

Safe Operating Procedures Bandsaw

DO NOT use this machine unless you have been through the check out process on its safe use and operation.



Safety glasses must be worn at all times in work areas.



Long and loose hair must be contained or restrained.



Appropriate footwear with substantial uppers must be worn.



Close fitting, protective clothing or a workshop apron is encouraged.



Rings and jewellery must not be worn.



A mask should be worn when excessive airborne dust is created.

PRE-OPERATIONAL SAFETY CHECKS

1. Visually check the area to ensure no slip or trip hazards are present in the workspace.
2. Ensure no slip/trip hazards are present in workspaces and walkways.
3. Locate and ensure you are familiar with the operation of the ON/OFF starter and EStop (if fitted).
4. Check that all guards are in position.
5. Ensure push stick is available.
6. Lower the blade guide and guard to full effect.
7. Start the dust extraction unit before using the saw.
8. Faulty equipment must not be used. Immediately report suspect machinery to the Shop Manager. Report issues in the SLACK #woodshop channel. Post a sign on equipment and or lock it out as needed.

OPERATIONAL SAFETY CHECKS

1. Never leave the machine running unattended.
2. The workpiece should be fed forward evenly and held firmly on the table to ensure effective control during cutting whilst keeping hands in a safe position.
3. Use a push stick when feeding material past the blade.
4. Do not force a wide blade on a cut of small radius. Use relief cuts when cutting sharp curves.
5. Before making adjustments switch off the saw and bring the machine to a complete standstill.
6. Stop the machine before attempting to back the work away from the blade.
7. Stop the saw immediately if the blade develops a 'click'. Report it to the manager.

GENERAL OPERATION

1. Put on Safety glasses and hearing protection.
2. All materials should be inspected for defects such as warps, knots and foreign objects.
3. Keep safety guards in place. Upper guide should clear stock by about 6 mm (1/4").
4. Make curved cuts gradually and use relief cuts for tight radius curves.

5. Never back out of curved cuts while machine is still running as this will result in the blade coming off. (You must wait until blade comes to a complete stop).
6. Make all cuts on the waste-side of the line.
7. Maintain a well-balanced position and feed work into blade firmly, but without pushing too hard.
8. Never start the machine with stock touching blade, never reach under the table, and never perform layout or setup on the table.
9. Turn machine off and disconnect from power source before installing or removing accessories, when finished cutting, before adjusting or changing set-ups, or when making repairs.
10. If blade breaks or there are any other issues during operation immediately stop the saw, leave the stock where it is, unplug the saw and report the incident to the shop manager. Report issues in the SLACK #woodshop channel. Post a sign on equipment and or lock it out as needed.

HOUSEKEEPING

1. Switch off the saw and reset all guards to a fully closed position.
2. Leave the machine, floor and workspace in a safe, clean and tidy state.

POTENTIAL HAZARDS & RISKS

- | | | |
|---|--------------------|----------------|
| ■ Rotating shafts and moving components | ■ Noise | ■ Entanglement |
| ■ Abrasive and sharp surfaces | ■ Pinch and squash | ■ Eye injury |
| ■ Wood dust | ■ Ejected waste | |

[DO NOT do these things.]

1. Attempting to cut very small items.
2. Cut cylindrical or irregular stock.

Date of last review _____

Signature _____

Adjustments



Unplug the machine from the power source before making any repairs or adjustments. Failure to comply may cause serious injury.

5.7.2 Table-to-blade squaring and 90° stop

11. Insert stop screw with nut (see HP6/8, Figure 5-5) into table.
12. Set a square on table top and against blade, as shown in Figure 5-7.
13. Loosen lock handle (L, Figure 5-5) and manually tilt table until table and blade are square.
14. Tighten lock handle (L).
15. Turn stop screw (HP6) until it contacts saw frame, and tighten hex nut (HP8) against table.
16. If needed, loosen screw and move pointer (M, Figure 5-5) to align with zero on scale. Retighten screw.

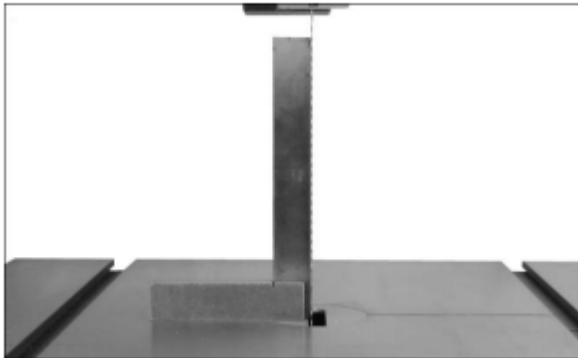


Figure 5-7 squaring table to blade

5.8.1 Fence to miter slot alignment

4. Slide fence against edge of miter slot (Figure 5-9) and tighten handle (E₂) to lock position. The fence should align parallel to miter slot along entire length of fence.
5. If adjustment is needed, loosen four screws (E₃, Figure 5-9) and shift fence body as needed to align fence with miter slot.
6. Tighten screws (E₃).

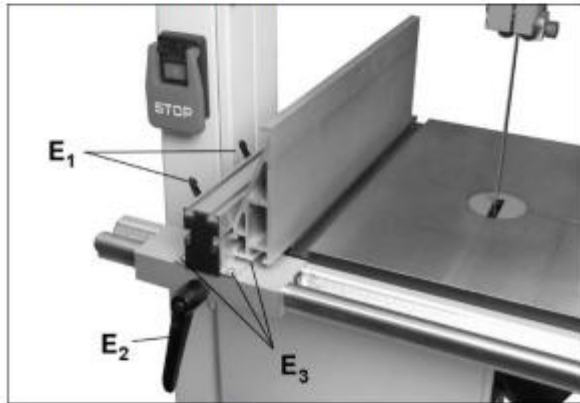


Figure 5-9

5.8.2 Fence to blade alignment

7. Set table at 90° to blade and lock in position.
8. Move fence against blade (do not deflect blade by pushing into it). See Figure 5-10.
9. Verify that fence, top-to-bottom, lies flat against side of blade. If it does not, loosen guide rail nuts (see HP6, Figure 5-4) and raise or lower one end of guide rail as needed.
10. Snug guide rail nuts. Do not fully tighten yet.

7.0 Adjustments

7.1 Resaw fence

Refer to Figure 7-1.

The fence can be installed in one of two positions; vertical (resaw position) or horizontal. Horizontal position is useful for small or thin workpieces, and allows blade guide to be lowered without interference from fence. Zero setting of cursor cannot be used with horizontal fence position.

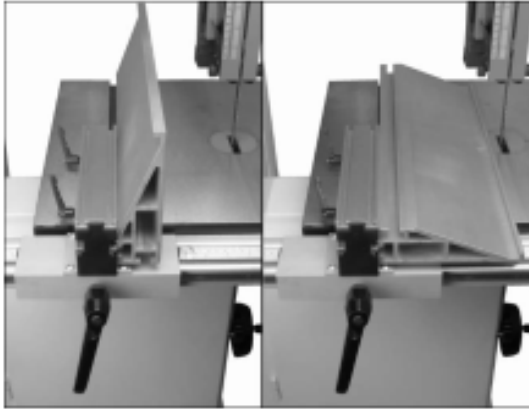


Figure 7-1: fence positions

7.2 Miter gauge

Refer to Figure 7-2.

1. Slide miter gauge into table slot from front edge of table.
2. Loosen knobs (A_1) and install miter fence (A_2) onto gauge body. Position fence as needed and tighten knobs.
3. Loosen handle (A_3), pull out pin (A_4), and rotate body to desired angle. Tighten handle.

7.2.1 Setting positive stops

The miter gauge has positive stops at 0 (90°), and 45° left and right, located beneath the gauge body.

4. Use a square to verify that miter fence is square to blade when set at 90° on scale.
5. If miter gauge is not square to blade, loosen handle (A_3) and adjust until square. Tighten handle.
6. Verify that pointer (A_5) shows 90° . If it does not, loosen screw and shift pointer to 90° . Tighten screw.
7. Adjust a stop if needed by loosening hex nut and rotating screw (A_6). Retighten nut.

The top channel on miter fence will accommodate accessory items, such as hold-downs. Remove end cap and install t-bolts into the channel.



Figure 7-2: miter gauge adjustments

7.3 Table tilt

Refer to Figure 7-3.

1. Disconnect machine from power source.
2. Loosen lock handle (B, Figure 7-3).
3. Tilt table up to 45 degrees to right (as viewed from operator side).
4. Tighten lock handle (B).

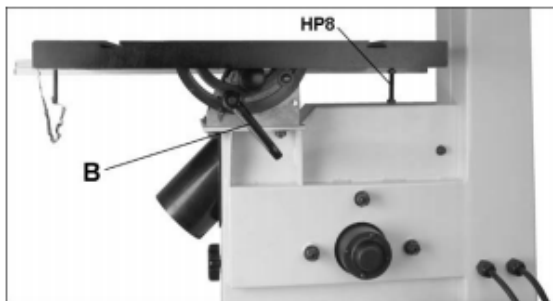


Figure 7-3: table tilt

7.4 Installing/changing blades

⚠WARNING

Disconnect machine from power source before installing blade.

⚠CAUTION

Wear gloves when handling blades. New blades are usually packaged in coiled position; to prevent injury uncoil them slowly and carefully while wearing work gloves and safety glasses.

See sect. 4.0 for blade requirements of the JWBS-14SFX.

1. Disconnect machine from power source.
2. Remove pin from table slot, and remove table insert.
3. Adjust upper and lower blade guides away from blade (see sect. 7.8 through 7.10).

5. Open upper and lower doors by rotating door knobs.
6. Remove dust block (C, Figure 7-4).
7. Carefully remove blade from top wheel, then from between upper and lower blade guides and lower wheel. Slide blade out through slot in table.
8. Guide new blade through table slot. Place blade loosely in upper and lower blade guides. Make sure blade teeth point down toward table, and toward front of saw.

(If the teeth will not point down, no matter how the blade is oriented, then blade is inside-out. Twist it into correct orientation and re-install it.)

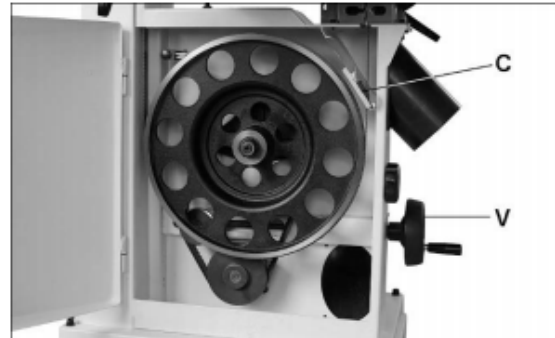


Figure 7-4

9. Position blade at center of upper and lower wheels.
10. Reinstall dust block, table insert and table pin.
11. Before operating band saw, the new blade must be tensioned and tracked, in that order. Refer to sect. 7.5 and 7.6.
12. The blade guides must also be set properly according to instructions in sect. 7.7 through 7.10.

7.5 Blade tension

Refer to Figures 7-5 and 7-6.

Blade tension should be checked following blade replacement, and periodically as the blade stretches from use.

1. Lower tension lever (D, Figure 7-5) to tension position.
2. Set proper blade tension by rotating handwheel (E, Figure 7-5), clockwise to tighten, counterclockwise to loosen.
3. The gauge (F, Figure 7-6) indicates approximate tension according to blade width in inches. Initially, set blade tension to correspond

Keep in mind that too little or too much blade tension can cause blade breakage and/or poor cutting performance.

Tip: When the band saw is not being used, raise tension lever to *release* position – this will prolong the life of blade and tires.

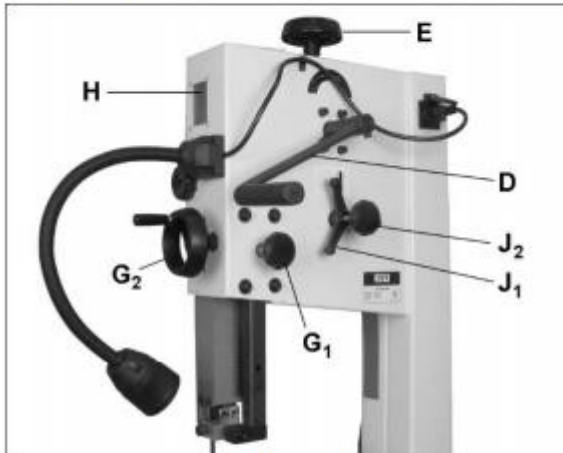


Figure 7-5

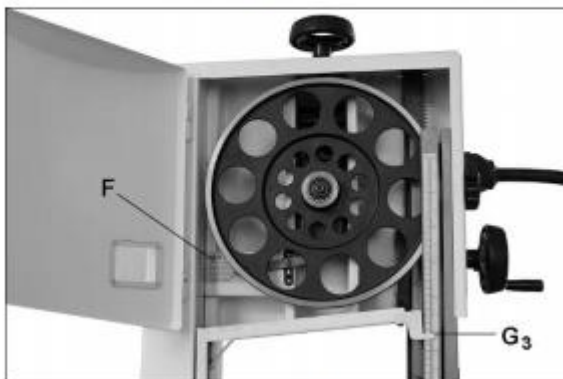


Figure 7-6