

Fort St James CRI – Fire Mitigation Project

RFP 001-2024 Tender Package Info: TU-1 Manual

OBJECTIVES: The overall objectives of this fuel management prescription are to:

- Improve public safety and reduce the wildfire threat for all residents and recreationalists that utilize the areas being treated.
- Reduce the risk of wildfire to the hospital, homes, and community water reservoir
- Enhance the ability of local BCWS and fire departments to action potential wildfires in and surrounding these treatment areas.
- Reduce the potential rate of spread and wildfire intensity within the treatment areas.

STRATEGIES: Strategies to achieve the above objectives include:

- Thinning from below (i.e., remove suppressed, intermediate trees) to reduce ladder fuels, crown bulk density, and ultimately reduce the risk of crown fire.
- Retention of dominant and co-dominant canopy trees with the intention of maintaining a cool and moist understory microclimate, while reducing wildfire behavior intensity,
- Retain and encourage live deciduous tree and shrub species with a high moisture content to reduce fire behaviour and provide wildlife habitat
- Pruning of retained trees to increase crown base height and reduce ladder fuel continuity
- Remove hazardous/dangerous trees from striking distance of residences and critical infrastructure
- Mitigate potential for forest health and windthrow hazard concerns.

METHODS: Thin from below (TFB), Commercial thin (CT), Hazard tree removal (HTR), Surface fuel removal (SFR), Prune (PRU), Pile and burn (PB), Firewood Production.

NOTE: TU-1 is **MANUAL** treatment (not mechanical).

TREATMENT UNIT 1 (manual, hand tools)

- Total Area: 8.5 ha
- Merchantable volume per ha: approximately 3 m³/ha
- Total merchantable volume: approximately 25 m³ total

TREATMENTS

For detailed description of treatments please see section “I. Treatment Description” of the District of Fort St. James Fuel Management Prescription (FMP).

- Remove Hazard Trees first (preferable), or as encountered. At least one certified faller is required to be present on site.
- Thin from below up to 22.5 cm DBH conifer stems to a target average overstory (+17.5 cm DBH) density of approximately 500 SPH (+/- 50 SPH) which includes deciduous stems. This inter-tree spacing averages to 4.8 m.
- Retain primarily intermediate sized conifer stems in the 17.5-22.5 cm size class and above.
- Pruning will be required on all retained trees to a height of 3 m.
- All high value wildlife trees will be retained throughout all treatment areas.
- A minimum of 4 logs per ha of CWD will be retained, each being a minimum of 2 m in length and 7.5 cm in diameter at one end.
- Most CWD will be retained to a maximum of 150 pieces/ha, with a preference for larger pieces (> 30 cm diameter), scattered throughout the area and bucked to the ground. CWD in decay class 4 or above is not counted towards the CWD target.

SLASH DISPOSAL:

- Piling and burning of debris/slash are the prescribed method of slash disposal. With the approval of City council some slash and fallen timber will be bucked and piled as firewood in predetermined areas of the town for communal use by the residents of Fort St. James.
- Pile burning will be done where feasible with the consent of the local fire chief. As per District of Fort St. James Bylaw No. 1001, an open-air burning permit application can be filled out and submitted to the fire chief for approval to conduct open air pile burning within the treatment boundary.

DEBRIS PILING:

- Under the Wildfire Act and Regulation logging and manual debris piles can be constructed through manual methods and all piles must be disposed of according to local guidelines. All burning is to be conducted in compliance with the BC Wildfire Act and Wildfire Regulation.

OTHER

- A number of local footpaths and walking paths have been established within the treatment area by local residents living adjacent to the area. Footpaths affected by operations in the area will be rehabilitated to their original state post operation if damage occurs.
- Best management practices shall be employed to reduce the introduction and spread of invasive plants to the treatment area by being aware of potential invasive plants, report any confirmed invasive plants, ensure equipment and machinery is clean of soil and plant material before being transported to the site, and minimizing soil disturbance.
- The treatment area falls within the Nechako Lowland for the purpose of migratory bird nesting season. If a treatment were to occur between April 25th and August 5th, a qualified professional must conduct a breeding bird survey prior to commencement of operations:
- Soils are categorized as sensitive due to the Very High soil compaction rating resulting from clay soil texture. The proposed manual treatments will have nil impact to soil compaction, therefore soil disturbance is anticipated to be < 5%.
- There are no permanent access structures proposed in the treatment area.
- There are no streams within the treatment and therefore no crossings.
- There are no RMZs of streams directly tributary to an S1, S2, or S3 stream in the proposed treatment area.