

AVOIDING INJURIES WHEN USING CHAINSAWS

- In the last four years there have been over 250 chainsaw injuries during logging operations - nearly 80 of them resulted in lost time totalling well over 700 days. In silvicultural operations there were over 80 reported chainsaw injuries, with 187 days reported lost time.
- Many of these injuries are severe, with up to 60 lost days per injury.
- Fatal injuries to experienced workers in recent years highlight the need to update skills and practice.
- Most injuries during logging and silvicultural operations were lacerations and strains and sprains. Other injuries included back injuries, bruises and burns, and being hit by sticks and debris. Many injuries resulted from slips, trips and falls.
- Hundreds of near misses have also been reported. For example, while cutting tension wood; chain breaking incidents and where chaps have been but still protected legs from injury.



The potential hazards associated with chainsaw use include:

- ◆ kickback
- ◆ manual handling injuries and other strains and sprains
- ◆ being struck by the chain
- ◆ hot engine/muffler
- ◆ petrol
- ◆ noise and vibration
- ◆ debris and dust
- ◆ working on rough and steep terrain
- ◆ carbon monoxide/fumes.

SAFE CHAINSAW USE REQUIRES KEY DAILY SAW CHECKS

Muffler - reduces noise and directs exhaust gases away from the operator.

Spark arrester - catch sparks in the exhaust gases. **Set carburettor so chain is stationary when saw is idling.**

Chain catcher - catches the chain if it breaks and prevents it hitting the operator. **Check daily to make sure it is undamaged.**

Chain brake - stops the chain moving if the saw kicks back. Inertia chain brake - stops the chain moving if the saw kicks back. **Clean and check daily.**

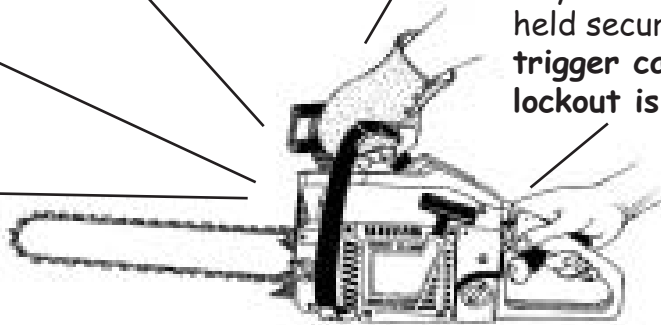
Mitt - prevents your left hand coming off the front handle so long as your left thumb is held correctly under the handle.

Throttle lock-out - ensures the throttle only functions when the rear handle is held securely. **Check daily that the trigger cannot be operated until the lockout is depressed.**

Anti-vibration mounts - reduces the amount of vibration felt by the operators hands. **They should be checked weekly for wear.**

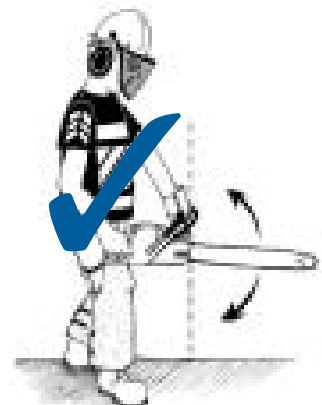
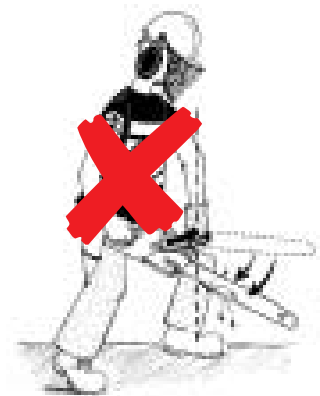
Rear hand guard - protects the right hand from debris and broken chains. **Check the chain for cracked rivets or links.**

On-Off switch - can quickly turn saw off with thumb when holding rear handle with the right hand. **Test daily to make sure the engine stops immediately.**



USING THE CHAINSAW SAFELY

- Never drop-start a saw: always use recommended starting methods.
- When using the saw do not over-reach: move your feet to get close to the cutting position.
- Use correct techniques to avoid cutting your left foot or leg.
- Use the lightest saw and shortest bar for the job, keeping the motor size and bar length balanced.
- Avoid cutting with the upper tip of the saw (increases chance of kickback).
- Do not operate the saw above shoulder height.
- Do not make cuts that result in logs rolling dangerously.
- When moving around, switch the saw off or engage the chainbrake and carry the saw in both hands.
- Refuel with the motor off, away from sources of ignition - no smoking.
- Use the decompression button when cold starting.



PERSONAL PROTECTIVE EQUIPMENT (PPE) and ACCESSORIES

The following PPE and accessories should be worn or carried by chainsaw operators:

- hi visibility helmet
- visor or safety glasses
- ear muffs
- hi visibility shirt, vest or garment - make sure it is clean
- chainsaw cut resistant chaps or trousers - replace if cut
- safety boots with steel toe cap - chainsaw resistant gumboots or leather boots
- first aid kit - fallers must include at least two large sterile wound dressings
- means of communication - whistle, radio, phone, pager and organise to check regularly on each other
- fire extinguisher
- approved fuel and oil containers
- tool belt and spares kit with all appropriate tools and component
- ensure chainsaw operators have:
- clothing that is close fitting enough to avoid tangling in vegetation
- easy access to drinks and snacks.

The big picture

Having a healthy and happy crew is good business. Management commitment towards worker health and safety can go a long way towards helping reduce the risk of injury and illness.

Planning

- Rotate workers between tasks that do and do not require a chainsaw.
- Plan the landing to allow an adequate safe area for easy chainsaw maintenance.
- Make sure that production pressure does not encourage short-cuts by chainsaw users.

Supervising

- Ensure chainsaw operators routinely check and maintain their saw daily.
- Ensure workers take regular breaks and have access to drinks and snacks.
- Check that all users of chainsaws have appropriate PPE, which is regularly checked and well maintained.
- Make sure workers keep appropriate distances from each other and machines.
- Organise attendance at regular refresher courses to reinforce good practice.
- Make sure chainsaw operators have their first aid kits including large sterile dressings.

Training/education

- Train workers in all aspects of chainsaw use so they recognise hazards, perform well and do not take risks.
- Practice emergency drills regularly.

Monitor/review

- Encourage near miss reporting and address the issues raised.
- Have regular safety meetings, listen to staff suggestions, and work as a team.

FOREST SAFETY GUIDANCE LEAFLET 8

Case Study

The problem

Contractor Dave was finding that the quality control of one of his new skiddies needed more work. He was not cross-cutting straight and he often complained of being tired. However, the skiddie was using the right log cutting techniques, drinking plenty of fluid, eating regularly and resting so neither of them was sure what the problem was.

The issues

Contractor Dave tried the skiddie's saw and noticed it cut slowly and not straight. Also it produced clouds of smoke and fumes. The skiddie reckoned he looked after it but realised his saw performed worse than his mates.

What to do

Contractor Dave helped the skiddie brush up on his maintenance techniques. He encouraged the skiddie to put the time and effort into looking after his saw, to save time in the long run. They brushed up on a few simple maintenance fixes on the saw (clean fuel and air filters), tuning the saw and evened the chain using a file guide.

The results

The effort resulted in much improved performance and less load on the skiddie. Contractor Dave kept an eye on him for a while to ensure he kept his saw up to scratch. He also reviewed the other skiddies' maintenance techniques and checks, making life easier for the workers and more productive for Dave.

Further information

This Guidance Leaflet has been prepared by the "ACC Safer Industries Working Group" which has representatives from ACC, COHFE, Forest Industry Contractors Association and Forest Industries Training. This leaflet has notes on good practice that are not compulsory but may be helpful when considering what to do. It is a reference tool to help **supervisors/foremen** ensure that safe working practices are carried out at their forestry worksites.

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