www.AccurateBuilding.com
Copyright © 2004-2005
Date Published: 1974, 1976
ACCURATE BUILDING INSPECTORS ®
A Division of Ubell Enterprises, Inc.
Permissions For Reprints Contact: 1-800-640-8285

How To Use A Hacksaw

Though the hacksaw is specifically designed to cut through metal, it is often used to saw wood and plastic. And because of the unique frame design, the blade may be inserted both parallel and perpendicular to the frame, as shown in Figure 4. The technique for using a hacksaw is identical to that of a crosscut saw.

Utensils

Hacksaw frame
Hacksaw blade, 12" inches, with 24 teeth per inch
Table vise
Hacksaw blade, 12" inches, with 32 teeth per inch
C-clamp

Ingredients

Piece of pipe or heavy iron
Can of machine oil
Piece of sheet metal
Block of wood

1. Adjust hacksaw frame so end post and handle post are slightly more than 12" inches apart. This is done by putting pressure on the end post until frame releases from notch and can be moved.
2. Set forward and rear blade holders so pins are perpendicular to the frame (Fig. 4A).
3. Place the 24-teeth-per-inch blade onto the forward and rear pins so teeth are facing away from handle (Fig. 4B).
4. Turn wing nut so that blade is secure in frame. To operate effectively, blade must be under tension at all times.
5. Insert pipe securely into vise, one end protruding a few inches.
6. Grasping the hacksaw handle firmly in one hand, lay the blade on the pipe 1/2" inch from the vise. The closer to the vise you cut, the fewer the vibrations and the more accurate the cut.
7. Take long, easy strokes over the pipe until a groove is formed.
8. Continue the strokes, exerting additional, but not excessive pressure.
9. If the cutting becomes difficult, apply a few drops of lubricating oil to the blade.
10. Relieve pressure before cutting through the pipe. Also watch your toes when the pipe end falls to the floor.
11. Remove pipe from vise.

12. Remove blade from frame and replace with 32-teeth-per-inch blade.
13. Lay sheet metal onto piece of wood and clamp together with C-clamp. Insert both securely into vise, making sure that sheet metal is flush with the upper edge of the wood.
14. With the sheet metal facing you, lay the hacksaw blade on the wood and make several long, easy strokes as described above. You will notice that, as you cut the wood, you also cut through the sheet metal. Incidentally, this is the only safe method we know.
15. Do not twist blade and exert too much pressure, as this will break the blade.

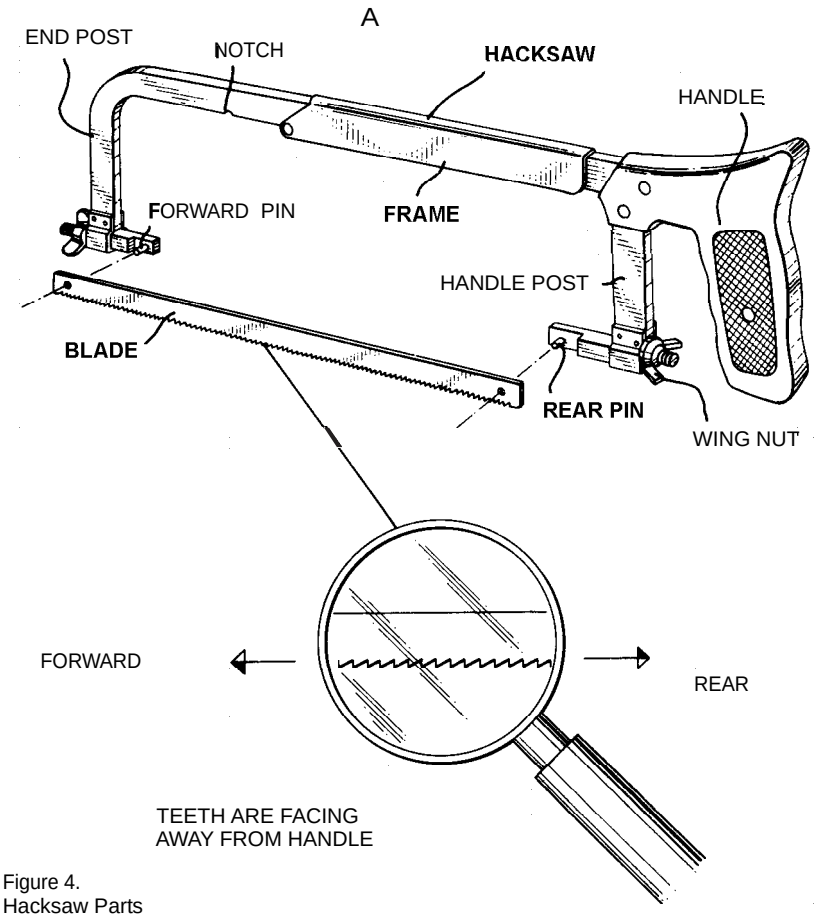

Figure 4.
Hacksaw Parts