

Title: Wood Chipper Safety Policy

Date: June 2018

Goals/Purpose:

The goals and purpose of this safety manual is to provide safety information, alert employees to the hazards of operating wood chippers, reference additional mandatory training and establish work practices that will reduce or eliminate the hazards related to the use of wood chippers.

Operating wood chippers is a potentially dangerous process. When employees feed tree branches/limbs into the chipper feed area, they are at risk of getting “caught in” the machine and suffering severe injury, amputation or death by being “drawn into” roller feed blades or being “struck by” the machine or large branches resulting in a serious injury. Implementing the work practices, completing training and using the personal protective equipment established in this policy will significantly help to protect employees from serious or fatal injuries during wood chipper operations.

Chippers usually consist of a powered feed mechanism that draws branches into the machine, knives mounted on a rotating disc/drum roller, an engine to power the unit and a discharge chute to transport wood chips. Chippers used by Southwestern University are equipped with a mechanical feed control bar that activates the feed rollers when it is pulled, pushing the feed bar to the neutral position to stop and pushing the bar towards the rear discharge chute to reverse the feed rollers. The bar is located along the top and rear of the feed chute for quick and easy access and control. Chippers with feed control bars are required to have quick stop and reverse feed control levers/controls for emergency situations.

The Department Supervisor has responsibility to

- implement the work practices in this policy
- periodically observe work practices by employees (2 times/month)
- correct unsafe behaviors and provide hands-on refresher instructions
- provide hands-on operators instructions (owner’s manual- start-up, engage feed roller, etc)
- ensure all operators complete review of this policy and YouTube training links

Training

All operators of wood chipper machines must complete the following video based training prior to using or being assigned wood chipper duties. Training is designed to help employees understand the correct operation of the wood chipper and safety controls, the importance of establishing a maintenance and inspection process, proper start-up and shut-down and the use of proper personal protective equipment. Supervisors should closely supervise all employees to ensure they are safely operating and exhibiting safe behaviors when working with the wood chipper or as a part of the team. Supervisor is

responsible to schedule annual refresher training. Supervisor should conduct periodic safety tool box talks in the field (twice per year) to ensure safe work practices are consistently applied.

Vermeer – Manufacturer’s Operations & Safety Training Video – VCR – Classroom Training

Review these On-Line as part of SafeColleges Policy Review Session:

- <https://www.youtube.com/watch?v=k5PnXckFIIO>
 - Bandit Video

- <https://www.youtube.com/watch?v=7NKZM9IIEk>
 - California FACE Video – Chipper Fatality & Prevention tips

- https://www.youtube.com/watch?v=ji_-m_yIq10
 - WorkSafe BC – Fatality Review

Work Practices

The following work practices are to be implemented and used to help ensure the safe operation of the wood chipper.

- Always designate and assign a safety monitor to be **stationed at the emergency shut off device at any time the machine is running and employees are approaching the wood chipper to feed material into the chipper.** The safety monitor is to be instructed to carefully and attentively watch all employees in front of the chipper and immediately shut off the feed mechanism in the event an employee looks to be in danger of falling into or being drawn into the feed mechanism.
- Whenever feasible, and as a standard practice, employees are to **stand to the side of the infeed chute when feeding material/branches** into the chute. This work practice significantly reduces the risk of being drawn into the chute and allows the employee access to the emergency stop devices.
- Before starting the chipper, ensure the disc/drum roller hood is completely closed and properly latched and that no material is inside the infeed chute area. Allow chipper to warm up at low rpm and raise to full operating rpm based on manufacturer’s instructions prior to feeding any material into the chipper.
- Chock chipper trailer wheels to avoid movement or rolling during operation.
- Check material to be sure there is no metal or other unsuitable material.
- Ensure discharge chute is pointed at safe loading area away from all employees and chute guard is attached and deflects debris to a downward position.

- Employees are to maintain a safe distance between each other during feeding operations so as not to bump, trip or encumber any other employee. Do not stand or work directly in front of chipper during feeding operations or when chipper is running.
- Push short or left over material/branches into the chute with wooden push sticks instead of reaching in the chute with hands or feet to help push the material into the feed rollers.
- Feed branches into the chute with the larger or butt end first to avoid being struck by the large end of the branch swinging sideways.
- Place shorter, smaller branches on top of larger longer branches when feeding.
- Employees are not allowed to stand on, sit on or climb on the wood chipper while it is running.
- Ensure there is no rope, twine, lines, wires anywhere near the wood chipper prior to start up of the machine.
- Be certain to read, review and follow all operator's manual operating instructions. Follow operator's manual (de-energize) when performing maintenance (changing chipper blades/knives or when attempting to clear a clogged chipper). Locking pins are typically utilized to lock-out activating the roller drums/feed mechanisms.

Personal Protective Equipment

Employees are to use the following protective equipment when operating the wood chipper:

- Eye protection – ANSI approved safety glasses
- Hand protection – proper work gloves with no extended cuffs – short wrist tight fitting cuff.
- Ear protection – earplugs or muffs.
- Head Protection – wear hardhat or helmet
- Supervisor is to assess work conditions and determine if additional face protection (face shield) is necessary for working conditions.
- Ensure there is no loose fitting straps, strings, jewelry worn during operation of the wood chipper.

Department Supervisor is responsible to establish an inspection and maintenance process that follows the manufacturer's instructions with attention to proper lock-out procedures.