Trail Management Plan

Demonstration Trail
Parson's Pond to Daniel's Harbour

Trailhead Development Company Inc.

Rev. No	Revision	Date (D-M-Y)	Approved By
0	Initial Trail Management Plan	8 Oct 2025	
1	Minor updates after TDCI review	22 Oct 2025	Colin Jones
2	Document Finalization for Submission	22 Dec 2025	Colin Jones
3			
4			

December 2025

Environmental Preview Report – Appendix D

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Acronyms and Abbreviations

ATV	all-terrain vehicles
DFO	Department of Fisheries and Oceans Canada
DECCC	Department of Environment, Conservation and Climate Change (Provincial)
EPR	Environmental Preview Report
IMBA	International Mountain Biking Association
km	kilometres
m	metres
STA	Shuswap Trail Alliance
TAOC	Trails for All Ontarians Collaborative
TCT	Trans-Canada Trail
TDCI	Trailhead Development Company Incorporated
TMP	Trail Management Plan
UAS	Unmanned Aerial System

1 Introduction

Following review of the Great Coastal Trail – Parson's Pond to Daniel's Harbour Demonstration Trail Project (herein referred to as the "Project") Registration Document (available here), the Government of Newfoundland and Labrador (GNL) Department of Environment, Conservation and Climate Change (DECCC) required the preparation of an Environmental Preview Report (EPR). The Guidelines issued for the EPR require submission of a Trail Management Plan (TMP) by the proponent (i.e., the Trailhead Development Company Inc., TDCI).

This TMP describes the actions undertaken to protect and upkeep the proposed trail during its lifetime. These actions include trail monitoring and maintenance during construction and operation, proper signage (e.g., orientation and rules), and enforcement of proper trail use (e.g., prohibition and prevention of motorized vehicle access). Trail maintenance will follow the International Mountain Bike Association (IMBA) trail development guidelines (Carsten 2023) with elements from other guidelines as needed (e.g., TAOC 2006; STA 2008).

General activities outlined in this TMP include:

- Trail tread maintenance (e.g. grading, pothole repairs);
- Trail corridor maintenance;
- Vegetation removal (e.g. maintenance pruning);
- Erosion control;
- Structure maintenance and inspections;
- Trail decommissioning and rehabilitation (e.g., removing signage and boardwalks);
- Infrastructure routine repair and replacement (e.g., trail signs, boardwalks); and
- Waste management related to construction.

2 Project Description

The purpose of this Project is to build a new walking/cycling trail from Parson's Pond to Daniel's Harbour. The trail will traverse 26.6 km in the margin between the coastline and Route 430. The trail will be divided into 10 segments, with several access points from Route 430 (Figure 2.1). It will be designed to accommodate both bicycles and pedestrians, but unauthorized motorized vehicles (e.g., all-terrain vehicles or ATVs) will not be permitted on the trail.

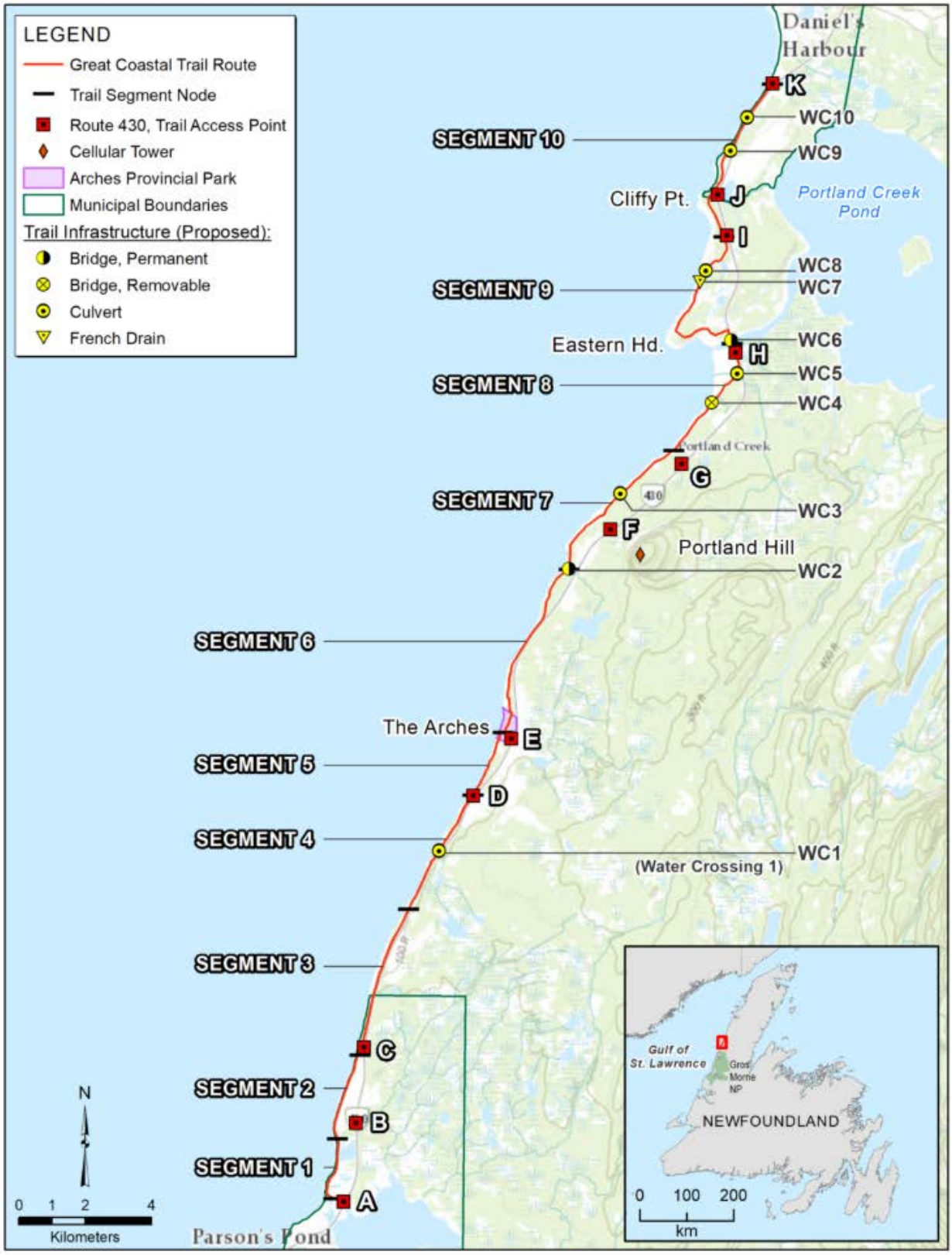


Figure 2.1. Proposed Great Coastal trail route located along the coastline between the communities of Parson's Pond and Daniel's Harbour, NL.

2.1 Schedule of Activities

Construction of the trail will occur following regulatory approval, with an anticipated start in Spring 2026 and taking approximately ~1.5 years to complete. Following completion of the trail, inspections will occur at regular intervals. Infrastructure inspections will occur monthly each operating season (May to October) and following significant storm events. This includes inspecting trail tread, drainage features, bridges, boardwalks, and culverts. A full trail inspection will be completed at the start and end of each operating season. Deficiencies will be recorded in the maintenance log and reported to the TDCI. The TDCI will organize and deploy maintenance crews to the trail sections as required.

2.2 Trail Usage

The Project is designed to be a multiuse trail for pedestrians and cyclists. Motorized vehicles such as ATVs will be prohibited from use on the trail. Infrastructure and communication procedures to prevent unauthorized motor vehicle access to the trail will be developed in consultation with sustainable trail building standards (IMBA) and contractors as appropriate.

2.3 Roles and Responsibilities

During construction, contractors are responsible for site safety. The TDCI Safety Officer will ensure signage, maps, and emergency protocols are in place and up to date. This includes any communications with the quarry operators. Local emergency responders will be provided with updated access maps and a signage code key annually. Maintenance crews will be responsible for site safety and posting temporary signage alerting trail users to any closures.

Seasonal trail crew staff (employees and contracted crews) will perform routine inspections, minor repairs, and waste collection. Specialized contractors (e.g., bridge maintenance crews or equipment operators) will be engaged for larger repairs or replacements.

2.4 Communications

Prior to any construction or maintenance activities, the TDCI Safety Officer will communicate with regulators and stakeholders that may operate within the localized proposed area. These communications will also include informing local first responders to all trail access and egress points and their unique identities for timely response. Accidental damage to personal property will be addressed in consultation with the landowner. Unsafe sections of the trail will be closed with signage installed until repairs are completed.

A small quarry is present at Segment 9 of the trail and blasting activities occur infrequently. The TDCI Safety Officer will communicate with the local quarry operators to determine if any blasting is scheduled that will overlap with trail construction or maintenance. Communications with the local quarry operators, maintenance crews, and trail users will follow the steps outlined in Section 6.2.6 of the EPR (LGL 2025). In brief, the following steps will be adhered to:

- The TDCI Safety Officer will maintain regular communications with the local quarry operators and stay informed on planned activities that may impact the use of the trail (e.g., blasting); and
- Prior to blasting operations, public notice is provided via radio stations servicing a given area. Should the blasting company inform the Great Coastal Trail Authority (GCTA) and/or their partner organizations (e.g., TDCI) in advance of planned basting operations, the GCTA may also provide notice via a planned trail digital app.
- Trail segments impacted by quarry activities will be closed to users with warning signs posted during the duration of the quarry activities.

The TDCI Safety Officer will also be in regular correspondence with the construction and maintenance crews and address any concerns.

2.5 Monitoring and Review

Annual review of contingency measures will occur with emergency services and local stakeholders. User feedback collected via QR codes or posted contact information on trailhead signage will be reviewed annually. Signage, response procedures, and maintenance schedules will be updated as site conditions evolve.

2.6 Contingency Planning

Construction and maintenance crews will follow the procedures outlined in the Contingency Plan (see Section 4.5 in the EPR [LGL 2025]). In brief, this includes personnel being trained and equipped with first aid kits, spill kits, and having access to emergency communications. Trail heads and access points will serve as emergency access and egress points. Each access and egress point will be geo-referenced and marked with a unique code (this information will be included on trail signage installed during construction). Crews will have the authority to shut down or reroute the trail as required.

3 Trail Monitoring and Maintenance Program

To ensure proper techniques are used to construct the trail, the TDCI will engage with firms qualified to construct trails in NL. Infrastructure that will require maintenance during the operation of the trail includes the trail tread, trailway clearance, trail clearing width, water crossing infrastructure, and signage. Equipment used during maintenance will be fit for purpose and in working order. Prior to any maintenance, crews will post alerts at trailheads near the work site and clearly mark the trail adjacent to the worksite.

Maintenance crews will observe the following:

- Maintenance teams will conduct inspections along the trail at the start of the operational season in May and perform necessary maintenance then and throughout the trail use period;
- Prior to any maintenance activities, crews will review mitigation measures to protect the environment and wildlife (see Appendices B [Mitigation Plan] and C [Environmental Protection Plan] in the EPR [LGL 2025]);
- Maintenance crews will be trained in first aid, spill response, and emergency procedures;
- Equipment operators must be trained and experienced with the equipment;
- All equipment will be inspected to ensure proper working order and fit for purpose;
- No fueling will occur within 100 m of any waterbodies;
- A spill kit will be available to each construction and maintenance crew working with mechanized equipment;
- Construction material will be covered with a secured tarp when appropriate;
- Existing roadways, paths, or trails will be used to minimize damage;
- Workers are expected to not leave the maintenance site or equipment unattended; and
- To minimize the disturbance footprint, site access will be limited to essential vehicles only.

3.1 Trail Infrastructure

3.1.1 Trail Tread and Corridor

The trail tread is defined as the area of passage for trail users. This area will receive the most wear during the lifespan of the trail. Along most of the proposed trail the tread is dual way, with a width of approximately 2.4-3.0 m. Maintenance activities include clearing vegetation and maintaining the integrity of the tread (e.g., fix potholes or

other infrastructure). The trail corridor is defined as the area including the trail tread, clearance on either side of the trail, user sightlines, and an overhead vertical clearance. The corridor width is 3.0-4.0 m with a vertical clearance of 3.0 m.

Tread maintenance activities (see Figure 3.1) will include:

- Re-shaping tread;
- Building up tread;
- Grading and drainage;
- Vegetation management (e.g., clearing, trimming, re-vegetation);
- Pothole filling;
- Soil fill (e.g., exposed roots and rocks); and
- Trail rerouting (as necessary).

Substrate and materials required for re-shaping the tread, building up the tread, filling potholes, covering tripping hazards, and erosion control will be sourced from approved sources. Material will be staged at trailheads and access points along the trail and brought into the area using low ground pressure equipment including tracked power barrows, mini excavators, and all-terrain vehicles/side-by-sides equipped with trailers or cargo beds.

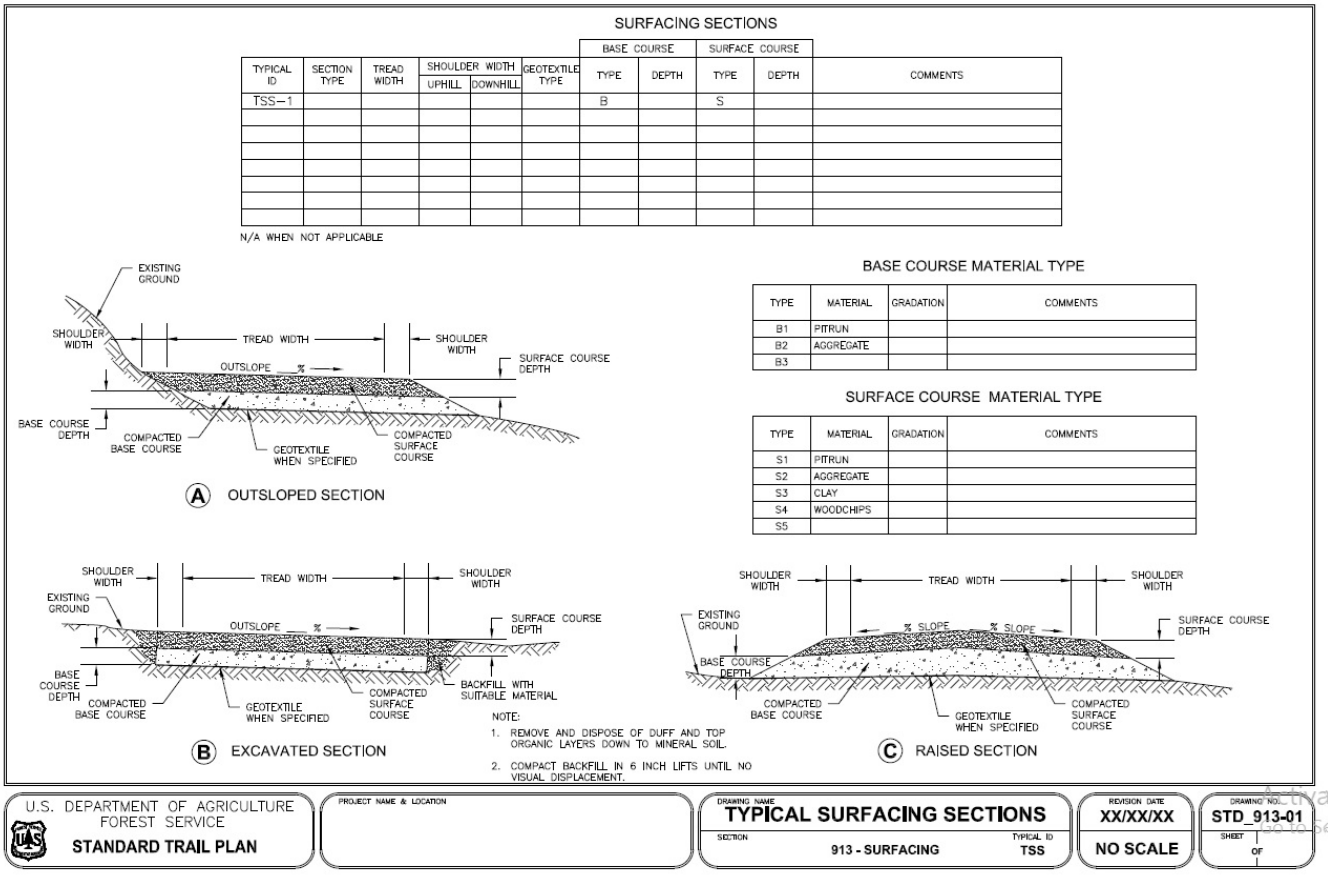


Figure 3.1. Example of a tread surfacing procedure and documentation log (Source: Carsten 2023).

Corridor maintenance activities will include:

- Vegetation management (e.g., clearing, removing felled trees and branches);
- Erosion control (e.g., slope stabilization);

- Trail rerouting (as necessary); and
- Grading and drainage.

Vegetation will be removed or pruned to maintain the corridor width, vertical clearance, and user sightlines (Figure 3.2 and Figure 3.3). Trees that block passage of the trail will be removed using appropriate tools (e.g., chainsaws). Vegetation will be moved downslope of the trail or carried out of the area if needed. Discarded vegetation will not block waterways or be discarded on burrows or nests.

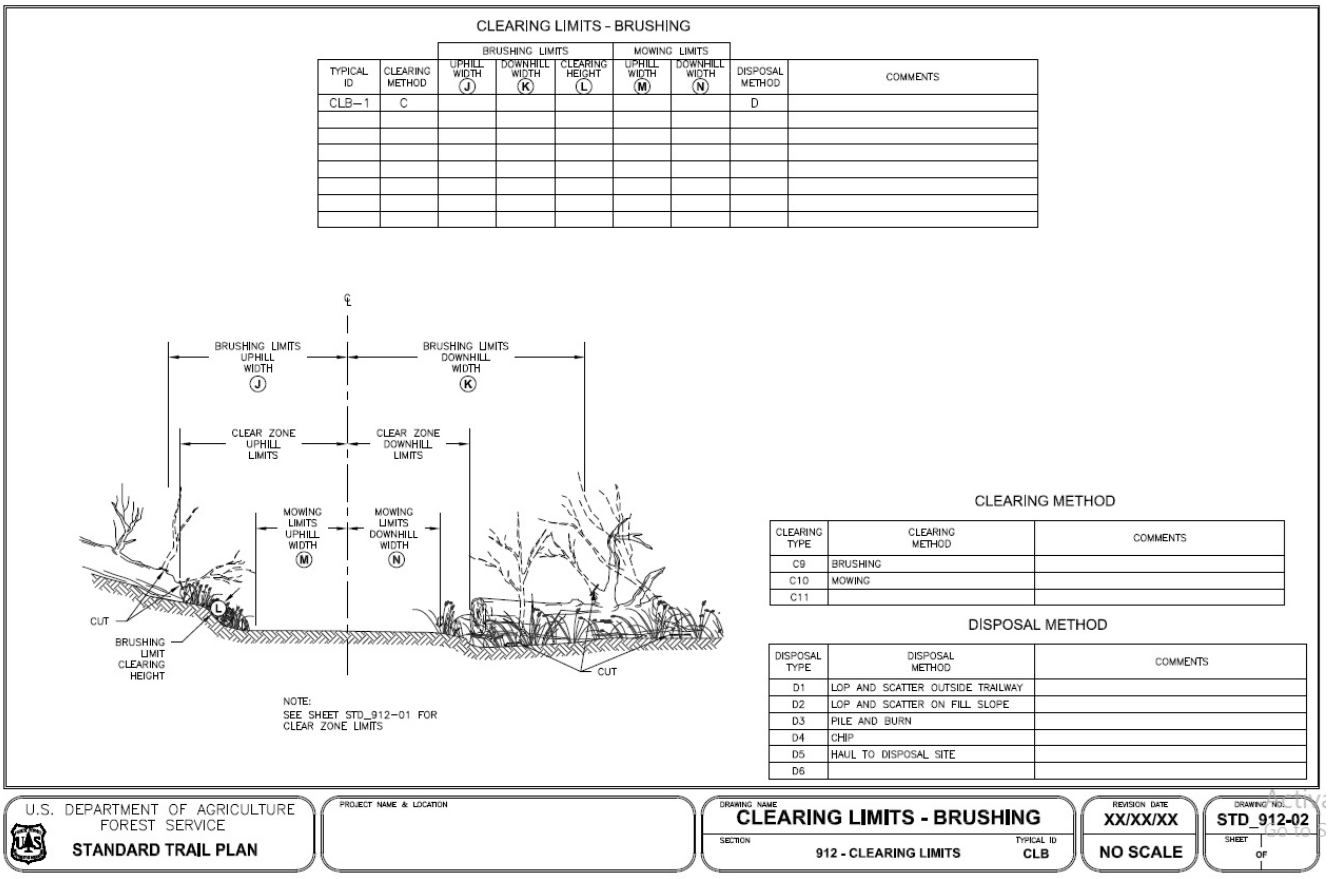
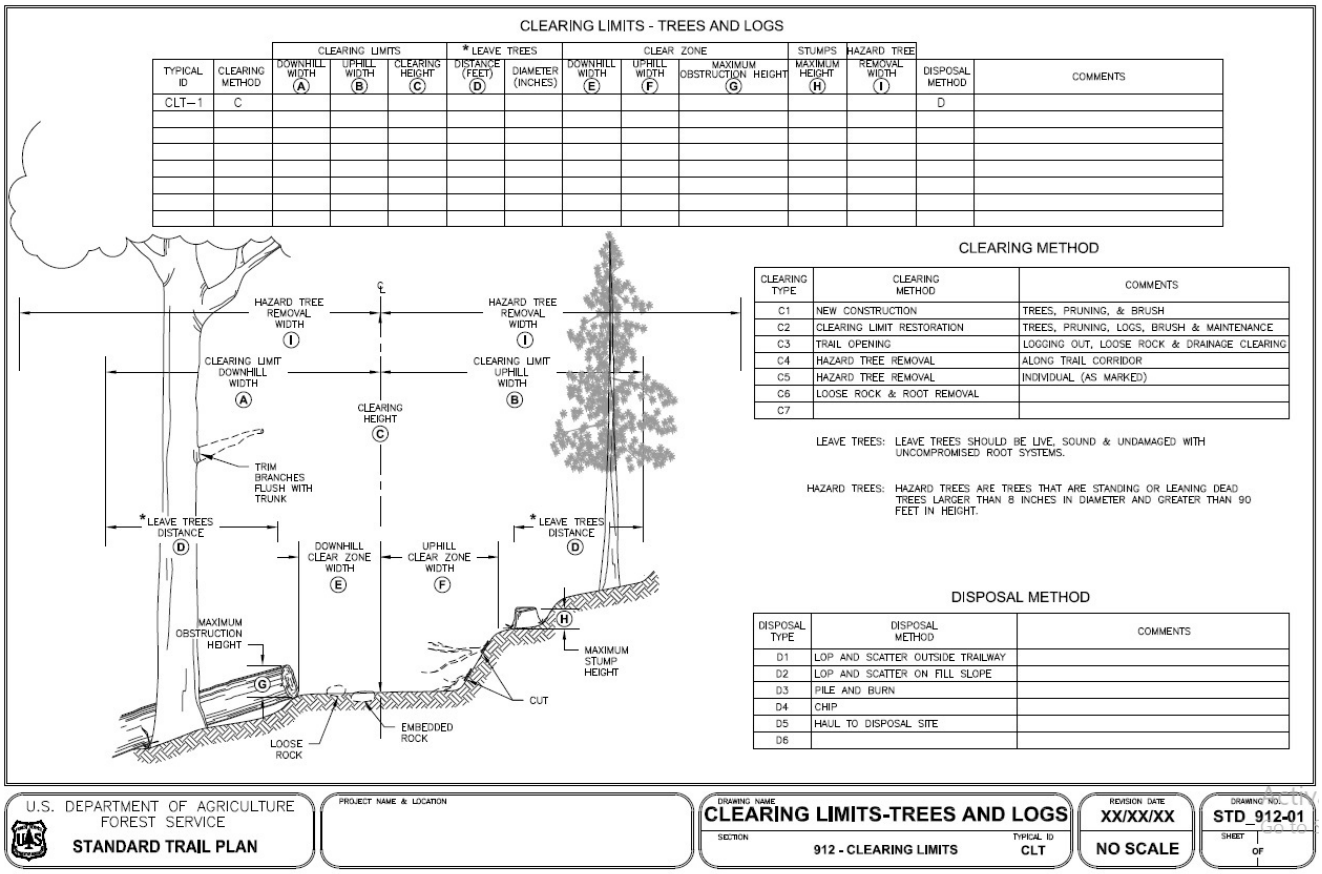


Figure 3.2. Example of a brush clearing procedure and documentation log for a standard trail (Source: Carsten 2023).



TYPICAL ID	CLEARING METHOD	CLEARING LIMITS DOWNHILL WIDTH (A)	CLEARING LIMITS UPHILL WIDTH (B)	CLEARING LIMITS CLEARING HEIGHT (C)	*LEAVE TREES DISTANCE (FEET) (D)	*LEAVE TREES DIAMETER (INCHES)	CLEAR ZONE DOWNHILL WIDTH (E)	CLEAR ZONE UPHILL WIDTH (F)	CLEAR ZONE MAXIMUM OBSTRUCTION HEIGHT (G)	STUMPS MAXIMUM HEIGHT (H)	HAZARD TREE REMOVAL WIDTH (I)	DISPOSAL METHOD	COMMENTS
CLT–1	C											D	

CLEARING TYPE	CLEARING METHOD	COMMENTS
C1	NEW CONSTRUCTION	TREES, PRUNING, & BRUSH
C2	CLEARING LIMIT RESTORATION	TREES, PRUNING, LOGS, BRUSH & MAINTENANCE
C3	TRAIL OPENING	LOGGING OUT, LOOSE ROCK & DRAINAGE CLEARING
C4	HAZARD TREE REMOVAL	ALONG TRAIL CORRIDOR
C5	HAZARD TREE REMOVAL	INDIVIDUAL (AS MARKED)
C6	LOOSE ROCK & ROOT REMOVAL	
C7		

DISPOSAL TYPE	DISPOSAL METHOD	COMMENTS
D1	LOP AND SCATTER OUTSIDE TRAILWAY	
D2	LOP AND SCATTER ON FILL SLOPE	
D3	PILE AND BURN	
D4	CHIP	
D5	HAUL TO DISPOSAL SITE	
D6		

Figure 3.3. Example of a tree and log clearing procedure and documentation log (Source: Carsten 2023).

3.1.2 Signage Maintenance

Well-maintained signs are important for orienting trail users and identifying prohibited activities (e.g., unauthorized vehicles or activities). Damaged, missing, or out-of-date signs can result in a poor/negative experience and disorient trail users. Every effort will be made to install signs with long lifespans and tested in Canadian climates. It has been estimated 10% of trail signage will need to be replaced annually (TCT 2025).

Types of trail signage include:

- Trailheads and access points with GPS cooridnates and unique ID codes;
- Restricted use for pedistrians and cyclists with no use by unauthorized motorized vehicles with explanation why motorized vehicle access is restricted (environmental protection, user safety, and trail longevity);
- Wayfinding markers;
- Emergency Information Panels (includes emergency contacts for the area and nearest access point);
- Hazard Signs (temporary and permenant signs for trail closures or known risks);
- Interpretation Panels (educational panels about trail safety, responsible recreation, or environmental sensitive areas); and
- Seasonal Alerts (including temporary signage communicaating site-specific risks such as icy conditions or maintenance activities).

Sign maintenance protocols include the regular inspection of signage to ensure the following: signage visibility (e.g., overgrown vegetation removal), repair of loose fittings, repair or replace missing signs, and remove or update obsolete signs. A signage maintenance log will be kept by TDCI.

In addition to wayfinding and information signs, contact information for TDCI to allow users to communicate trail conditions will be included on signs at key points along the trail (e.g., trailheads and large infrastructure).

3.1.3 Infrastructure to Prevent Unauthorized Motor Vehicle Access

Gates, bollards, or barriers will be installed at trailheads and road crossings to prevent unauthorized motor vehicle (e.g., ATVs) access while maintaining accessibility for emergency and maintenance vehicles. This infrastructure will be inspected and repaired as required in line with the inspection schedule for the trail and as reported to the TDCI.

3.2 Waterway Protection

During maintenance and repair activities, crews are required to maintain a minimum 30-m buffer of undisturbed vegetation around all freshwater bodies and wetlands, except at necessary water crossings. During these activities the minimum buffer will be identified and flagged. Flags will be removed following the completion of activities. Crews will follow applicable guidance including the Best Management Practices for the Protection of Freshwater Fish Habitat in Newfoundland and Labrador (DFO 2022).

3.2.1 Structural Maintenance

Structural maintenance at and near waterways along the proposed trail will involve geotextile fabric, culverts, boardwalks, and bridges as summarized below. Inspections of the trail route will occur prior to and at the conclusion of the operating season (May - October). Irregular inspections may also be carried out periodically to assess associated trail infrastructure integrity via unmanned aerial system (UAS) drone flights.

Fabric:

- During construction, geotextile fabric and granular fill will be used in wet areas to protect the area from impact from the trail. This fabric will be inspected and replaced as necessary.

Culverts:

- Visual inspections of culverts (Figure 3.4) for structural weaknesses or blockages will be conducted.
    - Blockages will be cleared and the debris removed from the waterway.
    - Any damage to culverts will be documented and reported to the TDCI for repair.
    - Machinery required for repairs will be similar to that used during construction; access to the site will use existing trails to reduce further impacts.

Boardwalks:

- Visual inspections of boardwalks will be conducted.
    - Sections in need of repair will be flagged and reported to the TDCI.
    - Damaged sections will be removed from the trail and disposed of according to provincial and municipal requirements.

Bridges:

- Bridges (permanent and seasonal) will be inspected by qualified engineers on a regular schedule as per the design recommendations.
- The temporary, seasonal bridge at Water Crossing 4 (WC4; Figure 2.1) will be installed annually by qualified personnel following the spring freshet (e.g., in late-April to early-May). It will be removed at the end of the operating season each year.

- A 30-m non-disturbance buffer from waterbodies will be observed where possible.

- Specific to the WC4 temporary bridge, its positioning relative to water channel flow will be inspected monthly and after high rainfall and storm surge events to ensure optimal functionality and trail user safety.

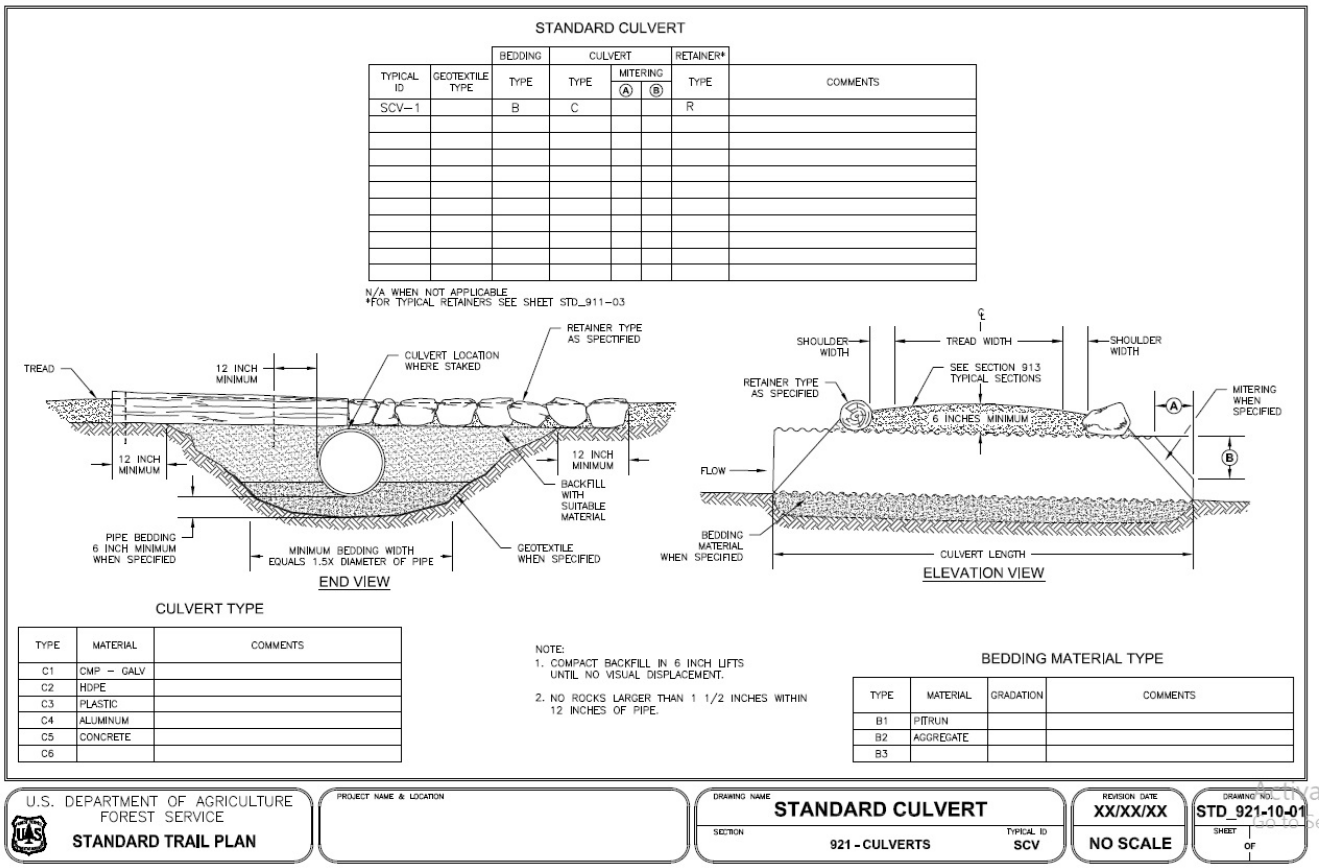


Figure 3.4. Example of a standard culvert installation procedure and documentation log (Source: Carsten 2023).

3.3 Maintenance and Repair Funding

A dedicated Trail Maintenance Fund will be established from a combination of operational revenues (e.g., tourism programming and social enterprise income), public donations, and secured funding agreements. Annual operating budgets will include a line item for maintenance and repair, ensuring predicable resources for routine maintenance and contingency repairs.

3.4 Waste Collection

Waste receptacles will be placed at primary trailheads and high-use access points. Waste will be collected daily during peak season and weekly during the shoulder season. While crews are conducting trail maintenance, they will collect and carry-out garbage produced during maintenance, as well as any additional garbage observed on the trail. Trail users are expected to follow a carry-in/carry-out policy and dispose of garbage in proper receptacles. All collected garbage will be transported to approved municipal disposal facilities.

3.5 Prevention of Incursion onto Private Lands

At the design level, trail route configuration will be used to discourage unintended access to private land, including the placement of trail turns, grade reversals, or obstructions (e.g., boulders or trees) near property boundaries to subtly redirect users and reduce shortcutting. The trail tread itself will also be designed to feel less direct or appealing at these sensitive locations, encouraging users to stay on the intended route. During maintenance, these design features will be inspected and enforced.

In addition to trail design and physical barriers, signage directing users to the trail path and the location of sensitive areas will be maintained.

4 Literature Cited

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