Safety Hazards

Working Safely with Sharp Blades or Edges

On this page

Why is there a concern when working near sharp blades or edges?

How can this hazard be eliminated or the risk controlled?

What do I need to know about the safe use of hand tools with sharp blades?

What do I need to know about the safe use of power tools with sharp blades?

How can I work safely with broken glass and dishware?

Why is there a concern when working near sharp blades or edges?

The most common concern when using sharp blades or edges is an injury, such as a cut (laceration, puncture) or an amputation.

Tools or equipment with sharp blades or edges can include:

- knives and other utensils
- box cutters, utility knives, safety cutters, etc.
- scissors
- equipment with blades or moving parts, such as food processors, mixers, meat grinders, etc.
- glasses, dishes, etc., especially when broken or chipped
- food wrap container blades, cans that have been opened, etc.
- razor blades

Also see the OSH Answers Needlestick and Sharps Injuries for more information.

How can this hazard be eliminated or the risk controlled?
Most reliable option is to eliminate the use of the blade. Assess if there is another way to cut the item, open the package, automate the process, or use a different tool.

Next, assess if there is another way to reduce the need for using the blade (e.g., slicing, cutting or trimming). Is there a different type of blade or tool that will do the job safer (e.g., covered blades, fixed guards, non-exposed blades, spring backs, tape splitters, pliers, snips, etc.)?

If these options are not possible, the following steps may help to reduce the risk of injury.

What do I need to know about the safe use of hand tools with sharp blades?

To prevent cuts:

- Use the right tool for the job.
- Only use the tool only for the job it was designed for. For example, a knife should not be used as a pry bar, can opener, chisel, punch, awl, scraper, or screwdriver.
- Educate and train all staff in the safe use of any tool they may use.
- Inspect the tool before use.
- Make sure the blade is sharp. Dull blades require more force, increasing the chance of injury.
- Carry one tool at a time, tip and blade pointed down at your side.
- Work in a well-lit space so you can see what you are doing.
- Cut on a stable surface. Use a cutting board or slip-resistant matting to prevent the item from sliding on the counter.
- Where possible, use a mechanical device to hold the item.
- Hold the tool with your stronger hand.
- Use protective clothing such as cut-resistant or mesh gloves, especially for the holding hand. Safety glasses will protect the eyes if the blade shatters or breaks.
- Cut away from your body. Make sure no body parts are in the cutting path, or in the path the blade might take if it slips.

- If the tool has a retractable blade, retract it immediately after use, and retract it fully. Similarly, close scissors or snips when not in use.

- Place the tool at the back of the counter when not in use, with the sharp edge away from you.

- Store tools appropriately. For example, store knives securely in a knife rack or drawer, with the handles facing the front. Or, create racks, slots, or boxes near the work space to store the tool.

- When cutting food, clean the knife immediately after use or place it in a container labelled “knives only” near the sink.

- Throw out broken, dull, or rusty blades by placing them in a puncture-resistant container.

- Do not use excessive pressure when cutting.

- Do not try to catch a falling tool. Quickly move out of the way, let it fall, and then pick it up.

- Do not engage in horseplay with a tool in your hand.

- Do not engage in discussions with your co-workers while you are using a sharp tool. Stop cutting if you need to look up or focus on something else.

- Do not carry tools while carrying other objects.

- Do not carry an open tool in your pocket.

- Do not drop or leave a sharp tool in a place where it cannot be seen; for example, by placing other items on top of the tool or placing the tool in dish water.

- Do not pass or throw a tool to someone else. Place the tool or knife on the counter and let the other person pick it up. Tools like scissors can be passed in the closed position, handle first.

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**What do I need to know about the safe use of power tools with sharp blades?**

- Follow the manufacturer's instruction manual when you operate, clean, and maintain the equipment.

- Make sure that proper lock out/tag out procedures are in place and followed (e.g., unplug any broken or unsafe equipment, attach a warning tag, take it out of use, and tell your supervisor).

- Make sure that all guards and safety devices are in place and functioning properly.
• Make sure the cutting blades are sharp.
• Keep your hands away from the edges of cutting blades – make sure you can see both your hands (and all your fingers) as well as the cutting blades. Keep your eyes on the item you are cutting and know where your fingers are in relation to the blade.
• Keep your hands away from all moving parts, and avoid cleaning or brushing off moving parts such as cutting blades or beaters in mixers.
• Keep your hands out of feed hoppers and delivery chutes – use a pusher or stick to load the machine. Or, use a knife to finish cutting when the item becomes too thin for the slicer or blade.
• Turn off and unplug the equipment before trying to dislodge items, and before disassembling and cleaning.
• Put all guards and safety devices back in place after cleaning.
• If there are moving parts, cover or tie back your hair, tuck in loose or frayed clothing and remove your gloves and jewellery. All of these items can get caught in the equipment when it is moving or rotating.
• Keep the floor and work area around the equipment clear of debris or items you might trip over.
• Do not try reaching into any part of the equipment with your fingers.
• Do not bypass any guards or safety devices.
• Do not operate the equipment if you feel tired or unwell.

How can I work safely with broken glass and dishware?
• Use a dustpan and broom to pick up broken glass from the floor. Sweep a larger area to make sure all pieces are collected.
• Dispose of broken glass in a puncture-resistant container marked “broken glass only”. Seal the container before placing in the garbage.
• Pick up small loose pieces of broken glass with a damp paper towel and dispose of them in a puncture-resistant container.
• Do not pick up broken pieces with your bare hands.
• Do not walk in the area with bare feet.
• Do not use dishes and glassware with broken or sharp edges.
• Do not overload trays when collecting dirty glass or dishes.
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