## **Upper Lillooet Hydro Project**

## **Weekly Environmental Monitoring Report #58**

Reporting Period: April 19 - April 25, 2015

Upper Lillooet River Hydroelectric Facility (Water File No. 2002561, Water licence No. C130613), Boulder Creek Hydroelectric Facility (Water File No. 2003049, Water licence No. C129969) & Transmission Line

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#### Owner Construction Permits and Approvals

Environmental Assessment Certificate No. E13-01 (Amendment 1, 2, 3, 4, 5 & 6) Fisheries Act Subsection 35(2)(b) Authorization No. 09-HPAC-PA2-000303 (Amendment 1, 2) Letter of Advice for the Transmission Line No. 09-HPAC0-PA2-000303 Leave To Commence Construction (ULRHEF) File No. 2002561 Leave To Commence Construction (BDRHEF) File No. 2002453 Leave To Commence Construction (TX Line) File No. 2002561/2002453 Conditional Water Licence (ULRHEF C130613) File No. 2002561 Conditional Water Licence (BDRHEF C129969) File No. 2002453 Conditional Water Licence (BDRHEF C131153) File No. 2003601 Licence of Occupation (ULRHEF #232384) File No. 2409871 Licence of Occupation (BDRHEF #232386) File No. 2409998 Licence of Occupation (TX Line #2423386) File No. 2410654 Occupant Licence to Cut (ULRHEF Amendments 1, 2, 3, 4, 5, 6) No. L49717 , Occupant Licence to Cut (BDRHEF – KM 38 laydown) No. L49698 Occupant Licence to Cut (BDRHEF Amendments 1, 2, 3) No. L49816 Occupant Licence to Cut (TX Line Amendment 1, 2, 3, 4, 5, 6, 7, 8) No. L49697 General Wildlife Measure Exemption Approval Letter (TX Line & BDRHEF) File No. 78700-35/06 UWR and 39585-20 WHA Heritage Conservation Act – Alteration Permit (ULRHEF) File No. 11200-03/2014-0033 Road Use Permit No. 6123-13-02 (Lillooet River FSR); 5673-13-01 (Rutherford Creek FSR); 7977-13-01 (Lillooet South FSR); 8015-13-01 (Ryan River); 8188-13-01 (Pemberton Creek FSR); and 9717-13-01 (Miller Bench FSR) Junction Permit (ULRHEF & BDRHEF) File No. 11250-32/6123 (Amendment 1) Aeronautical Obstruction Approval (Tx Line - Lillooet River Crossing) File No. 2013-004 Aeronautical Obstruction Approval (Tx Line - Ryan River) File No. 2013-005 Aeronautical Obstruction Approval (Tx Line - North Miller) File No. 2013-006 Aeronautical Obstruction Approval (Tx Line - South Miller) File No. 2013-007 Aeronautical Obstruction Approval (Tx Line - Pemberton Creek) File No. 2013-008 Aeronautical Obstruction Approval (Tx Line - Lillooet River near Pemberton) File No. 2013-009 Aeronautical Obstruction Approval (Tx Line - Lillooet River near Meager Creek) File No. 2013-010 Navigable Water Protection Act (ULRHEF) File No. 8200-2009-500434-001 Navigable Water Protection Act (BDRHEF) File No. 8200-2012-501-032-001 Navigable Water Protection Act (Tx Line - North Creek) File No. 8200-2013-500103-001 Navigable Water Protection Act (Tx Line - Lillooet River) File No. 8200-2013-500101-001 Navigable Water Protection Act (Tx Line - Lillooet River) File No. 8200-2013-500102-01 Navigable Water Protection Act (Tx Line - Ryan River) File No. 8200-2013-500104-001 Navigable Water Protection Act (Tx Line - South Miller River) File No. 8200-2013-500100-001 Navigable Water Protection Act (Tx Line - Boulder Creek) File No. 8200-2013-500099-001 Navigable Water Protection Act – Extension Approval (ULRHEF, BDRHEF, Tx Line) Navigable Water Protection Act (Bridge - Ryan River) File No. 8200-2013-500381 Navigable Water Protection Act (Bridge - Upper Lillooet Side Channel; Extension Approval) File No. 8200-2013-500383 Section 57 Authorization (ULRHEF) File No. 16660-20/REC202717 SLRD Temporary Use Permit No. 34 - Boulder Creek HEF SLRD Temporary Use Permit No. 35 - Upper Lillooet River HEF SLRD Building Permit (10864) - Upper Lillooet River HEF Powerhouse SLRD Building Permit (10865) - Boulder Creek HEF Powerhouse Works Permit for Construction within FSR Right-of-Way No. 6123-14-01 Section 52(1)(b) FRPA Authorization for Ryan River Wet Crossing File No. FOR-19400-01/2014 MOTI Permit to Construct, Use and Maintain Works Upon the Right-Of-Way of a Provincial Public Highway No. 2014-06099



#### Contractor Construction Permits and Approvals

Magazine Licence File No. UL76018

Section 8 Approval – Short Term Use of Water File (Lillooet River and Tributaries) No. A2006123 (Amendment 1) Waste Discharge under the Code of Practice for the Concrete and Concrete Products Industry under the Environmental Management Act (Authorization No. 107204) Tracking No. 326969

Wildlife Act Permits – Pacific Tailed Frog Salvage Permit # SU15-164805, Fish Salvage Permit #SU14-95329 Section 52 of the Fisheries (General) Regulations – Fish Salvage Licence # XR 139 2014 BC Safety Authority – Temporary Construction Electrical Service Permit EL-140698-2014 Municipal Wastewater Regulation - Authorization # 107032

Water Supply System Construction Permits – VCH-14-613 for Main Camp
Water Supply System Permit to Operate Issued July 30th, 2014 for Main Camp
Section 6(3) and Schedule 3 Wildfire Regulations Fire Exemption for Ryan River Bridge File No. 14350-07
SLRD Building Inspection Report dated August 13, 2014 - Construction Camp Building Permit No. 10830
Lillooet River FSR Temporary Road Closures Approval File No. 11250-32/6123 (Amendment 1, 2)
Lillooet South FSR Temporary Road Closures Approval File No. 11250-32/7977

#### **ACRONYMS:**

AMBNS	Active Migratory Bird Nesting Survey	ISW	Instream Works
ASMP	Archaeological Sites Management Plan	ITM	Environmental Issue Tracking Matrix
ARD M/L	Acid Rock Drainage and Metal Leaching	JEM	JEM Energy Ltd. (Delegate Independent
<b>BCEAO</b>	British Columbia Environmental		Engineer)
	Assessment Office	LTC	Leave to Construct
BCWQG	British Columbia Water Quality Guidelines	MFLNRO	Ministry of Forests, Lands and Natural
BDRHEF	Boulder Creek Hydroelectric Facility		Resource Operations
BG	Background	MOE	Ministry of Environment
BKL	BKL Consultants Ltd.	MOTI	Ministry of Transportation and Infrastructure
CE	CRT-ebc Construction Inc.	NCD	Non Classified Drainage
DFO	Fisheries and Oceans Canada	OLTC	Occupational License to Cut
DS	Downstream	PAG	Potentially Acid Generating
EAC	Environmental Assessment Certificate	ROW	Right of Way
EAO	Environmental Assessment Office	RVMA	Riparian Vegetation Management Area
Ecofish	Ecofish Research Ltd.	SES	Sartori Environmental Services
Ecologic	Ecologic Consulting	Stringer	Temporary Backfeed Transmission Line
EIR	Environmental Incident Report	Line	
ESC	Erosion and Sediment Control	TX Line	Transmission Line
FAM	Field Advice Memorandum	ULRHEF	Upper Lillooet Hydroelectric Facility
FSR	Forest Service Road	UWR	Ungulate Winter Range
GWR	Mountain Goat Winter Range	VC	Valued Component
Hedberg	Hedberg and Associates Ltd.	WEL	Westpark Electric Ltd.
IE	Independent Engineer (True North Energy)	WEMR	Weekly Environmental Monitoring Report
IEM	Independent Environmental Monitor	WHA	Wildlife Habitat Area
INX	Innergex Renewable Energy Inc.	WQ	Water Quality



## 1.0 Summary of Site Inspections for Reporting Period

The table presented below summarizes the IEM team site presence, weather and monitoring locations by component:

Dates	IEM Team Personnel	Weather Conditions	Key Monitoring Locations & Activities
April 19 – 25	TH, BA, SE	Variable conditions with rain/snow events on April 21 & 22	<ul> <li>■ Routine equipment maintenance and repairs completed at the 38km laydown shop location</li> <li>■ Maintaining electric fence, gates, and electrified mats</li> <li>■ Formwork and rebar installation at ULRHEF powerhouse</li> <li>■ Formwork and rebar installation at BDRHEF powerhouse</li> <li>■ Drill and blast works in the BDRHEF tunnel</li> <li>■ Road maintenance on Lillooet River FSR from 18 – 37km</li> <li>■ The IEM conducted a site inspection on April 21 and 24</li> <li>TX Line</li> <li>■ Segment 2</li> <li>■ Temporary generator site works near 39km of the Lillooet River FSR</li> <li>■ Segments 8 and 9</li> <li>■ Framing from structure 182 to 201</li> <li>■ Segment 12</li> <li>■ Miller Bench FSR road upgrades continued, The IEM was onsite to monitor a culvert installation at MB50 on April 22</li> <li>■ Hand falling from structure 281 to 282</li> <li>■ Segment 13</li> <li>■ Hand falling from structure 318 to 326</li> </ul>

IEM Team Personnel: TH - Tom Hicks, BA - Blake Aleksich, SE - Stephanie Ellis

## 2.0 Administrative Summary

Key communications and meetings the IEM team had with the licensees, contractors and/or environmental authorities:

Date	Communication Type	Participants	Issues Discussed	ITM ID No.
April 19, 2015	Email	CE, SES, INX	CE requested approval for survey works to be conducted at the ULRHEF intake, ULRHEF downstream tunnel portal and the ULRHEF penstock prior to the May 1 reopening of construction areas above 41.5km of the Lillooet River FSR following the wolverine den emergence timing window. SES agreed the proposed survey works were acceptable given the surveyors travelled outside the morning and evening goat migration periods, a log was kept, and all wildlife sightings were reported.	-
April 20, 2015	Email	INX, JEM, SES	INX sent an updated version of the ULRHEF North side bulk excavation below 666m work plan. JEM	-



Date	Communication Type	Participants	Issues Discussed	ITM ID No.
			confirmed that works were able to continue and an LTC amendment would follow.	
	Email	INX, JEM, WEL, SES	INX distributed amendment #9 to Upper Lillooet Hydro Project Transmission Line Occupant Licence to Cut L49697 for Segment 11B and associated roads.	-
	Email and pre-work meeting	CE, SES, INX	SES met with CE at the ULRHEF powerhouse to discuss dewatering of the clean infiltration sump water directly to the Lillooet River and the installation of an additional sump and pumps to capture potentially alkaline or turbid water and convey it to the settling pond for treatment.	-
April 20-21, 2015	Email	CE, SES, INX	The use of ANFO in the BDRHEF and ULRHEF tunnel excavations and possible environmental concerns were discussed. SES provided the blasting regulations as stated in the Construction Environmental Management Plan and mitigation strategies.	-
	Email	SES, WEL	WEL updated SES on the results of two precautionary AMBNS conducted in Segment 13 that revealed very little bird activity. Plans for reassessment the following week were made.	-
	Email	CE, SES, INX	Riparian setback restrictions for the application for calcium chloride on roads for dust suppression were discussed and CE revised their work plan.	-
April 21, 2015	Email	SES, INX, JEM	INX distributed the Squamish Lillooet Regional District Building Permits associated with the ULRHEF and BDRHEF powerhouses and auxiliary infrastructure.	-
April 22 -24, 2015	Site visit and emails	WEL, SES, INX, Pemberton Wildlife Association (PWA)	INX, SES and the PWA visited the TX Line ROW where it crosses stream 167a in Segment 7 to assess whether or not clearing works had impacted fish habitat. During the visit, it was confirmed that activities were conducted in compliance with the work plan and associated project permits and approval as well as it was determined that fish habitat will not be degraded with the provision that crews conduct a secondary pass of the RVMA when next on site to remove any residual debris within the high-water mark boundary.	-
April 24, 2015	Email	WEL, SES, INX	WEL and SES continued to discuss a strategy for precautionary AMBNS prior to the end of the restriction window on May 1. WEL and SES agreed that surveys were necessary for the low elevation clearing sites in Segment 11 at the Ryan South realignment road. For the higher elevation sites in Segment 12, 13 and 14, WEL and SES agreed that an assessment AMBNS would be conducted in Segment 13 to determine the need for further surveys.	-



## 3.0 Current Work Restrictions and Timing Windows

The table presented below outlines work restrictions applicable during the reporting period for each active Project component location:

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Component	Location	Wildlife/Archeology Concern	Construction/Timing Restrictions & Mitigations
		Within 150m of wetlands or 100m of Coastal Tailed Frog Streams	IEM presence is required when clearing within 150m of wetlands or 100m of CTF Streams, to ensure clearing area is minimized.
		Riparian Vegetation Management Areas (RVMA)	IEM monitoring is required during clearing within RVMAs.
		Surface Water Quality	IEM monitoring is required during culvert installation activities in non-fish bearing waters to document adherence to the Surface Water Quality Protection Plan objectives.
	Segments 6 – 13	Suitable Raptor Nesting Habitat	IEM presence is required when clearing within suitable Northern Goshawk (NOGO), SPOW (Spotted Owl) and Western Screech-Owl (WESO) nesting habitat during the breeding period. A QP is to complete a nest survey if working within 600m of suitable Peregrine Falcon (PEFA) nesting habitat during the breeding period.
TX Line		Suitable Class 1 & 2 Grizzly Bear forage habitat	IEM monitoring is required when clearing within identified Class 1 & 2 Grizzly Bear forage habitat, to ensure clearing area is minimized.
		Wildlife Habitat Area (WHA) 2- 399	Construction of the transmission line within the Grizzly Bear WHA 2-399 must be construction outside of April 1 to June 1 and October 15 to December 31 to minimize disturbance to Grizzly Bears expected to use the WHA during spring and fall.
		Ryan River Drainage	Construction of the TX Line into and across the Ryan River drainage will occur during the less critical Grizzly Bear summer foraging period (June 1 – September 1)
		Moose, Deer, & Mountain Goat UWRs	Helicopter flight paths will avoid UWRs and landing locations will be located further than 500m away from the UWRs during the sensitive late winter period (March 1 – May 15).
Lillooet River FSR & ULRHEF	Access roads above the lower limit of the 200m buffer Truckwash Creek Migration Corridor to the ULRHEF intake	Mountain Goat UWR	If a goat is observed within 500 m of construction operations, construction must cease for at least 48 hours. The IEM must record and submit all goat observations to FLNR within 48 hours.
	ULRHEF work areas above the powerhouse	Wolverine den emergence	Construction will not occur beyond 41.5km of the Lillooet River FSR or above the



Component	Location Wildlife/Archeology Concern		Construction/Timing Restrictions & Mitigations		
	(beyond 41.5km of the Lillooet River FSR) & BDRHEF intake		BDRHEF intake access road gate from March 1 – April 30 during the critical den emergence period.		
ULRHEF & BDRHEF	BDRHEF intake	Mountain Goat UWR habitat (u-2-002 UL 12)	During winter construction and operations, access to Boulder Creek HEF intake must be gated at least 500 m from the original UWR u-2-002 UL 12 to restrict motorized use within the UWR, unless otherwise directed by FLNR.		

# 4.0 Upper Lillooet River Hydroelectric Facility & Boulder Creek Hydroelectric Facility – Monitoring Results

### 4.1 Construction Camp, 38 km Laydown & Lillooet River FSR

#### Operations:

- The electric fences were fully operational and clear of snow throughout the reporting period as identified in CE weekly reports provided to the IEM (Photo 1).
- Routine maintenance of construction equipment within the mechanic shop and fuel management continued at the 38 km laydown.
- Spring road maintenance continued on the Lillooet River FSR from 18 37km by the Primary Road Use Permit holder (Squamish Mills).
- A checkpoint station was assembled at 37.5 KM on the Lillooet River FSR. The station will
  be staffed with an attendant and CE will keep a log of all vehicles and personnel entering
  and exiting the job site (Photo 2). The purpose of the checkpoint station is to provide the
  public with information on the current landslide risk hazard level, road conditions, site safety
  and work site update and to better direct construction traffic arriving at site.

#### Environmental Summary:

- CE performed daily inspections of the electric fence and fuel storage areas.
- The IEM conducted a site inspection on April 24 and observed that bear attractant management was being carried out in accordance with the Human – Bear Conflict Management Plan (Photo 3). The IEM did not identify any issues with garbage or other possible bear attractants during a site wide inspection. CE was observed to be diligent in their bear attractant management.



#### Photos:



Photo 1 – The Pad 3 electric fence was operational during this reporting period (April 24, 2015).



Photo 2 – Checkpoint located at 37.5 KM on the Lillooet River FSR (April 24, 2015).



Photo 3 – The area outside of the kitchen trailers was observed to be clean, organized and free of bear attractants (April 24, 2015).

## 4.2 Upper Lillooet River HEF Powerhouse

#### Construction Activities:

- Formwork and rebar installation (Photo 4).
- Dewatering to settling ponds (Photo 5).
- Repositioning of 10" hose to dewater sump to Lillooet River (Photo 6).
- Deconstruction of settling ponds.

#### Environmental Summary:

 On April 24, the IEM conducted water quality sampling in the ULRHEF powerhouse sump to ensure the water was suitable to be pumped directly to the Lillooet River (Photo 4). CE needed to redirect the water to allow for the deconstruction of the settling ponds. The IEM



measured the sump water to be 1.41NTU with a pH of 7.88 and suitable for discharge to the surrounding environment in accordance with the Surface Water Quality Protection Plan. The 10" hose used to discharge the sump water to the Lillooet River was anchored to a large boulder and positioned in a way that would prevent erosion of the riverbank (Photo 6).

#### Photos:



Photo 4 – Current conditions at ULRHEF powerhouse (April 24, 2015).



Photo 5 – ULRHEF powerhouse settling ponds (April 24, 2015).



Photo 6 – 10" hose anchored to boulder to restrict movement of hose (April 21, 2015).

#### 4.3 Boulder Creek HEF Powerhouse

#### Construction Activities:

- Formwork and rebar installation continued (Photo 7).
- Drill and blast works in tunnel.
- Tunnel portal and powerhouse dewatering to oil water separator and settling ponds (Photo 8 and Photo 9).



#### Environmental Summary:

 All dewatering of the powerhouse excavation and tunnel was directed to the reconstructed settling ponds (Photo 9). All water introduced to the settling ponds was observed to be infiltrating to ground in the first cell of the ponds throughout this reporting period.

#### Photos:



Photo 7 – Current conditions at BDRHEF powerhouse (April 24, 2015).



Photo 8 – BDRHEF tunnel dewatering to oil water separator and settling ponds (April 24, 2015).



Photo 9 – BDRHEF settling ponds (April 24, 2015).

## 4.4 Water Quality Results

Weekly water quality monitoring at the ULRHEF and BDRHEF intakes will resume the week of May 1, 2015 once access to the sites is are open. Water quality will continue to be monitored at the discretion of the IEM at the ULRHEF and BDRHEF powerhouse sites to ensure site discharge meets surface water quality objectives.



#### 4.5 Recommendations

IEM recommendations for the hydroelectric facilities are as follows:

- The IEM recommends that the BDRHEF and ULRHEF sediment ponds continue to be utilized and are closely monitored to ensure that they are effectively promoting infiltration/ and treating water quality prior to discharging water offsite.
- Once the ULRHEF and BDRHEF intake sites can be accessed the IEM recommends that the effectiveness of installed winterization and ESC measures be assessed to ensure that regular maintenance is performed as needed.

#### 4.6 Upcoming Works

The following construction activities are scheduled to occur the in the upcoming reporting period(s):

- Excavation of sump and settling ponds for the ULRHEF intake dewatering and wastewater treatment system is scheduled to commence.
- Hand falling, grubbing and stripping for settling ponds and spoil pile expansion is scheduled to commence.
- Dewatering of ULRHEF downstream tunnel portal is scheduled to commence.
- Rebar, formworks, and concrete pours at the ULRHEF and BDRHEF powerhouses are scheduled to occur in the upcoming reporting period.
- Road clearing and bank stabilization works on the BDRHEF access road are scheduled to commence.
- Crane assembly is scheduled to commence at the BDRHEF intake.

## 5.0 Transmission Line - Monitoring Results

#### 5.1 Transmission Line Construction Activities

Clearing, Existing Road Upgrades and Access Road Construction:

- Assembly of temporary generator site in Segment 2 near 39km on Lillooet River FSR (Photo 10).
- Road upgrades (including culvert installations) continued in Segment 12 on Miller Bench FSR (Photo 13 and Photo 14).
- Hand falling in Segment 12 from structure 281 282.
- Hand falling in Segment 13 from structure 318 326 (Photo 15).

Transmission Line Pole Installation, Line Stringing and Clipping:

• Framing completed in Segment 8 and 9 from structure 182 – 201.



#### **Environmental Summary:**

• On April 22, the IEM was present for a non-fish bearing culvert installation at MB50 on the Miller Bench FSR at an identified Coastal Tailed Frog (CTF) stream. An Ecofish crew conducted a CTF salvage prior to works and during dewatering (Photo 11 and Photo 12). Worksite isolation was achieved with a sandbag dam and two pumps (Photo 13). Crews took care to minimize downstream sedimentation by minimizing disturbance to surrounding soil and gradually releasing water into the installed culvert. Despite diligent work by the contractor, three temporary pulses of suspended sediment were experienced downstream during works. The pulses of sediment occurred when residual water was released at 10:45, when one pump was shut off to release water to the culvert at 11:35 and when the second pump was shut off at 12:24. The sediment pulses all persisted for less than 10 minutes. The IEM was stationed downstream of the works to conduct water quality sampling (see Section 5.2 for Water Quality Results).

#### Photos:



Photo 10 – Construction of temprary generator site in Segment 2 (April 21, 2015).



Photo 11 – CTF salvage conducted by Ecofish crew at MB50 (April 22, 2015).



Photo 12 – CTF tadpole captured and relocated by Ecofish crew at MB50 (April 22, 2015).



Photo 13 – Sandbag dam and pumps used for worksite isolation at MB50 in Segment 12 (April 22, 2015).





Photo 14 – Culvert installation works at MB50 (April 22, 2015).



Photo 15 – Falling completed near structure 318 (April 23, 2015).

#### 5.2 Water Quality Results

The following table presents the results of water quality sampling collected during TX - Line water management activities according to the conditions outlined in the Surface Water Quality Protection Plan. Exceedances of in-situ water quality (turbidity) deemed to be caused by project-related activities are highlighted in bold font and are discussed above in Section 5.1.

Date	Time	Sample Location Description	рН	Turbidity (NTU)	Cond (uS)	Temp (°C)
		Segment 12 – Miller Bench FSR culvert insta	allation a	t MB50		
	8:30	Background above MB50	-	2.74	-	-
	10:20	20m downstream during MB50 work	-	3.15	-	-
	10:40	20m downstream during MB50 work	-	1.87	-	-
	10:45	20m downstream during MB50 work	-	22.2	-	-
April 22,	11:00	20m downstream during MB50 work	-	3.49	-	-
2015	11:20	20m downstream during MB50 work		0.64		
	11:35	20m downstream during MB50 work		68.8		
	11:45	20m downstream during MB50 work		12.6		
	12:24	20m downstream during MB50 work		78.5		
	12:35	Culvert outlet		7.8		

#### 5.3 Recommendations

 The IEM recommends all access roads be inspected to assess any slope failures or drainage/erosion concerns that have resulted from recent heavy rains and rain on snow events.



#### 5.4 Upcoming Works

The following new and/or environmentally sensitive construction activities are scheduled to occur along the TX Line in the upcoming reporting period(s):

- The temporary generator site works in Segment 2 will continue.
- Stinging poles will continue in Segment 8 and 9.
- Road upgrades and repairs in Segment 12 on the Miller Bench FSR are scheduled to continue.
- Clearing of the Segment 12 and 13 ROW will continue.
- Hoe chucking will commence in Segment 13.
- Road construction will commence in Segment 14.

## 6.0 Wildlife Sightings

As per the CEMP, a wildlife sightings record has been implemented and will be updated regularly by Project Personnel. It is mandatory for all personnel to report wildlife sightings including, but not limited to bears, cougars, mountain goats and deer. Wildlife sighting will be reported and recorded by the contractor(s) and submitted to the IEM on a weekly basis. Observation or detection of the following species will trigger notification to identified parties according to the following table.

Species Observed or Detected	Notification Period	Agencies to be Notified
Northern Rubber Boa	Immediately	IEM, Owner
Grizzly Bear	24hrs	IEM, Safety Officer, Conservation Officer, Owner
Wolverine Den	24hrs	IEM, MFLNRO, Owner
Spotted Owls	24hrs	IEM, MOE, Owner
Mountain Goats	48hrs	IEM, MFLNRO, Owner

## 7.0 Mountain Goat Monitoring Program

Mountain Goat monitoring will resume in the spring of 2015, once construction activities resume.



## 8.0 Environmental Issues Tracking Matrix (ITM)

## 8.1 Hydroelectric Facilities (ULRHEF & BDRHEF)

ITM Track	king Legend	i: Wo	ork Item Open ork Item Complete ue Closed				
Issue T	Issue Tracking Environmental Issue		nmental Issue	Mitigation Measur	res		
ID No.	Status	Location	Issue Description	Action Taken/Recommended	Date of Identification	Targeted Date for Completion	Date Completed
						next	ITM – ULR#23

#### 8.2 Transmission Line

ITM Trac	king Legend	l: Wo.	rk Item Open rk Item Complete ue Closed				
Issue 1	<b>Fracking</b>	Enviro	nmental Issue	al Issue Mitigation Measures			
ID No.	Status	Location	Issue Description	Action Taken/Recommended	Date of Identification	Targeted Date for Completion	Date Completed
						ne	ext ITM – Tx#3