LOGGER SAFETY INITIATIVE

Keeping Washington loggers safe.

Logger Safety Initiative Quarterly Training

Why am I receiving this LSI Safety Training Packet?

LSI participants are required to annually attend approved LSI Employer Logger Safety program training. There are two parts to the required training: Formal Training and Safety Training (see the attached LSI Training Requirements for more details). This packet satisfies one of the four required Safety Trainings. The LSI employer must ensure that all workers receive four LSI required trainings per year.

How do I provide the training to my employees?

LSI Employers and supervisors, if delegated, and all employees engaged in manual logging operations must participate in at least four (4) LSI trainings on an annual basis. If you have employees that do ground operations, even if only occasionally, review the "In the Clear Rigging" safety training (found on our website) materials in detail and discuss the scenarios with employees.

What documentation is required?

LSI employers will document that the training took place as part of their safety minutes. Be sure staff has signed the safety meeting sign-in sheet. The completion of the training will be assessed at the annual DOSH LSI Consultation.

WASHINGTON STATE LOGGER SAFETY INITIATIVE

Keeping Washington loggers safe.

Quarterly Cutting Safety Training: Evaluation of Snags

October 16, 2016

A 28-year-old timber cutter (victim) died when he was struck by a partially cut snag that was knocked down by another tree intentionally felled to bring it down. The victim and another cutter were working in close proximity to each other to even up the cutting line. The cutter made an under and back cut into a snag (danger tree) and decided not to use a wedge and left the snag standing momentarily. The snag did not fall. The cutter spoke with the victim, who was working less than two tree lengths away falling trees, about how to bring down the snag. They decided that the victim was to stop cutting and wait while the cutter selected a tree that would be used to "drive" the snag and push it to the ground. Going uphill from the snag, the cutter selected and cut a tree to fall in the direction of the standing snag. As the "driver" tree was falling, the cutter turned and saw that the victim was making a cut into a nearby tree. In an attempt to get the victim's attention, the cutter yelled and threw his hard hat toward him. The falling "driver" tree struck the side of the snag, causing the snag to fall 90 degrees to the right of its intended line of fall. The victim was struck by the falling snag and died at the scene.

Even though there was an evaluation of the snag between the cutter and the victim, it appears there was a misunderstanding in implementing their plan. Many safety requirements were not met in this instance. One recommended practice cutters need to follow is clear communication, working as a team to ensure the safety of all workers in the area, and avoid "pushing" a danger tree, other than to overcome a falling difficulty.

Snags and danger trees are encountered daily by timber cutters who are typically the first workers to be exposed to these hazards. When starting a new cutting unit, if several years have passed between the layout and logging phases, trees that may have been sound at the time of layout may not be sound at the time of harvest. A thorough assessment of the unit to identify and mark snags should be completed before operations start. Employers should conduct ongoing training to recognize and address snags so their cutters can safely eliminate the hazard to themselves or those who may be exposed.

At times it's difficult to assess at what point a snag becomes a hazard but always adhere to DOSH rules when eliminating a snag. Below are some best practices in the evaluation of snag hazards.

Evaluation of Snags

One of most important things about snags is to simply recognize the dangers each of them present. Big or little, solid or rotten, tall or short, they each pose a different problem. Below is one method of effectively evaluating a snag to learn the dangers it poses.

1. Use the buddy system.

- Does another more experienced cutter or qualified person need to assist in the evaluation and guidance of felling the snag?

2. Evaluate the condition of the snag

- Is there loose bark that could crumble down when the snag is cut into?
- How much of the snag is solid?
- Is there a solid spot where it can be cut or is it rotten all the way through? To determine this, bore the snag and assess it.
- Does the snag look safe all the way up or does it appear to have rotten sections?
- Is it tree length or is it shorter? Does it still have a top on it that may cause a problem as well?

Determine if there is a safe direction to fall the snag

- Can the snag be felled with the lean or not?
- Look for lean of the current stand or old stumps to determine which way they were felled.
- Can it be felled into a clear area so part of it does not come back towards the cutter?
- By cutting the snag, is a secondary exposure created for other workers who may be, or will be, working in that area?

Can it be left standing and not create exposure to other workers within the hazard zone

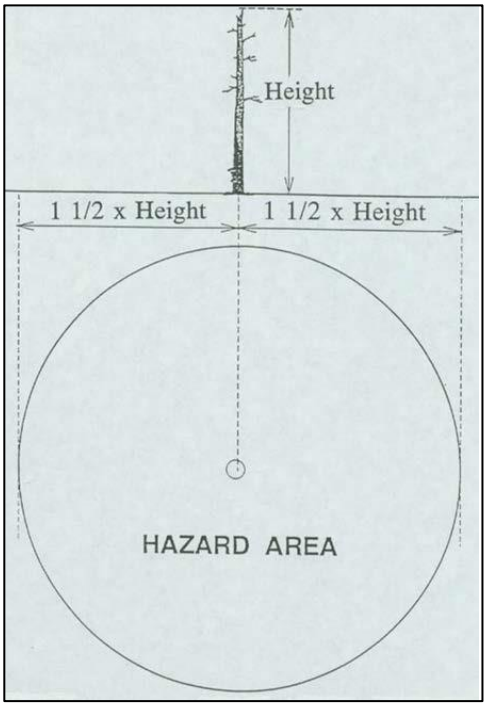
- Can present or future workers stay out of the hazard zone (1 ½ times the height of the snag is considered the hazard zone).

Does the person or landowner in charge need to be contacted to find a safer alternative method to get the snag on the ground?

- Does the use of explosives or another alternative method need to be arranged?

3. If it's been determined that the snag can fall in a safe direction, take time to do all necessary steps to ensure its fell as safe as possible.

- Evaluate the tree again
- Double up with a buddy. A cutter must not fall a tree or danger tree alone when two cutters are necessary to minimize hazards.
- Create a plan to address the snag. Communicate the plan, agree on the plan and implement the plan with each other.
- If necessary, dislodge loose bark and other material so if wedges are used the bark and material will not strike the cutter.
- Cut escape path(s).
- Make sure the face cuts match and are level.
- The back cut must be above the face cuts and level as well.
- Danger trees must be fell in the direction of lean unless other means (mechanical or dynamite) are used.
- Leave hinge wood all the way across the tree.
- Never turn your back on the snag or any danger tree.
- Finally**,** get in the clear as quick as possible!



If the snag is going to be left standing

- Clearly identify the hazard area around the snag (1 ½ times the height of the snag is considered the hazard zone) to prevent exposure to present or future workers to the area.
- Use flagging, paint, or other methods to identify the area.
- Communicate to other workers in the area.

4. If the snag is unsafe to cut and an alternative method will be used to get the snag on the ground then

- Contact the person or people in charge to inform them of the situation and decide on a safer method of getting the snag down.

For more information on the identification and cutting of snags and danger trees:

- See the LSI 2015 Quarter 3 training located on the website at www.loggersafety.org
- Refer to the LSI Cutting Operations Accident Prevention Program – "Falling Danger Trees Explained" section http://www.lni.wa.gov/Safety/TrainingPrevention/Programs/files/LSICuttingOperationsSampleAPP.doc
- WAC 296-54 Safety Standards for Logging Operations http://www.lni.wa.gov/safety/rules/chapter/54/
- SHARP Logging and Cutting FACE/Injury Reports http://www.lni.wa.gov/Safety/research/pubs/byindustry.asp?SB=I&I=11