#### **Community Forests June 15, 2017 Tumbler Ridge**

#### June 15, 2017





## Agenda

- 1 Logging near Power lines
- 2 Forestry HRS 2017 update

## Logging near power lines What is the problem?



- Increasingly harvesting operations are encroaching on High Voltage Power lines, whether along transmission corridors that pass through a TSA, TFL or Private Forest Lands. Power lines that are installed along roadways or into residential or industrial areas that border planned harvesting areas. Have their been any recent incidents of concern?
- What is required to ensure the safety of the workers conducting the Harvesting work should a tree be felled or pushed into the power line?
- What OHSR regulations apply? Who are the key parties with Responsibilities to ensure workers safety?

## Logging near power lines What's required?

#### 19.30 Preliminary inspection



- (1) Before commencing tree pruning or falling close to energized high voltage overhead conductors, the worksite must be inspected by a qualified person, authorized by the owner of the power system, to identify any hazardous areas, including situations where any part of a tree to be pruned or felled is within the applicable minimum distance from an energized conductor as specified in <u>Table 19-1A</u>, or may fall within that distance.
- (2) Immediately before commencing work, an inspection must be performed by a qualified person to verify the results of the initial inspection done under subsection (1) are still valid
- These 2 regulations potentially require "two" inspections of the planned harvesting area that is close to the High Voltage power lines prior to commencing any work.

## What's required? continued Additional requirements



#### 19.31 Work in a hazardous area

- Tree pruning or falling must not commence in a hazardous area until
- (a) an assurance is issued by the owner of the power system that any reclose feature is disabled, and
- (b) workers are informed of the voltages of the conductors.
- The hazard area is typically considered to be 1.5 tree lengths from the area of the limits of approach and is where "any part of a tree to be pruned of felled could be within the limits of approached as defined by table 19-1A.
- Work in this area cannot commence until "an assurance of non reclose" is issued by the Utility owner and workers are informed of the Voltage of the power lines.

Logging near power lines-What can be done at this time to facilitate this harvesting?



- The lines are inspected and all hazard trees within the Limits of approach are identified and removed by the Utility company:
- 1. Assurance of non reclose is issued and the power line is put on a single bump system, workers are trained around voltage levels and working in proximity to power lines. Acceptable SWP are developed and implemented to provide adequate assurance that trees or their parts with not enter to limits of approach zone. Harvesting work commences and is completed with no High Voltage line contact.
- 2. No assurance of non reclose is issued: the employers have basically three options to facilitate the Harvesting at this time- a). Leave a 1.5 tree length buffer of standing trees from the hazard zone into the standing timber-no work zone, b). Top any trees within the 1.5 tree length hazard zone that could fall into the limits of approach area (Arborist trained and certified to work in this zone, c) Utilized Certified and trained utility Arborists to remove the trees within the hazard zone

# Logging near power lines what is being considered for the future?

- WSBC Utility owner working group to explore and develop acceptable SWP for Harvesting in these areas including training programs for the Forestry Workers (BCFSC is involved and looking at the training elements).
- New Guideline for OHSR 26.2 around the proper planning of working near power lines that would cover acceptable SWP for both circumstances of Hand Falling and Mechanical harvesting
- In the planning process consideration for moving boundaries away from High Voltage power lines in an effort to remove the Risk associated with this type of work from the Harvesting activity
- Interim Reg Practices and ILS is working on producing a bulletin to send out to the Harvesting employers around what is currently required when working around High Voltage Power lines- The bulleting will outline the current options and an emphasis upon planning that looks at removing the risk by moving boundaries.

## Logging Near Power lines



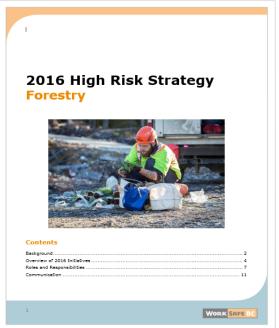


- Why is this an important issue?
- Two incidents in the past 1.5 years in which mechanical harvesters have felled trees into energized High Voltage Power lines (no injuries to date)

#### What is the objective?

→ Reduce the serious injury and fatal injury rates in the top risk exposure categories in forestry harvesting over a 5 year period (note: 2016 was year 3)

- Manual tree falling
- Mechanized harvesting
- Cable yarding operations
- Log transportation
- Looking at top risk exposure categories/mechanisms of injury in each of the four target harvest phases
- Controls and higher levels of responsibility/accountability
- ERPs are reviewed as part of all site inspections.
- Seasonal/geographic inspectional focus on Silviculture operations
- Wildfire seasonal focus



#### What is the objective?

FHRS CUs	2015 Injury Rate	2015 Serious Injury Rate
Manual Tree Falling & Bucking	29.4 (25.2 in 2011)	6.1 (9.4 in 2014)
Cable or Hi-Lead Logging	6.1 (9.4 in 2013)	2.2 (2.8 in 2013)
Log Hauling	5.4 (6.3 in 2011)	1.3 (1.9 in 2011)
Mechanized Tree Falling	1.7 (2.4 in 2012)	0.5 (0.6 in 2013)
Integrated Forest Management	3.5 (3.8 in 2012)	0.9 (1.1 in 2012)

Silviculture	8.0 (9.2 in 2011)	1.4 (0.9 in 2012)
Brushing, Weeding, Tree	7.5	1.6
Thinning, Spacing	(9.4 in 2013)	(2.1 in 2014)

#### 2016 Inspectional Focus

Harvesting Phase	Mech. Injury/ Area of Risk	Inspectional Focus
Manual Falling	<ul> <li>Control of tree (falling cuts)</li> <li>Risk assessment (windfall, danger tree, etc.)</li> <li>Brushing</li> </ul>	<ol> <li>Falling cuts</li> <li>Danger tree and windfall assessment and plans</li> <li>Unnecessary brushing practices</li> <li>New faller training locations</li> </ol>
Mechanized Harvesting	<ul> <li>Maintenance work</li> <li>Getting off and on machinery</li> <li>Equipment – loss of stability</li> <li>Congestion</li> </ul>	<ol> <li>Maintenance work plan and lockout</li> <li>Three Point Contact procedures</li> <li>Steep slope assessment plans</li> <li>Site planning and layout</li> </ol>
Cable Yarding Operations	<ul> <li>Struck by Logs</li> <li>Slips and Falls</li> <li>Congestion</li> </ul>	<ol> <li>Clearing the turn</li> <li>Yarding angles</li> <li>Landing the log</li> <li>Site planning and layout</li> </ol>
Log Transporting	<ul> <li>MVA's</li> <li>Loading and unloading activities</li> <li>Maintenance Work</li> <li>MSI shoulder injuries</li> <li>Proper use and installation of Binders</li> </ul>	<ol> <li>Driving and Road Assessment</li> <li>Loading, off-loading and securing of load</li> <li>Best practices for maintenance work (lock out, access and egress)</li> <li>Cab Guards</li> <li>Binder use and installation</li> </ol>
Silviculture	<ul> <li>Motor Vehicle accidents</li> <li>Lack of ERP/Practice</li> <li>Lack of adequate MSI risk assessment/Management Program</li> </ul>	<ol> <li>ERP elements</li> <li>Planning and conducting operations</li> <li>Driver training/policies</li> <li>MSI Risk Assessment/ Management/ Education</li> </ol>

# 2016 Forestry High Risk Strategy 2016 Target/Priority CU's



Primary Focus:
Cable or Hi-Lead Logging (703003)
Ground Skidding, Horse Logging, or Log Loading (703006)
Integrated Forest Management (703008)
Log Processing (703011)
Manual Tree Falling and Bucking (703013)
Mechanized Tree Falling (703014)
Helicopter Logging (703019)
Log Hauling (732044) <u>Secondary Focus</u> (seasonal/geographic considerations): •Brushing and Weeding or Tree Thinning or Spacing (703002) •Forest Fire Fighting (703005) •Tree Planting or Cone Picking (703016)

#### **Compliance Workbooks**

- New in 2016 but based on the 2005 Forestry Compliance Strategy
- Created to obtain trends and statistics on orders written
- Based on cascading responsibilities
- Completed when a high risk violation is encountered
- Workbook will be revised for 2017 to improve outcomes based on officer feedback and allow for a better process to data mine and analyze trends to better target areas in which responsibilities are being missed.

#### Outreach, messaging and support for strategy

- BCFSC alignment of activities with FHRS and dissemination • of FHRS related information BC Forest Safety Council
- Council communicates the Strategy at its training sessions and through the • Forest Safety Newsletter (online and directly to approximately 2000 industry subscribers)
- Continuous engagement with forestry stakeholders through conferences, • trade shows and stakeholder meetings to discuss current industry issues and challenges
  - TLA Conference
  - WSCA Conference
  - ILA Convention / Interior Safety Conference
  - Vancouver Island Safety Conference

Unsafe is Unacceptable

## Forestry High Risk Strategy Progress in 2016

- 1563 HRS Initiating Inspections = 102% of Target (1527)
   Completed (as on November 7, 2016)
- 533 inspections with SI Risk Orders
- 55 sanctions imposed or in progress
- 221 orders with potential for HRV
- 3 Stop work orders issued
- 23 Orders to Workers
- Most active months for Forestry HRS inspectional activity in June/July

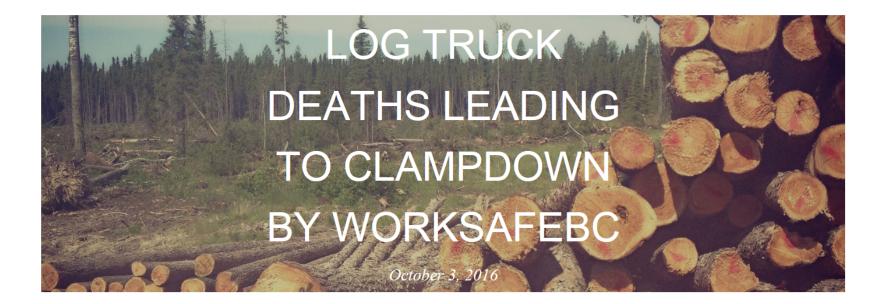
#### Progress in 2016

SI Risk Orders Time Sanctions Top Regs Cited CU Summary	Other Stats
Measure	Value YTD
Total Inspection Reports (including follow-ups)	1854
Compliance Agreements	0
Education Reports	24
Consultation Reports	158
Orders to Workers	21
Potential for HRV Orders	213
Stop Work Orders	3
Stop Use Orders	0
Orders	1161
Order Follow-ups	409

#### Progress in 2016

Service Centre	# HRS Inspections (Init.)
Courtenay	462
Prince George	246
Nanaimo	181
Terrace	108
Ft St John	97
Kamloops	102
Cranbrook	66
Abbotsford	81
Kelowna	79
Coquitlam	60
Nelson	43
Victoria	37
Surrey	1

## Forestry High Risk Strategy FHRS gets media attention...



By: Prince George Citizen

WorkSafeBC will be ramping up inspections of log trucks across the province in response to a spike in the number of fatal incidents so far this year.

## 2017 Forestry High Risk Strategy What's changing in the 2017 HRS

- 2017 will be year 4 of a 5 year Forestry Strategy
- Very few changes proposed for 2017
- It is critical that the Strategy be allowed to continue along a steady course to reinforce priority safety messaging
- Consistent and resolute application of the Forestry HRS over time is expected to result in a measurable reduction in injuries, serious injuries, and fatalities. (Note: see slide 3 for injury reduction trends)

#### What's changing in the 2017 HRS

- Few changes...
- Inclusion of inspectional focus on "roadside debris" within the Manual Tree Falling element of the FHRS (OHSR 26.80)
- Review of all new faller training sites, including sites where faller training is delivered by Industry Partners (this is to ensure that training is delivered in a compliant and safe manner for the student and instructor). New officer inspection checklist will be available for the January rollout of the HRS.
- Revision of the Steep Slope Logging Inspection Checklist to include the new Traction Assist harvesting methods increasingly utilized in BC (a FIAG working group has been struck and will develop (by January 2017) an inspection checklist/guide for inspecting these operations)

### 2017 Forestry High Risk Strategy What's changing in the 2017 HRS

- <u>Main change</u> introduction of inspectional windows for focus on the 4 main elements of the Strategy, i.e. hand falling, cable yarding, log hauling, mechanical harvesting (2016: 2 inspection focuses were introducedsummer initiative for 5 weeks was very successful, October to December log hauling focus- 3 key areas including seatbelt use, load stability and load securement, responding to 5 fatalities in this sector)
- Short-duration, focused inspection initiatives throughout the year ("don't call them blitzes")
  - concentrating on each of the FHRS pillars
  - additional focus on high hazard work processes
  - planned ahead of time will allow for better scheduling and adequate lead time

https://www.worksafebc.com/en/about-us/what-we-do/high-riskstrategies?origin=s&returnurl=https%3A%2F%2Fwww.worksafebc.com%2Fen% 2Fsearch%23q%3Dhigh%2520risk%2520strategies%26sort%3Drelevancy%26f% 3Alanguage-facet%3D%5BEnglish%5D&highlight=high+risk%2Bstrategies

#### **Questions?**

#### Suggestions?