

January 5, 2017

AltaGas Holdings Inc. (AltaGas)  
#1700. 355 – 4<sup>th</sup> Ave SW  
Calgary, AB  
T2P 0J1

**Attention: Renée Boyd, P. Eng.**  
**Operations Engineer - Gas**

**Reference: John Lake Pipelines NEB Abandonment Conditions**

---

## INTRODUCTION

North Shore Environmental Consultants Inc. (North Shore) is pleased to submit our scope of work and cost estimate for environmental consulting services related to the abandonment of the John Lake Pipelines (the Project) which consist of:

- The 3.7 km John Lake North pipeline from 06-04-057-27 W3M to 07-01-057-01 W4M; and
- The 3.0 km John Lake South pipeline from 12-04-056-27 W3M to 10-01-056-01 W4M.

## SCOPE OF WORK

The scope of work was prepared to address the *Attachment to Board Letter dated 19 December 2016* (the Letter) issued to AltaGas by the National Energy Board (NEB) (Attachment A). The Letter outlined several potential conditions related to the abandonment approval of the Project. The scope of work has five phases which address the potential conditions of the Letter:

- Project Management;
- Phase I Environmental Site Assessment (ESA);
- Aboriginal Participation and Monitoring Plan;
- Environmental Protection Plan (EPP); and
- Post-Abandonment Report and Monitoring Plan.

A Phase II ESA was also included as a potential condition but has not been included in this scope of work as the requirement, scope and cost will be reliant on the results of the Phase I ESA.

## PROPOSED METHODOLOGY

### Project Management

Tasks in the Project Management Phase would include project set-up, meetings, scheduling and planning, field support and project controls.

### Phase I Environmental Site Assessment

The Phase 1 ESA will be conducted in general accordance with the Canadian Standards Association (CSA) *Standard Z678-01: Phase I Environmental Site Assessment* (CSA, 2001). The following tasks are proposed as part of the Phase I ESA:

- Desktop Review
  - ◆ Search, order, and obtain available historical records, documents, and reports.
  - ◆ Review and interpret available information including: topographic, geological, and hydrogeological maps, aerial photographs, land titles, water well records, property use records, archive information, company records, and historical environmental reports.
  - ◆ Conduct interviews with key persons associated with the Project to validate site inspection information, record pertinent historical events, and identify historical sources of potential contamination.
- Field and Safety Preparations
  - ◆ Preparation of field documents.
  - ◆ Correspondence with landowners or client operations personnel, if required.
  - ◆ Preparation of all relevant safety documents including a pre-job hazard assessment and an emergency response plan.
- Fieldwork
  - ◆ Conduct a visual assessment of the Project and document conditions and potential environmental concerns.
- Report Writing, Review and Production
  - ◆ Prepare a Phase 1 ESA Report documenting and evaluating the findings of the assessment.
  - ◆ Conduct senior review of the report.
  - ◆ Finalize and compile the report components.

### Aboriginal Participation and Monitoring Plan

This phase will be limited to reporting and will require consultation with AltaGas. The report will serve as a plan describing the participation the Onion Lake Cree Nation (OLCN) will have in the abandonment activities for the Project. The plan will provide a description of the scope, methodology and measures for monitoring activities to be undertaken by OLCN, including:

- Consultation activities to be undertaken with OLCN to determine the proposed scope, methodology and measure for monitoring activities;
- The elements of abandonment that will involve OLCN monitoring;
- A description of how information gathered through the participation of OLCN monitors will be used by AltaGas; and
- A description of how information gathered through participation of OLCN monitors will be provided to OLCN.

### **Environmental Protection Plan**

The Environmental Protection Plan Phase will also be limited to reporting. The EPP will describe the environmental protection procedures and measures used to mitigate environmental impacts from the abandonment activities. As per the Letter the EPP will address, at minimum, the following:

- Procedures for planned abandonment activities and reclamation including soils handling, appropriate handling, testing and disposal of materials, and revegetation or vegetation management techniques designed to restore disturbed areas to the equivalent land capability;
- Measures to identify and characterize any contamination encountered during abandonment activities and a contingency plan to be implemented in the event that potential contamination is encountered; and
- Procedures for spill prevention, response and reporting during the abandonment activities.

### **Post-Abandonment Report and Monitoring Plan**

The Post Abandonment Report and Monitoring Plan Phase will include the following tasks:

- Field and Safety Preparations
  - ◆ Preparation of field documents.
  - ◆ Correspondence with landowners or client operations personnel, if required.
  - ◆ Preparation of all relevant safety documents including a pre-job hazard assessment and an emergency response plan.
- Fieldwork
  - ◆ Conduct a post-abandonment reclamation assessment.
- Report Writing, Review and Production
  - ◆ Prepare a Post-Abandonment Report documenting the findings of the assessment as per Section 8a of the Letter.
  - ◆ If required, prepare a Post-Abandonment Monitoring Plan Report as per Section 8b of the Letter.
  - ◆ Conduct senior review of the report(s).
  - ◆ Finalize and compile the report components.

## PROJECT TIMELINES

Table 1 outlines the durations for each phase and task associated with the Project and identifies their NEB submission deadlines.

**Table 1: Duration and NEB Submission Deadlines for Each Proposed Phase and Task**

Phase	Task	Duration <sup>1</sup>	NEB Submission
Project Management	Project Commencement and Meetings	Throughout project	Not applicable
	Scheduling / Supervision of field staff		
	Project controls / status reporting		
Phase I ESA (Phase II, if required)	Desktop review	1 week	90 days prior to commencing abandonment activities (45 days prior)
	Field and safety preparations		
	Fieldwork	1 week	
	Report writing, review and production		
Aboriginal Participation and Monitoring Plan	Report writing	2 weeks	30 days prior to commencing abandonment activities
	Report review		
	Report production		
Environmental Protection Plan	Report writing, review and production	2 weeks	45 days prior to commencing abandonment activities
Post-Abandonment Report and Monitoring Plan	Field and safety preparations	1 week	January 31 <sup>st</sup> after the first growing season following abandonment activities
	Fieldwork	2 Weeks	
	Report writing, review and production		

1. Durations are estimated in weeks, actual hourly estimates are included in the detailed cost estimate included in Attachment B.

## ESTIMATED COSTS

North Shore proposes to complete the scope of work on a time and expenses basis. Based upon the scope of work outlined in this proposal, the anticipated cost for the Project is **\$20,725.00**. A summary of the estimated costs, separated by phase, is included in **Attachment B**. Costs exclude GST and were prepared using North Shore's *AltaGas Ltd. - 2016 Corporate Preferred Rate Schedule - MSA (Attachment C)*.

## ASSUMPTIONS AND LIMITATIONS

The cost estimate was developed based on the following assumptions and limitations:

- Costs for the Post-Abandonment Monitoring Plan Report were prepared with the assumption that there will be less 5 outstanding issues associated with the pipelines;
- The post-abandonment assessment will not require ground disturbance beyond 30 cm;
- Costs do not include additional monitoring or maintenance of potential issues identified along the pipeline rights-of-way;
- If required, scope of work and costs for a Phase II ESA will be prepared as a separate proposal; and
- Fieldwork for the Phase I ESA will be limited to an assessment of the proposed ground disturbance sites associated with the abandonment activities.

## CLOSURE

North Shore appreciates the opportunity to offer our services to AltaGas. If we can provide clarification of any part of this proposal, please call the undersigned at (403) 228-3095.

Yours truly,

**North Shore Environmental Consultants Inc.**

Prepared by:



Danny Lajoie B.Sc., P.Ag.  
Sr. Environmental Consultant

- Attachment A:** NEB Attachment to Board Letter dated 19 December 2016  
**Attachment B:** Detailed Cost Estimate  
**Attachment C:** AltaGas Ltd. - 2016 Corporate Preferred Rate Schedule - MSA



## **ATTACHMENT A**

***NEB Attachment to Board Letter dated 19  
December 2016***



**AltaGas Holdings Inc. on behalf of AltaGas Pipeline Partnership (AltaGas)**  
**Abandonment Hearing MHW-003-2016**  
**Application to Abandon the John Lake Pipelines (Project)**  
**Filed 16 March 2016**

**National Energy Board**  
**NEB File OF-Fac-Gas-A174-2016-01 01**  
**Potential Draft Conditions**

---

These potential draft conditions may be revised and further conditions may be considered after additional evidence and/or comments are received.

In these potential draft conditions, where any condition requires a filing with the National Energy Board “for approval”, AltaGas shall not consider that condition met for the purposes of finally confirming compliance with all conditions until the specified Board approval is issued.

In these potential draft conditions:

**“Abandonment Activities”** means any in-field activity which results in a pipeline being permanently taken out of service and delivery of a product to an end user is discontinued.

**“Application”** means AltaGas’ application to the Board dated 16 March 2016 to abandon its John Lake Pipelines.

**“Board”** means the National Energy Board.

**“For approval”** - When a condition requires a filing for NEB approval, AltaGas must not commence the indicated activity until the Board issues its written approval of that filing.

**“Order”** means a prospective abandonment order issued by the Board to AltaGas pursuant to paragraph 74(1)(d) of the *National Energy Board Act*.

**“Project”** means the abandonment of, and where appropriate, the Abandonment Activities associated with, AltaGas’ John Lake Pipelines.



## **Potential Draft Conditions for the Order, if Leave Granted**

### ***1. Condition Compliance***

AltaGas shall comply with all of the conditions contained in this Order, unless the Board otherwise directs.

### ***2. Project Design, Location, and Activities***

AltaGas shall abandon the John Lake Pipelines in accordance with the specifications, standards (including Canadian Standards Association (CSA) Z662-15, Oil and Gas Pipeline Systems), commitments made and other information referred to in its Application or in its related submissions.

### ***3. Implementation of Environmental Protection***

AltaGas shall implement or cause to be implemented all of the policies, practices, programs, mitigation measures, recommendations, commitments, and procedures for the protection of the environment included in or referred to in its Application or in its related submissions.

### ***4. Phase I Environmental Site Assessment***

AltaGas shall file with the Board, **at least 90 days prior to commencing the Abandonment Activities:**

- a) a Phase I Environmental Site Assessment (ESA) (as per the guidance provided in the most recent version of CSA Standard Z768-01, Phase I Environmental Site Assessment) for the Project, including but not limited to, the ground disturbance sites, to investigate and describe any potentially hazardous materials and the likelihood of any historical contamination associated with the sites where the Project is located; and
- b) confirmation that the Phase I ESA did not identify potential contamination associated with the Project; or
- c) confirmation that a Phase II ESA will be filed with the Board as per Condition 5 of this Order, if the results of the Phase 1 ESA indicates that a Phase II ESA is warranted; and
- d) confirmation that a copy of the Phase I ESA has been provided to Onion Lake Cree Nation.

**5. *Phase II Environmental Site Assessment and Remediation Action Plan***

AltaGas shall file with the Board **for approval, at least 45 days prior to commencing the Abandonment Activities:**

- a) a statement confirming that a Phase II ESA is not required, or if the results of the Phase I ESA indicate that a Phase II ESA is warranted, a Phase II ESA (as per the guidance provided in the most recent version of CSA Standard Z769-00, Phase II Environmental Site Assessment) which includes the following:
  - i. a detailed description of procedures to be implemented for investigation of all existing or potential contamination identified pursuant to the Phase I ESA; and
  - ii. results of the soil and groundwater analysis, and findings of Phase II ESA;
- b) confirmation that the results of the Phase II ESA, or a statement indicating that it was not required, has been provided to Onion Lake Cree Nation (OLCN);
- c) confirmation that remediation was not required, or if the results of the Phase II ESA identify that remediation is required, a Remediation Action Plan in accordance with the *NEB's Remediation Process Guide*, which includes the following:
  - i. a summary of AltaGas' consultations with OLCN regarding the Remediation Action Plan. In its summary, AltaGas shall provide a description and justification for how it has incorporated the results of its consultation, including any recommendations from OLCN into the Plan.

**6. *Environmental Protection Plan***

AltaGas shall file with the Board **for approval, at least 45 days prior to commencing Abandonment Activities**, an Environmental Protection Plan for the Project. The Environmental Protection Plan shall describe the environmental protection procedures and measures used to mitigate environmental impacts from the Abandonment Activities associated with this Project, including, but not limited to:

- a) procedures for planned Abandonment Activities and reclamation including soils handling, appropriate handling, testing and disposal of materials, and revegetation or vegetation management techniques designed to restore disturbed areas to the equivalent land capability;
- b) measures to identify and characterize any contamination encountered during Abandonment Activities (for example, by visual or olfactory indicators, soil vapour testing, or soil sampling) and a contingency plan to be implemented in the event that potential contamination is encountered; and
- c) procedures for spill prevention, response and reporting during the Abandonment Activities.

**7. *Plan for Aboriginal Participation in Monitoring of Abandonment Activities***

AltaGas shall file with the Board **at least 30 days prior to commencing Abandonment Activities**, and provide a copy to Onion Lake Cree Nation (OLCN), a plan describing participation by OLCN in monitoring of Abandonment Activities for the Project. The Plan shall provide a description of the scope, methodology and measure for monitoring activities to be undertaken by OLCN, including:

- a) a summary of the consultation activities to be undertaken with OLCN to determine the proposed scope, methodology and measure for monitoring activities;
- b) those elements of abandonment that will involve OLCN monitoring;
- c) a description of how information gathered through the participation of OLCN monitors will be used by AltaGas; and
- d) a description of how information gathered through participation of OLCN monitors will be provided to OLCN.

**8. *Post-Abandonment Report and Post-Abandonment Monitoring Plan***

**On or before 31 January after the first complete growing season following the completion of the Abandonment Activities**, AltaGas shall file with the Board **for approval**, the following:

- a) a Post-Abandonment Report that shall include:
  - i. photographs and a brief description of landscape and land cover on and off the pipeline right-of-way;
  - ii. information or documentation demonstrating that the state of land at the area disturbed during the Abandonment Activities is restored to equivalent land capability or plans for further corrective actions and monitoring;
  - iii. confirmation of:
    - a. placement and maintenance of appropriate signage at the abandoned pipeline right-of-way; and
    - b. updating of pipeline status with first-call services;
  - iv. a remediation report confirming that all contamination has been remediated to the most stringent federal or applicable provincial environmental criteria, if any contamination was discovered during the Abandonment Activities. The remediation report shall describe all applied remedial activities and summarize the methods and results of any soil and groundwater sampling and analyses conducted; and
  - v. confirmation that a copy of the Post-Abandonment Report has been provided to Onion Lake Cree Nation (OLCN).

- b) a Post-Abandonment Monitoring Plan that shall include:
- i. a description of the environmental components or issues to be monitored;
  - ii. monitoring methods for each environmental component or issue;
  - iii. further corrective actions planned and a schedule for further monitoring and reporting;
  - iv. a description of and justification as to how AltaGas has incorporated the results of its consultation, including any recommendations from OLCN, into the plan; and
  - v. confirmation that a copy of the Post-Abandonment Monitoring Plan has been provided to OLCN.

**9. Condition Compliance by the Accountable Officer**

Within **30 days after completion of the Abandonment Activities**, AltaGas shall file with the Board, confirmation, by its accountable officer, as defined in the *National Energy Board Onshore Pipeline Regulations*, that the Project was completed, and that all Abandonment Activities were conducted in compliance with all applicable conditions to this Order. If compliance with any of these conditions cannot be confirmed, the accountable officer shall file with the Board details as to why compliance cannot be confirmed. The filing required by this condition shall include a statement confirming that the signatory to the filing is AltaGas' accountable officer.

**10. Order Expiration (Sunset Clause)**

Unless the Board otherwise directs prior to [one year from the date the Order is granted], this Order shall expire on [same date chosen above], unless Abandonment Activities in respect of the Project have commenced by that date.



# **ATTACHMENT B**

## **Detailed Cost Estimate**





Estimated Costs for Environmental Consulting Services Related to the  
John Lake Pipelines NEB Abandonment Conditions



Task Description	Senior Environmental Consultant	Intermediate Environmental Consultant II	Intermediate Environmental Consultant I	GIS / Drafting Analyst	Administration Support	Total Hours	Professional Fees	Field Expenses	Third Party Services	Total Cost
<b>AltaGas Ltd. 2016 Corporate Preferred Rate Schedule</b>	\$115	\$100	\$95	\$80	\$72					
Project Commencement and Meetings	5	0	0	0	0	5	\$ 575.00	\$ -	\$ -	\$ 575.00
Scheduling / Supervision of field staff	3	0	0	0	0	3	\$ 345.00	\$ -	\$ -	\$ 345.00
Project controls/budgeting/status reporting	5	0	0	0	2	7	\$ 719.00	\$ -	\$ -	\$ 719.00
<b>Project Management Total</b>	<b>13</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>2</b>	<b>15</b>	<b>\$ 1,639.00</b>	<b>\$ -</b>	<b>\$ -</b>	<b>\$ 1,639.00</b>
Desktop review	0	0	4	0	0	4	\$ 380.00	\$ -	\$ -	\$ 380.00
Field and safety preparations	0	0	4	0	0	4	\$ 380.00	\$ -	\$ -	\$ 380.00
Fieldwork	0	0	12	0	0	12	\$ 1,140.00	\$ 647.50	\$ -	\$ 1,787.50
Report writing, review and production	2	0	10	2	1	15	\$ 1,412.00	\$ -	\$ -	\$ 1,412.00
<b>Phase I ESA Total</b>	<b>2</b>	<b>0</b>	<b>30</b>	<b>2</b>	<b>1</b>	<b>35</b>	<b>\$ 3,312.00</b>	<b>\$ 647.50</b>	<b>\$ -</b>	<b>\$ 3,959.50</b>
Report writing	0	10	0	0	0	10	\$ 1,000.00	\$ -	\$ -	\$ 1,000.00
Report review	2	0	0	0	0	2	\$ 230.00	\$ -	\$ -	\$ 230.00
Report production	0	0	0	0	1	0	\$ 72.00	\$ -	\$ -	\$ 72.00
<b>Aboriginal Participation and Monitoring Plan</b>	<b>2</b>	<b>10</b>	<b>0</b>	<b>0</b>	<b>1</b>	<b>12</b>	<b>\$ 1,302.00</b>	<b>\$ -</b>	<b>\$ -</b>	<b>\$ 1,302.00</b>
Report writing, review and production	4	20	0	0	2	26	\$ 2,604.00	\$ -	\$ -	\$ 2,604.00
<b>Environmental Protection Plan</b>	<b>4</b>	<b>20</b>	<b>0</b>	<b>0</b>	<b>2</b>	<b>26</b>	<b>\$ 2,604.00</b>	<b>\$ -</b>	<b>\$ -</b>	<b>\$ 2,604.00</b>
Field and safety preparations	0	0	4	0	0	4	\$ 380.00	\$ -	\$ -	\$ 380.00
Fieldwork	0	24	24	0	0	48	\$ 4,680.00	\$ 1,819.50	\$ -	\$ 6,499.50
Report writing, review and production	3	8	24	3	2	40	\$ 3,809.00	\$ -	\$ -	\$ 3,809.00
<b>Post-Abandonment Report and Monitoring Plan</b>	<b>3</b>	<b>32</b>	<b>52</b>	<b>3</b>	<b>2</b>	<b>92</b>	<b>\$ 8,869.00</b>	<b>\$ 1,819.50</b>	<b>\$ -</b>	<b>\$ 10,688.50</b>
<b>Estimated Totals</b>	<b>24.0</b>	<b>62.0</b>	<b>82.0</b>	<b>5.0</b>	<b>8.0</b>	<b>180.0</b>	<b>\$ 17,726.00</b>	<b>\$ 2,467.00</b>	<b>\$ -</b>	<b>\$ 20,193.00</b>
<b>*Disbursements rounded to the nearest dollar</b>								<b>Disbursement (3% Prof Fees)*</b>		<b>\$ 532.00</b>
								<b>Total Cost (Exclusive of GST)</b>		<b>\$ 20,725.00</b>



**NORTH SHORE**  
Environmental Consultants

Estimated Phase I ESA  
Field Expenses

**AltaGas**

Task Description	Rate	Units	Subtotal	Disbursement Rate	Disbursement Cost	Total Cost
<b>Travel and Accommodations</b>						
Kilometers (4x4 Truck)	\$ 0.95	550	\$ 522.50	\$ -	\$ -	\$ 522.50
Hotel (per night)	\$ 160.00	0	\$ -	\$ 0.10	\$ -	\$ -
Subsistence (PerDiem)	\$ 50.00	1	\$ 50.00	\$ -	\$ -	\$ 50.00
Northern Subsistence (PerDiem north of Twp 90)	\$ 65.00	0	\$ -	\$ -	\$ -	\$ -
<b>Equipment</b>						
Communication	\$ 75.00	1	\$ 75.00	\$ -	\$ -	\$ 75.00
Field Sampling	\$ 125.00	0	\$ -	\$ -	\$ -	\$ -
Water Monitoring	\$ 150.00	0	\$ -	\$ -	\$ -	\$ -
Trimble GPS	\$ 200.00	0	\$ -	\$ -	\$ -	\$ -
Field Sampling Trailer	\$ 150.00	0	\$ -	\$ -	\$ -	\$ -
ATV / Snowmobile	\$ 50.00	0	\$ -	\$ -	\$ -	\$ -
UTV	\$ 200.00	0	\$ -	\$ -	\$ -	\$ -
ATV/UTV/Snowmobile Trailer	\$ 50.00	0	\$ -	\$ -	\$ -	\$ -
Biophysical kit	\$ 50.00	0	\$ -	\$ -	\$ -	\$ -
<b>Third Party</b>						
Laboratory	\$ -	0	\$ -	\$ 0.10	\$ -	\$ -
				<b>Total Cost (Exclusive of GST)</b>		<b>\$ 647.50</b>



**NORTH SHORE**  
Environmental Consultants

Estimated Post-Abandonment  
Field Expenses

**AltaGas**

Task Description	Rate	Units	Subtotal	Disbursement Rate	Disbursement Cost	Total Cost
<b>Travel and Accommodations</b>						
Kilometers (4x4 Truck)	\$ 0.95	650	\$ 617.50	\$ -	\$ -	\$ 617.50
Hotel (per night)	\$ 160.00	2	\$ 320.00	\$ 0.10	\$ 32.00	\$ 352.00
Subsistence (PerDiem)	\$ 50.00	4	\$ 200.00	\$ -	\$ -	\$ 200.00
Northern Subsistence (PerDiem north of Twp 90)	\$ 65.00	0	\$ -	\$ -	\$ -	\$ -
<b>Equipment</b>						
Communication	\$ 75.00	2	\$ 150.00	\$ -	\$ -	\$ 150.00
Field Sampling	\$ 125.00	0	\$ -	\$ -	\$ -	\$ -
Water Monitoring	\$ 150.00	0	\$ -	\$ -	\$ -	\$ -
Trimble GPS	\$ 200.00	0	\$ -	\$ -	\$ -	\$ -
Field Sampling Trailer	\$ 150.00	0	\$ -	\$ -	\$ -	\$ -
ATV / Snowmobile	\$ 50.00	0	\$ -	\$ -	\$ -	\$ -
UTV	\$ 200.00	2	\$ 400.00	\$ -	\$ -	\$ 400.00
ATV/UTV/Snowmobile Trailer	\$ 50.00	2	\$ 100.00	\$ -	\$ -	\$ 100.00
Biophysical kit	\$ 50.00	0	\$ -	\$ -	\$ -	\$ -
<b>Third Party</b>						
Laboratory	\$ -	0	\$ -	\$ 0.10	\$ -	\$ -
				<b>Total Cost (Exclusive of GST)</b>		<b>\$ 1,819.50</b>

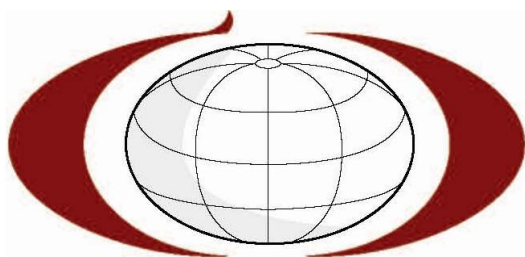




## **ATTACHMENT C**

***AltaGas Ltd. - 2016 Corporate Preferred Rate  
Schedule - MSA***





# **NORTH SHORE**

**Environmental Consultants**

## **AltaGas Ltd. - 2016 Corporate Preferred Rate Schedule - MSA**

<b>Personnel</b>	<b>Rate(s)</b>
Senior Environmental Consultant – Specialist <sup>1</sup>	\$ 135.00/hr
Senior Environmental Consultant	\$ 115.00/hr
Intermediate Environmental Consultant (Level II)	\$ 100.00/hr
Intermediate Environmental Consultant (Level I)	\$ 95.00/hr
Junior Environmental Consultant	\$ 82.00/hr
Drafting	\$ 80.00/hr
Administration/Project Support	\$ 72.00/hr
<b>Equipment, Supplies, &amp; Disbursements</b>	
	<b>Rate(s)</b>
Truck (4x4)	\$ 0.95/km
ATV / Snowmobile	\$ 50.00/day
UTV	\$ 200.00/day
ATV/UTV/Snowmobile Trailer	\$ 50.00/day
Communications <sup>2</sup>	\$ 75.00/day
Field Sampling Equipment and Supplies <sup>3</sup>	\$ 125.00/day
Water Monitoring and Sampling Supplies <sup>4</sup>	\$ 150.00/day
Trimble™ GPS	\$ 200.00/day
Field Sampling Trailer <sup>5</sup>	\$ 150.00/day
Subsistence (Per Diem)	<b>\$ 50.00/day</b>
Accommodations (if not provided)	<b>\$ Cost</b>
Third Party Services and Supplies (if not direct billed to client)	<b>\$ Cost + 4%</b>
Routine Project Expenses Disbursement <sup>6</sup>	3% of Professional Fees
Fugitive Emissions Field Testing Equipment <sup>(7)</sup>	\$ 800/day

### **NOTES:**

- 1 – Specialist includes Professional Hydrogeologist, Qualified Aquatic Environmental Specialist (QAES), and Air/Regulatory/Emissions Specialist.
- 2 – Includes cell phone, laptop, digital camera, 2-way radios, satellite communication, and handheld GPS.
- 3 – Includes RKI Gas-Tech, salt kit, pin finder, hand auger, and general sampling supplies.
- 4 – Includes water level, interface probe, multi-meter, Kemmerer sampler, Ekman dredge, hand corer sampler, and stream flow gauge.
- 5 – Enclosed heated trailer for soil/water sampling.
- 6 – Fixed disbursement charge of 3% of all professional fees will be added to each invoice to cover the cost of small incidental items (less than \$10.00) related to the project completion (ie. photocopies, scans, courier, LSAS searches, FTP file storage/transfer, etc.).
- 7 – Includes Infrared Camera, Hi-Flow Sampler, Gas Detector, Calibrated Vent Measurement Bags, etc.

**Spill Response and Professional Services provided under separate rate schedules**