

Tools make our everyday tasks easier and allow us to finish our work much quicker. However, the improper use of tools or the failure to maintain them can lead to serious injuries. Being aware of common risk factors and proper operating procedures can prevent accidents and injuries caused by hand and power tools.

WHAT SAFETY PRECAUTIONS ARE NEEDED BEFORE USE?

Before operating a power tool, follow these important safety guidelines to minimize injury.

1. **Use the correct tool for the task.** Users expend much more uncontrolled energy using the wrong tool. It also damages the tool for safe use in the future.
2. **Do not wear loose clothing.** Loose clothing or clothing with strings may get caught in rotating parts.
3. **Wear appropriate personal protective equipment** (e.g., safety glasses with side shields, face shields, and hearing protection).
4. **Check that power tools are properly grounded and double-insulated.** NEVER remove the ground prong or use a two-prong adapter.
5. **Keep all bystanders at a safe distance.** Only operators need to be in the area where tools are being used. Maintain a safe and clear perimeter around operable power tools.
6. **Ensure all guards and shields are in place** before turning on equipment.
7. **Make sure all cords/hoses are away from heat, oil, or sharp edges.**
8. **Secure materials with clamps or a vise.**



WHAT I NEED TO DO...

- Learn how to safely operate tools.
- Use the correct tool for the job.
- Use appropriate personal protective equipment (if applicable).
- Ensure that:
 - Tools are in a safe, operable condition.
 - Power tools are properly grounded.
 - Guards and shields are in place.
 - Tools are put away and properly stored. Do not store food or drink in work areas.
- Contact injuryprevention@usc.edu or EH&S at (323) 442-2200 for more information.

WHAT SAFETY MEASURES ARE TAKEN AFTER USE?

1. **Never disconnect power tools from the electrical outlet by pulling on the power cord.**
2. **Keep tools in good condition.** Refer to owner's manual for proper maintenance.
3. **Unplug power tools before changing blades, bits, or servicing the equipment.**
4. **Safely store tools when not in use.** Lock out power tools to prevent unauthorized use.
5. **Remove damaged tools from service.**

REFERENCES

OSHA Safety & Health Topics: Hand and Power Tools
<https://www.osha.gov/SLTC/handpowertools/index.html>
National Safety Council Publication 00007-7773: 5 Minute Safety Talk - Hand Tool Safety