

Town of Banff Class Screening Project Report Form A-2
Sub-Class 2: Service Lines

COMPLETING A CLASS SCREENING PROJECT REPORT FORM

Forms can be obtained at Environmental Services at the Town of Banff Town Hall or at the Environmental Assessment Office at Banff National Park Warden’s Office. Once completed, forms should be returned to one of these offices.

If you have questions about completing the form or the assessment process you should call the Environmental Assessment Office. The addresses and phone numbers for both the Town of Banff and Parks Canada’s Environmental Assessment Office are provided below. Incomplete or improperly completed forms will be returned. In some cases you may be asked to supply additional information or to do an individual environmental assessment.

Parks Canada’s Environmental Assessment Office will complete a review of the form within 14 days of its submission, and the proponent will be informed of the decision. If approved, a signed document, called the “Environmental Screening Approval Report,” will be mailed or faxed to you. A Town of Banff Development Permit may be required once the environmental assessment has been approved.

Certain projects may not need an environmental assessment. Other projects may require a more detailed individual environmental assessment. Such projects are usually those that are located near environmentally sensitive areas, are within 30 m of a waterbody, are excluded from the MCSR or those where unproven mitigations are to be used. If your project requires an individual environmental assessment, you will be advised. An individual environmental assessment may need to be prepared by an individual or firm with experience in environmental assessment.

The Environmental Assessment Office Banff Warden’s Office 238 Hawk St, Industrial Compound P.O. Box 900 Banff, Alberta T1L 1K2 Tel. (403) 762-1416	Environmental Services Banff Town Hall 110 Bear Street P.O. Box 1260 Banff, Alberta T1L 1A1 Tel. (403) 762-1215
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This CSPR form is to be completed by the project proponent or the proponent’s authorized agent for proposed service line activities within the town of Banff or areas adjacent to the town. It is the responsibility of the proponent to ensure that all information provided in this form is accurate and correct. Incomplete or inaccurate forms will be returned. To assist you in the preparation of the form, the following attachments have been provided:

- **Attachment 1:** Mitigation Information for Service Line Projects (Table 5.3)
- **Attachment 2:** Map of Wildlife Corridors, Ecosites, Archaeology and Land Use Districts (Figure 5.1)
- **Attachment 3:** Potentially Sensitive Sites in the Class Screening Area (Appendix B)

SUB-CLASS 2: SERVICE LINES

Projects in Sub-Class 2 include construction of new service lines (underground gas, water, sewage, electricity and communication [e.g. telephone and cable] and aboveground power lines), and operation, modification, maintenance or repair, and decommissioning and abandonment of existing lines (only applies when activities occur outside the town, or within the town and are carried out within 30 m of a waterbody; involve the likely release of a polluting substance into the environment; increase the operating capacity of the line; or involve a risk of physical harm to mammals.)

SECTION 1: DESCRIPTION OF THE PROJECT

This section is designed to determine whether you have a project as defined in the Canadian Environmental Assessment Act that requires an environmental screening.

1. Please provide a **summary description of your project** on a separate sheet and attach. Please provide a site plan of your proposed project. A one-page site plan is acceptable.

a. Does your project involve (check all of the following that apply)?

- i. The construction of a new service line YES NO
- ii. The disconnection of an existing service line YES NO
- iii. The modification of an existing service line YES NO

b. If your project is the modification of an existing service line, will your project increase the carrying capacity of the water, sewer, gas, electricity or telephone service lines? YES NO

c. Will your project require excavation? YES NO

If **YES**,

- i. Will the excavated material be re-used on site? YES NO
- ii. What is the total quantity of material to be excavated? (specify units) _____

d. Will a new lease or a new right-of-way be required to accommodate your project? YES NO

e. If a lease is required, will the use of the site remain the same? YES NO N/A

SECTION 2: LOCATION OF PROJECT

This section is designed to determine if your projects fits into Sub-Class 2 (Service Lines) of the Model Class Screening Report (MCSR).

2. If your project is located:

a. *Within* the town of Banff please provide:

Street Address:

Ecosite (initials and name, *e.g.*, Norquay $\frac{\text{NY3}}{8}$ Refer to Attachment 2)

b. *Outside* the town of Banff:

i. If your project is located on the periphery of the town, or providing services in or to one of the areas listed below, please circle:

- Banff Rocky Mountain Resorts
- Rimrock Inn
- Upper Hot Springs
- Timberline Lodge
- Cave and Basin
- Banff Gondola

SECTION 3: *Continued*

- e. Are any historic or archaeological resources directly or indirectly affected by your project (see Attachment 2)? YES NO UNSURE
- f. Is a federally or provincially designated heritage building or site affected by your project? YES NO
- g. Will your project cause any impacts to the environmental or cultural/heritage setting that have not been identified below in Table SC-2? YES NO
- h. If you answered **YES** to 3(g), briefly describe those impacts not already identified. Attach a separate sheet to this form, if necessary.

Table SC-2: Potential environmental effects from service line projects

• Dust production	• Habitat loss, fragmentation
• Decrease in air quality	• Wildlife sensory disturbance
• Runoff/sedimentation of waterbodies	• Encroachment on wildlife movement corridors
• Soil and water contamination	• Increased traffic
• Soil compaction and erosion	• Risk to public safety
• Slope failure	• Waste production
• Loss of topsoil	• Hazardous materials
• Damage/loss of vegetation	• Use of resources
• Changes in noise/visual quality	• Impact to historical or archaeological resources

SECTION 4: MITIGATIONS

This section is designed to identify what mitigations will be used to remove or reduce the potential impacts identified above, and to determine the potential for impacts to remain after the mitigations are implemented.

- 4.
- a. Will Standard MCSR mitigations as described in Attachment 1 be used? YES NO UNSURE
- b. Will any environmental mitigations be undertaken *other than or in addition to* those listed in Attachment 1? YES NO UNSURE

If you answer **YES** or **UNSURE** to 4(b), please submit detailed information on your proposed mitigations on a separate sheet along with this form.

- c. Will your project involve blasting, dredging, surface or groundwater dewatering, excavation of contaminated soil or disposal of any hazardous materials? If so, please specify on a separate sheet. YES NO
- d. Will your project require geo-technical investigation - drilling, soil sampling, - to determine soil capacity, contamination, groundwater depth etc? YES NO
- e. If you answer **YES** to 3(g), and you identified additional potential impacts in 3(h), please describe additional mitigations to be followed to address those impacts. Please attach a separate sheet if necessary.

SECTION 5: COMPLIANCE MONITORING

This section is designed to determine how you will ensure mitigations will be followed during your project.

- 5.
- a. Will an environmental monitor be available on site to ensure the mitigation measures described in Attachment 1 and Section 4 are implemented? YES NO
- b. Please indicate those groups/individuals you have informed about your project.

SECTION 6: APPLICATION SIGNATURE

As the developer of the proposed project or his/her authorized agent, I guarantee that to the best of my knowledge all information provided here is complete, correct and accurate.

Signature:	Date:
Name:	Phone:
Address:	

SECTION 7: FOLLOW-UP PROGRAM

(Parks Canada to complete)

7. a. Is a follow-up program required for this project? YES NO

If you answered **YES**, describe any project specific follow-up activities that are warranted to verify the environmental effects or the effectiveness of mitigation measures. Describe responsibilities for follow-up activities.

SECTION 8: SIGNIFICANCE

(Parks Canada to complete)

8. a. Is the project likely to cause significant environmental effects if all of the mitigations are followed? Please rate any remaining impacts as negligible, low, medium or high.

NEGLIGIBLE LOW MED HIGH

Note: This form to be attached to the Banff National Park Environmental Screening Approval Report Form.

Attachment 1 Sub-Class 2: Service Lines - Mitigation for Reducing Impacts of Service Line Projects

Activity	Potential Impacts	Mitigation Measures
Pre-Planning		
General activities	Runoff / sedimentation; soil contamination	<ul style="list-style-type: none"> • Prepare an Emergency Response Plan for the worst case, i.e., heavy rainfall and runoff events, high winds, spills, fires, etc. • In the event of emergency operations (as defined in Section 5.10 of the MCSR), call 911. The Warden Dispatch can also be contacted (available 24 hours/day) at (403) 762-4506 or the Wardens Office at (403) 762-1470 to notify of any emergency procedures required. • Ensure all activities are conducted at least 30 m from waterbodies.
	Dust production	<ul style="list-style-type: none"> • Have a water source available to wet down exposed soil and dry areas.
	Wind and water erosion	<ul style="list-style-type: none"> • Prepare a satisfactory Sediment and Erosion Control Plan covering all construction and restoration periods. • Acquire necessary sediment control equipment (i.e., straw bales, landscaping fabric, sediment fences, etc.) and install prior to construction. • Extra planning should be used for areas with silty deposits (VL3 and VL4) and sloped areas with sandy deposits (see Figure 5.1).
	Compaction of soils	<ul style="list-style-type: none"> • Identify soils susceptible to compaction (fine textured and organic soils) • Wherever possible, use equipment of low bearing weight, low PSI tires, or tracked vehicles, especially in sensitive sites.
	Slope failure	<ul style="list-style-type: none"> • Assess slope stability (based on slope length, soil texture, steepness, soil depth) and adjust activities to avoid these areas if possible. Use appropriate setbacks. • Pay particular attention when planning for slopes of Class 6 (15-30%) or greater, especially where soils are shallow and likely to move with disturbance.
	Habitat loss and fragmentation or encroachment on wildlife movement corridor	<ul style="list-style-type: none"> • Identify wildlife habitat that may be impacted by activities and avoid sensitive areas. • Identify and avoid wetlands. • Ensure only necessary vegetation is removed and delineate areas to be avoided with biodegradable flagging tape and/or temporary fences.

Attachment 1 Sub-Class 2: Service Lines - Mitigation for Reducing Impacts of Service Line Projects - *Continued*

Activity	Potential Impacts	Mitigation Measures
General activities (continued)	Sensory disturbance and mortality of wildlife	<p>When working adjacent to natural areas:</p> <ul style="list-style-type: none"> • According to the wildlife that may be present, schedule high noise level activities and other intrusive construction activities to avoid critical life stages (breeding, nesting, rearing, migration). Consult with Parks Canada (403-762-1416) to discuss any localized wildlife concerns. • Confine “noise” activities to hours set out in Town of Banff Noise Bylaw. • Consider posting wildlife signs to reduce vehicle speeds and increase driver awareness near construction areas where wildlife mortality has or is likely to occur. • Educate workers to not harass or attract wildlife, keep the site free of food scraps, and dispose of garbage in bear proof containers.
	Disturbance of archaeological resources	<ul style="list-style-type: none"> • Determine whether there are archaeological sites in the area (see Figure 5.1). • Consult with Parks Canada (403-762-1416) if sites are identified. • If potential archaeological sites may be subject to ground disturbance, adapt activities to avoid them. • Educate workers to stop work immediately and to notify site supervisor upon finding any archaeological artefacts.
	Public safety	<ul style="list-style-type: none"> • Outline traffic control measures and assess the need for flagging personnel. • Call utility line companies to identify infrastructure locations (Alberta OneCall: 1-800-242-3447).
	Reduced aesthetics (visual and noise)	<ul style="list-style-type: none"> • Evaluate the site layout, access routes and construction activities to minimize their visual impact. • Plan work schedule to confine “noise” activities to hours set out in Town of Banff Noise Bylaw and, if possible, to periods of low visitation.
Underground Services		
Site Preparation		
Clearing of vegetation	Dust production	<ul style="list-style-type: none"> • Wet down dry, exposed soils, particularly during windy periods. • Ensure materials being stored or transported are covered with tarps or equivalent material.

Attachment 1 Sub-Class 2: Service Lines - Mitigation for Reducing Impacts of Service Line Projects - *Continued*

Activity	Potential Impacts	Mitigation Measures
Clearing of vegetation (continued)	Runoff / sedimentation	<p>In all ecosites and on areas with a slope class of 5 (5-15%) or greater:</p> <ul style="list-style-type: none"> • Minimize vegetation cover removal. • Assess slopes stability (based on slope length, soil texture, steepness, soil depth). • Use appropriate geo-technical control measures to stabilize slopes. • To ensure that site runoff is minimized, control overland flow up gradient and down gradient of exposed areas by use of diversion ditches, bales, vegetative filter strips, and/or sediment traps. • When possible, hand clear slopes > 35%. Wait to clear steep sloped areas until immediately before scheduled construction and reclaim immediately afterwards. • Periodically inspect erosion control structures for effectiveness.
	Wind and water erosion	<p>Particularly in areas with silty deposits (VL3 and VL4) and sloped areas with sandy deposits (see Figure 5.1):</p> <ul style="list-style-type: none"> • Clear minimum area necessary in ROW. Where possible, leave stumps and roots in place. • Protect exposed soils with granular materials, mulches, or straw. • Cover stockpiles of soil with polyethylene sheeting, tarps, or vegetative cover. • Minimize grubbing.
	Damage to adjacent vegetation	<p>To protect undeveloped areas adjacent to development site:</p> <ul style="list-style-type: none"> • A development permit from the Town of Banff Planning and Development Division (403-762-1215) is required before removing any trees. • Minimize area cleared. Clearly mark area to be cleared with biodegradable flagging tape and or temporary fences. • Ensure vertical (Rocky Mountain) juniper, Douglas fir and limber pine are protected. • Ensure excavated material does not damage or bury plant material that is to be retained on the site or in adjacent areas. • Hoarding around trees to be retained must be installed beyond the tree's drip line prior to commencement of site work. • Trees are to be cut so that they fall inside the cleared perimeters. • Care must be taken during grubbing and stripping to ensure that trees and roots on the edge of the cleared area are not disturbed. • Grubbing and stripping may not be permitted on steep slopes.
	Habitat fragmentation and wildlife corridor encroachment, loss of wilderness quality	<p>When working adjacent to all undeveloped areas and areas bordering natural habitat, especially wildlife movement corridors and natural wetlands:</p> <ul style="list-style-type: none"> • Clear only the minimum area required for construction activities. • Retain vegetation barriers where possible, especially trees and shrubbery.

Attachment 1 Sub-Class 2: Service Lines - Mitigation for Reducing Impacts of Service Line Projects - *Continued*

Activity	Potential Impacts	Mitigation Measures
Thawing	Decrease in ambient air quality due to emissions	<ul style="list-style-type: none"> • Only use ground thawing measures in emergency situations. • Minimize use of propane for thawing by scheduling activities for spring/summer/fall.
Grading and excavation	Dust production / aesthetics	<ul style="list-style-type: none"> • Wet down dry, exposed soils, particularly during windy periods. • Ensure fine materials being stored or transported are covered with tarps or equivalent material. • Minimize grading and excavation on windy days to limit dust production.
	Runoff/ sedimentation	<ul style="list-style-type: none"> • Halt construction activity on exposed soil during events of high rainfall intensity and runoff. • Assess slopes stability (based on slope length, soil texture, steepness, soil depth). • Use appropriate geo-technical control measures to stabilize slopes. • Cover stockpiles of soil with polyethylene sheeting, tarps, or vegetative cover. <p>Sites close to waterbodies, but not closer than 30 m:</p> <ul style="list-style-type: none"> • To ensure that site runoff is minimized, control overland flow up gradient and down gradient of excavated areas by use of effective diversion ditches, bales, vegetation filter strips, or sediment traps.
	Wind and water erosion	<p>Particularly in areas with silty deposits (VL3 and VL4) and sloped areas with sandy deposits (see Figure 5.1):</p> <ul style="list-style-type: none"> • Protect exposed soils with coarse granular materials, mulches, or straw. • Cover stockpiles of soil with polyethylene sheeting, tarps, or vegetative cover.
	Loss of top soil and/or top soil/subsoil mixing	<ul style="list-style-type: none"> • Use separate lifts and storage of topsoil and subsoil horizons, replacing them in the same order after completion of activity, wherever practical. • Topsoil will be stored away from any slopes, subsoils, spoil material, construction activities and day-to-day operations.
	Slope failure	<ul style="list-style-type: none"> • Avoid work on steep slopes, especially areas with slope Class 6 (15-30%) or greater. • Assess slopes stability (based on slope length, soil texture, steepness, soil depth). • Use appropriate geo-technical control measures to stabilize slopes. • Topsoil will be stored away from any slopes, subsoils, spoil material, construction activities and day-to-day operations.
	Non-point source hydrocarbon contamination	<ul style="list-style-type: none"> • When constructing and upgrading of storm sewers, install oil sumps.

Attachment 1 Sub-Class 2: Service Lines - Mitigation for Reducing Impacts of Service Line Projects - *Continued*

Activity	Potential Impacts	Mitigation Measures
Dewatering	Runoff / sedimentation	<ul style="list-style-type: none"> • Dewatering is not permitted into any waterbody, including the Bow River and Whiskey Creek. • Dewatering is permitted on previously disturbed vegetation or natural vegetation if the following conditions are met: <ol style="list-style-type: none"> 1. sediment controls are used (i.e., silt fences, silt bags, etc.). 2. water velocity is controlled to dissipate energy, prevent soil erosion and allow for infiltration. 3. dewatering structures are continuously monitored to ensure no damage is being done to soil or vegetation. • As an interim measure, the Town may allow silty water to be pumped into the sanitary system. A permit is required (403-762-1200). • Parks Canada does not allow dewatering into storm sewers unless it can be demonstrated (with aid of a laboratory) that the proponent has the methods and equipment to limit sediment entering the receiving waterbody. • Sediment from the traps may be used as fill on the construction site.
	Damage to adjacent vegetation	<ul style="list-style-type: none"> • For undeveloped areas adjacent to development site, ensure water and sediment is directed away from natural areas.
	Sensory disturbance and mortality of wildlife	<p>When working adjacent to natural areas:</p> <ul style="list-style-type: none"> • According to the wildlife that may be present, schedule high noise level activities and other intrusive construction activities to avoid critical life stages (breeding, nesting, rearing, migration). Consult with Parks Canada (403-762-1416) to discuss any localized wildlife concerns. • Confine “noise” activities to hours set out in Town of Banff Noise Bylaw. • Consider posting wildlife signs to reduce vehicle speeds and increase driver awareness near construction areas where wildlife mortality has or is likely to occur. • Educate workers to not harass or attract wildlife.
<i>Installation, Maintenance and Repair</i>		
Trenching, backfilling, compacting, grading	Dust production / aesthetics	<ul style="list-style-type: none"> • Minimize the amount of open trench at any given time. • Cover stockpiles of soil with polyethylene sheeting, tarps, or vegetative cover. • Wet down dry, exposed soils, particularly during windy periods. • Minimize trenching, backfilling and compacting on windy days.

Attachment 1 Sub-Class 2: Service Lines - Mitigation for Reducing Impacts of Service Line Projects - *Continued*

Activity	Potential Impacts	Mitigation Measures
Trenching, backfilling, compacting, grading (continued)	Runoff / sedimentation	<ul style="list-style-type: none"> • Assess slopes stability (based on slope length, soil texture, steepness, soil depth). • Use appropriate geo-technical control measures to stabilize slopes. • All excavations will remain free of water (see mitigations for “Dewatering”). <p>Sites close to waterbodies, but not closer than 30 m:</p> <ul style="list-style-type: none"> • To ensure that site runoff is minimized, control overland flow up gradient and down gradient of excavated areas by use of effective diversion ditches, bales, vegetation filter strips, or sediment traps. • Stockpiles related to excavations will be stored a minimum of 2 m from embankments, slumps, water bodies and containment sources to prevent material loss or degradation. • Following excavations, lightly tamp disturbed areas to minimize slumping and potential pooling or water.
	Non-point source hydrocarbon contamination	<ul style="list-style-type: none"> • When constructing and upgrading of storm sewers, install oil sumps.
	Erosion (wind and water)	<ul style="list-style-type: none"> • Install trench breakers of impervious material to direct groundwater seepage to the surface. • Minimize the length of exposed trench and the time of excavated soil exposure. • Use interceptor ditches or berms (bales) upgradient of construction to divert overland flow around exposed soil surfaces. • Line steep ditches with filter fabric, rock or polyethylene lining to prevent channel erosion.
	Trench collapse	<ul style="list-style-type: none"> • Delay trenching until just prior to lowering-in pipeline.
	Compaction	<ul style="list-style-type: none"> • Compact soil to approximate preconstruction conditions while allowing for settling.
	Habitat loss, fragmentation, wildlife mortality	<ul style="list-style-type: none"> • Minimize the length of open trench, and the time a trench is open to reduce its affect as a barrier or trap for terrestrial wildlife. • Fence trench if it is to be left unattended over night.
Right-of-way maintenance (outside town boundary)	Dust production / aesthetics	<ul style="list-style-type: none"> • Wet down dry, exposed soils, particularly during windy periods. • Ensure materials being stored or transported are covered with tarps or equivalent material. • Minimize trenching, backfilling and compacting on windy days.
	Loss of wilderness quality	<ul style="list-style-type: none"> • Retain vegetation barriers where possible, especially trees and shrubbery. • Minimize the amount of vegetation removed.

Attachment 1 Sub-Class 2: Service Lines - Mitigation for Reducing Impacts of Service Line Projects – *Continued*

Activity	Potential Impacts	Mitigation Measures
Right-of-way maintenance (outside town boundary) (continued)	Contamination from fertilizers and herbicides	<ul style="list-style-type: none"> Accurately assess the need for chemicals during right-of-way maintenance. Use products and methods identified in Parks Canada Management Directive 2.4.1 (1985). Avoid herbicide/fertilizer use in proximity to, or where runoff may reach waterbodies.
Cleaning storm sceptors (stormwater sewers)	Sedimentation/contamination of water	<ul style="list-style-type: none"> Ensure stormwater storm sceptors are cleaned regularly. Dispose of sediment and trapped oils and debris at appropriate facilities.
<i>Decommissioning and Abandonment</i>		
Disconnection and removal of pipes/cables	Runoff / sedimentation	<ul style="list-style-type: none"> Stockpiles related to excavations will be stored a minimum of 2 m from embankments, slumps, water bodies and containment sources to prevent material loss or degradation. Following excavations, lightly tamp disturbed areas to minimize slumping and potential pooling or water.
	Wind and water erosion	<ul style="list-style-type: none"> Begin revegetation immediately. Protect exposed soils with coarse granular materials, mulches, or straw.
	Compaction	<ul style="list-style-type: none"> Select appropriate equipment, especially in erosion/slump prone areas (see Figure 5.1). If possible, use wide tracked equipment, rubber tired vehicles and low bearing pressure weight equipment in sensitive areas.
Aboveground Services		
<i>Maintenance and Repair</i>		
Removal of poles and lines	Compaction	<ul style="list-style-type: none"> Compact soil to approximate precondition conditions while allowing for settling. Select appropriate equipment, especially in erosion/slump prone areas (see Figure 5.1). If possible, use wide tracked equipment, rubber tired vehicles and low bearing pressure weight equipment in sensitive areas.
Digging holes for replacement poles	Slope failure	<ul style="list-style-type: none"> Assess slopes stability (based on slope length, soil texture, steepness, soil depth). Use appropriate geo-technical control measures to stabilize slopes.
	Loss of or damage to vegetation, weed invasion	<ul style="list-style-type: none"> Protect undisturbed land by only stockpiling materials on heavy canvas or polypropylene tarpaulins to protect native vegetation. Excavated material should not be permitted to damage or bury plant material that is to be retained on the RoW or in adjacent areas.

Attachment 1 Sub-Class 2: Service Lines - Mitigation for Reducing Impacts of Service Line Projects - *Continued*

Activity	Potential Impacts	Mitigation Measures
Planting poles and stringing	Heavy equipment and excavation activities may result in soil compaction, loss of organic matter, erosion and loss of topsoil	<ul style="list-style-type: none"> • Soil that has been temporarily shoved away from poles and temporarily placed on tarps will be shovelled back against the pole and lightly tamped to prevent slumping or pooling of water.
	Reduced aesthetics (noise)	<ul style="list-style-type: none"> • Confine “noise” activities to normal working hours or hours of Town of Banff Noise Bylaw.
Right-of-way maintenance	Dust production / aesthetics	<ul style="list-style-type: none"> • Wet down dry, exposed soils, particularly during windy periods. • Ensure fine materials being stored or transported are covered with tarps or equivalent material.
	Contamination from fertilizers and herbicides	<ul style="list-style-type: none"> • Accurately assess the need for chemicals during right-of-way maintenance. Use products and methods identified in Parks Canada Management Directive 2.4.1 (1985). • Avoid herbicide/fertilizer use in proximity to, or where runoff may reach waterbodies.
	Loss of wilderness quality	<ul style="list-style-type: none"> • Retain vegetation barriers where possible, especially trees and shrubbery. • Minimize the amount of vegetation removal.
<i>Decommissioning and Abandonment</i>		
Removal wires and poles, refilling holes	Heavy equipment and excavation activities may result in soil compaction, loss of organic matter, erosion and loss of topsoil.	<ul style="list-style-type: none"> • Soil that has been temporarily shoved away from poles and temporarily placed on tarps will be shovelled back against the pole and lightly tamped to prevent slumping or pooling of water.
	Weed invasion	<ul style="list-style-type: none"> • See mitigations for “Revegetation”.
	Sensory disturbance	<p>When working adjacent to natural areas:</p> <ul style="list-style-type: none"> • According to the wildlife that may be present, schedule high noise level activities and other intrusive construction activities to avoid critical life stages (breeding, nesting, rearing, migration). Consult with Parks Canada (403-762-1416) to discuss any localized wildlife concerns. • Educate workers to not harass wildlife. • Trade waste will be disposed of at Bow Valley Waste Management Commission’s Class III landfill.

Attachment 1 Sub-Class 2: Service Lines - Mitigation for Reducing Impacts of Service Line Projects - *Continued*

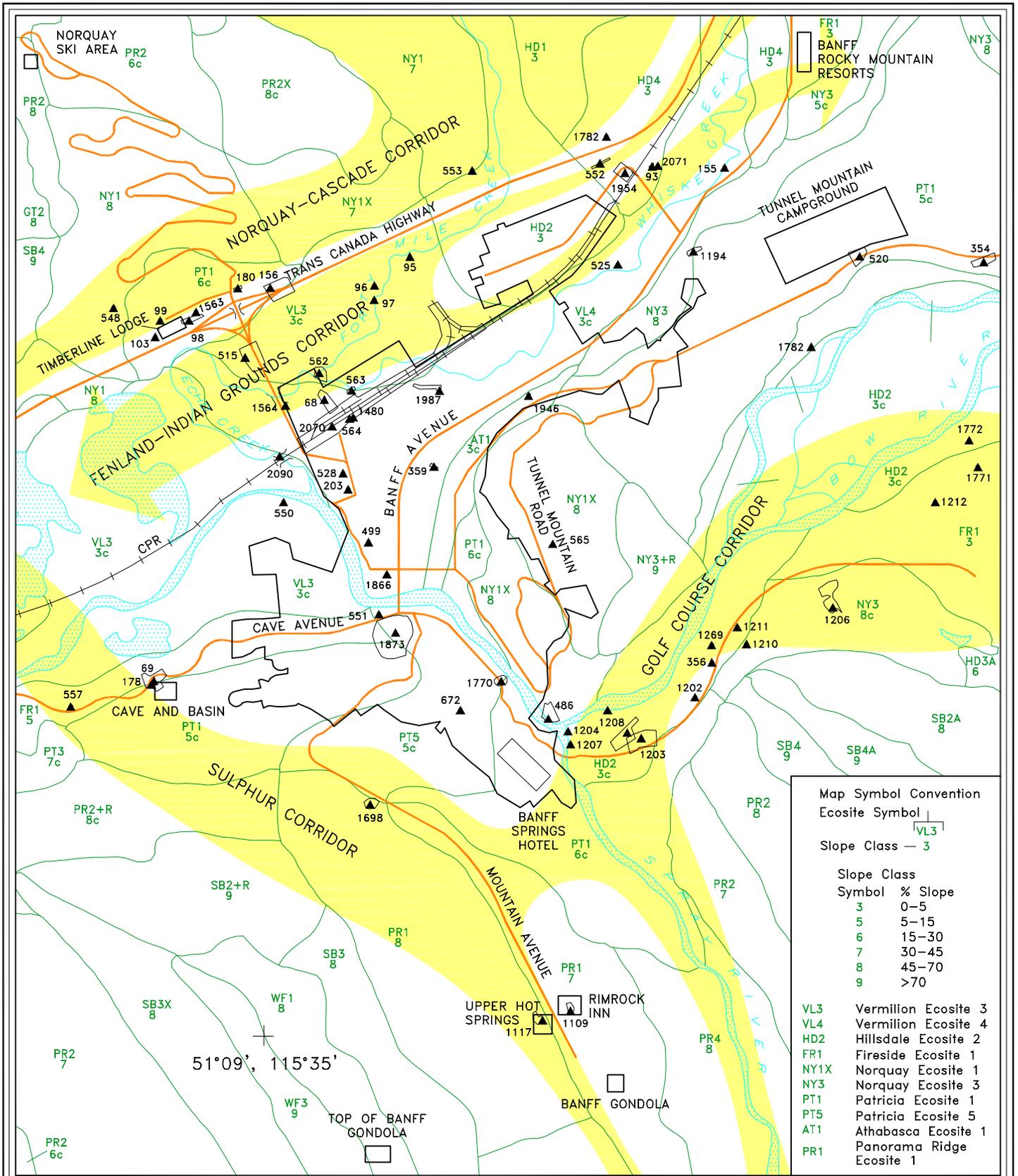
Reclamation and Restoration		
Revegetation	Runoff/ sedimentation, wind and water erosion	<ul style="list-style-type: none"> Initiate replanting of disturbed areas immediately after construction is completed. Protect exposed soils with coarse granular materials, mulches, or straw.
	Contamination from fertilizers and herbicides	<ul style="list-style-type: none"> Accurately assess the need for chemicals during right-of-way maintenance. Use products and methods identified in Parks Canada Management Directive 2.4.1 (1985). Do not use fertilizers and herbicides in areas where residue or runoff may enter a waterbody or drainage pathway. Do not over water.
	Compaction	<ul style="list-style-type: none"> Cultivate affected areas before reclaiming, especially areas with fine textured or organic soils.
	Weed invasion	<ul style="list-style-type: none"> Ensure topsoil is clean and weed free. If clean fill is unavailable, check on weeds or treat as needed for 3 years following landscaping and revegetation. All construction equipment from outside Banff National Park will be steam cleaned prior to arrival to minimize the risk of introducing weeds. Revegetate exposed areas at first opportunity.
	Habitat loss, fragmentation and wildlife corridor encroachment.	<ul style="list-style-type: none"> Revegetate exposed areas at first opportunity.
	Attraction of wildlife to palatable, non- native species	<ul style="list-style-type: none"> Seed with Parks Canada-approved seed mix (see Appendix C) and native plants that are non-palatable to wildlife.
Underground and Aboveground Services		
General Activities		
Materials handling/storage	Dust production	<ul style="list-style-type: none"> Wet down dry soil or cover with tarp. Ensure materials being stored or transported are covered with tarps or equivalent material.
	Runoff/ sedimentation	<ul style="list-style-type: none"> Cover stockpiles with polyethylene sheeting, tarps, or vegetative cover.
	Damage to adjacent vegetation	<ul style="list-style-type: none"> Excavated material will not be permitted to damage or bury plant material that is to be retained on the site or in adjacent areas. Protect undisturbed land by only stockpiling materials on heavy canvas or polypropylene tarpaulins to protect native vegetation. Excavated material should not be permitted to damage or bury plant material that is to be retained on the construction site or in adjacent areas.

Attachment 1 Sub-Class 2: Service Lines - Mitigation for Reducing Impacts of Service Line Projects - *Continued*

Activity	Potential Impacts	Mitigation Measures
Equipment operation and maintenance	Decrease in ambient air quality due to emissions	<ul style="list-style-type: none"> • Ensure all equipment is properly tuned, free of leaks, in good operating order, and fitted with standard air emission control devices. • Minimize idling of engines at all times.
	Dust production	<ul style="list-style-type: none"> • Wet down dry and dusty roads. • Do not use oil-based dust suppressants. • Reduce speeds. • Ensure materials being stored or transported are covered with tarps or equivalent material.
	Contamination of soil and water from accidental spill	<ul style="list-style-type: none"> • In the event of emergency operations (as defined in Section 5.10 of the MCSR), call 911. The Warden Dispatch can also be contacted (available 24 hours/day) at (403) 762-4506 or the Wardens Office at (403) 762-1470 to notify of any emergency procedures required. • Avoid work in high risk areas, particularly in areas of high water table, steeply sloped sites or in close proximity to streams. • Have spill containment equipment on-hand and ensure that all personnel are trained in their use. • Ensure all construction equipment is free of leaks from oil, fuel or hydraulic fuels. • The crossing of any waterbody (including wetlands) by construction equipment, or the use of such equipment within waterbodies is strictly prohibited unless prior approval has been confirmed. • Designate refuelling areas at least 100 m away from any water body. Refuelling sites will be bermed with an impermeable liner to contain 125% of the anticipated fuel quantity. Any contaminated rainwater will be moved out of the park. • Refuelling activities should not be conducted where runoff could carry contaminants into drainage pathways (including storm sewers). • Dispose of contaminated materials at provincially certified disposal sites outside of the Park. No treatment of contaminated soils (e.g., bioremediation) is allowed in the Park. All applicable documentation demonstrating proper disposal should be obtained.

Attachment 1 Sub-Class 2: Service Lines - Mitigation for Reducing Impacts of Service Line Projects - *Continued*

Activity	Potential Impacts	Mitigation Measures
Equipment operation and maintenance (continued)	Compaction of soils	<ul style="list-style-type: none"> • Restrict vehicular travel and other equipment operation to the construction site and approved access routes. • Vehicle parking will be restricted to specialized areas on the construction site. • Minimize or halt construction traffic during wet conditions when the soil shows signs of ponding or rutting. • In sensitive areas, if possible, use equipment that minimizes surface disturbance including low ground pressure tracks/tires, blade shoes and brush rake attachments.
	Damage to adjacent vegetation	<p>Undeveloped areas adjacent to development site:</p> <ul style="list-style-type: none"> • Careful machine operation is required to ensure that damage to surrounding vegetation does not occur. • Excavated material must not be permitted to bury plant material that is to be retained. Snow fences may be used to prevent excavated material escaping into the surrounding forest.
	Weed invasion	<ul style="list-style-type: none"> • All construction equipment from outside Banff National Park will be steam cleaned prior to arrival to minimize the risk of introducing weeds. • Construction equipment from outside the Park will not be washed while in the Park.
	Sensory disturbance to wildlife	<p>All undeveloped areas and areas bordering natural habitat, especially wildlife movement corridors and natural wetlands:</p> <ul style="list-style-type: none"> • Use existing roadways, pathways and previously disturbed areas for site access and travel within the site. • Educate workers not to enter wildlife corridors. • Confine “noise” activities to hours set out in Town of Banff Noise Bylaw.
	Increased traffic levels	<ul style="list-style-type: none"> • Time construction activities to minimize vehicle conflicts on access roads and/or use flagging personnel.
Waste management (general)	Contamination of soil and water from accidental spill or improper disposal	<ul style="list-style-type: none"> • No rock, silt, cement, grout, asphalt, petroleum product, lumber, vegetation, domestic waste, or any deleterious substance shall be placed or allowed to disperse into any stream, river, pond, storm or sanitary sewer, or other water course.
	Aesthetics (visual and smell)	<ul style="list-style-type: none"> • Collect all waste, store appropriately and dispose trade waste at Bow Valley Waste Management Commission’s Class III landfill, and household garbage at the Waste Transfer Station. • All garbage and food must be stored in bear-proof bins as per the Banff Waste Bylaw. • Construction sites must undergo thorough clean-up, including removal of general litter, survey stakes and flagging tape at project completion.



Map Symbol Convention

Ecosite Symbol 

Slope Class — 3

Slope Class	
Symbol	% Slope
3	0-5
5	5-15
6	15-30
7	30-45
8	45-70
9	>70

VL3	Vermilion Ecosite 3
VL4	Vermilion Ecosite 4
HD2	Hillsdale Ecosite 2
FR1	Fireside Ecosite 1
NY1X	Norquay Ecosite 1
NY3	Norquay Ecosite 3
PT1	Patricia Ecosite 1
PT5	Patricia Ecosite 5
AT1	Athabasca Ecosite 1
PR1	Panorama Ridge Ecosite 1

LEGEND

-  Local Study Area (Town of Banff and Outlying Areas)
-  Road
-  Railroad
-  Available Wildlife Corridors
-  Ecosites
-  Archaeological Site and Sensitive Area

Attachment 2
Ecological Information within the Class Screening Area (Sub-Class 2)

SOURCE: POPE (2001)

Scale 1:30,000
 Metres





Attachment 3

Potentially Sensitive Sites in the Class Screening Area

The following represents sites that are potentially sensitive to disturbance. Considerations of these sensitivities should be included in future development plans.

1. General Wetlands and Riparian Habitats

Whiskey Creek and associated springs. Middle Springs Creek and associated springs, Bow River, Forty Mile Creek, Forty Mile/Echo/Whiskey Creek/CPR 'Y' Wetlands, Discharge zones along the toe of Sulphur Mountain, Stables Wetlands (Recreation grounds to Cave and Basin).

2. Sand Dune and Beach Ridges

Fenland, Recreation Centre lands, lands including the train station and extending into residential areas SE of the station into downtown blocks past Rundle Church. Rocky Mountain Resort/new corrals/Brewster Doughnut Area.

3. Stream Levees

Bow River, Forty Mile/Echo Creek

4. Fish Spawning Sites

Forty Mile Creek, Bow River, Whiskey Creek, CPR 'Y'

5. Waterfowl Habitat

Whiskey Creek behind Cougar Street, Bow River, Forty Mile/Echo/Whiskey Creek/CPR 'Y' Wetlands, Stable Wetlands.

6. Beaver Habitat

Potential beaver habitat should be identified and projects designed to minimize the disruption of habitat. Potential sites include the CPR 'Y' and associated lands, Whiskey Creek, Fenlands, Bow River Levees, Horse Bams/Cave and Basin Wetlands.

7. Avifauna

Some parts of the class screening area are used by breeding and migrating birds. The most significant bird habitat is the shrub/wetland area on the Bow River flood plain adjacent to the Recreation Area (Edwards 1988). Other sites should also be reviewed.

8. Vegetation

Disturbance of the following species should be avoided whenever possible:

- Limber Pine: Tunnel Mountain, Hoodoos.
- Douglas Maple: North slope of Tunnel Mountain.
- Douglas Fir: most dry forested sites.

- Aspen: various locations.
- Balsam Poplar: various locations, especially in the vicinity of stable wetlands.

9. Viewpoints/Viewscapes

Surprise Corner, Bow River views, views from the Banff Springs Hotel, Mt. Norquay and Tunnel Mountain Drive.

10. Incidentals

- Fossils: sites should be surveyed for the presence of fossils; known and potential sites include Norquay Road, Bow Falls outcrops. Tunnel Mountain trail, Mt. Rundle talus rocks near the climbing practice rock and the landscaping rock in the recreation grounds play areas. Any exposure/application of "Rundle Rock" should be examined for fossils.
- Glacial Deposits: evidence of glacial and periglacial activity should be preserved as interpretive features. Features include: flutings along upper Tunnel Mountain Trail; till and outwash exposure at Grizzly Street; and outwash gravels at Compound Road turnoff from Banff Avenue.
- Bedrock Exposures offer an opportunity to interpret the geologic history of Banff National Park. Potential sites include: Bow Falls areas. Tunnel Mountain, Drive rock cuts; Buffalo Street; Norquay Road; and. Vermilion Lakes Drive older stone fences.
- Historical features sites should be reviewed for potential historical/archaeological features.