

Memo to: H.Copland, F. Patch Government of Yukon Type II Mines

From: B. Thrall, R. McIntyre, Alexco Resource Corp.

cc: C. Fernets, P. Johnson, D. Cornett

Date: November 9, 2006

Subject: Contract for Service for Site Investigation and Improvements United Keno Hill Mine

site: Special Projects Update Memo

On behalf of the Elsa Reclamation and Development Company Ltd., we are pleased to provide this memo as an outline of work undertaken on Special Projects at Keno Hill during the summer of 2006. In accordance with approved work plans for six special projects, work is currently in progress under a service contract between The Government of Yukon and Elsa Reclamation and Development Company Ltd. This summary report provides the progress on principally field components of those special projects as of October 31, 2006 a well as costs incurred to date. Approved work plans are appended to this document for ease of reference.

Project 1: Water Treatment Improvements Study

Historic operating data from the treatment sites has been compiled and analyzed for pH and zinc relationships. Alternative sludge management approaches for Galkeno 300 were summarized and proposed including disposal in a new lined facility within the Sime waste dump as well as within the Sime open pit. The study indicates that more soluble zinc is released untreated during the desludging campaigns than is contained in all of the treated solution, indicating a high priority to improve the desludging approach at Galkeno 300.

A power comparison study was completed on the economics of installing a transformer at Galkeno 300 versus continuing with generator power. Ongoing power outages do to generator shutdown create fluctuations in zinc concentrations and treatment performance at Galkeno 300. A reliable power source would improve the system performance. As well, zinc enters the pond untreated throughout the year during periods of generator shutdown for preventative maintenance periods.

A literature review and summary of alternative treatment options has been completed. At this point in the study the approach is not to complete additional bench scale treatability studies as these have already been completed and we do not believe there is value added to additional bench scale treatability studies. Instead actual field data as a result of changes to the Galkeno 300 system are being used to assess and propose recommendations for improvement to all of the systems.

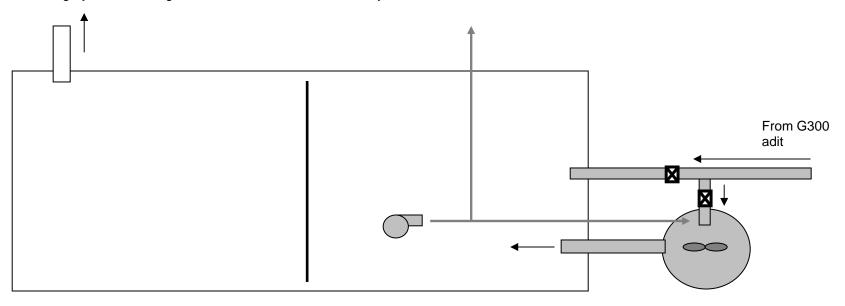
Project 2: Water Treatment Capital Improvements

Although certain improvements were made during the summer of 2006, this project was essentially put on hold until the results of the water treatment improvement study were known. ERDC has incurred approximately \$25,000 - \$30,000 in costs at the end of October in efforts to improve the performance of the Galkeno 300 system. This includes construction of a new sludge settling pond, installing a new mix tank and purchasing and installing a sludge recycle pump. Please see Figure 1 for a schematic depiction of the improvements to date and modification to the Galkeno 300 system. These efforts are essentially part of the improvement study as they provide actual field data on the effects of improved mixing and sludge recycling.



Photo 1: View of new Galkeno 300 mix tank.

Galkeno 300 Treatment Modifications to date Items in grey denote changes and additions to the treatment system



- 1. Sludge pump on floats approximately 12" above the bottom of pond, can be moved around to effectively recycle sludge
- 2. Tank buried to reduce elevation and allow adit water to directly flow into tank
- 3. Valves installed to bypass the mix tank if necessary
- 4. Piping sized to handle 300 gpm (8" line)
- 5. Solution enters the mix tank at the bottom and exits out the side
- 6. All existing systems left intact and operational and can be activated immediately if necessary
- 7. Sludge pump recycle piped to allow desludging directly into tanker on a routine basis

Figure 1: Schematic of Galkeno 300 water treatment improvements.

Project 3: Baseline Environmental Assessment

Documentation of Remaining Sites

SRK Consulting, with assistance from Access, was on site from August 16 to August 25, 2006, and documented 32 of the remaining sites, as listed below in Table 1 and indicated on Figure 2: Project Area Overview map, as well as reviewing two high priority sites including Bellekeno 600 (Eureka shafts), and the Lucky Queen adit. Sites included in these inspections were those known to be on UKHM claim blocks and those that were within one claim block of a known UKHM claim. These workings associated with these sites were located with a GPS unit in order to verify that the workings were either on or off UKHM claim blocks. One site, Gold Queen, could not be located based on the coordinates and description given in the Public Works document, and therefore could not be documented. The numbers referred to the table below were taken from Public Works & Government Services Canada Report: Keno Valley-Dublin Gulch Environmental Assessment, 2000.

Table 1: UKHM sites inspected in 2006.

Number	Name
8	Betty
14	Bluebird
15	Tin Can
16	Rico
17	Duncan Creek
20	Klondike-Keno
23	Kijo
24	Croesus No. 1
27	Lake
29	Highlander
30	Cub & Bunny
31	Stone
33	Main Fault & Nabob
34	Lake View
35	Nabob No. 2
37	Gold Hill No. 2

Number	Name
38	Fox
39	Caribou (Segsworth) & Alice
40	Divide
43	Duncan
45	Silver Basin
46	Nabob
47	Monument & Ladue Fraction
48	Apex
52	Мо
53	Maybrun
54	Hogan
59	Eagle
63	Gerlitski
69	Avenue
71	Christal (Dorothy)
73	Gambler

Note that two sites were visited, Runer and Vanguard, however they were determined to be off of UKHM claims at the time of our attendance, and therefore no thorough inspection or documentation was conducted.

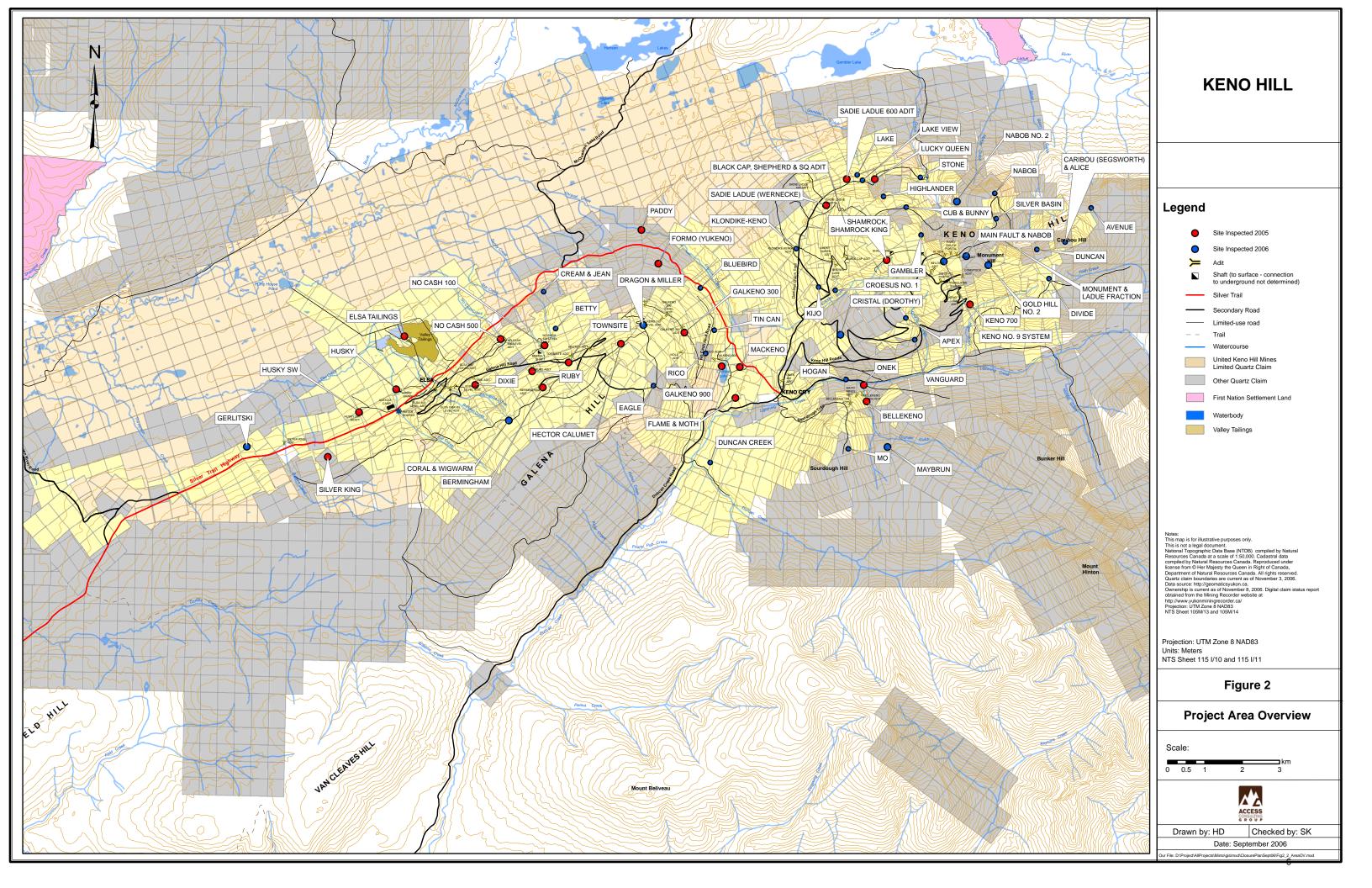
SRK Consulting completed the inspection and documentation of the four remaining sites on September 18, 2006, including the Keno No. 9, Cream & Jean, Dragon & Miller, and Coral & Wigwam sites, which concluded our documentation of all relevant sites.

Inspections were carried out on foot, by pickup truck, and by All-Terrain Vehicle. Major areas of focus included visual inspections of the current conditions at each site, including qualitative assessments of subsidence of known crown pillars, stability of open pits and underground openings, buildings and mine structures, waste dumps, and geochemical characteristics of wastes. Any ponded water in pits was noted, along with any surface drainage present and the downstream pathway of surface flow.

Results of these inspections were used to compile the UKHM Physical Hazards Risk Registry, Building Contamination Inventory, and the Hydrocarbon Contamination Inventory included in this progress report.



Photo 2: Assortment of buildings at Gambler site.

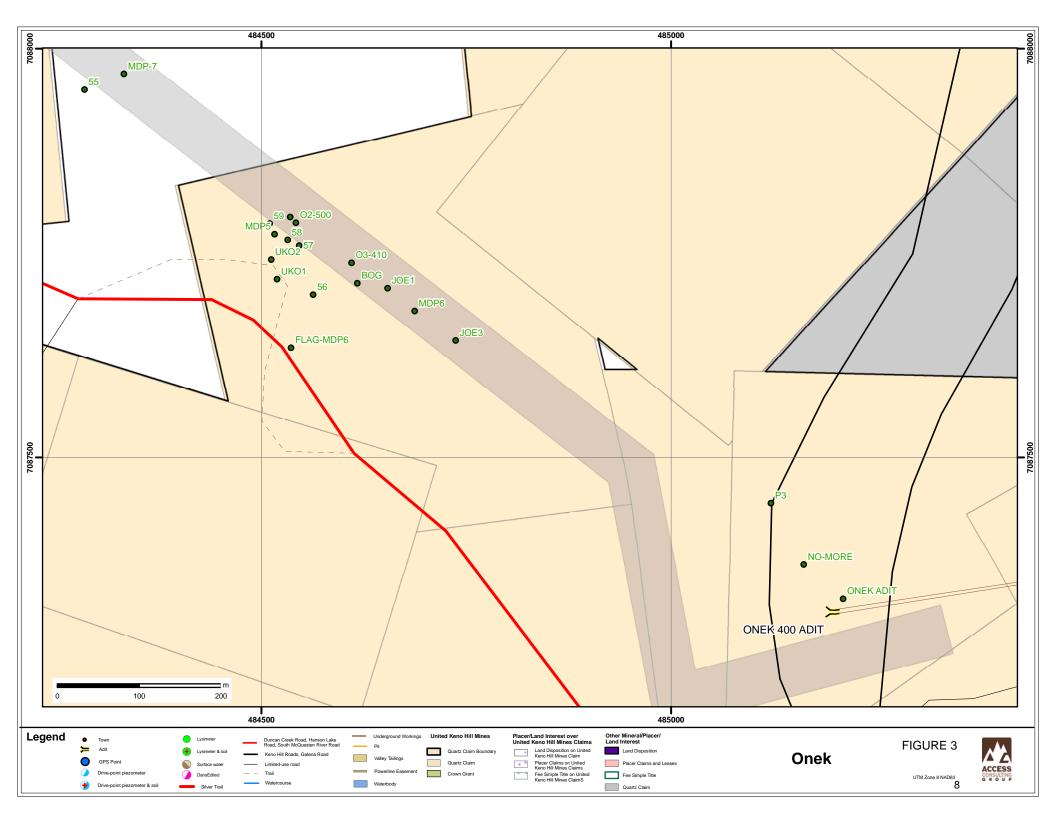


Groundwater

Shallow groundwater samples have been taken using drive point piezometers and a transect established to determine zinc loadings down gradient of adit discharge locations. Specifically, shallow groundwater sampling and mapping has been completed down gradient of No Cash, Onek, Galkeno 300 and 900 and Valley Tailings. This data has been incorporated into a site wide groundwater database and sampling locations have been summarized on maps. This work is also useful in the closure planning special project.



Photo 3: Access employee installing drivepoint piezometer



Historic Elsa Tailings Spill

SRK Consulting, with assistance from Access, conducted a visual inspection of the extent of the Elsa Tailings down Flat Creek west of Dam #3. Inspection was carried out on foot along side of Flat Creek. A large area of dead vegetation accompanied by obvious visual evidence of tailings deposits were located west of Dam #3 for a couple of hundred metres. The condition of this area and the tailings deposits were documented by SRK Consulting and will be included in the Final Baseline Assessment Report.

A long stretch of Flat Creek was inspected beyond the extent of the above mentioned tailings deposit in an effort to visually observe evidence of tailings movement downstream. When evidence of tailings material was no longer observed, this position was located with a GPS unit and considered the visual extent of the tailings spill. Once again, these findings will be included in the Final Baseline Assessment Report.

Minewater

A 3-D model of the Galkeno/Hector underground system has been completed in Autocad. The model is conceptual in nature and is a 'best fit' of available survey data (i.e. no mathematical groundwater model will be required for purposes of the BEA). The model incorporates underground workings, veins and major faults into a visual Autocad 3D model. NovaGold geologist D. Brownlee spearheaded these efforts and produced a summary report on the findings of the model and the interconnections of the underground system for Galkeno and Hector.

Galkeno 300 & 900 3D Model Looking Northerly

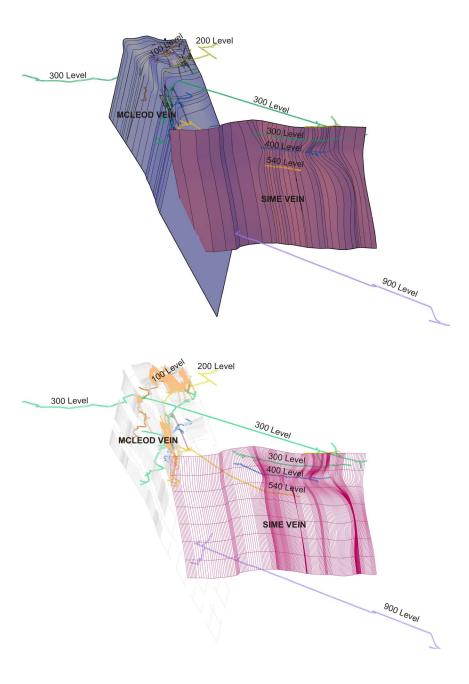


FIGURE 4

Soil Contamination along Haulage Routes

SRK, with assistance from Access, conducted a soil sampling survey of routes considered to be representative of haul route conditions, to determine metals content of soil. These transects were established to assist in a determination of the potential for area-wide contamination due to hauling high grade ore, and ore concentrates. A total of four transects were completed, with five sample stations established per transect. Sample sites selected were nominally 5, 10, 25, 50, and 100 meters from road edge, and soil was taken to a depth of 2cm from the 'F' soil horizon immediately below the litter layer. Note that the toe of the roadway material was considered the road edge, so the distance from the actual edge of the traveled portion of the roadway was varied somewhat from site to site.

The twenty soil samples collected were shipped to ALS Chemex in Vancouver for analysis. Transects completed consisted of:

Transect 1: approximately 1 km west of Silver King adit, along Silver Trail Highway;

Transect 2: east of Formo mine site, along Silver Trail Highway;

Transect 3: south of Keno 700 mine site, along Keno ore haul route;

Transect 4: west of Dixie mine site, along Calumet Drive mine haul road;

Initial lab results indicate highest metal concentrations (principally zinc, lead and manganese) on Transect 4, Calumet Drive near Dixie adit. Provisional laboratory results have been summarized in Table 2: UKHM Haulage Route Sampling Table; full reporting will be included in the Final Baseline Assessment Report.



Photo 4: Soil sample location near Keno Hill.



Table 2: UKHM Haulage Route Sampling

LOCATION	Units	REF-8	REF-13	REF-28	REF-53	REF-103	HWY-9	HWY-14	HWY-29	HWY-54	HWY-104	KH-9	KH-14	KH-29	KH-54	KH-104	CD-8	CD-13	CD-28	CD-53	CD-103	Yukon CSR -
Sample Date	• · · · · ·		14-Sep-06	_														15-Sep-06				
Sampled by		DM/CF	DM/CF	DM/CF	DM/CF	DM/CF	DM/CF	DM/CF	DM/CF	DM/CF	DM/CF	DM/CF	DM/CF	DM/CF	DM/CF	DM/CF	DM/CF	DM/CF	DM/CF	DM/CF	DM/CF	
Matrix		Soil	Soil	Soil	Soil	Soil	Soil	Soil	Soil	Soil	Soil	Soil	Soil	Soil	Soil	Soil	Soil	Soil	Soil	Soil	Soil	
ME-ICP41																						
Ag (Silver)	ppm	2	0.9	0.7	1	0.7	2	1.2	1.4	0.3	0.3	50.2	16.8	6	3.6	3.2	22.8	27.3	2.5	0.5	2.4	40
Al (Aluminum)	%	0.42	0.22	0.1	0.21	0.11	0.48	0.6	0.53	0.19	0.14	0.59	0.36	0.77	0.88	0.38	0.31	0.15	0.27	0.44	0.22	None
As (Arsenic)	ppm	39	12	11	9	7	53	41	40	12	7	141	36	11	10	2	67	73	15	8	11	100
B (Boron)#	ppm	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	2**
Ba (Barium)	ppm	120	100	60		60	90	110	90	80	100	60	100	320	250	200	90	60	110	270	150	2000
Be (Beryllium)	ppm	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	8
Bi (Bismuth)	ppm	<2	<2	<2		<2	<2	2	<2	<2	<2	3	<2	<2	<2	<2	<2	<2	<2	<2	<2	None
Ca (Calcium)	%	2.12	2.42	2.1	2.34	0.69	0.88	1.87	1.42	2.73	3.94	0.37	0.27	0.42	0.16	0.24	1.32	1.67	1.58	1.66	2.51	None
Cd (Cadmium)	ppm	4.8	4.2	1.4	8.0	0.5	1	0.9	1.2	0.9	0.9	14.2	9.9	4.3	1.7	1	24.8	32.5	3.7	1.3	2.7	500
Co (Cobalt)	ppm	5	3	2	3	1	5	6	5	3	2	10	6	11	5	3	4	2	5	5	2	300
Cr (Chromium)	ppm	7	4	2	3	1	9	10	9	3	2	8	5	4	5	4	6	3	4	5	3	700
Cu (Copper)	ppm	27	18	. •		8	23	26	22	18	33	52	30	18	35	20	37	39		21		
Fe (Iron)	%	1.01	0.51	0.24	0.44	0.22	1.45	1.44	1.42	0.4	0.27	2.39	1.35	0.69	0.73	0.7	1.24	0.78	0.59	0.7	0.42	None
Ga (Gallium)	ppm	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	None
Hg (Mercury)	ppm	<1	1	<1		<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1		150
K (Potassium)	%	0.07	0.12	0.1		0.06	0.06	0.07	0.05	0.02	0.02	0.05	0.07	0.09	0.07	0.1	0.07	0.08	0.05	0.03	0.05	None
La (Lanthanum)	ppm	<10	<10	<10	-	<10	10	10	10	<10	<10	10	10	10	10	<10	<10	<10	<10	<10	<10	None
Mg (Magnesium)	%	0.45	0.4	0.47		0.12	0.26	0.36	0.32	0.35	0.32	0.27	0.16	0.1	0.07	0.1	0.25	0.25	0.21	0.26	0.32	None
Mn (Manganese)	ppm	664	561	514		77	187	439	189	177	219	1860	499	1755	250	565	1540	1455	839	719	289	None
Mo (Molybdenum)	ppm	<1	<1	<1	<1	<1	1	1	1	<1	<1	5	3	1	2	1	<1	<1	1	1	<1	40
Na (Sodium)	%	0.01	0.01	0.01	0.01	<0.01	0.01	0.01	0.01	0.01	0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	0.01	None
Ni (Nickel)	ppm	14	8	4	11	3	15	15	15	6	11	25	15	23	19	12	11	7	7	9	5	500
P (Phosphorous)	ppm	950	1410	870		540	890	990	730	650	590	1490	1420	2140	1810	1580	1100	1070	900	890	810	None
Pb (Lead)	ppm	51	26			49	52	40	57	7	10	1560	501	226	59	44	359	631	162	24	77	2000
S (Sulphur)	%	0.15	0.2	0.2		0.12	0.09	0.16	0.12	0.26	0.24	0.11	0.12	0.13	0.07	0.1	0.23	0.25	0.16	0.16	0.17	500
Sb (Antimony)	ppm	<2	<2	<2		<2	2	<2	<2	<2	<2	39	18	4	<2	<2	19	24	2	<2	<2	
Sc (Scandium)	ppm	1	<1	<1	<1	<1	1	1	1	<1	<1	1	<1	<1	<1	<1	1	<1	1	<1	1	None
Sr (Strontium)	ppm	62	71			34	24	48	41	70	93	18	15	42	20	21	34	37	45	54		
Ti (Titanium)	%	0.01	<0.01	<0.01	<0.01	<0.01	0.01	0.01	0.01	<0.01	<0.01	0.01	<0.01	<0.01	<0.01	<0.01	0.01	<0.01	0.01	0.01	0.01	None
TI (Thallium)#	ppm	<10	<10	<10		<10	<10	<10	10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10		2**
U (Uranium)	ppm	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	None
V (Vanadium)	ppm	12	6	3	5	3	16	17	15	5	5	12	7	6	10	11	11	4	7	11	ŭ	200**
W (Tungsten)	ppm	<10	<10			<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	None
Zn (Zinc)	ppm	287	258	142	111	65	99	114	103	79	32	1060	780	182	53	91	1885	1840	199	91	118	600

^{*} REF - Samples taken approximately 1km west of Silver King site along Silver Trail Highway

#Guidelines below detection limit

Yellow highlight indicates result exceeds CSR criteria for industrial site

^{*} HWY - Samples taken east of Formo site along Silver Trail Highway

^{*} KH - Samples taken on Keno 700 road, south of Keno 700 site.

^{*} CD - Samples taken along Calumet Drive, west of Dixie site.

^{*} CCME Guideline

^{**}CSR Guideline applies to agricultural use only

Hydrocarbon-Contaminated Soils

Access Consulting observed and documented areas where evidence of hydro-carbon contamination was visible while conducting the inspections of the remaining sites with SRK Consulting. Areas of concern were compiled and correlated with sites documented the previous year and with areas and storage facilities reported in the March 2000 Environmental Baseline Assessment performed by Public Works. This information was sorted into a Hydrocarbon Contamination Inventory list which included Site Name and Location, Description of Contamination, whether samples were taken, and a documented History of Spills if applicable.

Please see Table 3: UKHM Hydrocarbon Contamination Inventory table for an inventory of hydrocarbon contaminated soil; further discussion and context will be forthcoming in the Final Baseline Environmental Assessment Report.



Photo 5: Evidence of hydrocarbon contamination at Caribou (Segsworth) site (later research determined that this site was not on UKHM claim package).

Assigned Site	Site Name	Location	Desription of Contamination	Samples Taken	History of Spills	Mitigation Measures
No.	One Name	Location	Destription of Contamination	Odnipies Taken	riistory or opins	miligation measures
1	Silver King	Diesel fuel was likely stored near the 100 Level Adit.	No visible signs of contamination	None		
·	onver rang	Compressor building	Hydrocarbon staining on crushed gravel floor	None		
		Backfill pipe	Small and shallow stain from drilling lubricant or hydraulic oil;	None		
2	Husky & Husky SW	Above ground storage tank located behind the boilerhouse	Soil staining evident around perimeter of 9400 litre tank; heavy staining at the valves; rock berm extends around the perimeter of the AST	None		
		Two AST's located in the northeast corner inside the boilerhouse	Staining noted on the concrete floor on the exterior of the building and the rear addition; no staining was noted on the surrounding soils.	None		
		One fuel drum laying on its side, leaking from bung.	Minor soil staining	None		
		Small storage shed adjacent to west wall of boiler house.	Interior heavily stained with tar and rock drill oil; minor staining at the entrance.	None		
		Three drums were located at the rear of the smaller storage shed.	Minor surficial staining surrounding the drums.	None		
		One aboveground storage tank located on the northwest corner of the hoist house on Husky SW site	No visible signs of contamination	None		
		Two 200L drums labelled as torque fluid at Husky SW site	Area around horizontal drum stained. (approx. 20m3)	None		
		SW site	Some staining around fuel drum (approx. area = 8m2) indicating that is has or is leaking	None		
	Elsa	Fuel Storage area at backfill site.	No visible signs of contamination	None		
4	Dixie	Inside and along north wall of garage	Staining of soil present (approx. 10m2) appears to be from heavy	None		
5	Coral & Wigwarm		machinery maintenance. No visible signs of contamination			
	Bermingham & Ruby (Arctic & Mastiff)	Northwest corner of the receiving tank behind the garage on	Some leakage has occurred and the soils surrounding the tank	Yes		
	, ,	the Ruby site.	have been stained.			
		Ruby Level 400 Adit	Interior of the adit stained with hydrocarbons.	None		
7	No Cash		Spills present on both the concrete floor and immediately outside of bay doors; associated with equipment inside the boiler room. Staining appears to be superficial.	None		
_						
	Betty Hector Calumet	Three metal oil barrels present adjacent to the conveyor	No visible signs of contamination A small stain (approx. 0.5m2) is present on the ground near the	None None		
9	nector Calumet	section of the facility, two empty and one full of oil & water.	barrels.	Note		
10	Dragon & Miller		No visible signs of contamination	None		
	Galkeno 300	Adjacent to the north wall of the quonset warehouse.	Staining (approx. 0.5m3) visible from inside between the concrete and the building frame.	None		
		Adjacent to the west wall of the quonset warehouse.	Staining (approx. 0.6m3) visible from an above ground storage tank.	None		
	Galkeno 900	Storage Building	1m2 oil stain in the dirt	None		
	Fisher Creek			Not on claim		
	Bluebird Tin Can		No visible signs of contamination No visible signs of contamination	None None		
	Rico		No visible signs of contamination	None		
	Duncan Creek		No visible signs of contamination	None		
	Flame & Moth		No visible signs of contamination	None		
19	Onek			None		
		East of buildings 19A and 19C and to the south of building	Oil staining present Seven stains were identified; approx area = 20m2	None None		
		19D. North and south of Building 19G.	Five large waste oil stains were present; approx. area = 30m2	None		
		Under POL shed at upper camp.	Extensive staining attributable to spillage from various hydrocarbon based liquids stored in the building; approx. area = 6m2	None		
		Unlined sumps in garage.	Heavily stained.	Yes - no PCB's detected		
20	Klondike-Keno	Three heating oil drums on wood platform at the southern	No visible signs of contamination	None None		
	Sadie Ladue	area of site Roughly 10m east of Pit #1	A fuel or oil stain (< 5m2) was present which penetrated less than	None		
21	244.0 24440		5cm into the broken waste rock.			
		Site for temporary storage of Jet B fuel in 1996	Possible contamination suspected	Yes		

ie 1 of 4



Assigned Site						
No.	Site Name	Location	Desription of Contamination	Samples Taken	History of Spills	Mitigation Measures
22	Bellekeno	2000L storage tank inside compressor house at 625 Level	\ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \	None		
		A CTA : 00 0001 -:	floor, at the entrance, and behind compressor house.	Nega		
		AST1 is a 20,000L single wall aboveground steel diesel tank behind the compressor house at the 625 Level.	INO VISIDIE SIGNS OF CONTAMINATION	None		
		AST2 is a 2,000L single wall aboveground steel gasoline	No visible signs of contamination	None		
		tank inside the compressor house at the 625 Level.				
		AST3 is a 3,000L single wall aboveground, two compartment steel gasoline/diesel tank inside the	There is a zone of staining adjacent to the tank likely from spilling during fuel transfer.	None		
		compressor house at the 625 Level	duling rue transier.			
		Between the dump shed, lunchroom, and adit building at 625	Minor surface soil staining.	None		
		Level Mobile fuel storage tank at the 200 Level	Surface soil staining (approx. 9m2) adjacent to tank.	None		
			Minor surface staining was present.	None		
		Backfill pad	Soil contamination observed from the drilling operation.	Yes		
		·	(approx.7.2m3)			
0.5	16"					
	Kijo Croesus No. 1		U	None None		
	Black Cap, Shepherd & SQ Adit	Ten drums located at the east side of Waste Rock Pile WR-	Waste oil stain near the 10 drum pile. (approx. 0.2m3)	Yes		
	·	01				
		Shop		Yes		
			the gravel floors, and one small stain present outside of bay			
26 27	Lucky Queen Lake		No visible signs of contamination No visible signs of contamination	None Not on claim		
	Shamrock	Generator building	Soil within the generator building was stained. (approx. area =	None		
			4m2)			
		Main building site	Two small hydrocarbon stains present on east side. (approx. area <1m2)	None		
			,			
	Highlander Cub & Bunny		No visible signs of contamination No visible signs of contamination	None None		
	Stone		No visible signs of contamination	None		
32	Keno 700	Generator Shack and Oil storage building	Hydrocarbon staining on floor leading outside to the southeast.	Yes		
		Mining office.	Hydrocarbon staining on wooden floor.	None		
				None		
		Between the mining office and the boiler building	Large hydrocarbon stain on the slope.	Yes		
		Fuel tank situated between ambulance shed and generator	No visible signs of contamination	None		
		shack				
		Fallen transformer site at 200 Level	Suspected contamination	Yes		
		Below landfill site	Suspected contamination	Yes		
		Garage floor	Suspected contamination	Yes		
		Erosion channel	Suspected contamination	Yes		
		Below engine drop/oil change platform	Suspected contamination	Yes		
		Post considerable discount		No.		
		Drainage channel to the northeast	Suspected contamination	Yes		
00	Main Fault O Nahal	Collid was to down a sound by the state of t	Fifteen bettering for animals larger that the best to be a larger	No		
33	Main Fault & Nabob	Solid waste dump near old house on the opposite side of Silver Basin Gulch Trail.	Fifteen batteries for miner's lamps that are leaching	None		
	Lake View	January Company (1988)	No visible signs of contamination	Not on claim	Not on claim	
	Nabob No. 2	Charrendo MO Daine Duildin		None		
36	Keno No. 9 System	Shamrock J18 Raise Building	Transformer on power pole suspected of containing PCB's based on age.	Inone		
		I	John ago.	I	I	I

nge 2 of 4



Assigned Site						
Assigned Site No.	Site Name	Location	Desription of Contamination	Samples Taken	History of Spills	Mitigation Measures
140.						
37	Gold Hill No. 2	350m west of Monument Hill Summit via the Monument Hill	No visible signs of contamination	None		
O,	00.0 1 140. 2	Trail	The violate digite of contamination	The first of the f		
38	Fox	Four 45 gallon drums found in Trench #1	No visible signs of contamination	None		
39	Caribou (Segsworth) & Alice	Numerous 5 gallon Chevron pails located in and around	Numerous hydrocarbon staining around blocked adit entrance.	Not on claim	Not on claim	
40	Divide	trenchinc and adit. Six empty drums present near wood frame building.	No visible signs of contamination	None		
41	Devon	on onety drame procent near mood name banding.	No visible signs of contamination	Not on claim	Not on claim	
42	Faith		No visible signs of contamination	Not on claim	Not on claim	
43	Duncan		No visible signs of contamination	Not on claim	Not on claim	
44	Gold Queen		No visible signs of contamination	None	Not an aleina	
45 46	Silver Basin Nabob		No visible signs of contamination No visible signs of contamination	Not on claim Not on claim	Not on claim Not on claim	
47	Monument & Ladue Fraction		No visible signs of contamination	None	Not on claim	
48	Apex		No visible signs of contamination	None		
49	Vanguard	Twenty 45 gallon drums outside of adit.	No visible signs of contamination	Not on claim	Not on claim	
50	Homestake		No visible signs of contamination	Not on claim	Not on claim	
51	Christine	One 45 gallon drum of jet fuel present about 20m west of	No visible signs of contamination	Not on claim	Not on claim	
52	Mo	Trench #1	No visible signs of contamination	Not on claim	Not on claim	
53	Maybrun	Cabin	Staining present around cabin area.	Not on claim	Not on claim	
		Dozen empty 45 gallon drums	No visible signs of contamination	Not on claim	Not on claim	
54	Hogan	1,7 0	No visible signs of contamination	Not on claim	Not on claim	
55	Runer	Two 22,750L above ground storage tanks behind garage and storage shed.	No visible signs of contamination	Not on claim	Not on claim	
		Garage	Untimbered and 1/4 of the timbered section of the garage floor exhibited moderate to heavy hydrocarbon staining.	Not on claim	Not on claim	
		Adjacent to southwest corner of timber frame refueling structure.	Soil staining.	Not on claim	Not on claim	
		Storage shed located west of the garage	Soil staining evident outside doorway; no discolouration below 0.05cm depth.	Not on claim	Not on claim	
		Empty drum stack on top of slope approximately 125m west of garage	Small area of staining immediately south of drum stack.	Not on claim	Not on claim	
56	Wernecke Railroad		No visible signs of contamination	Not on claim	Not on claim	
57	Formo (Yukeno)		No visible signs of contamination	Not on claim	Not on claim	
58	Paddy		No visible signs of contamination	Not on claim	Not on claim	
59	Eagle		No visible signs of contamination	Not on claim	Not on claim	
60	Fisher Cream & Jean		No visible signs of contamination	Not on claim	Not on claim	
61 62	Nord		No visible signs of contamination No visible signs of contamination	Not on claim Not on claim	Not on claim Not on claim	
63	Gerlitski		No visible signs of contamination	None	Not on daim	
64	Titan		No visible signs of contamination	Not on claim	Not on claim	
65	Shanghai	Twenty four empty 45 gallon drums located to the west of	No visible signs of contamination	Not on claim	Not on claim	
66	Moon	the waste rock pile. Fuel Cache #1: Twenty three empty fuel drums 13m east of	No visible signs of contamination	Not on claim	Not on claim	
		Building 66A				
		Fuel Cache #2: Ten empty fuel drums 20m south of Building 66C	No visible signs of contamination	Not on claim	Not on claim	
		Solid waste dump	Contains batteries for vehicles which could be leaching acid.	Not on claim	Not on claim	
60	NA Links		No visible since of contentingtion	Niek aus alaina	Net an eleim	
68 69	Mt. Hinton Avenue		No visible signs of contamination No visible signs of contamination	Not on claim Not on claim	Not on claim Not on claim	
70	Yono		No visible signs of contamination	Not on claim	Not on claim	
71	Christal (Dorothy)	A number of empty 45 gallon drums were found discarded at		None	The off olding	
	(=)	the Christal Camp site.				
72	Ironclad (Ankeno)	A number of empty 45 gallon drums were located about 40m west of Adit 1.	No visible signs of contamination	Not on claim	Not on claim	
73	Gambler	Thirteen empty 205 litre steel barrels were located on the	No visible signs of contamination	Not on claim	Not on claim	
		waste rock below the lower adit.				
75	Bema		No visible signs of contamination	Not on claim	Not on claim	
76	Townsite Mine	Office/Workshop	Minor staining on floor.	None		
77	Sadie Ladue 600 Adit	Fuel Ctereme Area #4: Commeillerere and a CLL #6	No visible signs of contamination	None		
78	Elsa Village	Fuel Storage Area #1: Sawmill area, north of Hwy #2.	No visible signs of contamination	None		16

e 3 of 4 16



Assigned Site No.	Site Name	Location	Desription of Contamination	Samples Taken	History of Spills	Mitigation Measures
		Fuel Storage Area #2: Diesel Service Station south of	1	None		
		skating rink Fuel Storage Area #3: Oil Storage Tank near the rescue	test pit immediately downgradient of the dispenser Fuel stains are present around the refueling shack	None	Large fuel spill occurred from this tank. Limited cleanup	
		building on the northeast side	ruei stains are present around the refueiling shack	None	work was completed and Environment Canada indicated spill did not impact downgradient areas offsite.	
		Fuel Storage Area #4: Diesel and Stove Oil storage tanks across from fire hall	Small patch of stained soil bottom of diesel tank drain valve.	None		
		Fuel Storage Area #5: AST near main doors of main shop	Minor spillage noted around tank.	None		
		Fuel Storage Area #6: Underground UST's at school.	Minor stains observed near gymnasium building.	None		
		Fuel Storage Area #7: Gas & Diesel AST's on north side of flotation mill.	No obvious staining	None		
		Fuel Storage Area #8: Generator AST located next to Northwestel hut.	No obvious staining	None		
			Approx. 500m3 of oil soaked gravel present. No containment berm present.	None		
		Waste Oil Storage Area #2; behind storage shed across the road from Aurora Heights	Seven pails of waste oil present; one has overflowed onto concrete pad.	None		
		Waste Oil Storage Area #3; Oil change pad across from #1 Bunkhouse	Waste oil may have been dumped on the ground underneath the ramp.	None		
		Out of service transformer storage near new bunkhouse.	No visible signs of contamination	Yes		
		Out of service transformer storage on northwest side of road	No visible signs of contamination	Yes		
		leading into the saw mill area.				
		Flotation Mill/Crusher House	Concrete floor is heavily stained with spilled oil or fuel. Heavy oil staining (48m2) visible outside and immediately north of	None		
			room with 50,000 litre readgent vessel and diesel powered	INOTIE		
			pumps; extends onto a vehicle turnaround area.			
		Machine Shop	A number of small spills on the concrete floors near the doors.	None		
79	Elsa Tailings	Twenty empty barrels located in the "boneyard"	No visible signs of contamination	None		
80	Wernecke Tailings		No visible signs of contamination	Not on claim	Not on claim	
81	Mackeno	Immediately north of weight scale foundation.	Six small surface stains with a total area of 1m3; not present below 0.10m below grade.			

age 4 of 4

Building Contamination

Access Consulting observed and documented sites where asbestos or lead leaden materials were found while conducting the inspections of the remaining sites with SRK Consulting. Where possible, samples of potential asbestos containing materials were retained by Access Consulting in the event that lab analysis was necessary to confirm the presence of asbestos fibres. Sites with evidence of lead or asbestos bearing materials were compiled and correlated with sites documented the previous year and with areas reported in the March 2000 Environmental Baseline Assessment performed by Public Works. This information was sorted into a Building Contamination Inventory list which included Site Name, Contamination Location, Description of Contamination, and whether samples were taken.

Please see Table 4: UKHM Building Contamination Inventory table for an inventory of building contamination; further discussion and context will be forthcoming in the Final Baseline Environmental Assessment Report.



Photo 6: Possible building contamination at Main Fault & Nabob site.



Table 4: UKHM Building Contamination Inventory - Provisional Draft

Assigned Site	Site Name	Location	Desription of Contamination Suspect	Samples Taken/Results	Mitigation Measures
No.	Cito Hamio	20041011	Door phon of Contamination Guopool	Campios ranomitosano	mingunon modeares
1	Silver King	100 Level Shifters Office/Lunch Room	Paint	None	
2	Husky & Husky SW	Boiler House	Possible asbestos exterior and interior siding, vinyl and asbestos	None	
			floor tile.		
		ATCO Trailer	Exterior is painted yellow and brown.	None	
3	Elsa	50 Level Shack	Blue paint	None	
		400 Level Portal	Insulated wood frame with asbestos siding.	None	
4	Dixie	Garage/Office	Asbestos board in the office area.	None	
			Floor tile	Yes - 1-10% chrysotile	
5	Coral & Wigwam		No visible signs of contamination		
6	Bermingham & Ruby (Arctic & Mastiff)		No visible signs of contamination	None	
7	No Cash	100 Level Garage	Bay doors are painted	None	
		100 Level Lunchroom	Floor and partial wall sheathed with 2cm thick asbestos board.	None	
			Foundation consists of wood plank flooring on grade covered with	None	
			asbestos.		
8	Betty		No visible signs of contamination	None	
9	Hector Calumet		No visible signs of contamination	None	
10	Dragon & Miller		No visible signs of contamination	None	
11	Galkeno 300	Residence (Building 11G)	Contains paint on interior	None	
12	Galkeno 900	Storage Building	1m2 oil stain in the dirt	None	
13	Fisher Creek		No visible signs of contamination	Not on claim	
14	Bluebird	Cabin	Some paint on windows and doors.	None	
			Asbestos fibre board in northeast corner	None	
15	Tin Can		No visible signs of contamination	None	
16	Rico		No visible signs of contamination	None	
17	Duncan Creek		No visible signs of contamination	None	
18	Flame & Moth		No visible signs of contamination	None	
19	Onek	Building 19A	Weathered green paint exterior	None	
		Building 19B	Weathered green paint exterior	None	
		Building 19C	Weathered green paint exterior	None	
		Building 19D	Yellow painted exterior; painted interior walls	None	
		Building 19E	Asbestos tar paper on entire exterior of building	None	
		Buildings 19J to 19M	Portion of one building still has asbestos tarpaper cladding	None	
20	Klondike-Keno	Collapsed buildings	A number of collapsed buildings contain evidence of asbestos on	None	
			them.		
		Drill shack	Asbestos lining on the walls	None	
21	Sadie Ladue		No visible signs of contamination	None	
22	Bellekeno	Powder magazine at 200 Level Adit	Interior walls lined with asbestos board.	None	
		Wash house at 200 Level Adit	Lined with asbestos paper on exterior.	None	
23	Kijo	Traditional de Los Loverright	No visible signs of contamination	None	
24	Croesus No. 1		No visible signs of contamination	None	
25	Black Cap, Shepherd & SQ Adit		No visible signs of contamination	Yes	
26	Lucky Queen		No visible signs of contamination	None	
27	Lake		No visible signs of contamination	Not on claim	
28	Shamrock	Main Site Building	Paint on interior walls	None	
29	Highlander		No visible signs of contamination	None	
30	Cub & Bunny	<u> </u>	No visible signs of contamination	None	
31	Stone	Dry building	Exterior of building is painted white.	Yes - sample not yet run	
Ŭ.		Outhouse near middle adit	Possible asbestos on walls	Yes - sample not yet run	
		Building 31C	The roof and wall panel are likely constructed with an asbestos-	Yes - sample not yet run	
			containing material.		
		Building 31D	Possible asbestos on walls	Yes - sample not yet run	
4	I .	1	I. CCC.D.C GODGOCG ON WARD	. so campio not yourun	<u> </u>

Page 1 of 3



Table 4: UKHM Building Contamination Inventory - Provisional Draft

Assigned Site					
No.	Site Name	Location	Desription of Contamination Suspect	Samples Taken/Results	Mitigation Measures
32	Keno 700	Mess Hall	Exterior asbestos-board insulation siding.	Yes - 60-80% chrysotile	
			Paint on exterior walls.	Yes - sample taken by Public Works but never analysed	
), an analy 1	
		Bunkhouse	Exterior asbestos-board insulation siding.	Yes - 60-80% chrysotile	
			Interior paint	None	
		Manager's accomodation bulding and storage sheds	Interior paint	None	
		Boiler Room and Water Supply Building	Insulation around boiler and lying in a pile on the floor	Yes - tested negative for asbestos.	
33	Main Fault & Nabob	House	Exterior walls contain traces of asbestos tar paper cladding.	Yes - sample not yet run	
34	Lake View	Solid wasste dump #2	Approximately 20m3 of the waste is asbestos asphalt wall. No visible signs of contamination	None Not on claim	
	Nabob No. 2		No visible signs of contamination	None	
	Keno No. 9 System	Wood frame over Shamrock J18 raise	Interior of building is clad in gyoprock with asbestos coating.	None	
	Gold Hill No. 2	Wood frame over Ghamfock of Chaise	No visible signs of contamination	None	
38	Fox		No visible signs of contamination	None	
39	Caribou (Segsworth) & Alice		No visible signs of contamination	Not on claim	
	Divide		No visible signs of contamination	None	
	Devon	Old frame cabin	Some asbestos tar paper cladding on the building and the ground		
			g g g		
42	Faith		No visible signs of contamination	Not on claim	
	Duncan		No visible signs of contamination	Not on claim	
44	Gold Queen		No visible signs of contamination	None	
	Silver Basin		No visible signs of contamination	Not on claim	
	Nabob		No visible signs of contamination	Not on claim	
	Monument & Ladue Fraction		No visible signs of contamination	None	
	Apex		No visible signs of contamination	None	
	Vanguard		No visible signs of contamination	Not on claim	
	Homestake		No visible signs of contamination	Not on claim	
	Christine		No visible signs of contamination	Not on claim	
	Мо		No visible signs of contamination	Not on claim	
	Maybrun		No visible signs of contamination	Not on claim	
54	Hogan		No visible signs of contamination	Not on claim	
	Runer		No visible signs of contamination	Not on claim	
	Wernecke Railroad		No visible signs of contamination	Not on claim	
	Formo (Yukeno)	Core Shack	Contains asbestos tar paper cladding	Not on claim	
	Paddy	Storage Building	White painted exterior.	Not on claim	
	Eagle		No visible signs of contamination	Not on claim	
	Fisher		No visible signs of contamination	Not on claim	
	Cream & Jean		No visible signs of contamination	Not on claim	
	Nord		No visible signs of contamination	Not on claim	
	Gerlitski	+	No visible signs of contamination	None	
	Titan Shanghai	Calid wants dump	No visible signs of contamination	Not on claim	
	Shanghai Maan	Solid waste dump	5m3 of asbestos tar paper	Not on claim	
66	Moon	Sleeping quarters	Roof is covered in asphalt asbestos roofing.	Not on claim	
		Kitchen Solid waste dump	Painted "Wide Load" sign above door. Contains asbestos covered hoses	Not on claim Not on claim	
68	Mt. Hinton	Soliu waste dump	No visible signs of contamination	Not on claim	
		+	No visible signs of contamination No visible signs of contamination	Not on claim Not on claim	
	Avenue Yono	+	No visible signs of contamination No visible signs of contamination	Not on claim	
	Christal (Dorothy)	+	No visible signs of contamination No visible signs of contamination	None	
	Ironclad (Ankeno)		No visible signs of contamination No visible signs of contamination	Not on claim	
	Gambler	+	No visible signs of contamination No visible signs of contamination	Not on claim	
		+		Not on claim	
75	Bema		No visible signs of contamination	INOLOH CIAIM	

age 2 of 3



Table 4: UKHM Building Contamination Inventory - Provisional Draft

ssigned Site No.	Site Name	Location	Desription of Contamination Suspect	Samples Taken/Results	Mitigation Measures
76	Townsite Mine	Office/Workshop	Possible that floor tiles contain 1-10% chrysotile as they are	None	
			similar in appearance to the tile sampled at the Dixie site.		
			White paint was applied to the interior, however, most of the paint		
77	O - 1 - 1 - 1 - 2 - 2 - 2 - 2 - 4 - 1 - 1		had worn off.	News	
77	Sadie Ladue 600 Adit	Chook #0 hooids the Coursill	No visible signs of contamination	None	
78	Elsa Village	Shack #2 beside the Sawmill	Exterior is clad with asbetos wallboard	None	
		Wood Storage Building Pink and white bunkhouse	Exterior is clad with asbetos wallboard Exterior is clad with asbetos wallboard	None None	
		Union Shop		None	
		Snack bar	Exterior cladding containing asbestos was found along the base	None	
		Strack bal	of the building.	None	
		Flotation Mill/Crusher House	Exterior walls are clad with approximately 1600m2 of asbestos	None	
		Tiotation will/Crusher House	shingles.	None	
		No. 2 Garage	Three of the exterior walls and the ceiling are covered with an	None	
		110. 2 Garage	asbestos material.	Tions	
		Light Vehicle Shop	Exterior walls are clad with an asbestos material.	None	
		Yellow Exploration Building		None	
		Elsa Market	Asbestos tiles are suspected to be beneath the linoleum flooring.	None	
		Fire Hall	Approximately 30m2 of asbestos sheet cladding exists beneath	None	
			the metal siding.		
		Building #34 (east of the Fire Hall)		None	
		Administration Building		None	
				None	
		Men's Staffhouse	Suspect asbestos tiles were observed on the roof and inside the	None.	
			kitchen (25m3) and bathroom (15m3). Exterior walls are clad in		
			asbestos.		
		Apartment Building	Interior floors, exterior walls, and tar roof all contain suspect	None	
			asbestos.	l	
		Roman Catholic Church	Exterior walls are clad in asbestos and the floor is covered in	None	
		Flat Ordal Backlessa #4	asbestos tile.	News	
70	Floo Tollings	Flat Creek Residence #1		None	
79	Elsa Tailings	Transmission Building 79A	Door is painted green	None None	
80	Wernecke Tailings	Transmission Building 79B	Building is painted entirely green. No visible signs of contamination	Not on claim	
81	Mackeno	Pumphouse	Asbestos-impregnated tar paper present on the building exterior	None	
01	INIACREITO	i unipriouse	and asbestos wallboard is present on the interior walls. Asbestos	INOTIG	
			is considered non-friable in both of these forms.		
			is considered from masterin sour or these forms.		
		Debris noted on the surface of the site	Non-friable asbestos wallboard.	None	

Page 3 of 3 21

Site Orthophotos

ERDC commissioned aerial photos from Aero Geometrics to undertake an aerial photography program at 1:10 1000 to be used for baseline environmental assessment, closure planning, as well as to be utilized for the surface exploration program. The property was flown for aerial photography in September 2006. Photos have been received and site orthos are being completed.

Project 4: Closure Planning

Water Quality Data Review and Sitewide Model

All of the historic water quality data for the site has been compiled into a single water quality database in Excel, and current sampling daily and monthly reports are being integrated into the database. The data contained in the workbook has been combined with flow monitoring data to generate an updated site-wide water and loading balance for the mine site and its receiving streams. The water quality database is currently being screened and assessed for data quality, and referencing all data with lab reference numbers for QA/QC where applicable. The loading balance has been partially completed and additional optimization of the loading balance is necessary.

A sample page of the database is provided below, which illustrates an example of the data to date.

Additional Water Sampling and Flow Monitoring

Flow monitoring has been initiated at all currently monitored receiving water stations required under the care and maintenance contract. Although flow monitoring was not required as part of the care and maintenance monitoring program, flows are necessary to update the sitewide loading balance and for closure planning purposes.

Shallow groundwater samples have been taken using drive point piezometers and a transect established to determine zinc loadings downgradient of adit discharge locations. Specifically, shallow groundwater sampling and mapping has been completed downgradient of No Cash, Onek, Galkeno 300 and 900 and Valley Tailings. This data has been incorporated into a sitewide groundwater database and sampling locations have been summarized on maps.

Table 7: Example sheet from the 2006 Water Quality Master Database

South McQuesten River u	's Christal Creek																																		Duplicate	e
Norwe	est Labs Number 248026 Collected by LES	LES	LES	LES	303929-2 310 LES I	ES	LES	322370-1 3 ACG	LES	ACG	LES		LES	ACG	LES					392636-1 LES		LES	LES	LES	ACG		A	G I		CG	LES	ALEXCO ALEXC				
	Sample Date 2-Aug-0 Matrix water Units	3 24-Jan-04 water	19-Feb-04 water	23-Mar-04 water	24-Apr-04 19-1 water v	May-04 15	Jun-04 2 water	water	water	water	vater	water 21-Oct-04	29-Nov-04 water	17-Dec-04 water	26-Jan-05 water	27-Feb-05 water	22-Mar-05 water	21-Apr-05 water	27-May-05 water	30-Jun-05 water	20-Jul-05 water	23-Aug-05 2 water	vater	26-Oct-05 water	29-Nov-05 water	14-Dec-05 25-Ja water wat	-06 22-F	eb-06 15-1 ter V	Aar-06 27-A Aater w	Apr-06 2t ater	5-May-06 water	28-Jun-06 30-Jul- water water	water	water	16 25-Oct-06 25-Oct-06 water water	3
Internal Anaylsis pH		7.18		7.62	7.71	1.08		8.3		8.4	7.8	7.3	7.1	6.95	7.35	7.18	8.99	8.4	8.9	8.1	7.94	7.99		7.84	7.79	7.43 7.2	7.	26 7	.59			6.55	7.2	7.3	7.6	#
pH Total Zinc Temperature Conductivity	mg/L C µS/cm m3/s	0.1 449	0.1	0.1	0.1 383 1 0.84			16.7 320		14.5	1.4 425	0.1 390	0.1 431	0.5	0.1 512	0.2	0 471	0.2	10.4	17.7	15.4 279	10.8 321		0.2 347	0.2 366	0.2 0. 345 37	0	2 9	0.1			12.1	380	324	410	3
Flow Dissolved Oxygen Turbidity NTU	m3/s mg/L		1.45	0.28	0.84	7 0.08				320 2.662												9.9		2.9	1.89	1.8	0.5	28					5.025		nm	3
External Anaylsis Metals Dissolved (Trace)																																				3
Metals Dissolved (Trace) Aluminum (Al) Antimony (Sb)	Dissolved mg/L 0.1 Dissolved mg/L <0.02		<0.01 <0.02	<0.01	<0.01 0	1.06	0.1 0.02	0.151 0.0002	0.083	0.11	0.036	0.008	0.008 0.0002	0.005	<0.005	<0.005 <0.0002	<0.005 <0.0002	0.03	0.26 <0.002	0.094	0.129 0.0002	0.076	0.068	0.033	0.012 0.0002	0.014 0.0 0.0002 0.00	8 0.0	06 0 002 0.	005 0.	005	0.079	0.114 0.135 <0.0002 <0.000	0.137	0.151	0.07 0.078	,
Arsenic (As) Barium (Ba)	Dissolved mg/L 0.02 Dissolved mg/L 0.0412 Dissolved mg/L <0.000		<0.04 0.0751	<0.04 0.077	<0.02 0 <0.04 0 0.067 0 <0.0006 0	0.04 0.03 0	0.04	0.0014 0.048 0.0001	0.0014	0.04 0.048	0.0012	0.001 0.058 0.0001	0.0012	0.0013	0.0012	0.0014	0.0003	0.001	<0.002 0.04	0.001	0.0012	0.052	0.051	0.052	0.061	0.0002 0.00 0.0011 0.00 0.072 0.0	3 0.0	174 0	076 0.	071	0.027	0.042 0.05	0.0013	0.0008	0.0006 0.0006 0.05 0.05	∄
Barium (Ba) Beryllium (Be) Bismuth (Bi) Boron (B)	Dissolved mg/L <0.02 Dissolved mg/L		<0.00		<0.02 0			0.0005	<0.0005 0.003	0.000	0.0005	0.0005 0.002 0.0005	0.0005	0.0005	<0.0005	0.0005	<0.0005	<0.0005	<0.001 <0.005 <0.02	<0.0005 <0.002	0.0001 0.0005 0.002 0.00012	<0.0001 <0.0005 <0.002	0.0005	0.0005	0.0005	0.0005 0.00 0.003 0.0 0.00013 0.00	15 0.0 3 0.0	005 0. 103 0	0005 0.0 0004 0.	0005	0.0005	<0.0001 <0.000 <0.0005 <0.000 <0.002 <0.00	5 <0.0005	<0.0005	<0.0001 <0.0001 <0.0005 <0.0005 <0.002 <0.002	Ξ.
Cadmium (Cd) Calcium (Ca) Chromium (Cr)	Dissolved mg/L <0.000 Dissolved mg/L 35.3 Dissolved mg/L <0.001	6	<0.0006 61.9 <0.001	0.0022 59.2 <0.001	<0.0006 0. 27.7 <0.001 0	0006 0 24 .001 (38.1 0.001	0.00008 40.1 0.0005				0.00005				<0.0006	< 0.00046	<0.0001	<0.0001	<0.0006	0.00012	0.00009	0.00017	0.00014	0.0001	0.00013 0.00	12 0.00	009 0.0	0011 0.0	0008	0.0001	0.00025 0.0002	4 0.00044	0.00059 43.1 <0.0005	0.0005 0.00053	#
Cobalt (Co) Copper (Cu) Iron (Fe) Lead (Pb)	Dissolved mg/L <0.001 Dissolved mg/L 0.013		<0.001 <0.001 0.038	<0.001 0.003 0.033	<0.001 0 <0.001 0	.001 I	0.001	0.0003	0.003	0.006	0.009	0.0002 0.003 0.0001	0.001	0.001	<0.001	0.0001 <0.001	<0.0001 <0.001	<0.0001	0.001 <0.01	0.0003	0.0005	0.0004	0.0007	0.0007	0.0003	0.0003 0.00 0.001 0.0	1 0.0	001 0. 101 0	0001 0.0	0001	0.001	0.0014 0.001 0.003 0.003	0.0039	0.0044	0.0034 0.0034 0.004 0.004	∄ .
	Dissolved mg/L <0.005		0.044 <0.007 19.7	0.032 <0.007	<0.001 0 0.1 0 <0.01 0 <0.007 0 10.5 (0.0143 0.	.011 .007	0.01	0.0003	0.004	0.006	0.0001 0.004	0.0001	0.0001 0.004	0.0003	<0.0001 0.005	<0.0001 0.005	<0.0001 0.004	0.0005	<0.001 <0.01	<0.0001 0.004	0.0002	<0.0001 0.005	0.0001 0.004	0.0001 0.004	0.0003 0.005	0.0004 0.00 0.006 0.0	14 0.0 6 0.0	003 0. 106 0	0004 0.0 005 0.	0001 004	0.0002 0.002	0.0002 0.000 0.004 0.004	9 0.0002 0.006	0.001 0.006	0.0002 <0.0001 0.005 0.005	∄
Magnesium (Mg) Manganese (Mn) Mercury (Hg) Molybdenum (Mo)	Dissolved mg/L 12.5		0.0342	0.0297	0.0143 0.	0026 0	11.1	0.036		0.818				0.054																				0.142		#
Molybdenum (Mo) Nickel (Ni) Phosphorus (P)			0.005	<0.01 <0.002 0.11	0.003 0	0.01 007 (0.008		0.0059	0.01 0.006 0.32	0.001	0.001 0.0014	0.001 0.0046	0.001 0.0048	<0.001 0.0032	<0.001 0.0037	<0.001 0.004	<0.001 0.004	<0.01 0.008	<0.001 0.0061	0.001 0.007	<0.001 0.0061	0.001 0.0095	0.001	0.001	0.001 0.0 0.0074 0.00	9 0.0	01 0 057 0.	001 0. 0033 0.0	001 0056	0.001 0.0051	<0.001 <0.00 0.0132 0.010	<0.001 0.0234	<0.001 0.0248	<0.001 <0.001 0.0222 0.0225	3
Potassium (K) Selenium (Se)	Dissolved mg/L <0.06 Dissolved mg/L 0.7 Dissolved mg/L 0.11 Dissolved mg/L 1.4		<1 <0.1	<1 <0.1 3.4	<0.06 (<1 <0.1	1.1 0.1	1 0.1 1.4	0.4 0.0004 1.43	0.0004	0.32 1.7 0.1	0.0006	0.0004 2.04	0.0004 2.14	0.0003	<0.0002	0.0005	<0.0002	0.0004	<0.002	0.0005	0.0003	0.0008	0.0006	0.0004	0.0004	0.0005 0.00	14 0.0	004 0.	0003 0.0	0004	0.0002	0.0004 <0.000	2 0.0004	<0.4 0.0005	0.0004 0.0005	∄
Silicon (Si) Silver (Ag) Sodium (Na)	Dissolved mg/L <0.002		<0.002 3.27	<0.002 3.15 0.252	<0.002 0 1.47 0 0.252 0 26.9	.002 I	1.4 0.002 1.07	0.0001 1.6 0.179	<0.0001		0.0001	0.0001	0.0001	0.00272	<0.0001	<0.0001	<0.0001	<0.0001	<0.001	<0.0001	0.0001	<0.0001	0.0001	0.0001	2.46 0.0001	2.56 3.0 0.0001 0.00	1 0.0	001 0.	0.0001	1 000	0.0001	<0.0001 <0.000	1.94	<0.0001 0.9	<0.0001 <0.0001	∄
Sulphur (S)	Dissolved mg/L 1.22 Dissolved mg/L 0.15 Dissolved mg/L 16.8 Dissolved mg/L		0.242 25.3	0.252 30.3	0.252 0 26.9	7.7	0.158 14.3	0.179 19.4	0.149 19.9	23.7	22.9	0.209 22.1				0.256 21.6	0.263 328	0.237 24	0.12 12.1	0.182	0.177 18.8								243 0. 8.8		0.071 7.3	0.18 0.158 18.1 22.4	0.18 26.2	0.172 22.1	0.207 0.205 25.8 25.7	#
Tellurium (Te) Thallium (Tl) Thorium Tin (Sp)	Dissolved mg/L <0.005 Dissolved mg/L		<0.005		- 0	.005	0.005	0.001	<0.0005			0.00005	0.00005	0.00005	<0.00005	<0.00005	<0.00005	<0.00005	<0.0005	<0.00005	0.00005	<0.00005	0.00005	0.00005	0.00005	0.00005 0.00 0.001 0.0		0.005	0005 0.0	0005 0	0.00005	<0.0005 <0.000	<0.00005	<0.0000	5 <0.0005 <0.0006	5
Titanium (Ti) Uranium (U)	Dissolved mg/L <0.001 Dissolved mg/L <0.001 Dissolved mg/L <0.07		<0.01 <0.004 <0.06	<0.004 <0.06	<0.004 0 <0.06 0	0.01 0.04 0.06	0.004	0.0015	0.0013	0.01 0.004 0.06	0.001 0.0022 0.0007	0.0017	0.0012	0.0014	0.0016	0.0011	0.001	0.001	<0.005 <0.005	0.001	0.0016	<0.0005 0.0006	0.0013	0.0015	0.0019	0.0019 0.00	8 0.0	015 0. 009 0.	0017 0.0	0013	0.0008	0.0014 0.056 0.0005 0.000	<0.0005 0.0007	0.0015	0.0016 0.0018 0.0008 0.0008	Ξ.
Vanadium (V) Zinc (Zn) Zirconium (Zr)	Dissolved mg/L 0.003 Dissolved mg/L 0.02 Dissolved mg/L <0.005		<0.001 0.013 <0.005	<0.001 0.026 <0.005	<0.001 0 0.026 0 <0.005 0	.001	0.001	0.0002	0.018	0.001 0.709 0.005		0.0002	0.0001	0.0001 0.021 0.001	0.0007	0.0001	0.0001	<0.0001	<0.001 0.04	0.0002	0.0003	0.0016	0.0004	0.0002	0.0002	0.0004 0.00 0.035 0.0	0.0	002 0. 133 0	0002 0.0 027 0.	0009	0.0002	<0.0001 0.000 0.048 0.021	0.0005	0.0004	0.0006 0.0008	#
Metals Total (Trace)			<0.01	0.08		1.84	0.10	0.10	0.080	0.13	0.072	0.03	0.031		0.027	0.010	0.02	0.02	0.417	0.104	0.162	0.138	0.105	0.142	0.000	0.089 0.0		ne n	023 0.	006	0.508	0.435 0.260	0.467	0.052	0.365 0.33	∄
Aluminum (Al) Antimony (Sb) Arsenic (As)	Total mg/L 0.17 Total mg/L <0.02 Total mg/L <0.02 Total mg/L <0.000 Total mg/L <0.000 Total mg/L <0.000		<0.02	<0.02 <0.04	<0.02 (<0.04 (1.02	0.02 0.04	0.0002 0.0014	< 0.0002	0.02	0.072 0.0002 0.0013	0.0002	0.0002	0.0002 0.0016	<0.0002 0.0019	<0.0002 0.0017	<0.0002 0.002	<0.0002 0.001	<0.0002 0.0015	<0.0002 0.0011	0.0002 0.0013 0.051	<0.0002 0.0015	0.0002 0.0011	0.0002 0.0011	0.0002 0.0011			002 0. 015 0.	0002 0.0 0019 0.0	0002 0012	0.0003 0.0018	<0.0002 <0.000 0.0012 0.001	2 <0.0004	<0.0002 0.0012	2 <0.0004 <0.0002 0.0009 0.0008	Ξ.
Banum (Ba) Beryllium (Be) Bismuth (Bi)	Total mg/L <0.000 Total mg/L <0.000 Total mg/L <0.02	8	<0.006 <0.008 <0.02	<0.0833 <0.0006 0.09	<0.0076 0. <0.0008 0. <0.02 0	0472 0 0006 0	0.0432 0.0006 0.02	0.053 0.0001 0.0005	<0.0001 <0.0005	0.0467 0.0006 0.02	0.048 0.0001 0.0005	0.0012 0.056 0.0001 0.0005	0.066 0.0001 0.0005	0.0001	<0.0001 <0.0005	<0.0001 <0.0005	<0.0001 <0.0005	<0.0001 <0.0005	<0.0001 <0.0005	<0.0001 <0.0005	0.0001	<0.0001 <0.0005	0.053 0.0001 0.0005	0.054 0.0001 0.0005	0.065 0.0001 0.0005	0.0002 0.00 0.0014 0.00 0.062 0.0 0.0001 0.00 0.0005 0.00	3 0.0 11 0.0 15 0.0	001 0. 005 0.	086 0. 0001 0.0 0005 0.0	0001 0005	0.037 0.0001 0.0005	<0.0001 <0.000 <0.0005 <0.000	0.056 1 <0.0002 5 <0.001	<0.0001 <0.0005	0.053 0.052 <0.0002 <0.0001 0.0001 <0.0005	,‡
Antimory (Sb) Arsenic (As) Banum (Ba) Beryllum (Be) Bismuth (Bi) Boron (B) Cadimum (Cd) Calcium (Ca) Chromium (Cf)	Total mg/L <0.000	8	<0.0008	0.0033	<0.0008 0	.001 0	0006 (0.004 0.00008 40.2	0.034	0.0008	0.002	0.002	0.002	0.003	0.004 0.00006	0.0003	0.004 0.00006 58.8	0.003 0.0008	0.003 0.00018	<0.002 0.00012	0.007 0.00012 40.9	<0.002 0.00012	0.002	0.003 0.00019	0.003 0.0001	0.0003 0.00 0.00014 0.00 52.3 60 0.0005 0.00	4 0.0 19 0.0	03 0 1016 0.	004 0. 0001 0.0	0004 0008 0	0.002 0.00024	0.003 0.006 0.00038 0.0002 39.6 44.1	<0.004 7 0.00064	<0.002 0.00082	<0.004 <0.002 2 0.00063 0.00061 49.4 49	∄
Cobalt (Co)	Total mg/L <0.001 Total mg/L <0.001		63.9 <0.001 <0.001	<0.001 <0.001	31.4 2 <0.001 0 <0.001 0	002 I	0.001	0.0005	<0.0005 0.0013	0.001	0.0005 0.0003	50.6 0.0005 0.0002	0.0005 0.0002	0.0005 0.0001	<0.0005 0.0002	<0.0005 0.0002	<0.0005	<0.0005 <0.0001	0.0009 0.0012	<0.0005 0.0005	0.0005 0.0005	<0.0005 0.0005										<0.0005 <0.000 0.0018 0.001	5 <0.001 0.0045	<0.0005 0.0053	5 <0.001 <0.0005 0.0036 0.0038	Ξ.
Copper (Cu) Iron (Fe) Lead (Pb)	Total mg/L 0.017 Total mg/L 0.097 Total mg/L <0.006 Total mg/L <0.006		<0.001 0.159 0.044	0.006 0.261 0.037	0.001 0	89	0.011	0.004 0.1 0.0005	0.006	0.122	0.2	0.015	0.002	0.002	0.009 0.3 0.0003	<0.001 0.2 0.0001	0.001 0.2 0.0002	<0.001 0.2 0.0006	0.003 0.8 0.0008	0.002 0.2 0.0002	0.002 0.2 0.0002	0.002 0.2 0.0003	0.2	0.2	0.2	0.001 0.0 0.2 0. 0.0004 0.00	0.0	2 003 0.	0.004 0.0	0.1	0.004 1 0.0021	0.004 0.004 0.4 0.2 0.0005 0.000	0.006 0.3 0.0003	0.009 0.3 0.0006	<0.2 0.2 <0.0002 0.0001	∄
Lithium (Li) Magnesium (Mg) Manganese (Mn) Manganese (Mn)	Total mg/L <0.006 Total mg/L 14 Total mg/L 0.046 Total mg/L Total mg/L	1	<0.007 20.6 0.0351	<0.007 19.8 0.0411	<0.01 0 <0.007 0 12.5 0 0.0144 0	.007 ('.48 .147 ()	0.007 11.2 0.0474	0.006 13.6 0.036	0.006 12.9 0.09	0.186 12 0.151	0.005 15.8 0.046	0.005 17.1 0.049	0.004 17.2 0.061		0.005 22 0.057	0.005	0.005 19.7 0.053	0.004 18.2 0.04	0.003 9 0.088	0.004 11.8 0.056	0.005 12.9 0.051	0.005 14.2 0.198	0.004 13.1 0.063	0.006 15 0.069	0.006 16.7 0.061	0.008 0.0 16.4 18 0.064 0.1	5 0.0 1 18	106 0 1.6 2 154 0	006 0. 1.9 1 055 0.	7.7 052	0.002 5.4 0.097	0.004 0.006 11.7 13.6 0.095 0.08	0.006 15 0.19	0.008 14.1 0.164	0.007 0.007 16 15.2 0.14 0.139	#
Molybdenum (Mo)	Total med 0.007		<0.01	<0.01	<0.01 0 0.003 0	0.01	0.01	0.001	<0.001	0.01	0.001 0.0069	0.001 0.0063	0.001	0.0002	0.001	<0.001	<0.001	<0.001	<0.001	<0.001	0.001	<0.001	0.001	0.001	0.001	0.001 0.0 0.008 0.00		101 0	001 0. 0059 0.0		0.001	<0.001 <0.00	<0.002	<0.001	<0.002 <0.001	∄
Nickel (Ni) Phosphorus (P) Potassium (K)			<0.06 <1	0.12 <1 <0.1 3.4		0.06	0.06	0.4	0.5	1.5	0.6	0.6	0.6	0.007	1.2	0.0040	0.6	1	<0.4	<0.4	0.4	0.4	0.4	0.8	0.4			8		0.9	0.6	<0.4 <0.4	<0.8	0.4	<0.8 0.5	∄
Selenium (Se) Silicon (Si) Silver (Ag)	Total mg/L 0.08 Total mg/L 0.08 Total mg/L 1.6 Total mg/L 1.6 Total mg/L 1.00 Total mg/L 1			< 0.002	3 <0.002 0	2	1.6 0.002	0.001 1.28 0.0009	2.42	1.5 0.002	0.0005 1.59 0.0001	0.0004 1.74 0.0001	2.09	0.0003	3.2 0.0001	3.11	0.0003 3 <0.0001		2.43 0.0003	1.84	1.85 0.0001	1.9	1.87	2.13 0.0001	2.45 0.0001	0.6 0.0004 0.00 2.42 2.9 0.0001 0.00 2.3 3.	3.	21 3 001 0.	.75 3 0001 0.0	i.02 0001	1.8 0.0001	2.06 1.56 <0.0001 <0.000	2.12	2.04	2.05 2.02 <0.0002 <0.0001	đ
Sodium (Na) Stronium (Sr) Sulphur (S) Tellurium (Te)	Total mg/L 1.38 Total mg/L 1.38 Total mg/L 0.167 Total mg/L 18.9 Total mg/L 0.000 Total mg/L 0.000		3.3 0.244 28.7	3.19 0.254 32.2	3 <0.002 0 1.48 (0.26 0 27.8	0.82 .083 7.8	1.08 0.16 14.4	1.5 0.19 18.6	1.6 0.152 19.3	1.45 0.219 19.7	1.8 0.222 22.1	1.9 0.225 21.3	2.5 0.252 23.9	0.0265	3.7 0.238 28.4	3 0.252 27.4	3 0.255 26	5.2 0.238 24	0.8 0.12 12.6	1.1 0.186 16.6	1.6 0.189 18.6	1.4 0.188 21	1.5 0.205 20.3	2 0.236 22.6	2 0.253 25.6	2.3 3. 0.255 0.2 24.5 27	6 0.2 21	.1 :39 0	3.6 2 258 0. 0.7 2	2.6 248 :5.9	0.0001 0.9 0.071 7.1	1.1 1.5 0.163 0.2 19.2 22.6	0.17 24.8	0.9 0.181 23.5	2 1.6 0.212 0.204 23.6 23.4	#
Tellurium (Te) Thallium (Tl) Thorium	Total mg/L <0.006 Total mg/L <0.006 Total mg/L		20.008			.006		0.00005	<0.00005		0.00005		0.00005	0.00005	<0.00005	<0.00005	<0.00005	<0.00005	<0.00005	<0.00005	0.00005	<0.00005		0.00005		0.00005 0.00	05 0.00	1005 0.0	0005 0.0		0.00005	<0.00005 <0.000	0.0001	<0.0000	5 <0.0001 <0.00005	5
Tin (Sn) Titanium (Ti) Uranium (U)	Total mg/L <0.006 Total mg/L <0.001 Total mg/L <0.001 Total mg/L <0.07 Total mg/L 0.004 Total mg/L 0.004 Total mg/L <0.007		<0.000 <0.004	<0.01 0.013	<0.01 0 <0.004 0	0.01	0.01	0.001 0.0018 0.0007	<0.001 0.006	0.01 0.004	0.001 0.0016	0.001 0.0019	0.001 0.0017	0.0019	<0.001 0.002	<0.001 0.0017	<0.001 0.002	<0.001 0.001	<0.001 0.0104	<0.001 0.0028	0.001 0.0017 0.0006	<0.001 0.0018	0.0008	0.001 0.0036	0.001 0.0024	0.0024 0.00	1 0.0 6 0.0	018 0	001 0. 0022 0.	001	0.001 0.0125	<0.001 <0.00 0.0052 0.045	<0.002 0.0041	<0.001 0.0059	<0.002 <0.001 0.0025 0.0022	3
Vanadium (V) Zinc (Zn)	Total mg/L <0.07 Total mg/L 0.004 Total mg/L 0.026		<0.07 <0.001 0.013	<0.07 <0.001 0.027	<0.07 0 <0.001 0 0.016 0	.007 .002 (.058 (0.001	0.0002	0.0008 0.0007 0.064	0.07 0.001 0.13	0.0008 0.0002 0.02	0.001 0.0019 0.0009 0.0005 0.013 0.001	0.0009 0.0003 0.02	0.0009	0.0008 0.0002 0.021	0.0008 0.0017 0.016	0.0009 0.0002 0.02	0.0008 0.0001 0.029	<0.0005 0.0011 0.044	0.0008 0.0003 0.02	0.0008 0.0003 0.02 0.001	0.0008 0.0003 0.031	0.0007 0.0003 0.045	0.0007 0.0004 0.049	0.0009 0.0002 0.037 0.001	0.0008 0.0 0.0002 0.00 0.043 0.0 0.001 0.0	1 0.0 12 0.0 7 0.0	008 0: 001 0: 038 0	0008 0.0 0003 0.0	0007 0002	0.0005 0.0012 0.048	0.0007 <0.000 0.0004 0.000 0.073 0.043	0.0003 0.12	0.0008 0.0005 0.153	<0.001 0.0009 0.0003 0.0002 0.11 0.111	#
Zirconium (Zr) Physical and Aggregate	Total mg/L <0.006		<0.008	<0.006	<0.006 0	.006	0.006	0.001	<0.001	0.006	0.001	0.001	0.001		<0.001	<0.001	<0.001	<0.001	<0.001	<0.001	0.001	<0.001	0.001	0.001	0.001	0.001 0.0	1 0.0	101 0	001 0.	.001	0.001	<0.001 <0.00	<0.002	<0.001	<0.002 <0.001	∄
Temp. of observed pH and EC Total Suspended Solids TSS Total Dissolved Solids TDS	°C Total mg/L <1 mg/L	196	<2	<3	20.2	54	9	18.8	21.3 13	2	20.3	19.9	2	21.2	19 1 221	<2	<2	4 178	23	3 134	2	<2	2	4 142	2	2 14 16		· .	2	2	36	165				1
Routine Water	- ngr	.50	2.0	7.70	7.01		7.0		7.05	7.00	8.16			7.00	200	7.0		1/0	7.0	1,34	701	100	7.87	7.84	7.00	7.51 7.6	_	_	_		7.00	738 822			708 705	1
Electrical Conductivity Calcium	µS/cm Dissolved mg/L		418	60.8	408 53.6	7.7	283	8.22 299 40.1 13.8	300	1660	350 47	8.04 361 53.1	7.8 410 53	55.1	65.5	7.6 445 54.9	7.6 440 62.7	7.67 410 52.5	7.49 238 28.8	7.66 311 38	7.94 311 41.4	332 44.9	354 45.9	369 49	7.28 416 55.2	426 46	- 4		.48 7 i29 4 2.4 5	8.7	7.29 151 19.9	280 329 38 44	340 44.4	8.01 340	7.50	∄
Magnesium Sodium Potassium	Dissolved mg/L Dissolved mg/L Dissolved mg/L		•	20.8	17.8			13.8	12.8 1.6 0.5		16.1 1.9	17.4 1.9	17.6 2.6 0.9	18.5 2.8	22.2 3.8 1.1	18 3.3 0.8	20.4 3 0.6	17 2 <0.4	9.1 1.1 0.5	11 1.5 0.5	12.9 1.4 0.4	15.4 1.3 <0.4	0.6	0.6	17 2.2 0.4	57.6 62 16.6 18 2 3.	0	9 8	1.2 3.6	18 3 1.8	5.5 1.3 0.5	12.2 14.8 1.2 1.3 <0.4 <0.4	15.2 1.5 0.4		17 16.8 1.5 1.4 0.4 <0.4	#
Iron Manganese	Dissolved mg/L		76.0	92.2	80.6		40.3		0.19	900	0.5 0.08 0.042 68.8	0.04	0.08 0.053	79.0	0.02 0.057	0.035	0.06 0.058	0.15 0.04	0.54 0.088	<0.10 <0.05	0.08	0.03 0.028	0.04 0.046	0.05 0.06	0.4 0.03 0.051	0.06 0.0 0.068 0.0	7 0.0	05 (151 0	.03 0 .051 0.	1.17 106	0.5 0.2 0.038	0.05 0.06 0.069 0.074	0.05 0.193		0.05 0.05 0.134 0.132	∄ .
Hydroxide Carbonate	Dissolved mg/L 65.7 water mg/L <5 water mg/L <6		<5 <6	<5 <6	<5 <6	5 6	5	5	<5 <6	5	5 6 138	5 6 153	5	5	- 45 - 46	<5 <6	√5 ≪6	<5 <6	35 46	<5 <6	5	<5 <6	66	5 6	5 6 146	5 5 6 6		3	5	5 6	5					Ē
Bicarbonate P-Alkalinity T-Alkalinity	water mg/L 118 as CaCO3 mg/L as CaCO3 mg/L 97		180 - 147	193 <5 158	<6			118 5 97	111 <5 91				162 133	167 5 137	205 <5 168	185 152	185	175	83 68	116 95	6 126 104	131	6 140 115	140	146 5 120	163 18 5 5 134 14			01 1 5 65 1		61 5 50					#
Hardness Ammonia-N	Dissolved as CaCO3 mg/L 140		236	238	207	88	141	157	151	202	184	204	205	214	255	211	240	201	110	140	156 0.008	175	172		208	212 23				220	72					1
Ammonia-N Nutrients	<0.08								<0.05															0.014												∄
Nitrite Nitrogen (NO2) Nitrate Nitrogen (NO3)	mg/L <0.1 mg/L <0.01 mg/L	$+ \exists$					- 1		<0.1 <0.05	==											0.03	<0.03 <0.03		0.03						Ŧ	0.03			ŧ=	+	#
N <nh3 N<n02<no3 Total Phosphorus</n02<no3 </nh3 	mg/L mg/L																																			∄
Cyanide Total Cyanide Cyanide <wad< td=""><td>mg/L</td><td></td><th></th><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td>ᆂ</td><td><u> </u></td><td>\pm</td><td></td><td></td><td></td><td></td><td></td><td>₫.</td></wad<>	mg/L																											ᆂ	<u> </u>	\pm						₫.
Cyanide <wad td="" testing<="" toxicity=""><td>mg/L</td><td>$+ \exists$</td><th></th><td></td><td></td><td></td><td>- 1</td><td></td><td></td><td>==</td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td>Ŧ</td><td></td><td></td><td></td><td>ŧ=</td><td>+</td><td>#</td></wad>	mg/L	$+ \exists$					- 1			==																				Ŧ				ŧ=	+	#
Lethal Concentration LC50 Percent survivability	- 5																																			1
Designation 96 hour LT50 Bloassy Percent survivability	hours %																													=						#
Designation																																				ユ

Soils Characterization

Alexco Resource Corp. has completed borehole drilling using a Becker Hammer drill at select UKHM locations in an effort to characterize soils and gravels and to determine permeability and location of potential gravel sources for use in final closure planning including sources of potential cover material and possible in-situ injection sites. Three borings were advanced around the tailings ponds. Hole #4 was located to the immediate northeast of the adit opening to Galkeno 900. A full summary report on the findings of the soils characterization will be included in the final report for this special project.



Photo 7: Hammer borehole rig at Valley Tailings

Assessment of Waste Rock Geochemistry

As part of the baseline environmental assessment conducted by Access Mining Consultants in 1996, R. McIntyre conducted a comprehensive waste rock dump and pit wall rock sampling program, shortly before UKHM encountered financial difficulties. Due to unfortunate corporate circumstances therefore, these samples were never sent to laboratory for analysis. Since that time, the sample pails have been stored in their original plastic 20 litre sample pails on pallets in a warehouse. Access revisited those samples this past summer and verified sample & container integrity, and re-documented the samples that were deemed intact, uncompromised & therefore suitable for analytical testing (some of the original pails had been opened & re-sampled by unknown parties, and therefore deemed compromised & were discarded). To further characterize and assess long term geochemical stability of various waste rock piles, these seventy-five x 20 litre pails will be shipped to Chemex Labs in Vancouver for static ABA testing using the Modified Sobek method, and Metals Leachate testing. Please see Table 5: Galena & Keno Hill Pit Walls & Waste Rock Dump Sample Inventory for a list of samples.



Photo 8: Detail view of waste rock pile at Eagle site.

Table 5: Galena & Keno Hill Pit Walls & Waste Rock Dump Sample Inventory - August, 2006

	No. of 20		
Mine/dump location	L Pails	Sample ID	Sample Description
DIXIE Adit dump			
	1	95UKHDD01	grey fine gr. mat'l, minor >3", 3" rusty bands every 12"
	2	95UKHDD02	brownish & grey fine gr. mat'l (broken schist, some fragments, grey qtzite)
	1	95UKHDD03	grey fine gr. mat'l, rusty bands (6") every 14", sample from 8' depth
BERMINGHAM pit wall			
	2	95UKHBP01	thin bedded qtzite, rusty weathering; North wall of pit
	2	95UKHBP02	thick bedded blocky, rusty weathering qtzite; manganese staining (?); above old brim. Shaft; N. wall pit
	2	95UKHBP03	thick bedded, blocky qtzite, buff weathering, some minor graphitic schist talus; N. wall pit
	2	95UKHBP04	rusty weathering, blocky qtzite, minor schist; 70%>4", 10%>8"
	1	95UKHBP05	buff weathering blocky qtzite, 70%>4"
	2	95UKHBP06	graphitic schist, platy talus on South pit wall, 1/2" x 8" pieces
	1	95UKHBP07	sericitic schist, platy to blocky talus on S. pit bench
BERMINGHAM pit dump			
	2	95UKHBD01	fine grained ore stockpile (1/2">x<3"), rusty weathering, 70% "soil" fraction mat'l
	2	95UKHBD02	fine grained ore stockpile (1/2">x<3"), rusty weathering, 70% "soil" fraction mat'l
	1	95UKHBD03	ore and colluvium (?) scraped from floor of ore stockpile area
	1	95UKHBD04	graphitic schist
	2	95UKHBD05	ore and colluvium (?) scraped from floor of ore stockpile area
	1	95UKHBD06	buff weathering, blocky gyzite
RUBY adit dump			· · ·
,	2	95UKHRD01	grey - black fine grained qtzite rubble, iron stain banding (on only, 6" thick, dipping 45')
	2	95UKHRD02	grey - black fine grained qtzite rubble, weak iron stain banding (on only, 6" thick, dipping 45')
	2	95UKHRD03	grey - black fine grained gtzite rubble, iron stain banding (on only, 6" thick, dipping 45')
CALUMET 1-14 pit dump	 		[
oomer i i i pit damp	2	95UKHCD01	buff weathering, altered (?) qtzite, rusty fractures
	2	95UKHCD02	buff weathering, blocky qtzite, rusty fracturing, possible some vein mat'l (15%)
HUSKY SW	-	00011110002	Total Total Total Table Table
TIOOKI OW	1	95UKHWD01	very pyritic grey qtzite
CALLIMET 1 15 nit woll	 '-	9301(1111001	I very pyrine grey quare
CALUMET 1-15 pit wall	4	OELIKLIODO4	Igraphitic schiot, platy talua (4/2" thick v. 6. 40" lang)
	1	95UKHCP01	graphitic schist, platy talus (1/2" thick x 6-10" long)
	2	95UKHCP02	grey blocky qtzite, maroon fractures, >60%+4"
CALUMET 1-15 pit dump		051114110501	
	2	95UKHCD04	grey blocky qtzite, maroon weathering on fractures
	2	95UKHCD03	ore stockpile scrapings mixed and some colluvium, minor buff weathering qtzite w/ rusty fractures
MILLER pit dump			
	2	95UKHMD01	greenish-grey fine grained qtzite, rusty weathering on fracture surfaces, some pyrite casts

Table 5: Galena & Keno Hill Pit Walls & Waste Rock Dump Sample Inventory - August, 2006

	No. of 20		
Mine/dump location	L Pails	Sample ID	Sample Description
HECTOR adit dump			
	2	95UKHHD01	grey qtzite rubble, mixed with debris; top of dump
	2	95UKHHD02	grey qtzite rubble, mixed with debris; top of dump
	1	95UKHHD03	green sercite schist rubble, woody debris & fines; toe of dump
SIME 6 pit wall			
	2	95UKHSP01	grey, platy graphitic schist; 1/4" thick x 4-10" long
	2	95UKHSP02	buff weathering , blocky qtzite, some rusty fracture surfaces
SIME 4 pit wall			
	1	95UKHSP03	thick bedded, grey massive qtzite, some pyrite casts, all surfaces iron stained
SIME 35 pit wall			
	2	95UKHSP04	very fine grained schist, some Fe stain
	2	95UKHSP05	
SIME 4 & 6 pits wall			
	1	95UKHSD01	clean buff qtzite, 4" blocks, minor oxidation on 50% of fracture surfaces
ONEK pit			
	1	95UKHOP02	mixed interbedded (graphitic schist) & qtzite, mostly + 4" chunks
ONEK pit dump			
	1	95UKHOD01	greenstone, blocky 3" x 7" pieces and chips
	1	95UKHOD02	buff weathered qtzite, rusty fractures
	2	95UKHOD03	grey platy graphitic schist, 1/2" x 7"
HUSKY shaft dump			
-		95UKHYD01	dark grey, very pyritic qtzite, qtz stringers; 80%>3", 20%<3" + sand size fraction (major acidic seep at toe)
KENO 700 adit dump			
•	1	95UKHKD01	grey qtzite, qtz bands
	1	95UKHKD02	green seritic schist
UN adit dump			
·	2	95UKHUD01	mixture grey graphitic schist and buff weath. qtzite, 30" + 3" 70" <3"
TOWNSITE adit dump			
•	1	95UKHTD01	buff weathering qtzite, 10% >3", mostly fine fraction, some oxidation
	2	95UKHTD02	grey qtzite with serecite schist, 10% > 3", mostly fine fraction
BELLEKENO adit dump			
	2	95UKHLD01	dark grey pyritic qtzite, qtz stringers abundant
SILVER KING pit dump	1		
	1	95UKHVD01	mixed grey and buff qtzite, minor schist, some sandsize particles
TOTAL # of SAMPLE SITES:	48		
TOTAL # of 20 L PAILS	75		

Project 5: Physical Hazard Reduction

Identification of priority hazards

A site-wide survey of adits and other facilities was completed in September 2006 as part of the Baseline Environmental Assessment. The hazards identified have been incorporated into a risk register that will allow rating the risks on a scale of Low, Medium and High. Approximately 150 risks have been registered to date.

The risk register that was previously submitted to Type II office for review has been included with this Progress Report as Table 6. In accordance with direction from YG Type II office, a workshop has been planned for later in November that will rate the individual hazards for priority remediation.

Hazard Reduction Options

SRK Consultants prepared a summary of remediation approach for significant hazards that were known including Shamrock J and other open holes on the Keno Hill and Sourdough Hill areas. These design criteria were used to remediate the Shamrock J vent raise and open holes and shafts on Sourdough Hill.

Hazard Reduction Implementation

The most significant site remediated during the 2006 season was the Shamrock J vent raise. This site contained a building that was partially collapsed over an open vent raise, and vehicle track evidence in the past had provided indication that this site represented the highest priority danger for personal injury. A fence to prevent access had been previously installed but evidence suggested that tourists and the public were still able to access the site and a significant risk remained. The Shamrock J site is within a published tourist destination. Based on the design criteria provided by SRK, the building was first removed and stacked next to the vent raise. Prior to building removal, the fence was dismantled and transported offsite and is stored in Elsa for future use.

Upon removal of the building, it was evident that the vent raise was collapsed with overburden material. A 325 excavator was used to assess if the vent raise was bridged with material. The excavator dug approximately 20 feet into the material and it continued to be competent and not bridged. The hole was then filled with local borrow material as per SRK specs. The top of the filled hole was capped with growth media and mounded to promote water runoff. The building material was burned and the remaining metal debris was loaded and transported to Elsa. A burn permit was secured prior to burning the remnant building.

Seven open holes and one trench immediately next to the road on Sourdough Hill were filled with material as per SRK specs. The open holes and shafts on Sourdough Hill were high on the priority list as tourists and local residents frequently travel this road and the holes and shafts were easily accessible.



Assigned Site	Site Name	Location Description	UTM Coordinates	Description of Physical Hazards	Consquence	Likelihood	Risk Rating		Mitigation Measures A	ctions Complete
No.					Severity	Probability	Numerical	Descriptive		
1	Silver King	Straddles the Silver Trail Highway at Galena Creek,	473050E, 7085275N	Open Pit has no barriers to prevent access; temporary	M . 1	T Y 1*1 1	20	Madama	Erect more permanent barriers to limit access to the	
		approximately 4km southwest of Elsa town site	,	barriers have fallen down. Compressor building accessible to the public.	Moderate	Unlikely	30	Moderate	open pit.	
				Compressor building accessible to the public.	Low	Possible	10	Low	Ensure doors on compressor building are structurally sound and locked with an adequate mechanism.	
2	Husky & Husky SW	12km west of Keno City on Silver Trail Highway, past the		Power pole and power line west of headframe.	Low	1 0331010	10	Low	Power poles and lines need to be dismantled and	
_	l lucky a riderly err	first turnoff for the Elsa townsite, downhill via an access	474740E, 708677N	The following perior line week or measuramer					disposed off.	
		road for 0.5km.	,		Minor	Possible	30	Moderate	'	
				Tension cracks near the crest of waste dump.	Low	Possible	10	Low		
				Boiler House accessible.					Ensure doors on Boiler House are structurally sound and	
					Low	Possible	10	Low	locked with an adequate mechanism.	
				Storage Shed accessible.	Low	Possible	10	Low	Ensure doors on Storage Shed are structurally sound and	
				Workshop accessible.	Low	Possible	10	Low	locked with an adequate mechanism. Ensure doors on Workshop are structurally sound and	
				Workshop accessible.	Low	Possible	10	Low	locked with an adequate mechanism.	
				Shaft House and Headframe were accessibleat Husky SW.					Ensure doors on Shaft House and Headframe are	
				,					structurally sound and locked with an adequate	
					Moderate	Possible	100	Moderate	mechanism.	
				Hoist House accessible.			100		Ensure doors on Hoist House are structurally sound and	
				ATOO Teelles accesible	Moderate	Possible	100	Moderate	locked with an adequate mechanism. Ensure doors on ATCO Trailer are structurally sound and	
				ATCO Trailer accessible.	Low	Possible	10	Low	locked with an adequate mechanism.	
3	Elsa	Located within the Elsa townsite on the north-facing slope		Powderhouse corner vent raise appears to be subsiding	Low	1 OSSIDIC	10	Low	Depression across Calumet Drive could be stope	
J	2.00	of Galena Hill.	476000E, 7087000N	with a linear depression crossing Calumet Drive.					subsidence and should be mound filled as vehicles cross	
			,		Moderate	Likely	300	Moderate	over this area on a regular basis.	
				Several buildings in various stages of repair may need to be						
				either dismantled or entry adequately blocked to prevent						
				entry.	Moderate	Likely	300	Moderate		
4	Dixie	3.6km along Calumet Drive from the junction with		Ditch running along side of Garage/Office building could be					Either ditch needs to be filled in and redirected or building	
		Wernecke Road.	477000E, 7087200N	subject to erosion during peak flows, which could result in					should be moved or disassembled.	
				the structure collapsing; accessible.	Minor	Almost certain	300	Moderate		
				Shaft is partially collapsed and filled with water to a depth of			200		Debris likely needs to be pulled out and shaft filled.	
				approximately 3m below ground level.	Major	Possible	300	Moderate	5	
	0 10 10"	E		Two collapsed raises show evidence of subsidence.	Minor	Possible	30	Moderate	Depressions may need to be mound filled.	
5	Coral & Wigwarm	Follow the Bermingham Road for 2.8km from the Hector Portal to a cat trail that leads northwest for 100m to site.	Two shafts present that are open and accessible. 477900E, 7086250N							
		Portar to a car trail that leads northwest for 100m to site.	477900E, 7080250IN		Major	Unlikely	90	Moderate		
6	Bermingham & Ruby (Arctic & Mastiff)	Near the summit of Galena Hill, approximately 1.5km		Ruby shaft area has collapsed on skip; area in front of shaft	1114101	Cimiery	, ,	Titoderate	Structure should be extracted and the shaft filled by	
	,	southwest of Calumet town site via the gravel road from	474740E, 708677N	has failed also; shaft house accessible.					mounding to account for future subsidence in and around	
		Calumet.			Critical	Possible	1000	Extreme	shaft.	
				One of the dumps is open without any berming.					Entrance gated to vehicular traffic. Is berming necessary	
					Minor	Possible	30	Moderate	for foot traffic?	
				200 level Adit has collapsed somewhat but is still accessible.	Moderate	Possible	100	Moderate	Shaft has somewhat collapsed in on itself. May need to dismantle portal and provide fill.	
				Explosives magazine and Detonator House accessible.	Wioderate	1 OSSIDIC	100	Wiodciate	Ensure doors on both buildings are structurally sound	
				Explosives magazine and betonator riouse decessible.	Low	Possible	10	Low	and locked with an adequate mechanism.	
				Water Shack accessible.			-		Ensure doors on Water Shack are structurally sound and	
					Low	Possible	10	Low	locked with an adequate mechanism.	
				Two residential buildings were considered unsafe, yet	,				Possibly need to dismantle or restore buildings.	
-	No Cook	I control on the solid of the color of the c		accessible.	Moderate	Unlikely	30	Moderate	Fish and discount of the second of the secon	
7	No Cash	Located on the mid-northwest slope of Galena Hill via a road leading from the Elsa-Calumet road.	477230E, 7088058N	Partially collapsed adit.	Moderate	Possible	100	Moderate	Either adit needs material fill in the present opening or the timbers can be dismantled and the adit filled.	
		Todu reduing from the Elsa-Galufflet fodu.		Garage accessible.	wioderate	r ossible	100	Wioderate	Ensure doors on Garage are structurally sound and	
				Carago accessibile.	Low	Possible	10	Low	locked with an adequate mechanism.	
				Shaft House accessible.		********			Ensure doors on Shaft House are structurally sound and	
					Low	Unlikely	3	Low	locked with an adequate mechanism.	
				Lunch Room accessible.					Ensure doors on Lunch Room are structurally sound and	·
					Major	Possible	300	Moderate	locked with an adequate mechanism.	
8	Betty	Old trailheads extend northeast from the No Cash mine	4700E4E 70000001	One shaft collapsed due to permafrost; retaining					Shaft could be cause for concern, however, location and	
		towards the Betty mine site.	4/9251E, /088632N	approximately 1ft of water.	Major	Possible	300	Moderate	low depth of shaft determined the risk to be minimal.	
9	Hector Calumet	Located on the northwest slope of Galena Hill, on the	+	Underground opening present in west corner.	IVIAJOI	1 0881016	300	wiouciale	Opening in corner could be filled with excavator or	
9	notor Galumet	Calumet Road.	480900E, 7088300N	onderground opening present in west conten.					covered over with a dozer.	
			, , , , , , , , , , , , , , , , , , , ,		Major	Possible	300	Moderate		
				Other concern would be berming the open pits and wall	-					
				failure in some areas.	Major	Possible	300	Moderate		
				Sinkholes present in pit floor.	Major	Possible	300	Moderate	Sinkholes would likely need to be mound filled.	
				Shacks, bunk house, and water storage building all					Ensure doors on Lunch Room are structurally sound and	
		1	1	accessible.	Major	Possible	300	Moderate	locked with an adequate mechanism.	

e 1 of 6 30



Assigned Site					G	* · · · · ·	Di L D. C		Mitigation Measures	
No.	Site Name	Location Description	UTM Coordinates	Description of Physical Hazards	Consquence Severity	Likelihood Probability	Risk Rating Numerical	Descriptive	Mitigation Measures	Actions Complete
					Severity	Trobability	Numerical	Descriptive		
10	Dragon & Miller	Located on the north slope of Galena Hill along the	481500E, 7088800E	Dragon Adit open but blocked by ice year round.						
11	Galkeno	Calumet Back Road.	4010002, 70000002	Timbers is called at 200 Level Adit bases called and but still	Major	Possible	300	Moderate	Timbers should be removed and adit filled	
11	Gaikeno	Located on the northeast slope of Galena Hill via the Calumet Back road, approximately 3.9km from the Duncan	482600E, 7088600N	Timbers in collar of 200 Level Adit have collapsed, but still accessible.					Timbers should be removed and adit filled.	
		Creek road.	,		Major	Possible	300	Moderate		
				Some parts of open pit missing berms.	Major	Possible	300	Moderate		
				Loading elevator very unstable; accessible.	Major	Possible	300	Moderate	Location easily accessible and inviting to the curious. Should be dismantled.	
12	Galkeno 900	Located at the eastern base of Galena Hill via an all-		Some tension cracks on slope north of set pond.	1414JO1	1 ossiere	300	Wioderate	Continuous monitoring should be done of the tension on	
		weather gravel road that branches off to the southwest	483600E, 7087700N	·					the north slope.	
13	Fisher Creek	from the Silver Trail Highway, approximately 0.6km. Located on the lower southeast slope of Galena Hill,			Major	Possible	300	Moderate	Not on claim	
13	I Islief Oreek	roughly 1km north of Duncan Creek Road.	481000E, 7083700N		Major	Possible	300	Moderate	Not on claim	
14	Bluebird	Northeast slope of Galena Hill, approximately 4km		Three shafts were located east of cabin, two with ladders.					Shafts could be filled by hand. Low risk.	
		northwest from Keno City; 70m upslope.	482750E, 7089825N	Shafts filled in but still relatively deep (approx. 1-2m) One small shaft located north of other shafts only 0.5m deep.						
				small shart located north of other sharts only 0.5m deep.	Major	Possible	300	Moderate		
				Log cabin accessible; in poor condition.	Major	Possible	300	Moderate		
15	Tin Can	250m uphill of Silver Trail Highway.	4007405 700074014	One partially caved shaft found further down slope; stil					Shaft could be cause for concern, however, location and	
			483743E, 7088748N	somewhat accessible however, not too deep (approx 2.5m)	Major	Possible	300	Moderate	low depth of shaft determined the risk to be minimal.	
16	Rico	Northwest slope of Galena Hill, 450m upslope of Galkeno		One open shaft above adit, collapsed inward approximately	,	1 ossiere	300	Wioderate	Shaft could be cause for concern, however, location and	
		900 site via old dirt road that branches off Calumet Back	483300E, 7087700N	4m in depth; water retained in bottom.					low depth of shaft determined the risk to be minimal.	
		road roughly 2.2km north of junction with Duncan Creek Road.	.000002, .00		Major	Possible	300	Moderate		
17	Duncan Creek	Just east of the confluence of Duncan Creek with Lightning		Trenches present only, however, do not reach bedrock. May	, ,	1 0331010	300	Wioderate		
		Creek via an overgrown cat track that intersects with the	483200E, 7084950N	not be exploration trenches but cleared areas only.						
		Duncan Creek Track approximately 800m from the Duncan Creek Road.	.002002, .00.000.1		Major	Possible	300	Moderate		
18	Flame & Moth	Directly southeast of Christal Lake on the north side of	4000075 700005011	Site consists of minor pits and trenching; no real hazards	Wajoi	TOSSIDIE	300	Wioderate		
		Duncan Creek Road.	483967E, 7086852N	apparent.	Major	Possible	300	Moderate		
19	Onek	Located on the south slope of Keno Hill immdiately		Open pits in the south end have no berms on them (location	l l				Locals use the pit area as a shooting range; thus the pit	
		northeast of Keno City.	487406E, 7087196N	is vehicle accessible).					hazard is more emminent. Also suggests buildings in upper camp could be entered or used as targets, so	
					Major	Possible	300	Moderate	removal might be in order.	
				Collapsed rock above lower portal; timbers of lower portal ir		1 0331010	300	Wioderate	Removal of rock and refurbishing of timbers may be in	
				poor shape.					order as the portal cannot be allowed to plug with ice due	
									to the close proximity of the Keno residents as a sudden release from the portal can cause serious damage and	
									disruption.	
					Major	Possible	300	Moderate		
				Lone Star shaft inaccessible except for 5m deep hole within open pit.	Major	Possible	300	Moderate	Perhaps should be filled either by hand or with backhoe.	
20	Klondike-Keno	Northwest slope of Keno Hill, approximately 1.5km		Subsidence has occurred behind collapsed adit.					Moderate rating given because of close proximity to	
		southwest of Wernecke town site.	484700E, 7090700N		Matan	D 71.1	200	Madama	accessible roadway, would definitely catch the attention	
				Drillers shack located north of adit roof structure on it's way	Major	Possible	300	Moderate	of the curious.	
				to collapsing	Major	Possible	300	Moderate		
21	Sadie Ladue	Located on the northwest slope of Keno Hill at the	4004005 7000000	Collapsed stope located between Shaft #2 and Pit #1; loose					Collapsed stope should be filled with backhoe to prevent	
		Wernecke Camp.	486400E, 7092000N	slabs in roof a hazard.	Major	Possible	300	Moderate	access.	
				A number of buildings in various states of repair are present	, ,				Note that most cause for concern from structures present	
				on the site.					on site should be lookout, as this structure is largely	
									attractive to the curious and it's height makes it a significant liability in case of collapse. Access to structure	
					Major	Possible	300	Moderate	should be eliminated.	
22	Bellekeno	South side of Sourdough Hill Road at the 100 level adit site	487126E, 7086385N	Open shaft along right side of road partially covered by	3.6.1	D91	200	Mada	Shaft should be able to be filled with material without too	✓
			, , , , , , , , , , , , , , , , , , , ,	collapsing frame Further up road along right side, another open log-lined ven	Major	Possible	300	Moderate	much difficulty. Shaft should be able to be filled with material without too	
				about 3m deep	Major	Possible	300	Moderate	much difficulty.	✓
				Minor tension cracks along edge of pond and along crest of		ъ	200	M		
		80m along a trail leading off of Sourdough Hill Road.		waste rock slope. Eureka:	Major	Possible	300	Moderate	All of these openings (4 in total) should be filled with	
		Som along a trainreading on or Souldough Hill Noad.		2 open shafts located west of cabin; one overgrown and one					material, possibly mounded at the stope location to	
				is fairly deep					account for settling	✓
				1 large stope failure in the middle of road 1 large open vent raise	Major	Possible	300	Moderate	Trail along Sourdough Hill Drive should be either bermed or gated right at Sourdough Hill Road	
				Powder mag is in poor condition and accessible.	Major	Possible	300		Building may have to be dismantled.	
				Wash house is in poor condition and accessible.	Major	Possible	300		Building may have to be dismantled.	
				1						

ge 2 of 6



Assigned Site					G		Di L D di						
No.	Site Name	Location Description	UTM Coordinates	Description of Physical Hazards	Consquence Severity	Likelihood Probability	Risk Rating Numerical	Descriptive	Mitigation Measures	Actions Complete			
					Severity	Probability	Numericai	Descriptive					
23	Kijo	Located on the mid-southwest slope of Keno Hill, roughly		One collapsed portal south of the collapsed adit; entrance to									
		500m north of Erickson Gulch via Blackcap Road which	486200E, 7089600N	small for accessibility.									
		branches off Wernecke Road, 80m down the slope.			Major	Possible	300	Moderate					
24	Croesus No. 1	Midway up the western slope of Keno Hill, extending		One shallow caved in shaft found up the hill from the adits.	Wajoi	1 OSSIDIC	300	Wioderate	Shaft could be filled in by hand, but the location in the				
		roughly 350m along an azimuth of 5 degrees up the north							dense bush makes it's priority low.				
		side of Erickson Gulch from the creek via the Blackcap	486655E, 7089425N										
		Road which branches off of Wernecke Road, 1.3km to the northwest.			Major	Possible	300	Moderate					
25	Black Cap, Shepherd & SQ Adit	Three sites located on the western slope of Keno Hill,		Black Cap Adit allegedly accessible.	1111901	1 0551010	300	1115derate	Adit entrance could be sealed with rods and geotextile.				
		roughly a kilometre north of Erickson Gulch, all within	486950E, 7091675N						-				
		450m of each other.			Major	Possible	300	Moderate					
				Lucky Queen Adit accessible through broken timbers.	Major	Possible	300	Moderate	Portal material likely needs to be removed and the adit sealed with material.				
				Open pits with no berming present.	Major	Possible	300	Moderate	Sealed With material.				
				Workshop accessible.	Titagor	1 0551010	300	Hoderate	Ensure doors on Garage are structurally sound and				
				·	Major	Possible	300	Moderate	locked with an adequate mechanism.				
26	Lucky Queen	Located on the northwest slope of Keno Hill, roughly		Doors unlocked on Shaft #1 headframe.					Ensure doors on Shaft #1 headframe are structurally				
		1.25km east and uphill of the Wernecke Camp.	487700E, 7092700N			5	200		sound and locked with an adequate mechanism. Moderate rating given because of attractiveness to				
27	Lake	250m west of Gambler Gulch, midway down the		Large headframe present above shaft, access to descent	Major	Possible	300	Moderate	Not on claim				
21	Land	northwestern slope of Keno Hill, via the Lower Faro Gulch		ladder nailed shut, however, access can be gained from					NOT ON GIGHT				
		Trail.	490150E, 7090640N	side of shaft as ground has collapsed . Shaft may be									
				approximately 5m deep.	Major	Possible	300	Moderate					
28	Shamrock	Near the summit on the southwest side of Keno Hill; can		Headframe is collapsing into the shaft and ground	J				Headframe material should be extracted from the shaft,				
		be seen from Keno City	488018E, 7090536N	subsidence is occuring on the east side of the shaft.					then an assessment as to whether the shaft needs a plug				
			1000102,10000011		Maion	Possible	300	Moderate	to be filled or not should be made.				
				Main Site Building accessible.	Major Major	Possible	300	Moderate					
				Generator Shed accessible.	Major	Possible	300	Moderate					
				200 Level Portal partially collapsed; access is possible but	Major	1 OSSIDIE	300	Wioderate	Material may have to be removed from adit entrance and				
				difficult.	Major	Possible	300	Moderate	adit filled with material.				
29	Highlander	2km northwest of Keno Hill Summit on the south side of	km northwest of Keno Hill Summit on the south side of	2km northwest of Keno Hill Summit on the south side of	2km northwest of Keno Hill Summit on the south side of		One caved in adit with a small opening that still allows	Major	Possible	300	Moderate	Collapsed adit can be filled by hand if necessary. Site not	
20	Tilgiliandoi	Gambler Gulch.	487900E, 7092100N						in obvious location; may limit accessibility.				
					Major	Possible	300	Moderate	·				
				Ore processing building accessible.	Major	Possible	300	Moderate					
				Bunkhouse accessible.	Major	Possible	300	Moderate					
20	Out & Duran	North and for in a place of Four Ordels A Flore continues to f		Cabin accessible.	Major	Possible	300	Moderate					
30	Cub & Bunny	Northeast facing slope of Faro Gulch, 1.5km northwest of the Keno Summit.	488780E, 7092120N	Site consists of a trench and a pit; no real hazard concerns	Major	Possible	300	Moderate					
31	Stone	2.3km north of Keno Summit in Faro Gulch; south of Faro	4000005 700050011	One adit partially caved and difficult to access.	1.111,01	1 0001010	200	1.1000200	If necessary, partially collapsed adit can be filled by hand.				
		Gulch Trail.	488800E, 7092500N		Major	Possible	300	Moderate	Location makes priority low.				
				Dry Building accessible.	Major	Possible	300	Moderate					
32	Keno 700	Sites occur across a broad, relatively gentle slope above Hope Gulch southeast of the Keno Summit on Keno Hill	490250E, 7089350N	Keno 200 Adit collapsed some approx. 3m deep; accessible from door at front.	1				Ensure doors on adit are structurally sound and locked with an adequate mechanism.				
		via the Keno 700 Road.	730230L, 1009330IN	moni door at none.	Major	Possible	300	Moderate	with an aucquate mechanism.				
				Comstock 150 Adit door sealed but has some damage.	J				Repair doors on adit and lock with an adequate				
					Major	Possible	300	Moderate	mechanism.				
				Comstock 200 Adit door sealed but accessible from smaller door on west side.	Major	Possible	300	Moderate	Ensure doors on adit are structurally sound and locked with an adequate mechanism.				
				Garage building subjected to erosion at base from being	iviajoi	1 OSSIDIE	300	Moderate	with an adequate mechanism.				
				positioned on waste rock pile.	Major	Possible	300	Moderate					
				Drill equipment shop was unstable, slipping into the erosion			***						
				channel.	Major	Possible	300	Moderate					
				The mining/geoligist office was unstable and slipping into the erosion channel.	Major	Possible	300	Moderate					
				All building on the site were accessible.	Major	Possible	300	Moderate					
33	Main Fault & Nabob	North face of Keno Hill, approximately 0.75km northwest of	F	Old house & old outhouse accessible.									
		Monument Hill, adjacent to the Keno No.9 System via the	490150E, 7090640N				200						
24	Lako Viow	Silver Basin Gulch Trail. Located in the cirque at the headwaters of Faro Gulch on		Most of the site consists of a number of transhes that	Major	Possible	300	Moderate	Not on claim				
34	Lake View	the north slope of Keno Hill.	489635E. 7091270N	Most of the site consists of a number of trenches that pose no real hazard. One building still standing on site in process					Not on claim				
			.30000_, 700127014	of collapsing.	Major	Possible	300	Moderate					
35	Nabob No. 2	North side of Keno Hill, approximately 2km northwest of		One shaft has workings collapsed into it; not accessible.	-								
		Mounument Hill summit via an unnamed trail the branches	489900E, 7092100N										
		off Silver Basin Gulch Trail.			Major	Possible	300	Moderate					

ge 3 of 6



Assigned Site	Site Name	Location Description	UTM Coordinates	Description of Physical Hazards	Consquence	Likelihood	Risk Rating		Mitigation Measures	Actions Complete
No.	One Hame	Ecoulion Beschpilon	O Tim Goordinates	Description of Finysical Hazards	Severity	Probability		Descriptive	miligation incasures	Actions complete
36	Keno No. 9 System	Located on the Keno Hill summit via the Keno Signpost road.	48?300E, 7090200N	Faro Gulch Portal not inspected. Unsure of condition.	Major	Possible	300	Moderate	Portal is very attractive to the adventurous hiker.	
		loau.		Open pits on top of Keno Hill summit.	Wiajoi	1 OSSIDIC	300	Wiodciate	Considering the amount of traffic around the Signpost	
					Major	Possible	300	Moderate	area, perhaps the larger pits should be bermed.	
				Two open holes are present just east of the Signpost.	Major	Almost certain	3000	Extreme	Considering the amount of traffic around the Signpost area, open holes need to be filled ASAP.	
37	Gold Hill No. 2	350m west of Monument Hill Summit via the Monument	490740E, 7090400N	One shaft collapsed to a depth of approximately 1ft.	,				Shaft can be filled in by hand if necessary.ent.	
		Hill Trail	4307402, 70304001	A number of trenches present, one with an eroding high wal	Major	Possible	300	Moderate	Wall would need to be shaved down, likely by Excavator	
				that is in the process of slow collapse.					or possibly dozer, however, site would be difficult to	
	_				Major	Possible	300	Moderate	reach with either piece of equipm	
38	Fox	North side of Keno Hill, approximately 1.5km north- northwest of Monument Hill Summit via the Silver Basin	490650E, 7091600N	Site consists of two trenchsed; no real hazards observed						
		Gulch Trail.	490050E, 7091000N		Major	Possible	300	Moderate		
39	Caribou (Segsworth) & Alice	Approximately 250m southwest of Caribou Hill Summit and		Caved in adit still somewhat accessible through rip rap fill.	Wildo	1 ossible	300	Woderate	Not on claim	
		in the steeped wall cirque immediately west of Caribou Hill	492796E, 7091020N	Exposed portion of shaft accessible; ground possibly failing						
		Summit.		in front of shaft	Major	Possible	300	Moderate		
				Exposed portion of shaft accessible; ground possibly failing	,		400		Not on claim	
40	Divide	South side of Keno Hill, between Faith & Hope Gulches,		in front of shaft Just a series of trenches, no apparent hazards.	Major	Possible	300	Moderate		
70	Divido	approximately 1.5km southwest of Caribou Hill.	492249E, 7089995N	gast a series of trenenes, no apparent nazarus.						
44					Major	Possible	300	Moderate	N	
41	Devon	Located on the south side of Keno Hill, approximately 1km north-northwest of the junction of Lightning Creek and	493100E, 7088855N						Not on claim	
		McNeill Gulch.	1001002,10000011		Major	Possible	300	Moderate		
42	Faith	Located on the southeast side of Keno Hill, approximately 1km southeast of Caribou Hill summit, via a partially							Not on claim	
		overgrown cat trail along the rigdeline between Beauvette	493700E, 7089900N							
		Hill Trail and the Hope Gulch Trail.			Major	Possible	300	Moderate		
43	Duncan	Located near the top of Keno Hill, approximately 1km west- southwest of Caribou Hill Summit, just below the rim of the		Shaft caved in waist deep. Trenching evident on rim of cirque.					Not on claim	
		cirque.	432200E, 7030770IV	Trending evident on tim of cirque.	Major	Possible	300	Moderate		
44	Gold Queen	Site was not located.	4040505 7004700N	A trench and an open adit was indicated in the public works					Low priority was given due to the fact that the site was	
			491350E, 7091700N	героп.	Major	Possible	300	Moderate	not located, therefore, would likely not be majorly accessible to hikers.	
45	Silver Basin	North side of Keno Hill, approximately 1km north of the	404000E 70044E0N	One collapsed adit and shaft on west facing slope of Gulch;	,				Not on claim	
		monument hill summit, via the Silver Basin Gulch Trail.	491000E, 7091450N	not accessible.	Major	Possible	300	Moderate		
46	Nabob	North side of Keno Hill, approximately 1.6km north- northwest of Mounument Hill Summit.	491000E, 7092350N	Minor trenching only; no obvious hazards.	Major	Possible	300	Moderate	Not on claim	
47	Monument & Ladue Fraction	Northwest of Mountment Hill Summit. Northwest facing slope of Monument Hill summit,		One collapsed adit located on east facing slope of Silver	Wajoi	Fossible	300	Moderate		
		approximately 1.5km past the signpost via the Silver Basin	4000005 70000001	Basin Gulch just below summit of Monument Hill; not						
		Gulch Trail.	490900E, 7090900N	accessible. Trenching present on top of cirque.						
					Major	Possible	300	Moderate		
48	Apex	Located approximately 250m south of 4th switchback past the intersection of Signpost Road and Keno 700 Road.	488640E, 7088920N	One lined shaft located in Trench #3, a couple of meters deep. Possible subsidence immediately west of the hole.					Shaft can be filled in by hand if necessary.	
		and interession of eigripost read and rene res readi	1000102,100002011	·	Major	Possible	300	Moderate		
40	N/ 1			Wood cabin accessible.	Major	Possible	300	Moderate	N	
49	Vanguard	Located on the south slope of Keno Hill on the west side of Charity Gulch via an old 500m trail from the Keno 700	489300E, 7088250N						Not on claim	
		road.	, , , , , , , , , , , , , , , , , , , ,		Major	Possible	300	Moderate		
50	Homestake	North side of Bunker Hill via an unnamed overgrown road 2.5km in length that branches off Lightning Creek Road							Not on claim	
		near the junction of Thunder Gulch and Lighning Creek.	489750E, 7086600N							
					Major	Possible	300	Moderate		
51	Christine	Located on the peak of Bunker Hill, 7km east of Keno City.	492300E, 7085200N		Major	Possible	300	Moderate	Not on claim	
52	Мо	East slope of Sourdough Hill	487082E, 7085278N	Two open shafts, both collapsed about 10ft down	Major	Possible	300	Moderate	Not on claim	
53	Maybrun	South side of Thunder Gulch at the confluence of two		Open adit with portal structure collapsing slowly; two	-				Not on claim	
		creeks abouth 1.5km south of Lightning Creek	48/914E, 7085643N	branches in adit, right likely accessible, left side caved in approximately 10m	Low	Possible	10	Low		
54	Hogan	South slope of Keno Hill no the north side of Lightning	486924E, 7087344N	Shallow shaft on east end of waste dump only 2ft deep.					Not on claim	
	D	Creek Road.	400924E, /00/344N	·	Major	Possible	300	Moderate	Net are also	
55	Runer	Located on the southwestern toe of Keno Hill, 3km east of Keno City via a gravel road branching off from the dirt road							Not on claim	
		between the Signpost Road and Lightning Creek Road.	488150E, 7087550N							
EC	Wornacka Pailraad				Major	Possible	300	Moderate	Not on claim	
56	Wernecke Railroad	Located on the northwest slope of Keno Hill, approximately 0.5km west of the Wernecke town site.	484700E, 7091700N		Major	Possible	300	Moderate	Not on claim	

ge 4 of 6



Assigned Site					G		D1 1 D 41			
No.	Site Name	Location Description	UTM Coordinates	Description of Physical Hazards	Consquence	Likelihood Probability	Risk Rating Numerical	Descriptive	Mitigation Measures	Actions Complete
					Severity	Probability	Numericai	Descriptive		
57	Formo (Yukeno)	Mine site straddles the Silver Trail Highway approximately	481904E, 7090442N	Two adits were at one time sealed but are now somewhat					Not on claim	
		7km east of Elsa.	461904E, 7090442N	accessible.	Major	Possible	300	Moderate		
				Core shack accessible.	Major	Possible	300	Moderate	Not on claim	
				Wood shack accessible. Wood cabin accessible.	Major	Possible	300	Moderate	Not on claim	
				Multi-Bay outhouse accessible.	Major Major	Possible Possible	300 300	Moderate Moderate	Not on claim Not on claim	
58	Paddy	Located off of the Hansen-McQuesten Road on a gravel		One partially collapsed adit just above Christal Creek.	Major	Possible	300	Moderate	Not on claim	
00	laday	access road to the southwest which loops around to the	481450E, 7091342N	one partially collapsed date just above official crock.					Trot on stall	
		barrel storage area, where two roads branch off, each	461450E, 7091342N			D 111	200			
59	Eagle	reaching a different section of the site. East side of Galena Hill, through Hector-Calumet Mine on		One collapsed shaft in the middle of some significant	Major	Possible	300	Moderate	Not on claim	
39	Lagie	road that leads to Microwave Towers, 85m south from Jock	481900E. 7086900N						Not on claim	
		Shaft	,,	3,	Major	Possible	300	Moderate		
60	Fisher	Located on the southeast slope of Galena Hill via a 2km							Not on claim	
		walk along an overgrown road on the west side of Duncan Creek to Galkeno Road, 40m north of Duncan Creek	481300E, 7084700N							
		Road.			Major	Possible	300	Moderate		
61	Cream & Jean	400m north of Silver Trail Highway along an overgrown	478853E, 7089483N	Cream shaft accessible however water and ice are present	_	_			Not on claim	
00	Mord	road adjacent to Sandy Creek. Located on the northwest slope of Galena Hill near the	., 0000E, 7000703N	at a depth of 2m.	Major	Possible	300	Moderate	Not on claim	
62	Nord	junction of Silver Trail Highway and Hanson-McQuesten	4705775 7000001						Not on claim	
		Lakes Road directly adjacent to the road.	479577E, 7090692N			D 111	200			
63	Gerlitski	North of a prominent knob on the south side of the		Site consists of only two trenches with waste rock piles; no	Major	Possible	300	Moderate		
63	Germski	McQuesten River Valley between Galena Creek and		apparent hazards.						
		Thompson Creek, 0.5km north of Silver Trail Highway,	470800E, 7085550N							
		1.2km west of the turnoff to the Silver King site.			Major	Possible	300	Moderate		
64	Titan	Lcoated on an unnamed creek that merges with the South							Not on claim	
		McQuesten River 1km to the southwest, just 1km upstream of where Christal Creek and sthe South	473300E, 7093150N							
		McQuesten River merge.			Major	Possible	300	Moderate		
65	Shanghai	Located approximately 4.5km east of the junction of			.,,				Not on claim	
		Shanghai Creek and the McQuesten River on the north								
		side of the river via a 6km road that connects the property with the South McQuesten Road at the airport.	467650E, 7088950N							
		with the South McQuester Road at the airport.			Major	Possible	300	Moderate		
66	Moon	Located at the base of th north side of Keno Hill between			•				Not on claim	
		Faro and McKay Gulch via an overgrown trail that	489200E, 7094050N		Matan	D 11.1 .	300	No. Least.		
68	Mt. Hinton	branches off from the lower Faro Gulch Trail. Lies on the northern face of Mount Hinton at the head of			Major	Possible	300	Moderate	Not on claim	
00	INIC THREST	McNeil Gulch, approximately 11km east-southeast from	495070E, 7083370N						Not on dam	
		Keno City.	1000702, 700007014		Major	Possible	300	Moderate		
69	Avenue	10KM northeast of Keno City on a plateau midway		There is either an adit or a possible fall in the rocks located					Not on claim	
		between the Caribou Hill and Beauvette Hill Summits, at	493594E, 7091072N	southeast of the Avenue site. The Avenue site itself is a						
		the edge of a slope that drops steeply to the north towards Keno Ladue Creek.	,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,	southeast of the Avenue site. The Avenue site itself is a series of trenches. No real hazard areas.	Major	Possible	300	Moderate		
70	Yono	on the southwest side of Bunker Hill in Thunder Gulch via			1414101	1 0331010	300	moderate		
		the Thunder Gulch Trail a few hundred metres past	489400E, 7085660N							
74	Christal (Darathy)	Bellekeno. Located on the western slope of Keno Hill south of		One timber lined shoft approximately 2.5 and a second	Major	Possible	300	Moderate	Chaft apuld be filled in by heart 1 airdir air.	
71	Christal (Dorothy)	Erickson Gulch via a foot trail departing Keno Road about	486780E, 7088540N	One timber lined shaft approximately 2.5m deep with approximately 6" of water.			1		Shaft could be filled in by hand. Low priority given though, due to the location of the shafts in the dense	
		2.5km out of Keno City.	.307002, 700007011	approximatory of or mator.	Major	Possible	300	Moderate	bush.	
				One shaft located north of first shaft, approx. 1m deep with					Shaft could be filled in by hand. Low priority given	
				approx. 0.5ft of water in it.	Major	Possible	300	Moderate	though, due to the location of the shafts in the dense bush.	
72	Ironclad (Ankeno)	Site lies above and below Keno 700 Road about 2.5km out			IVIaj0I	1 OSSIDIE	300	Moderate	Not on claim	
_		of Keno City.	486970E, 7087700N			D. 71	200	Media		
73	Gambler	Located in the cirgue at the headwaters of Faro Gulch on		One upper adit caved in about 8ft in depth with ground	Major	Possible	300	Moderate	Not on claim	
73	Cambioi	the north slope of Keno Hill.	489162E, 7091184N	1 ''			1		THOU OT CHAIRT	
		· ·	,	Two other adits are collapsed and inaccessible.	Major	Possible	300	Moderate		
	_			Cabin & outhouse accessible.	Major	Possible	300	Moderate	Not on claim	
75	Bema	Located on the southwest slope of McMillan Gulch about 10km east of Keno City.	494960E, 7087360N		Major	Possible	300	Moderate	Not on claim	
76	Townsite Mine	6.2km along Calumet Drive from the junction of Wernecke	470505 705-55	Rock overhang has caved in at adit entrance and is	iviajoi	1 0221010	300	WIOGETALE	Moderate rating given due to accessibility from Calumet	
		Road .	479500E, 7087800N	considered a safety hazard.	Major	Possible	300	Moderate	Drive and attention given in PWGSC report.	
77	Sadie Ladue 600 Adit	6km north of Keno City via a 1km trail leading north from	485950E, 7092700N	One adit present; allegedly still accessible.	M.:	D11.1	200	Mada	Moderate rating given due to accessibility from Wernecke	
	l	Wernecke Camp.			Major	Possible	300	Moderate	Camp.	

.5 of 6



signed Site	Site Name	Location Description	UTM Coordinates	Description of Physical Hazards	Consquence	Likelihood	Risk Rating		Mitigation Measures	Actions Complete
No.	0.10.110	200411011 20001 (2010)		Description of Fifty stour Hazards	Severity	Probability		Descriptive	ganon modeli co	Authoric Complete
					·					
78	Elsa Village	Located on the south side of Silver Trail Highway, 11.5km west of Keno City.	476000E, 7087000N	Green shack accessible.	Major	Possible	300	Moderate		
				Shack #1 & 2 beside sawmill accessible.	Major	Possible	300	Moderate		
				Carpentry shop accessible.	Major	Possible	300	Moderate		
				No. 5 bunkhouse accessible.	Major	Possible	300	Moderate		
				Union shop building accessible; in poor condition.	Major	Possible	300	Moderate		
				Snack bar accessible through a back door.	Major	Possible	300	Moderate		
				Dining hall accessible.	Major	Possible	300	Moderate		
				Wooden walkways are in poor condition at Mill site.	Major	Possible	300	Moderate		
				Access available to the grizzly bay at Mill site.	Major	Possible	300	Moderate		
				Utilildor collapsing at mill site.	Major	Possible	300	Moderate		
				Retaining wall failing on south side of Mill site.	Major	Possible	300	Moderate		
				Light vehicle shop accessible.	Major	Possible	300	Moderate		
			Rescue building accessible.	Major	Possible	300	Moderate			
			Swimming pool building accessible.	Major	Possible	300	Moderate			
				Medical building accessible; contains medical equipment	- 3				Although this is not a physical hazard, contents of the	
				and personal medical files.	Major	Possible	300		building can subject the company to large privacy exposure.	
				Heavy Equipment Warehouse accessible through unlocked door on the north side.	Major	Possible	300	Moderate		
				Mens staffhouse accessible.	Major	Possible	300	Moderate		
				Apartment building accessible.	Major	Possible	300	Moderate		
				Single car garage building accessible.	Major	Possible	300	Moderate		
				Church building in poor condition; accessible.	Major	Possible	300	Moderate		
				Elsa School was accessible.	Major	Possible	300	Moderate		
				Flat Creek residences #1 & 2 accessible.	Major	Possible	300	Moderate		
79	Elsa Tailings	South McQuesten River Valley to the northwest of Galena Hill, near the head of Flat Creek via a gravel road located		No apparent hazards other than tension cracks on dam walls which is watched on a regular basis.						
		just west of Porcupine Creek.			Major	Possible	300	Moderate		
80	Wernecke Tailings	Located in an unnamed lake on the northwest side of Keno Hill at the head of Ladue Creek.	484400E, 7095400N		Major	Possible	300	Moderate	Not on claim	
81	Mackeno	Located on the east and northeast shore of Christal Lake via a gravel road off the main highway approximately 2km northwest of Keno City, and enters the south portion of the	484083E, 7087675N	No apparent physical hazards.						
		millsite.			Major	Possible	300	Moderate		

nge 6 of 6



Photo 9: View of Shamrock J building partially collapsed over open vent raise.



Photo 10: Photo 8: View of Shamrock J vent shaft filled and mounded with building removed.

Project 6: Wire clean-up

Planning

A survey of the mine site for wire and assessment of priority areas was completed with Peter Johnson (ERDC) and Keith Hepner (McQuesten Enterprises) on August 17, 2006. This survey identified the priority areas that were left unfinished from the 2005 program as well as additional areas scheduled for completion.

Field Activities

Wire cleanup began on August 22nd and focused on the area around Lucky Queen. Following completion in the Lucky queen area, labor and equipment moved to the Wernecke area.

Culverts supporting the poles were removed as well as grounding rods. The wire was rolled onto spools using McQuesten Enterprise loader and wire roller. The rolls of wire were transported to the Elsa framing yard using a McQuesten hyab truck. Figure x shows a typical example of rolling wire after it has been removed from the poles.

Not as much progress was made in the wire cleanup project as planned. ERDC committed to using NND labor for this special project. In addition to this special project, a number of NND members were employed with the Alexco exploration program. Given all of the demand for local NND labor, not as much wire cleanup was completed due to a shortage of consistent labor available to complete the project.



Photo 11: Alexco employees in the course of wire-cleanup.