



# Fire Hazard Assessment Field Form

This form is to be used by Peace Liard Business Area staff and Licensees when assessing fire hazards, as defined under the Wildfire Act and its Regulations, and must be completed by a 'Qualified Person' as defined in the Guidance and Interpretation section on page 3.

**Licence/Contract/Project:** \_\_\_\_\_ **Block:** \_\_\_\_\_ **Date:** \_\_\_\_\_

**Describe Condition(s) Being Assessed:** \_\_\_\_\_

Fuel Loading Factors	Industrial Activity Area characteristics and Point Rating Score each factor within range that best describes the condition(s) being assessed.				Score
Fuel Depth:	<20cm <4x4m, <b>1</b>	20 to 40cm >4x4m, <b>3</b>	40 to 60cm >4x4m, <b>5</b>	>60cm >4x4m, <b>7</b>	
Fuel Size: (% all fuels < 7 cm diameter)	<15% <b>1</b>	15 to 30% <b>3</b>	31 to 45% <b>5</b>	>45% <b>7</b>	
Horizontal Fuel Arrangement (% of area)	Fuel coverage <20% <b>1</b>	Fuel coverage 20% to 50% <b>3</b>	Fuel coverage 51% to 80% <b>5</b>	Fuel coverage >80% <b>7</b>	
Vertical Fuel Arrangement (fine fuels < 7 cm)	Mixed with soil <b>1</b>	On ground <b>3</b>	Partially Elevated <b>5</b>	Mostly elevated <b>7</b>	
Vegetation (contributes to Fuel Load )	None <b>0</b>	Low <b>1</b>	Moderate <b>3</b>	High <b>5</b>	
Risk of Ignition:	No access (barrier >500 m or isolated) <b>1</b>	Poor access (or mostly piled 30m from road) <b>2</b>	Good access (or piled within 30m of road) <b>3</b>	Readily accessible (public use road) <b>4</b>	
For average conditions, a score over <b>14</b> should have hazard abatement strategies prescribed, that	<b>Inherent Fire Hazard Rating Total:</b>				

### Hazard Interpretation & Abatement Strategy

	<b>Managed Fire Hazard Rating Total:</b>	

Completed by (Qualified Person) : \_\_\_\_\_

- Note:**
- Attach a map showing areas and conditions assessed, additional notes and provide a copy to the BCTS staff contact.
  - Timber Sale Licenses will not be closed until BCTS receives a copy of the most recent fire hazard assessment.
  - If conditions are complex or dissimilar, break them down for specific treatment areas by individual assessment and abatement strategies.

## Guidance and Interpretation

### Wildfire Act, Section 7 – Legal Requirement

*In prescribed circumstances and at prescribed intervals, a person carrying out an industrial activity or a prescribed activity on forest land or grassland or within 1 km of forest land or grass land must conduct fire hazard assessments. A person carrying out an industrial activity or a prescribed activity must abate within a prescribed period a fire hazard of which the person is aware or ought reasonably to be aware.*

BCTS Licensees' are responsible for completing fire hazard assessments and abating any hazard created by their operations. Conversely, BCTS is responsible for completing assessments on any of its contracts where it has created the hazard. This responsibility must be communicated to the Licensee or contractor at the EMS Prework.

BCTS will not assume another party's responsibility or take ownership of a fire hazard not of their doing under these legal requirements. BCTS staff are not officials, as defined in the *Wildfire Act*, and cannot verify if the assessment or abatement strategy developed by licensees meet legal requirements. This responsibility lies with the Compliance and Enforcement and Protection Branch.

### Wildfire Regulation, Section 11 and 12

*The hazard assessment must assess the fuel hazard, risk of a fire starting and spreading. The prescribed interval for assessment and abatement is either:*

- *Assessment every 3 months (Operations in or around the Thunder Bird Operating Area) during the period of industrial activity when within an area of local government (municipal area or regional fire protection district) and on completion of the activity if a shorter interval and abate the hazard within one burning season following the assessment. Or,*
- *Assessment every 6 months in all other areas and on completion of activity if a shorter interval and abate the hazard within one burning season following the assessment.*
- *Abatement must reduce the fuel hazard without increasing the risk of a fire starting, fire behaviour or fire suppression.*

A person may request an exemption in writing from their local Fire Centre Manager specifying the section of the act to which they are requesting an exemption and the duration of the exemption. See *Section 70 of the Wildfire Act* for a further explanation. If an exemption is granted any conditions or alternative requirement must be followed. For all Peace Liard Business Area operations, contact Prince George Fire Center at (250) 565-6124 or fax 250-565-6672 for exemption information

### Completion of Fire Hazard Assessment Forms

The preparation, implementation, and supervision of fire hazard assessment and abatement is considered to be within the scope of "professional forestry" and must only be carried out by persons authorized and qualified to do so under the Foresters Act of BC.

#### Qualified Persons

The following person(s) must complete the Fire Hazard Assessment:

- A Registered Forest Professional (Association of BC Forest Professionals) in good standing and who is qualified to complete a fire hazard assessment based on their education, training, and experience and declares them "competent" in such area of practice.

The following person(s) may complete parts of the Fire Hazard Assessment:

- Non-professionals and enrolled members of the Association of BC Forest Professionals may conduct sampling of sites to provide data for fire hazard assessments and abatement under the supervision of a RFT or RPF.

### The Peace Liard Business Area Fire Hazard Assessment Procedure

This procedure has been designed to assess the most common conditions experienced in the Peace Liard Business Area. These conditions are primarily dispersed fuel (large woody debris) over the project area and piled fuel along the road side. In situations where complex fuel patterns exist within the project area, multiple assessments should be considered.

A fire hazard score of 14 is not a clear indication of a fire hazard. It is a default threshold that may indicate site conditions reflect a sufficient fire hazard that an abatement strategy should be applied. The abatement strategy must reduce the fire hazard so as to make the likelihood of a fire starting or spreading acceptable to the assessor considering all factors. This can be one or a combination of reducing fuel loading, rearranging fuel breaks and limiting access.

#### Fuel Loading Factors

In general terms, each of the 7 factors scored should be interpreted and scored to approximate the actual conditions being assessed. Using good judgment and awareness assess each factor - low hazard being the lowest number and high hazard being the highest number. All factors must be scored. Other considerations such as values at risk, likelihood of human or lightning fire starts, slope position, terrain, aspect, adjacent fuel hazards, local prevailing winds and local fire history should all be used when

determining a hazard score and to interpret whether the total score is over or under an acceptable threshold for the specific area of activity to trigger abatement strategies.

Fuel Depth	Used to describe average fuel depth in a dispersed area. Ignore fuel free areas. Indicator of fuel hazard and suppression difficulty. If the dispersed area has had piling done than interpret smaller and fewer piles as lower risk than larger and frequent piles. Stratify and average out areas either piled or dispersed. If piling reduces all fuel loading to less than 20cm, assess strictly on pile size and number. If not, determine average dispersed fuel height and factor higher for the added piled fuel.
Fuel Size	Used to describe the amount of fine fuels. Indicator of fire ignition due to rapid drying and spread. Regardless of piled or dispersed fuel, estimate how much as a % of the total fuel loading
Horizontal Fuel Arrangement	Used to describe the amount of area covered by continuous fuel. Indicator of fire spread. If piles have a 3 meter fire guard, deduct the area of the piles and guard. If piles do not have guards, include the area of the pile. Reduce % area of fuel for roads, and other disturbed or natural fuel free areas within the total area being assessed.
Vertical Fuel Arrangement	Used to describe air space and stacking of fine fuels only for oxygen supply and preheating of fine fuels much as one would kindle a camp fire. Indicator of ignition and fire behavior. Easily confused with fuel depth but is assessing ignition vs. fuel hazard. The interpretation on piles here is how risk of ignition or risk of fire spread was altered. In piles, consider if they have reduced or increased fine fuel aeration and height.
Vegetation	Used to describe contributing fuel hazard from brush. Indicator of fuel hazard and fire spread. Low brush would not impede walking High brush would make walking difficult. Perennial succulent types of vegetation do not contribute to fuel hazard.
Risk of Ignition	This is the risk posed by ease of access for human start fires. Indicates ease of ignition. The more ready the 4X4 vehicle access, the higher the risk. Roadside piling can reduce risk; consider distance of piles from the road edge and if significant reduction of fine fuels.

In the Hazard Interpretation & Abatement Strategy section, the assessor should address the factors and conditions most contributing to the risk of fire if reasonable or common sense to do so. Assessor's should address the fuel hazard, fire start or fire spread directly as they contribute overall to the greatest fire hazard. By referencing the specific factor scores, the assessor should then re-score the fire hazard based on the implementation of their abatement strategy.

Fire Hazard Assessment is a process of risk management. The assessment is intended to describe the inherent fire hazard risk on an area of industrial activity. The abatement strategy reduces the risk to a manageable level commensurate with the values at risk, expected fire behavior and suppression difficulty.

### Best Practices Recommendations

- 1: This is a subjective process and the assessor must clearly rationalize their interpretation for determining risk and for selecting the most appropriate abatement strategy.
- 2: Take dated geo-referenced pictures to best show the conditions at the time of the assessment.
- 3: Some conditions or factors will be very complex. Some values at risk will be very high or indeterminate. The assessor must stay within the limits of their competence. Seek peer review to confirm your assessment and strategy , or consult with your local Fire Protection Officer for advice.
- 4: Due Diligence is what the assessor is striving for. Due diligence is training, awareness, documenting and most important, respect and concern for those that could be directly affected by a wildfire starting or spreading into the area of activity.

**Note:** This guide is not an instructional tool. The assessor is assumed to be qualified to follow this procedure and be able to interpret its intent. This procedure is under continuous improvement and the most current dated version will be on the BCTS Peace Liard Business Area EMS Public Web Site: [http://www.for.gov.bc.ca/bcts/areas/TPL\\_certification.htm](http://www.for.gov.bc.ca/bcts/areas/TPL_certification.htm) .