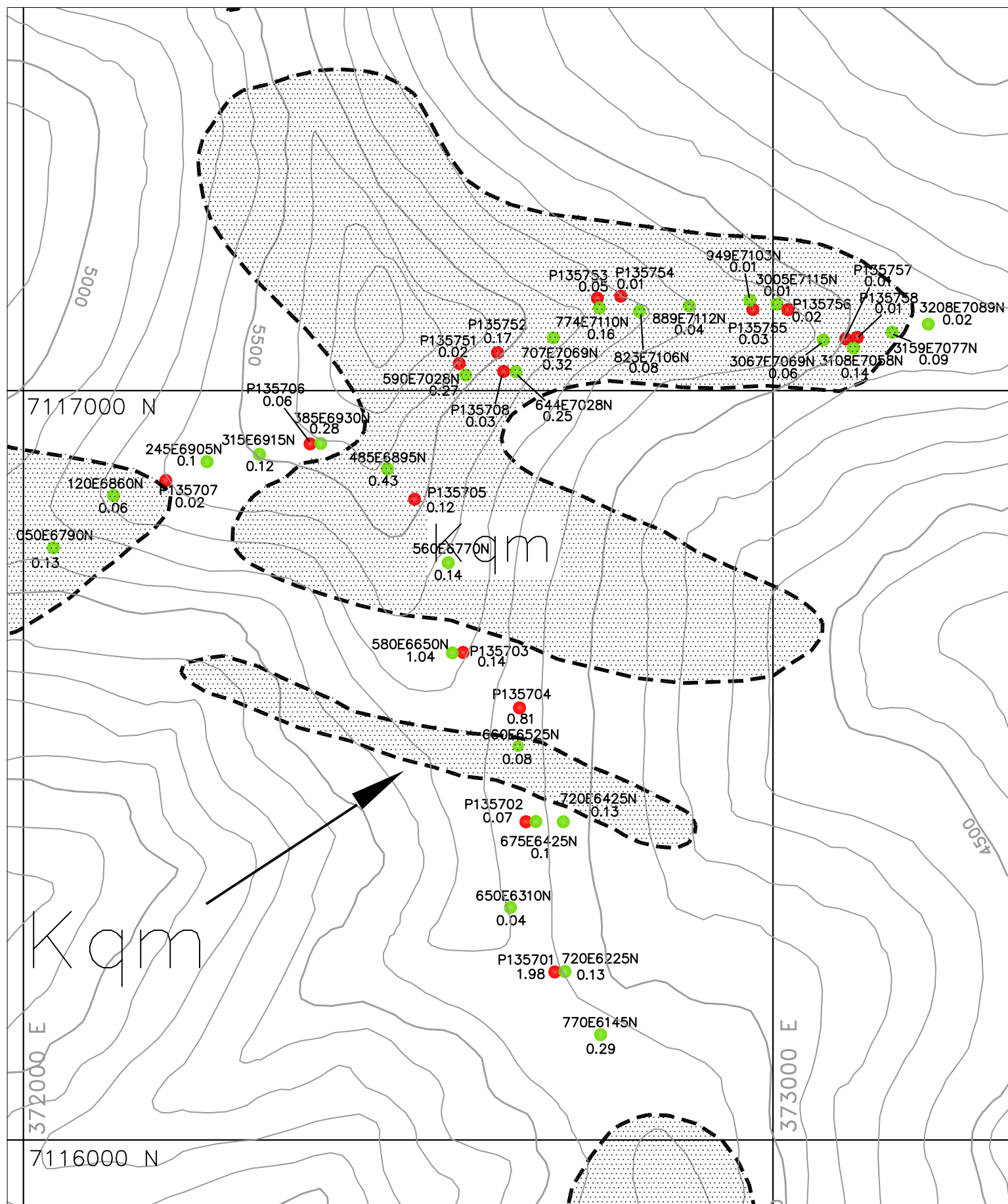
The massive monzonite was generally porphyritic, with 2% fresh feldspar phenocrysts to 1.5cm, 10% fresh biotite books, no quartz eyes and rare green hornblende crystals to 0.5cm in a fine grained feldspar matrix. Textural variations are evident within the larger intrusive bodies. Alteration varies from relatively fresh monzonite (no or slight sericite alteration of the groundmass, fresh biotite and no clay alteration of phenocrysts) to well altered monzonite (clay altered phenocrysts, biotite is sericite altered or obliterated, apple green sericite altered groundmass, often rusty and oxidized). The narrow sills are often highly altered and oxidized while the more massive stocks appear relatively unaltered in the interior to moderately altered along margins. Pyrite disseminations up to 1% often appear to be an alteration mineral associated with minor to moderate sericite alteration. Orange weathering, highly clay altered and oxidized intrusive zones, earlier interpreted as a late stage dike emplacement along fault zones, could not be confirmed as a separate intrusive event but certainly define fault zones as evidenced by surrounding increased joint development and discrete linear alteration/oxidation patterns cutting massive, largely unaltered intrusive stocks.

The Road River Group sediments seen on traverses consisted of interbedded shales and siltstones with widespread fine-grained biotite hornfelsing increasing in intensity near intrusive-sediment contacts and around quartz-tourmaline breccia bodies. The less altered sediments were orange weathering and often bleached near intrusive contacts.

There appeared to be multiple phases of veins with variable mineralogy occurring in the hornfelsed sediments and in the biotite quartz monzonite. Within the massive northern intrusive stock, the minor veining seen was mostly hairline with dark quartz infill. Veining in the sediments consisted of hairline to one centimeter widths of quartz, tourmaline or quartz-tourmaline-arsenopyrite.

Assay results from all intrusive rock samples returned less than 0.17 parts per million gold, although few of these samples contained veining. Sample P135751 was taken from a strongly clay altered and oxidized zone (possibly a late stage dike occupying a fault structure in a massive intrusive stock) with malachite and green scorodite staining and returned 0.02 parts per million gold, 8610 parts per million arsenic, 98 parts per million antimony and slightly anomalous silver at 4.2 parts per million. A well oxidized biotite quartz monzonite sample with 5% malachite and minor chrysocolla mineralization returned >10,000 parts per million arsenic, 1.21% copper, anomalous zinc at 149 parts per million but no associated anomalous gold, silver or antimony values. An adjacent sample of well oxidized biotite quartz monzonite with 5% pyrite mineralization showed 1050 parts per million Cu, but no associated gold mineralization. Several massive intrusive samples with minor to moderate argillic alteration showed no anomalous gold, silver, base metal or antimony values, although arsenic values in two samples reached 543 and 628 parts per million.

Two hornfelsed sediment rock samples containing quartz-tourmaline+/-arsenopyrite veins returned the best gold grades. The first sample contained 1.98 part per million gold, 2000 parts per million arsenic, 76 parts per million bismuth, 98 parts per million lead and 100 parts per million antimony. The second sample was a float boulder with a narrow (<1cm) quartz-tourmaline vein and considerable arsenopyrite with anomalous assay values of 0.81 parts per million gold, 8280 parts per million arsenic, 264 parts per million bismuth, 59 parts per million lead, 168 parts



LEGEND

CRETACEOUS
 Kqm biotite quartz monzonite

ORDOVICIAN-SILURIAN
 ROAD RIVER GROUP
 OSr chert, argillite, quartzite, conglomerate
 OSrh hornfelsed chert, argillite, quartzite, conglomerate

● Rock Sample
 ● Soil Sample

UTM N

ALEXCO RESOURCE CORP

Klondike Property, Dawson Mining District, YT

FIGURE 4: 2006 Rock and Soil Sample Locations with Au (ppm)

SCALE: 1 : 8,000 N.T.S.: 116 A/4 DATE: January 26, 2007

per million antimony and elevated copper at 252 parts per million. All other hornfelsed sediment rock samples contained either quartz veins, tourmaline veins or quartz-tourmaline veins but showed little anomalous gold mineralization, ranging from 0.02 – 0.14 parts per million gold, although one sample had elevated copper values to 232 parts per million.

A comparison of the geochemical element associations for intrusive and sedimentary samples highlighted differences in mineralization styles. For the intrusive samples, gold (at near background levels) appears to correspond strongly to chromium, lead, antimony and vanadium concentrations, but not arsenic. A comparison with historical geochemical results with higher gold grades may clarify the significance of this relationship, and to see if it holds true at higher gold grades. In sediments, gold correlated strongly with numerous elements including arsenic, bismuth, lead and antimony as well as elements associated with hornfelsing such as potassium, suggesting that gold is associated with base metal sulphide veining within base metal enriched hornfelsed sediments.

The 2006 rock sample results failed to repeat historical gold grades found in the intrusive units and only sporadically corresponded to historical gold grades in the sediments, otherwise returning far lower values. This is attributed to strong structural control of the mineralization with possible multiple veining events, not all of which would be mineralized. The northern intrusive stock in the areas traversed showed low vein density, overall lack of alteration and no gold associated with the disseminated pyrite alteration. Minor anomalous gold was found associated with a strongly oxidized, clay altered fault zone containing abundant arsenopyrite.

7.2 Soil Sample Results

Soil samples show sporadic anomalous gold values associated with all lithologies, often higher than nearby rock samples taken in 2006. Most soil samples show elevated arsenic levels and higher overall bismuth, lead, antimony and zinc values than seen in rocks samples. Increased arsenic levels often correspond to elevated copper values, with occasional elevated silver, bismuth, antimony, strontium and zinc.

Soil samples taken in underlying biotite monzonite lithologies from the northern stock and the sill immediately to the south overall had low gold values, ranging from 0.01- 0.32 parts per million, with one sample returning 1.04 parts per million gold and 1890 parts per million arsenic in an area of narrow, stacked quartz veins and fractures (trending 272, subvertical). Arsenic values varied considerably, from a low of 46 parts per million to a high of 4050 parts per million, with fairly consistent elevated copper values with increased arsenic. One sample with 0.27 parts per million gold also ran 11.2 parts per million silver, 3450 parts per million arsenic, 84 parts per million bismuth, 865 parts per million copper and 116 parts per million zinc.

Soil samples from mixed hornfelsed sediment and intrusive talus in the central property returned gold values from 0.1 – 0.25 parts per million, with arsenic values from 192 – 402 parts per million and several elevated copper values to 324 parts per million. Two samples with 0.1 and 0.25 parts per million gold carried 1525 and 2420 parts per million arsenic, respectively, and also showed elevated copper (272 and 218 parts per million) and antimony (101 and 149 parts per million). Sampling in the sediments of the western ridge top showed a top gold grade of 0.43 parts per million with the rest ranging between 0.06 – 0.28 parts per million. These samples again show elevated arsenic values (190 – 576 parts per million) and sporadic copper highs to 139 parts per million.

Soil geochemistry overall showed a weak correlation of gold grades with lead values, but no association with arsenic, antimony or other base metals. A moderate to strong correlation amongst arsenic, bismuth, silver, copper, lead, antimony and zinc point to a pervasive base metal sulphide phase (hornfelsing) with a probable separate gold – sulphide mineralizing phase that appears to be more discrete (likely structurally controlled). The distinct geochemical associations seen in the rock samples are not well replicated in the soil samples, likely due to the mixed lithologies in talus at sample sites.

8.0 CONCLUSION

The Klondike property is located within the Selwyn Basin, which consists of a broad package of Paleozoic sediments extending east-southeast from north-west of Dawson City to the Yukon-Northwest Territory border north of the major northwest-southeast trending Tintina Fault. This stratigraphy consists of shallow shelf to off-shelf marine clastic and chemical sediments, as well as basinal clastic sediments derived from the Ancient North American Platform to the northeast. The Mid-Cretaceous Tombstone-Tungsten Plutonic Suite (95-89Ma) has been emplaced within the Selwyn Basin. Monzonitic to quartz monzonitic members of this suite occur along an east-southeast trending belt extending for over 500 kilometres from northwest of Dawson City to the Yukon-Northwest Territory border.

The Klondike property is situated along an east-west structural extension of the "Reserve Trend" gold deposits of the Brewery Creek property 30 kilometers to the west (also held by Alexco Resource Corp.) and was staked over significant gold geochemical anomalies. Exploration targets on the property include intrusion related gold (as seen at Fort Knox, Donlin Creek and numerous other properties in the Tintina Gold Belt) and Carlin-style sediment hosted gold.

The Klondike Property is underlain by three major sedimentary sequences of the Road River Group: a Lower Silurian turbidite sequence consisting of sandstone, siltstone and quartzite; a middle unit consisting of Duo Lake Formation chert with minor siliceous shale, and an upper unit of non-siliceous siltstone, mudstone, shale and minor limestone, possibly of the Steel Formation. Three Cretaceous quartz monzonite stocks, less than 600 metres in diameter, and several east-west trending dikes have been emplaced into this sequence, causing localized hornfelsing of country rock. A suite of late stage bleached, argillically altered quartz porphyritic dikes less than two metres wide has been emplaced along east-west trending fault zones.

The 2006 field program consisted of a one-day field excursion with a crew of four geologists. The geologists were divided into two teams to conduct mapping, and rock and soil sampling in two traverses across the property. The traverses began in the central portion of the property near a 1989 Noranda trench (intercept of 2022 parts per billion gold over one metre) and extended north into the massive northern intrusive stock, from there branching east and west along the ridge tops to the property limits. The 2006 field program focused on gathering geological information on mineralization styles as seen in various lithologies, prospecting beyond the limits of previous work and confirming historical rock and soil geochemical results.

Mapping in 2006 confirmed the lithological contacts seen in historical maps, consisting of the intrusive phases (seen as massive bodies and as narrow sills) and variably hornfelsed sediments with localized tourmaline-quartz breccias. The massive intrusive units were generally porphyritic, with minor alteration while narrow sills were often highly altered and oxidized. Crosscutting, orange weathering, highly clay altered, discrete and linear fault zones may be occupied by a separate intrusive event, causing alteration and mineralization in adjacent intrusive rock.

The Road River Group sediments seen on traverses consisted of interbedded shales and siltstones with widespread fine-grained biotite hornfelsing increasing in intensity near intrusive-sediment contacts and around quartz-tourmaline breccia bodies. The less altered sediments are orange weathering and often bleached near intrusive contacts.

There appeared to be multiple phases of veins with variable mineralization occurring in the hornfelsed sediments and in the biotite quartz monzonite. Within the massive northern intrusive stock, veining was often hairline with dark quartz infill. Veining in the sediments consisted of hairline to one centimeter widths of quartz, tourmaline or quartz-tourmaline-arsenopyrite.

Assay results from all intrusive rock samples returned less than 0.17 parts per million gold, although few of these samples contained veining. Relatively unaltered samples had minor anomalous arsenic. Several samples taken from strongly clay altered and oxidized zones (probable fault structures) with variable malachite/crysocolla, green scorodite staining and disseminated pyrite contained background levels of gold with arsenic values to >10,000 parts per million, up to 1.21% copper and anomalous antimony and silver.

Two hornfelsed sediment rock samples containing quartz-tourmaline+/-arsenopyrite veins returned the best gold grades. The first sample appears to have been mainly vein material and returned 1.98 parts per million gold, 2000 parts per million arsenic, 76 parts per million bismuth, 98 parts per million lead and 100 parts per million antimony. The second sample was a float boulder with narrow (<1cm) quartz-tourmaline vein and considerable arsenopyrite with anomalous assay values of 0.81 parts per million gold, 8280 parts per million arsenic, 264 parts per million bismuth, 59 parts per million lead, 168 parts per million antimony and elevated copper at 252 parts per million. All other hornfelsed sediment rock samples contained either quartz veins, tourmaline veins or quartz-tourmaline veins but showed little anomalous gold mineralization, ranging from 0.02 – 0.14 parts per million gold, although one sample had elevated copper values to 232 parts per million.

Geochemical results for rock samples show gold in intrusive samples correlated with chromium, lead, antimony and vanadium concentrations but not arsenic, while samples from sedimentary rocks have gold correlating with numerous elements including arsenic, bismuth, lead, antimony as well as elements associated with hornfelsing such as potassium, suggesting that gold is associated with base metal sulphide veining within base metal enriched hornfelsed sediments.

The 2006 rock sample results failed to repeat historical gold grades found in the intrusive units and only sporadically corresponded to historical gold grades in the sediments, otherwise returning far lower values. This is attributed to strong structural control of the mineralization with possible multiple veining events, not all of which would be mineralized. The northern intrusive stock in the areas traversed showed low vein density, overall lack of alteration and no gold associated with the disseminated pyrite alteration. Minor anomalous gold was found associated with a strongly oxidized, clay altered fault zone containing abundant arsenopyrite.

Soil samples show sporadic anomalous gold values associated with all lithologies, often higher than nearby rock samples taken in 2006. Most soil samples show elevated arsenic levels and higher overall bismuth, lead, antimony and zinc values than seen in rocks samples. Soil geochemistry overall showed a weak correlation of gold grades with lead values, but no association with arsenic, antimony or other base metals. A moderate to strong correlation amongst arsenic, bismuth, silver, copper, lead, antimony and zinc point to a pervasive base metal sulphide phase with a probable separate gold – sulphide mineralizing phase that appears to be more discrete (likely structurally controlled). The distinct geochemical associations seen in the rock samples are not well replicated in the soil samples, likely due to the mixed lithologies in talus at sample sites.

Soil samples taken in underlying biotite monzonite lithologies from the northern stock and the sill immediately to the south overall had low gold values, ranging from 0.01- 0.32 parts per million, with one sample returning 1.04 parts per million gold associated with stacked quartz veins. Soil samples from mixed hornfelsed sediment and intrusive talus in the central property returned gold values from 0.1 – 0.25 parts per million. Sampling in the sediments of the western ridge top showed a top gold grade of 0.43 parts per million with the rest ranging between 0.06 – 0.28 parts per million.

The fact that the 1999 and 2006 field work largely failed to repeat historical high gold grades suggests that the mineralization is strongly structurally controlled. Further detailed mapping and sampling of prospective areas, particularly anomalous zones identified historically, is needed to define the extents of mineralization, possible fault or vein controls and to delineate possible drill targets.

Based on the assay results received this year and the limited area sampled as well as historical observations, the northern massive biotite quartz monzonite unit is an unlikely target for disseminated gold mineralization as it appears relatively unaltered with no gold associated with pervasive alteration, has a low quartz vein density and only showed gold grades in discrete oxidized structural zones likely intruded by a later dike phase. Other portions of the northern intrusive stock may prove more prospective. Systematic mapping and sampling of all the intrusive bodies, in particular vein orientations and densities, would better define the potential for a Fort Knox style gold deposit.

The hornfelsed sediments, particularly where they host quartz-tourmaline breccias, appear to be the most prospective targets. More detailed mapping and sampling of breccia bodies and vein mineralogies/orientations could help determine the significance of the quartz-tourmaline veining and look for disseminated mineralization in the sediments.

9.0 RECOMMENDATIONS

A new compilation of all assay results from past work on the current claims and possibly the adjoining claims is warranted with emphasis on identifying the likely lithological and structural controls on mineralization and identifying prospective areas to target with a field program. A review of all the geochemical results to date may help in delineating gold-enriched mineralization events as opposed to the seemingly widespread base metal enriched hornfelsed sediment signature. If areas with good mineral potential are identified in the compilation, a detailed mapping and sampling program of prospective areas, particularly anomalous zones and breccias identified historically, is needed to define the extents of mineralization, possible fault or vein controls and to delineate possible drill targets.

At the property scale, the 2006 results were not encouraging and did not repeat the historic high grades found on the property. The hornfelsed sediments, particularly where they host quartz-tourmaline breccias, appear to be the most prospective targets as sediment and breccia hosted gold deposits. More detailed mapping and sampling of breccia bodies and vein mineralogies/orientations could help determine the significance of the quartz-tourmaline alteration phase and look for disseminated mineralization in the sediments. As a low priority target, systematic mapping and sampling of vein types, orientations and densities in all the intrusive bodies is recommended to test the potential for a Fort Knox style gold deposit.

If encouraging results are seen from the compilation work and mapping-sampling program, a preliminary drill program could be considered.

Respectfully submitted,


Melanie Roberts, BSc


Michael A. Stammers, P.Geo., FGAC



10.0 REFERENCES

- Abbott, J.G., Gordey, S.P., Tempelman-Kluit D.J., 1986. Setting of Stratiform, Sediment - Hosted Lead - Zinc Deposits in Yukon and Northeastern British Columbia; *in* Mineral Deposits of Northern Cordillera, J.A. Morin ed., The Canadian Institute of Mining and Metallurgy, Special volume 37, p.1-18.
- Abbott, J.G., 1993. Revised Stratigraphy and New Exploration Targets in the Hart River Area, Southeastern Ogilvie Yukon. *in* Yukon Exploration and Geology, 1992; Exploration and Geological Services Division, Yukon, Indian and Northern Affairs Canada, p. 13-23.
- Aho, A.E., 1962. Prospecting and Mineral Development in Yukon: *in* Western Miner & Oil Review, Vol. 35, No.2, p. 32.
- Bostock, H.S., 1964. Geology, McQuesten, Yukon Territory; NTS 115P, scale 1:253,440. Geological Survey of Canada, Map 1143A.
- Copland, H. 1988. Geological and Geochemical Report on the IDA/ORO claims, Yukon Territory; Assessment Report by Noranda Exploration Company, Ltd.
- Doherty, R.A. 1995. Qualifying Report on the Panorama and IDA Properties, Yukon Territory by Orinoco Gold Inc.
- Duke, J. 1990. Report on 1989 Field Activities on the IDA/ORO claims, Yukon Territory; Assessment Report by Noranda Exploration Company, Ltd.
- Emond, D.S., 1986. Tin and Tungsten Veins and Skarns in the McQuesten River Area, Central Yukon: *in* Yukon Geology, Vol.1; Exploration and Geological Services Division, Yukon, Indian and Northern Affairs Canada, p. 113-118
- Emond, D.S. and Lynch, T., 1992. Geology, and Mineralogy and Geochemistry of Tin and Tungsten Veins, Breccias and Skarns, McQuesten River Region (115 P (north) and 105 M 13), Yukon; *in* Yukon Geology Vol. 3; Exploration and Geological Services Division, Yukon, Indian and Northern Affairs Canada, p.133-159.
- Emond, D.S., 1992. Petrology and Geochemistry of Tin and Tungsten Mineralized Plutons, McQuesten River Region, Central Yukon. *in* Yukon Geology Vol. 3; Exploration and Geological Services Division, Yukon, Indian and Northern Affairs Canada, p.167-195.
- Garrett, R.G., 1971. Molybdenum and Tungsten in some Plutonic Rocks of the Southeast Yukon Territory, Geological Survey of Canada, Open File Report 51.
- Green, L. H., 1971. Geology of the Mayo Lake, Scougale Creek and McQuesten Lake Map areas; Geological Survey Canada, Memoir 357.
- Green, L.H. 1972. Geology of Nash Creek, Larsen Creek, and Dawson map areas, Yukon Territory; Geological Survey of Canada, Memoir 364.
- Hollister, V.F., 1991. Fort Knox Porphyry Gold Deposit, Fairbanks, Alaska. *in* Case Histories of Mineral Deposits, Volume 3, Porphyry Copper, Molybdenum, and Gold Deposits, Volcanogenic Deposits in Layered Rock, V.F. Hollister ed., Society for Mining, Metallurgy, and Exploration, Inc., Littleton, Colorado.
- INAC, 1991: Yukon Placer Industry 1989 to 1990. Placer Mining Section, Mineral Resources Directorate, Yukon, Indian and Northern Affairs Canada.
- MacKay, G. 1989. Geological and Geochemical Report on the IDA/ORO claims, Yukon Territory; Assessment

Report by Noranda Exploration Company, Ltd.

McClintock, J., 1979. IDA Claims, Yukon; Geology and Geochemistry, Assessment Report, Rio Tinto Canadian Exploration Ltd.

McClintock, J. 1981a. IDA Claims, Yukon; 1980 Geology and Geochemistry; Assessment Report by Rio Tinto Canadian Exploration Ltd.

McClintock, J. 1981b. IDA Claims, Yukon, Geology and Trenching, 1981. Rio Tinto Canadian Exploration Ltd.

Minfile, 1993. Yukon Minfile, WP 5.1 Version, 15 Feb/93; Exploration and Geological Services, Department of Indian and Northern Affairs, Whitehorse Yukon.

Murphy, D.C., Heon, D., and Hunt, J., 1993. Geological Map of Clear Creek Map Area, Western Selwyn Basin (NTS 115P/14). Exploration and Geological Services Division, Yukon, Indian and Northern Affairs Canada.

Murphy, D.C., Heon, D., 1994. Geology and Mineral Occurrences of Sprague Creek Map Area (115P/15), Western Selwyn Basin. *In: Yukon Exploration and Geology 1993*; Exploration and Geological Services Division, Yukon, Indian and Northern Affairs Canada, p. 29-46

Roots, C.F., 1993. Nature of the Robert Service thrust on Fork Plateau and implications for mineral exploration, Mayo map area, *In: Yukon Exploration and Geology 1992* Exploration and Geological Services Division, Yukon, Indian and Northern Affairs Canada.

Schulze, C.M. and Johnson, G., 2000. 1999 Geological and Geochemical Assessment Report on the Klondike Property, NovaGold Resources Inc.

Schulze, C.M. 1997. Yukon Regional Project, 1997 Progress Report, In-house report, Viceroy Exploration (Canada), Inc.

Tempelman-Kluit, D.J., 1979. Transported Cataclasite, Ophiolite and Granodiorite in Yukon: Evidence of Arc-Continent Collision; Geological Survey of Canada, Paper 79-14.

Tempelman-Kluit, 1981. Geology and Mineral Deposits of Southern Yukon: *in Yukon Geology and Exploration 1979-80*; Geology Section, Department of Indian and Northern Affairs, Whitehorse Yukon.

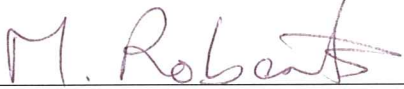
Wheeler, J.O. and McFeely, P., 1991. Tectonic Assemblage Map of the Canadian Cordilleras and Adjacent parts of the United States of America; Geological Survey of Canada, Map 1712A, scale 1:2,000,000.

CERTIFICATE OF QUALIFICATIONS

I, Melanie Roberts, of 502-1100 Jervis Street in the city of Vancouver and of business address of NovaGold Resources Inc., 2300 – 200 Granville Street in the city of Vancouver, in the province of British Columbia, certify that:

1. I am a project geologist employed with NovaGold Resources Inc.
2. I am a graduate of the University of Victoria with a Bachelor of Science (Honors) in Geology in 2000.
3. I have practiced my profession continuously since 2000 and have been involved in projects in Australia, South Africa and Canada.
4. I was present at the Klondike property on September 3, 2006 and during this time performed a portion of the mapping and rock sampling work. I reviewed the results from the program and have compiled this report based on these results and field observations.
5. I have no interest in the property described herein, nor do I expect to receive any such interest.

Dated at Vancouver, BC, this 31 day of January, 2006.



M. Roberts, B.Sc.

CERTIFICATE OF QUALIFICATIONS

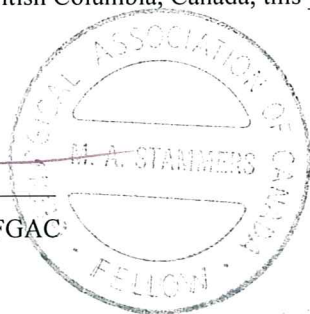
I, Michael A. Stammers, of 941 Kennedy Avenue, North Vancouver, in the Province of British Columbia, Canada, and of business address of NovaGold Resources Inc., 2300 – 200 Granville Street in the city of Vancouver, in the province of British Columbia, DO HEREBY CERTIFY:

- 1 THAT I am a Senior Geologist with NovaGold Resources Inc.
- 2 THAT I have practiced in my profession with various mining companies in Yukon, British Columbia, Ontario, Nova Scotia, Northwest Territories, Alaska, Oregon, Vanuatu and Venezuela for 30 years.
- 3 THAT I am a graduate of McMaster University (1977) and hold a combined Honours B.A. in Geology and Geography.
- 4 THAT I am duly registered as a Professional Geoscientist in the Province of British Columbia (#18883).
- 5 THAT I am a Fellow of the Geological Association of Canada.
- 6 THAT this report is based on Klondike property work that I personally participated in and partially supervised on September 3, 2006.
- 7 THAT I have no interest in the property described herein, nor do I expect to receive any such interest.

DATED at North Vancouver, British Columbia, Canada, this 31 day of January 2006.



Michael A. Stammers, P. Geo., FGAC



APPENDIX 1: List of Personnel and Contractors

PERSONNEL

Mike Stammers, Senior Geologist, NovaGold Resources Inc.
941 Kennedy Avenue, North Vancouver, BC

Rick Dutka, Geologist, NovaGold Resources Inc.

Dick Lippoth, Geologist, NovaGold Resources Inc.

Melanie Roberts, Project Geologist, NovaGold Resources Inc.
502-1100 Jervis Street, Vancouver, BC, V6E 2C4

CONTRACTORS

Fireweed Helicopters Ltd
PO Box 26 Stn C S C, Whitehorse, YT, Y1A 5X9

ALS Chemex
212 Brooksbank Avenue, North Vancouver, BC, V7J 2C1

APPENDIX 2: Statement of Expenditures

COST STATEMENT - Klondike Property

Alexco Resource Corp. and 650399 BC Ltd.

MAPPING AND SOIL SAMPLING SURVEYS

Wages

:	M. Roberts 12 days x \$350	4200
	D. Lippoth 2.25 days @400	900
	R. Dutka 2.25 days @\$400	900
	M. Stammers 4 days x \$500	<u>2000</u>

\$8,000.0

0

\$2,578.4

Fireweed Helicopters

0

Dawson Hotel

\$421.85

Freight

\$123.41

Norcan - Truck Rental

\$448.75

Stammers/Roberts Expenses - Incidentals/gas/meals

\$706.29

\$1,084.0

Assays Soils - 26 & Rocks - 17 ALS Chemex

0

\$1,500.0

Report Preparation

0

\$14,862.7

Total Minimum Expenditures Applied:

0

Estimated Minimum Expenditure per Work Claim*:

Ida 2 \$4,600.36

*Calculated at \$353.87/rock or soil sample

Oro 7 \$2,830.99

Ida 1 & 17, Oro 28 \$2,123.24 each

Ida 10 \$707.75

Ida 9 \$353.87

APPENDIX 3: Rock Sample Descriptions

KLONDIKE 2006 ROCK SAMPLE DESCRIPTION SHEET

Assy No.	Eastings	Northings	Zone	Sample Type	Width (m)	Sample Descr.	Form.	Lithology	Modifier	Colour	Carb. Presence	Silic.	Argillic Alt.	Potassic Alt.	Phylic Alt.	Limonite	Mineral #1	Amt %	Mineral #2	Amt %	Other Mineral	Amt %	Date	Sampler	Comments	Sample	Recvd Wt.	Au	Ag	Al	As	Ba	Be	Bi	Ca	Cd	Co	Cr	Cu	Fe	K	Mg	Mn	Mo	Na	Ni	P	Pb	S	Sb	Sr	Ti	V	W	Zn	Cu																																																																																																																																																																																																																																																																																																																																																																																																																																																																																		
																										No	kg	ppm	ppm	%	ppm	ppm	ppm	ppm	%	ppm	ppm	ppm	%	%	ppm	ppm	%	ppm	ppm	%	ppm	ppm	%	ppm	ppm	%	ppm	ppm	%	ppm	ppm	%	ppm	ppm	%	ppm	ppm	%	ppm	ppm	%																																																																																																																																																																																																																																																																																																																																																																																																																																																																							
P135701	372720	7116225		Chip	0.2	Vein		Qtz-tourmaline vein	Vein														3-Sep-06	D. Lippoth	Near old rock sample location 1099	P135701	0.68	1.98	0.5	2.03	2000	110	<0.5	76	0.2	<0.5	<1	95	26	1.66	0.03	0.55	74	<1	0.18	6	60	98	0.02	100	90	0.08	315	10	20																																																																																																																																																																																																																																																																																																																																																																																																																																																																																			
P135702	372675	7116425		Grab		Rock		Seds	Veined														3-Sep-06	D. Lippoth	Hairline qtz-tourmaline veins in hornfelsed seds	P135702	0.32	0.07	<0.5	4.84	32	240	1.8	<2	9.59	<0.5	5	50	38	3.16	0.2	3.48	1145	1	1.51	33	1980	9	0.03	5	409	0.23	210	<10	92																																																																																																																																																																																																																																																																																																																																																																																																																																																																																			
P135703	372580	7116650		Grab		Rock	Kqm	Biotite Quartz Monzonite	Veined														3-Sep-06	D. Lippoth	Picked sample intrusive w/qtz veinlet (0.5cm)	P135703	0.5	0.14	<0.5	7.63	839	1710	3.3	<2	2.9	<0.5	10	36	30	2.51	2.4	1.02	383	1	1.97	9	750	22	0.05	21	588	0.27	66	<10	49																																																																																																																																																																																																																																																																																																																																																																																																																																																																																			
P135704	372660	7116575		float		Rock		?	veined														3-Sep-06	D. Lippoth	Float, talus boulder with narrow (<1cm) qtz-tourmaline and considerable arsenopyrite	P135704	0.84	0.81	1.7	8.04	8280	2220	3.2	264	3.12	<0.5	22	27	252	3.15	2.61	1.24	283	1	1.81	6	870	59	0.17	168	683	0.3	58	10	75																																																																																																																																																																																																																																																																																																																																																																																																																																																																																			
P135705	372522	7116855		Grab		Rock		Seds	veined														3-Sep-06	D. Lippoth	Hairline tourmaline(?) veinlets in hornfels, claim post 10m up slope	P135705	0.78	0.12	<0.5	0.72	339	220	<0.5	<2	0.05	<0.5	<1	16	23	0.45	0.14	0.07	33	1	0.04	3	20	9	0.01	12	26	0.03	16	<10	7																																																																																																																																																																																																																																																																																																																																																																																																																																																																																			
P135706	372385	7116930		Grab		Rock		Seds	Veined														3-Sep-06	D. Lippoth	Hornfels with quartz veinlets	P135706	0.5	0.06	0.7	5.38	454	1010	1.9	<2	2.28	<0.5	1	104	232	1.36	0.45	0.67	114	12	1.49	54	950	10	0.05	15	318	0.5	385	<10	33																																																																																																																																																																																																																																																																																																																																																																																																																																																																																			
P135707	372190	7116880		Grab		Rock		Seds	Veined														3-Sep-06	D. Lippoth	Bright pink stain on hornfels, hairline veinlets	P135707	0.7	0.02	<0.5	0.9	311	430	<0.5	<2	0.05	<0.5	<1	14	30	0.47	0.19	0.14	28	<1	0.06	2	40	8	0.01	<5	32	0.04	20	<10	3																																																																																																																																																																																																																																																																																																																																																																																																																																																																																			
P135708	372644	7117028		Grab		Rock	Kqm	Biotite Quartz Monzonite	Altered	Lt grey	None	None	Strong	None	Moderate	Minor	Pyrite	0.5					3-Sep-06	R. Dutka	Taken from bottom of soil sample pit, well altered	P135708	1.18	0.03	0.7	8.64	1040	2160	3.1	19	0.12	<0.5	<1	7	115	0.7	4.74	0.09	18	<1	0.21	1	120	32	<0.01	50	356	0.11	12	10	34																																																																																																																																																																																																																																																																																																																																																																																																																																																																																			
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UTM coordinates in NAD 83 Zone 8

APPENDIX 4: Soil Sample Descriptions

Klondike Property - Soil Samples
 (September 3, 2006)

Sample Identifier			Sample Type	Sampler	UTM Coordinates		Horizon	Depth (cm)	Colour	Texture	Slope	Direction	Rock Type	Comments	SAMPLE	Au	Ag	Al	As	Ba	Be	Bi	Ca	Cd	Co	Cr	Cu	Fe	K	Mg	Mn	Mo	Na	Ni	P	Pb	S	Sb	Sr	Ti	V	W	Zn
					Easting	Northing									DESCRIPTION	ppm	ppm	%	ppm	ppm	ppm	ppm	%	ppm	ppm	ppm	ppm	%	%	%	ppm	ppm	%	ppm	ppm	ppm	%	ppm	ppm	%	ppm	ppm	ppm
1	770E	6140N	Soil	M. Stammers	372770	7116140	B, C	15	Brown	Sandy	Flat	None	Biotite Quartz Monzonite	Old Grid Stn. BL10000E, 18250N; Near old unmarked set of 4 claimposts	770E6145N	0.29	<0.5	7.5	1270	1380	2.5	10	0.98	<0.5	22	50	111	3.95	1.29	1.08	1190	3	0.78	18	910	36	0.03	40	227	0.37	101	<10	70
2	720E	6225N	Soil	M. Stammers	372720	7116225	B	15	Brown	Sandy	Gentle	South	Q-Tourm Vn in Hornfels	Near old hand trench along main mineralized trend	720E6225N	0.13	<0.5	4.94	402	910	1.1	5	0.49	<0.5	7	123	324	3.56	0.78	0.51	280	6	0.56	33	990	22	0.13	26	122	0.37	241	<10	57
3	650E	6310N	Soil	M. Stammers	372650	7116310	B, C	10	Brown	sand, chips	Gentle	South	Hornfels Outcrops		650E6310N	0.04	<0.5	5.74	251	1490	1.2	<2	0.67	<0.5	8	71	102	3.55	1.44	0.87	401	3	0.81	23	1410	14	0.08	9	132	0.41	118	<10	64
4	720E	6425N	Soil	M. Stammers	372720	7116425	B, C	10	Brown	sand, chips	Gentle	South	Hornfels Outcrops		720E6425N	0.13	0.5	5.51	192	1240	1.1	<2	0.69	<0.5	10	71	87	3.78	1.35	0.83	455	2	0.81	25	930	21	0.07	15	136	0.42	122	10	68
5	660E	6525N	Soil	M. Stammers	372660	7116525	C	15	Brown	sand, chips	Gentle	South	Biotite Quartz Monzonite	Very little alteration or veining in intrusive rocks	660E6525N	0.08	<0.5	5.8	702	1680	1.8	5	1.11	<0.5	8	46	153	2.46	1.38	1.12	443	1	0.64	24	870	26	0.03	19	305	0.3	85	<10	61
6	675E	6425N	Soil	M. Stammers	372675	7116425	B	15	Yellow-Brown	Sandy	Gentle	South	Q-Tourm Vn in Hornfels	Rock Sample - 135702, Near old unmarked set of 4 claimposts	675E6425N	0.1	0.6	9.18	1525	350	5.4	27	0.72	1.2	41	45	272	2.82	1.41	0.55	1410	2	1.6	19	1190	50	<0.01	101	193	0.25	95	<10	54
7	580E	6650N	Soil	M. Stammers	372580	7116650	C	10	Brown	sand, chips	Steep	South	Biotite Quartz Monzonite	Narrow stacked quartz veinlets, fractures trending 272/sub vertical	580E6650N	1.04	<0.5	7.9	1890	710	3.7	21	1.49	1	26	47	45	3.17	1.18	0.74	627	1	1.24	17	1150	48	0.02	46	405	0.34	81	<10	71
8	567E	6770N	Soil	M. Stammers	372567	7116770	B	10	Yellow-Brown	Sandy	Steep	South	Biotite Quartz Monzonite	rock Sample - 135704, Near old unmarked set of 4 claimposts	560E6770N	0.14	<0.5	8.16	4050	1010	3.5	9	1.44	0.7	9	38	37	3.07	1.42	0.71	272	1	1.18	10	1250	30	0.02	36	491	0.38	80	<10	52
9	485E	6895N	Soil	M. Stammers	372485	7116895	C	10	Brown	sand, chips	Steep	SW	Talus-Hornfels, Monzonite	Outcrop bedding - 290, 66N; beginning of spur running west	485E6895N	0.43	<0.5	7.41	550	580	3.8	<2	2.36	1	13	92	13	2.73	0.85	1.18	578	<1	2.16	20	1520	37	0.03	20	513	0.39	93	<10	70
10	385E	6930N	Soil	M. Stammers	372385	7116930	B, C	10	Brown	sand, chips	Steep	West	Talus-Hornfels, Monzonite	Very steep slope	385E6930N	0.28	<0.5	6.19	376	1350	1.9	<2	1.33	<0.5	10	73	95	2.72	1.46	1.32	314	2	1.28	37	1520	17	0.04	7	278	0.39	179	<10	52
11	315E	6915E	Soil	M. Stammers	372315	7116915	C	10	Yellow-Brown	sand, chips	Gentle	West	Talus-Hornfels, Monzonite	Ridge crest	315E6915N	0.12	<0.5	3.5	419	940	1.2	<2	0.75	0.6	13	49	93	2.32	0.67	0.73	521	1	0.65	67	560	13	0.01	27	113	0.28	83	<10	57
12	245E	6905N	Soil	M. Stammers	372245	7116905	B	10	Light Brown	clay-sand	Gentle	West	Hornfels Talus & Outcrops	Hornfels talus patches	245E6905N	0.1	<0.5	5.96	190	640	1.6	<2	1.66	<0.5	7	64	18	2.66	0.7	1.16	343	1	0.88	49	2060	10	0.01	12	190	0.36	178	<10	59
13	120E	6860N	Soil	M. Stammers	372120	7116860	B	10	Brown	Sandy	Gentle	West	Hornfels-Monzonite contact	Base of outcrop knob on spur crest	120E6860N	0.06	<0.5	5.58	383	1680	1.7	<2	0.91	0.5	14	57	129	2.7	1.54	1.01	437	1	0.85	37	780	14	0.02	10	169	0.36	116	<10	52
14	050E	6790N	Soil	M. Stammers	372040	7116790	B	10	Brown	clay-sand	Flat	None	Hornfels-Monzonite contact	Sample taken on knobs on spur crest	050E6790N	0.13	<0.5	5.81	576	1590	2	5	0.75	0.5	13	61	139	2.76	1.45	1.29	323	2	0.68	43	770	16	0.02	13	157	0.32	121	<10	52
15	1540E	6720N	Soil	M. Stammers	371540	7116720	B	15	Yellow-Brown	sandy	Flat	None	Mixed Intr. Hf talus field	Large, gentle swale: base of steep rocky spur ridge	1540E6720N	0.01	<0.5	6.87	275	1640	2.5	<2	0.78	0.6	6	42	32	2.86	2.13	0.94	344	1	0.69	19	780	27	0.02	15	269	0.29	73	<10	58
16	590E	7028E	Soil	R. Dutka	372590	7117028	C	25	Brown	sand, chips	Moderate	Northwest	Biotite Quartz Monzonite	Approx. 200 meters downslope from crest of the ridge.	590E7028N	0.27	11.2	7.55	3450	560	3.6	84	2.35	1.5	11	50	865	3.2	0.63	0.97	581	1	1.91	18	1260	43	0.01	77	514	0.42	95	<10	116
17	644E	7028N	Soil	R. Dutka	372644	7117028	B,C	25	Rusty Brown	sand, chips	Steep	Northwest	Metased Hornfels, Monzonite	Steep talus slope, local rusty oxidized zone, intensely bleached, pyrite.	644E7028N	0.25	1	8.05	2420	1650	2.6	2	0.77	1	2	36	218	2.83	2.02	0.44	85	6	0.15	24	1180	24	0.01	149	174	0.4	96	<10	77
18	707E	7069N	Soil	R. Dutka	372707	7117069	C	25	Brown	sand-clay.chips	Flat	Northwest	Biotite Quartz Monzonite	Local flat spot at base of steep talus slope.	707E7069N	0.32	0.8	8.62	1865	1070	4.3	19	1.93	0.9	18	37	209	3.37	1.55	1.18	639	1	0.86	15	1220	36	0.02	30	545	0.36	84	<10	56
19	774E	7110N	Soil	R. Dutka	372774	7117110	C	25	Brown	sand-clay.chips	Flat	None	Biotite Quartz Monzonite	Local flat spot on saddle ridge at base of steep talus slope.	774E7110N	0.16	<0.5	7.65	807	930	2.8	3	1.5	0.6	17	37	67	2.85	2.05	1.01	603	1	0.9	15	1000	32	0.01	15	341	0.24	65	<10	59
20	823E	7106N	Soil	R. Dutka	372823	7117106	B,C	25	Light Brown	sand, chips	Flat	None	Biotite Quartz Monzonite	Local flat spot on saddle ridge at base of steep talus slope.	823E7106N	0.08	<0.5	7.81	176	1170	3.9	<2	1.86	0.6	6	17	50	1.9	2.94	1.11	455	1	0.37	7	970	35	0.01	15	2840	0.15	35	<10	51
21	889E	7112N	Soil	R. Dutka	372889	7117112	C	25	Rusty Brown	sand, chips	Flat	None	Biotite Quartz Monzonite	Local flat spot on saddle ridge at base of steep talus slope.	889E7112N	0.04	<0.5	8.35	370	1100	2.7	3	1.08	0.5	11	44	20	3.5	2.38	0.95	303	<1	0.35	12	1320	39	0.01	38	349	0.34	81	<10	54
22	949E	7103N	Soil	R. Dutka	372949	7117103	B,C	25	Brown	sand-clay.chips	Flat	None	Biotite Quartz Monzonite	Local flat spot on saddle ridge at base of steep talus slope.	949E7103N	0.03	<0.5	6.22	582	940	2	11	1.34	0.6	12	64	22	3.32	1.32	0.83	600	1	1.2	25	1150	19	0.04	9	314	0.42	103	<10	73
23	3005E	7115N	Soil	R. Dutka	373005	7117115	C	25	Dark Brown	clay-sand, chips	Flat	None	Biotite Quartz Monzonite	Local flat spot on saddle ridge at base of steep talus slope.	3005E7115N	0.01	<0.5	6.11	46	800	1.5	<2	0.97	0.5	9	66	22	3.28	1.19	0.79	460	1	1.13	24	900	17	0.03	<5	197	0.4	111	<10	66
24	3067E	7059N	Soil	R. Dutka	373067	7117069	B,C	20	Rusty Brown	sand, chips	Steep	North	Biotite Quartz Monzonite	Base of steep talus slope, local rusty oxidized zone.	3067E7069N	0.06	<0.5	7.57	556	1320	5.1	3	1.08	0.8	11	45	87	3.16	2.72	0.72	567	2	0.89	20	840	30	0.03	13	257	0.32	73	10	68
25	3108E	7058N	Soil	R. Dutka	373108	7117058	B,C	20	Dark Brown	sand, chips	Flat	North	Biotite Quartz Monzonite	Local flat spot on steep talus slope.	3108E7058N	0.14	0.5	6.23	820	980	3.2	8	1.23	0.6	20	61	223	3.6	1.57	0.83	906	2	1.03	25	1030	33	0.02	21	269	0.39	99	10	74
26	3159E	7077N	Soil	R. Dutka	373159	7117077	B,C	25	Light Brown	sand, chips	Steep	Northwest	Metased Hornfels, Monzonite	Steep talus slope, approx 25 meters from ridge crest.	3159E7077N	0.09	<0.5	4.62	425	1070	1.4	2	0.64	0.5	8	56	76	2.62	1.09	0.71	387	1	0.73	26	480	15	0.02	8	135	0.35	95	<10	59
27	3208E	7089N	Soil	R. Dutka	373208	7117089	C	25	Dark Brown	sand, chips	Flat	None	Biotite Quartz Monzonite	Local flat spot on saddle ridge at base of steep talus slope.	3208E7089N	0.02	<0.5	5.9	90	920	1.6	<2	0.81	<0.5	6	48	39	2.86	1.63	0.64	398	1	0.89	17	910	18	0.04	8	245	0.36	88	<10	57
28	PM135710		STD PM 182												PM135710	1.25	0.5	4.32	3740	540	0.6	20	14.6	0.5	107	50	108	8.71	0.92	1.95	3580	11	0.67	31	1210	17	0.89	16	323	0.19	114	<10	155

APPENDIX 5: ALS Chemex Laboratory Certificates



CERTIFICATE VA06099989

Project: Klondike

P.O. No.:

This report is for 17 Rock samples submitted to our lab in Vancouver, BC, Canada on 13-SEP-2006.

The following have access to data associated with this certificate:

MELANIE ROBERTS

MIKE STAMMERS

M. STAMMERS

SAMPLE PREPARATION

ALS CODE	DESCRIPTION
WEI-21	Received Sample Weight
LOG-22	Sample login - Rod w/o BarCode
CRU-31	Fine crushing - 70% <2mm
SPL-21	Split sample - riffle splitter
PUL-31	Pulverize split to 85% <75 um
LOG-24	Pulp Login - Rod w/o Barcode

ANALYTICAL PROCEDURES

ALS CODE	DESCRIPTION	INSTRUMENT
ME-ICP61	27 element four acid ICP-AES	ICP-AES
Cu-AA62	Ore grade Cu - four acid / AAS	AAS
Au-AA25	Ore Grade Au 30g FA AA finish	AAS

To: ALEXCO RESOURCE CORP.
ATTN: MIKE STAMMERS
1920-200 GRANVILLE ST
VANCOUVER BC V6C 1S4

This is the Final Report and supersedes any preliminary report with this certificate number. Results apply to samples as submitted. All pages of this report have been checked and approved for release.

Signature:

Keith Rogers, Executive Manager Vancouver Laboratory



ALS Chemex
EXCELLENCE IN ANALYTICAL CHEMISTRY

212 Brooksbank Avenue
North Vancouver BC V7J 2C1
Phone: 604 984 0221 Fax: 604 984 0218 www.alschemex.com

To: ALEXCO RESOURCE CORP.
1920-200 GRANVILLE ST
VANCOUVER BC V6C 1S4

Page: 2 - A
Total # Pages: 2 (A - B)
Finalized Date: 14-OCT-2006
Account: ALERES

Project: Klondike

CERTIFICATE OF ANALYSIS VA06099989

Sample Description	Method Analyte Units LOR	WEI-21 Revd Wt. kg	Au-AA25 Au ppm	ME-ICP61 Ag ppm	ME-ICP61 Al %	ME-ICP61 As ppm	ME-ICP61 Ba ppm	ME-ICP61 Be ppm	ME-ICP61 Bi ppm	ME-ICP61 Ca %	ME-ICP61 Cd ppm	ME-ICP61 Co ppm	ME-ICP61 Cr ppm	ME-ICP61 Cu ppm	ME-ICP61 Fe %	ME-ICP61 K %
P135701		0.68	1.98	0.5	2.03	2000	110	<0.5	76	0.20	<0.5	<1	95	26	1.66	0.03
P135702		0.32	0.07	<0.5	4.84	32	240	1.8	<2	9.59	<0.5	5	50	38	3.16	0.20
P135703		0.50	0.14	<0.5	7.63	839	1710	3.3	<2	2.90	<0.5	10	36	30	2.51	2.40
P135704		0.84	0.81	1.7	8.04	8280	2220	3.2	264	3.12	<0.5	22	27	252	3.15	2.61
P135705		0.78	0.12	<0.5	0.72	339	220	<0.5	<2	0.05	<0.5	<1	16	23	0.45	0.14
P135706		0.50	0.06	0.7	5.38	454	1010	1.9	<2	2.28	<0.5	1	104	232	1.36	0.45
P135707		0.70	0.02	<0.5	0.90	311	430	<0.5	<2	0.05	<0.5	<1	14	30	0.47	0.19
P135708		1.18	0.03	0.7	8.64	1040	2160	3.1	19	0.12	<0.5	<1	7	115	0.70	4.74
P135709		0.06	1.18	0.5	4.23	3120	530	0.5	11	12.10	<0.5	108	51	106	8.78	0.88
P135751		0.50	0.02	4.2	7.49	8610	610	3.2	53	0.03	<0.5	<1	8	45	1.30	1.45
P135752		0.66	0.17	<0.5	8.27	543	2500	3.1	<2	3.42	<0.5	5	26	115	2.52	3.37
P135753		0.56	0.05	<0.5	7.87	628	1730	4.2	<2	2.86	<0.5	8	53	40	3.63	3.64
P135754		1.26	0.01	<0.5	8.23	53	1930	3.9	<2	3.34	<0.5	5	35	22	3.18	3.87
P135755		1.36	0.01	<0.5	8.32	41	1720	3.9	<2	3.14	<0.5	7	38	18	3.39	3.70
P135756		0.74	0.02	<0.5	7.85	149	2280	3.9	<2	2.69	<0.5	7	35	4	2.83	4.20
P135757		2.50	0.01	<0.5	7.94	130	2400	7.5	<2	0.18	<0.5	<1	6	>10000	0.98	4.73
P135758		0.96	0.01	1.1	8.10	159	2450	5.0	<2	0.18	<0.5	<1	5	1050	0.96	4.91



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Page: 2 - B
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Project: Klondike

CERTIFICATE OF ANALYSIS VA06099989

Sample Description	Method Analyte Units LOR	ME-ICP61 Mg %	ME-ICP61 Mn ppm	ME-ICP61 Mo ppm	ME-ICP61 Na %	ME-ICP61 Ni ppm	ME-ICP61 P ppm	ME-ICP61 Pb ppm	ME-ICP61 S %	ME-ICP61 Sb ppm	ME-ICP61 Sr ppm	ME-ICP61 Ti %	ME-ICP61 V ppm	ME-ICP61 W ppm	ME-ICP61 Zn ppm	Cu-AA62 Cu %
P135701		0.55	74	<1	0.18	6	60	98	0.02	100	90	0.08	315	10	20	
P135702		3.48	1145	1	1.51	33	1980	9	0.03	5	409	0.23	210	<10	92	
P135703		1.02	383	1	1.97	9	750	22	0.05	21	588	0.27	66	<10	49	
P135704		1.24	283	1	1.81	6	870	59	0.17	168	683	0.30	58	10	75	
P135705		0.07	33	1	0.04	3	20	9	0.01	12	26	0.03	16	<10	7	
P135706		0.67	114	12	1.49	54	950	10	0.05	15	318	0.50	385	<10	33	
P135707		0.14	28	<1	0.06	2	40	8	0.01	<5	32	0.04	20	<10	3	
P135708		0.09	18	<1	0.21	1	120	32	<0.01	50	356	0.11	12	10	34	
P135709		1.94	3530	10	0.62	32	1180	24	0.94	8	306	0.19	111	10	155	
P135751		0.15	16	<1	0.02	<1	160	18	0.02	98	400	0.09	11	<10	12	
P135752		1.13	340	<1	1.90	5	900	35	0.05	11	759	0.30	58	<10	48	
P135753		1.11	395	<1	1.81	5	1100	23	0.15	16	631	0.32	72	<10	47	
P135754		1.18	580	<1	1.77	7	1080	36	<0.01	<5	835	0.33	68	10	60	
P135755		1.11	645	<1	1.80	7	1070	40	0.01	5	752	0.33	68	10	70	
P135756		1.04	374	<1	1.54	6	1020	30	<0.01	10	632	0.30	66	10	34	
P135757		0.21	28	<1	0.59	3	230	21	0.01	<5	250	0.07	10	10	149	1.21
P135758		0.22	19	<1	0.57	2	230	18	<0.01	7	254	0.07	10	10	84	



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CERTIFICATE VA06100000

Project: Klondike

P.O. No.:

This report is for 28 Soil samples submitted to our lab in Vancouver, BC, Canada on 13-SEP-2006.

The following have access to data associated with this certificate:

MELANIE ROBERTS

M. STAMMERS

MIKE STAMMERS

SAMPLE PREPARATION

ALS CODE	DESCRIPTION
WEI-21	Received Sample Weight
LOG-22	Sample login - Rcd w/o BarCode
SCR-41	Screen to -180um and save both
LOG-24	Pulp Login - Rcd w/o Barcode

ANALYTICAL PROCEDURES

ALS CODE	DESCRIPTION	INSTRUMENT
ME-ICP61	27 element four acid ICP-AES	ICP-AES
Au-AA25	Ore Grade Au 30g FA AA finish	AAS

To: ALEXCO RESOURCE CORP.
ATTN: MIKE STAMMERS
1920-200 GRANVILLE ST
VANCOUVER BC V6C 1S4

This is the Final Report and supersedes any preliminary report with this certificate number. Results apply to samples as submitted. All pages of this report have been checked and approved for release.

Signature:

Keith Rogers, Executive Manager Vancouver Laboratory



Project: Klondike

CERTIFICATE OF ANALYSIS VA06100000

Sample Description	Method Analyte Units LOR	WEI-21 Recvd WL kg	Au-AA25 Au ppm	ME-ICP61 Ag ppm	ME-ICP61 Al %	ME-ICP61 As ppm	ME-ICP61 Ba ppm	ME-ICP61 Be ppm	ME-ICP61 Bi ppm	ME-ICP61 Ca %	ME-ICP61 Cd ppm	ME-ICP61 Co ppm	ME-ICP61 Cr ppm	ME-ICP61 Cu ppm	ME-ICP61 Fe %	ME-ICP61 K %	ME-ICP61 Mn %
770E6145N		0.28	0.29	<0.5	7.50	1270	1380	2.5	10	0.98	<0.5	22	50	111	3.95	1.29	
720E6225N		0.26	0.13	<0.5	4.94	402	910	1.1	5	0.49	<0.5	7	123	324	3.56	0.78	
650E6310N		0.28	0.04	<0.5	5.74	251	1490	1.2	<2	0.67	<0.5	8	71	102	3.55	1.44	
720E6425N		0.42	0.13	0.5	5.51	192	1240	1.1	<2	0.69	<0.5	10	71	87	3.78	1.35	
660E6525N		0.30	0.08	<0.5	5.80	702	1680	1.8	5	1.11	<0.5	8	46	153	2.46	1.38	
675E6425N		0.50	0.10	0.6	9.18	1525	350	5.4	27	0.72	1.2	41	45	272	2.82	1.41	
580E6650N		0.42	1.04	<0.5	7.90	1890	710	3.7	21	1.49	1.0	26	47	45	3.17	1.18	
560E6770N		0.32	0.14	<0.5	8.16	4050	1010	3.5	9	1.44	0.7	9	38	37	3.07	1.42	
485E6895N		0.32	0.43	<0.5	7.41	550	580	3.8	<2	2.36	1.0	13	92	13	2.73	0.85	
385E6930N		0.34	0.28	<0.5	6.19	376	1350	1.9	<2	1.33	<0.5	10	73	95	2.72	1.46	
315E6915N		0.32	0.12	<0.5	3.50	419	940	1.2	<2	0.75	0.6	13	49	93	2.32	0.67	
245E6905N		0.52	0.10	<0.5	5.96	190	640	1.6	<2	1.66	<0.5	7	64	18	2.66	0.70	
120E6860N		0.40	0.06	<0.5	5.58	383	1680	1.7	<2	0.91	0.5	14	57	129	2.70	1.54	
050E6790N		0.40	0.13	<0.5	5.81	576	1590	2.0	5	0.75	0.5	13	61	139	2.76	1.45	
1540E6720N		0.44	0.01	<0.5	6.87	275	1640	2.5	<2	0.78	0.6	6	42	32	2.86	2.13	
590E7028N		0.46	0.27	11.2	7.55	3450	560	3.6	84	2.35	1.5	11	50	865	3.20	0.63	
644E7028N		0.44	0.25	1.0	8.05	2420	1650	2.6	2	0.77	1.0	2	36	218	2.83	2.02	
707E7069N		0.40	0.32	0.8	8.62	1865	1070	4.3	19	1.93	0.9	18	37	209	3.37	1.55	
774E7110N		0.38	0.16	<0.5	7.65	807	930	2.8	3	1.50	0.6	17	37	67	2.85	2.05	
823E7106N		0.38	0.08	<0.5	7.81	176	1170	3.9	<2	1.86	0.6	6	17	50	1.90	2.94	
889E7112N		0.42	0.04	<0.5	8.35	370	1100	2.7	3	1.08	0.5	11	44	20	3.50	2.38	
949E7103N		0.38	0.03	<0.5	6.22	582	940	2.0	11	1.34	0.6	12	64	22	3.32	1.32	
3005E7115N		0.30	0.01	<0.5	6.11	46	800	1.5	<2	0.97	0.5	9	66	22	3.28	1.19	
3067E7069N		0.46	0.06	<0.5	7.57	556	1320	5.1	3	1.08	0.8	11	45	87	3.16	2.72	
3108E7058N		0.34	0.14	0.5	6.23	820	980	3.2	8	1.23	0.6	20	61	223	3.60	1.57	
3159E7077N		0.40	0.09	<0.5	4.62	425	1070	1.4	2	0.64	0.5	8	56	76	2.62	1.09	
3208E7089N		0.24	0.02	<0.5	5.90	90	920	1.6	<2	0.81	<0.5	6	48	39	2.86	1.63	
PM135710		0.04	1.25	0.5	4.32	3740	540	0.6	20	14.60	0.5	107	50	108	8.71	0.92	



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CERTIFICATE OF ANALYSIS VA06100000

Sample Description	Method Analyte Units LOR	ME-ICP61 Mg %	ME-ICP61 Mn ppm	ME-ICP61 Mo ppm	ME-ICP61 Na %	ME-ICP61 Ni ppm	ME-ICP61 P ppm	ME-ICP61 Pb ppm	ME-ICP61 S %	ME-ICP61 Sb ppm	ME-ICP61 Sr ppm	ME-ICP61 Ti %	ME-ICP61 V ppm	ME-ICP61 W ppm	ME-ICP61 Zn ppm
770E6145N		1.08	1190	3	0.78	18	910	36	0.03	40	227	0.37	101	<10	70
720E6225N		0.51	280	6	0.56	33	990	22	0.13	26	122	0.37	241	<10	57
650E6310N		0.87	401	3	0.81	23	1410	14	0.08	9	132	0.41	118	<10	64
720E6425N		0.83	455	2	0.81	25	930	21	0.07	15	136	0.42	122	10	68
660E6525N		1.12	443	1	0.64	24	870	26	0.03	19	305	0.30	85	<10	61
675E6425N		0.55	1410	2	1.60	19	1190	50	<0.01	101	193	0.25	95	<10	54
580E6650N		0.74	627	1	1.24	17	1150	48	0.02	46	405	0.34	81	<10	71
560E6770N		0.71	272	1	1.18	10	1250	30	0.02	36	491	0.38	80	<10	52
485E6895N		1.18	578	<1	2.16	20	1520	37	0.03	20	513	0.39	93	<10	70
385E6930N		1.32	314	1	1.28	37	1520	17	0.04	7	278	0.39	179	<10	52
315E6915N		0.73	521	1	0.65	67	560	13	0.01	27	113	0.28	83	<10	57
245E6905N		1.16	343	1	0.88	49	2060	10	0.01	12	190	0.36	178	<10	59
120E6860N		1.01	437	1	0.85	37	780	14	0.02	10	169	0.36	116	<10	52
050E6790N		1.29	323	2	0.68	43	770	16	0.02	13	157	0.32	121	<10	52
1540E6720N		0.94	344	1	0.69	19	780	27	0.02	15	269	0.29	73	<10	58
590E7028N		0.97	581	1	1.91	18	1260	43	0.01	77	514	0.42	95	<10	116
644E7028N		0.44	85	6	0.15	24	1180	24	0.01	149	174	0.40	96	<10	77
707E7069N		1.18	639	1	0.86	15	1220	36	0.02	30	545	0.36	84	<10	56
774E7110N		1.01	603	1	0.90	15	1000	32	0.01	15	341	0.24	65	<10	59
823E7106N		1.11	455	1	0.37	7	970	35	0.01	15	2840	0.15	35	<10	51
889E7112N		0.95	303	<1	0.35	12	1320	39	0.01	38	349	0.34	81	<10	54
949E7103N		0.83	600	1	1.20	25	1150	19	0.04	9	314	0.42	103	<10	73
3005E7115N		0.79	460	1	1.13	24	900	17	0.03	<5	197	0.40	111	<10	66
3067E7069N		0.72	567	2	0.89	20	840	30	0.03	13	257	0.32	73	10	68
3108E7058N		0.83	906	2	1.03	25	1030	33	0.02	21	269	0.39	99	10	74
3159E7077N		0.71	387	1	0.73	26	480	15	0.02	8	135	0.35	95	<10	59
3208E7089N		0.64	398	1	0.89	17	910	18	0.04	8	245	0.36	88	<10	57
PM135710		1.95	3580	11	0.67	31	1210	17	0.89	16	323	0.19	114	<10	155