

WOOD CUTTING BAND SAW INSTRUCTION MANUAL



MODEL : WBS-14L

For your own safety, read instruction manual
before starting operations.

● SAFETY RULES

WARNING: FAILURE TO FOLLOW THESE RULES MAY RESULT IN SERIOUS PERSONAL INJURY.

- 1. FOR YOUR OWN SAFETY, READ INSTRUCTION MANUAL BEFORE OPERATING THE TOOL.** Learn the tool's application and limitations as well as the specific hazards peculiar to it.
- 2. KEEP GUARDS IN PLACE** and in working order.
- 3. ALWAYS WEAR EYE PROTECTION.** Wear safety glasses. Everyday eyeglasses only have impact resistant lenses; they are not safety glasses. Also use face or dust mask if cutting operation is dusty. These safety glasses must conform to ANSI Z87.1 requirements.
Note: Approved glasses have Z87 printed or stamped on them.
- 4. REMOVE ADJUSTING KEYS AND WRENCHES.** Form habit of checking to see that keys and adjusting wrenches are removed from tool before turning it on.
- 5. KEEP WORK AREA CLEAN.** Cluttered areas and benches invite accidents.
- 6. DON'T USE IN DANGEROUS ENVIRONMENT.** Don't use power tools in damp or wet locations, or expose them to rain. Keep work area **well** lighted.
- 7. KEEP CHILDREN AWAY.** All visitors should be kept safe distance from work area.
- 8. MAKE WORKSHOP KID PROOF** with padlocks, master switches, or by removing starter keys.
- 9. DON'T FORCE TOOL** it will do the job better and safer at the rate for which it was not designed.
- 10. USE RIGHT TOOL.** Don't force tool or attachment to do a job for which it was not designed.
- 11. USE PROPER EXTENSION CORD.** Make sure your extension cord is in good condition. When using an extension cord, be sure to use one heavy enough to carry the current your product will draw. An undersized cord will cause a drop in line voltage resulting in loss of power and overheating. **Table 1** shows the correct size to use depending on cord length and nameplate ampere rating. If in doubt, use the next heavier gage. The smaller the gage number, the heavier the cord.
- 12. WEAR PROPER APPAREL** Do not wear loose clothing, gloves, neckties, rings, bracelets, or other jewelry which may get caught in moving parts. Nonslip footwear is recommended. Wear protective hair covering to contain long hair.
- 13. ALWAYS USE SAFETY GLASSES.** Also use face or dust mask if cutting operation is dusty. Everyday eyeglasses only have impact resistant lenses, they are NOT safety glasses.
- 14. SECURE WORK.** Use clamps or a vise to hold work when practical. It's safer than using your hand and it frees both hands to operate tool.
- 15. DON'T OVERREACH.** Keep proper footing and balance at all times.
- 16. MAINTAIN TOOLS WITH CARE.** Keep tools sharp and clean for best and safest performance. Follow instructions for lubricating and changing accessories.
- 17. DISCONNECT TOOLS** before servicing; when changing accessories, such as blades, bits, cutters, and

the like.

18. **REDUCE THE RISK OF UNINTENTIONAL STARTING.** Make sure switch is in **off** position before plugging in.
19. **USE RECOMMENDED ACCESSORIES.** Consult the owner's manual for recommended accessories. The use of improper accessories may cause risk of injury or persons.
20. **NEVER STAND ON TOOL** Serious injury could occur if the tool is tipped or if the cutting tool is unintentionally contacted.
21. **CHECK DAMAGED PARTS.** Before further use of the tool, a guard or other part that is damaged should be carefully checked to determine that it will operate properly and perform its intended function-check for alignment of moving parts, binding of moving parts, breakage of parts, mounting, and any other conditions that may affect its operation. A guard or other part that is **damaged** should be properly repaired or replaced.
22. **DIRECTION OF FEED.** Feed work into a blade or cutter against the direction of rotation of the blade or cutter only.
23. **NEVER LEAVE TOOL RUNNING UNATTENDED. TURN POWER OFF.** Don't leave tool until it comes to a complete stop.
24. **MAKE SURE TOOL IS DISCONNECTED** from power supply while motor is being mounted, connected or reconnected.

SAVE THESE INSTRUCTIONS

● **ADDITIONAL SAFETY RULES FOR BAND SAWS**

1. If you are not thoroughly familiar with the operation of band saws, obtain advice from your supervisor, instructor or other qualified person.
2. Follow all wiring codes and recommended electrical connections. Make certain that the tool is properly grounded.
3. Make all adjustments with the power "OFF"
4. Always maintain proper adjustment of blade tension, blade guides, and blade support bearings.
5. Avoid awkward hand positions. A sudden slip could allow the hand to contact the blade.
6. Do not attempt to saw stock that does not have a flat surface, unless a suitable support is used.
7. Make sure blade is not contacting the workpiece before turning on the power switch.
8. Always keep hands and fingers away from the blade when the machine is running.
9. Hold workpiece firmly against table and feed into blade at a moderate speed.
10. Make sure that the saw blade teeth point downward toward the table.
11. **Adjust upper guide to just clear work piece.**
12. Disconnect machine from the power source when making repairs.
13. Replace all guards after servicing.

14. Turn off band saw if the material is to be backed out of an uncompleted cut.
15. Make relief cuts before cutting long curves.
16. Do not cut material that is too small to be safely supported.
17. Support long heavy work from the floor.
18. Before leaving the machine, make sure the work area is clean.
19. Important: When the tool is not in use, the switch should be in the “OFF” position and the power cord disconnected.
20. Do not remove jammed cutoff pieces until blade has stopped.

ON-OFF SWITCH PADLOCK – To safeguard the band saw from unauthorized operation and to avoid accidental starting by children or other not qualified to use, the use of padlock is required. To lock out the on – off switch, open the padlock, insert through the hole of the switch on button and close the **padlock**. Place the key in a location that is inaccessible to children and other not qualified to use the tool.

SWITCH WITH KEY – The switch key must be inserted into the switch before saw can operate. To lock the switch in the OFF position, remove the switch key from the switch. Place the key in a location that is inaccessible to children and others not qualified to use the tool.

● **GROUNDING INSTRUCTIONS**

1. All grounded, cord-connected tools:

In the event of a malfunction or breakdown, grounding provides a path of least resistance for electric current to reduce the risk of electric shock. This tool is equipped with an electric cord having an equipment-grounding conductor and a grounding plug.

The plug must be plugged into a matching outlet that is properly installed and grounded in accordance with all local codes and ordinances.

Do not modify the plug provided – **if** it will not fit the outlet, have the proper outlet installed by a qualified electrician.

Improper connection of the equipment-grounding conductor can result in a risk of electric shock. The conductor with **insulation** having an outer surface that is green with or without yellow stripes is the equipment-grounding conductor. If repair or replacement of the electric cord or plug is necessary, do not connect the equipment-grounding conductor to a live terminal.

Check with a qualified electrician or service personnel if the grounding instructions are not completely

understood, or if in doubt as to whether the tool is properly grounded.

Use only 3-wire extension cords that have 3-prong grounding plugs and 3-pole receptacles that accept the tool's plug.

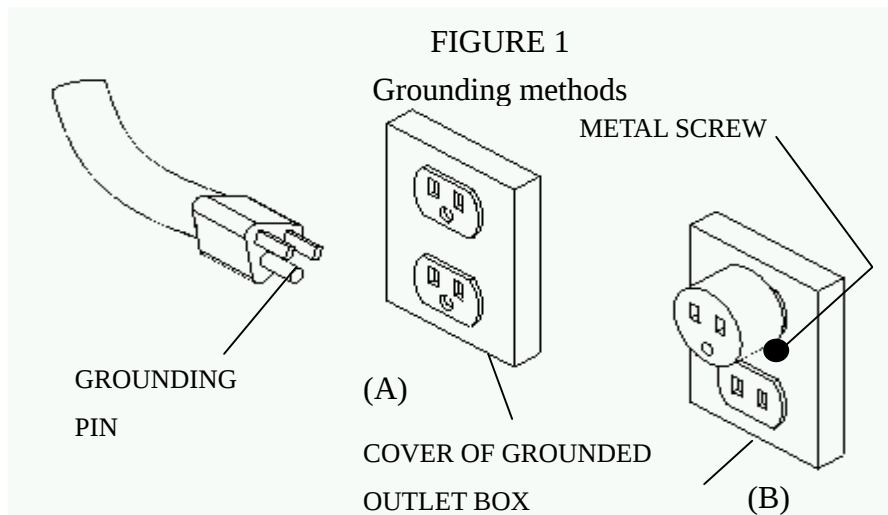
Repair or replace damaged or worn cord immediately.

2. Grounded, cord-connected tools intended for use on a supply circuit having a nominal rating less than 150 volts:

This tool is intended for use on a circuit that has an outlet that looks like the one illustrated in Sketch A in Figure 1. The tool has a grounding plug that looks like the plug illustrated in Sketch A in Figure 1. A temporary adapter, which looks like the adapter **illustrated** in Sketches B and C, may be used to connect this plug to a 2-pole receptacle as shown in Sketch B if a properly grounded outlet is not available. The temporary adapter should be used only until a properly grounded outlet can be installed by a qualified electrician. The green-colored rigid ear, lug, and the like, extending from the adapter must be connected to a permanent ground such as a properly grounded outlet box.

3. Grounded, cord-connected tools intended for use on a supply circuit having a nominal rating between 150-250 volts, inclusive:

This tool is intended for use on a circuit that has an outlet that looks like the one illustrated in Sketch D in Figure 1. The tool has a grounding plug that looks like the plug illustrated in Sketch D in Figure 1. Make sure the tool is connected to an outlet having the same configuration as the plug. No adapter is available or should be used with this tool. If the tool must be reconnected for use on a different type of electric circuit, the reconnection should be made by qualified service personnel; and after reconnection, the tool should comply with all local codes and ordinances.



Note : In Canada, the use of a temporary adaptor is not permitted by the Canadian Electrical Code.

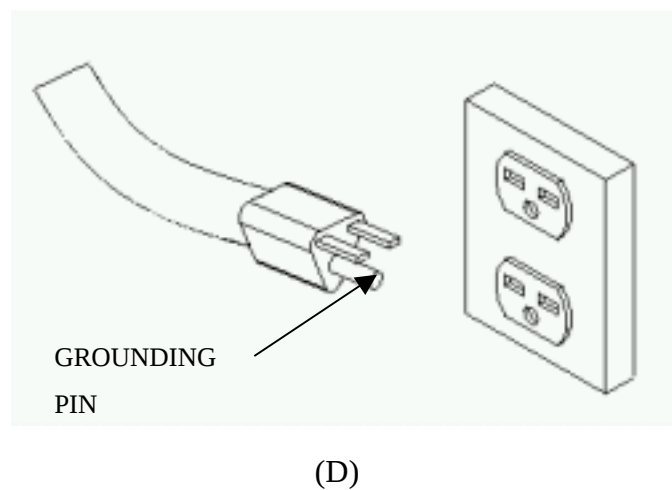
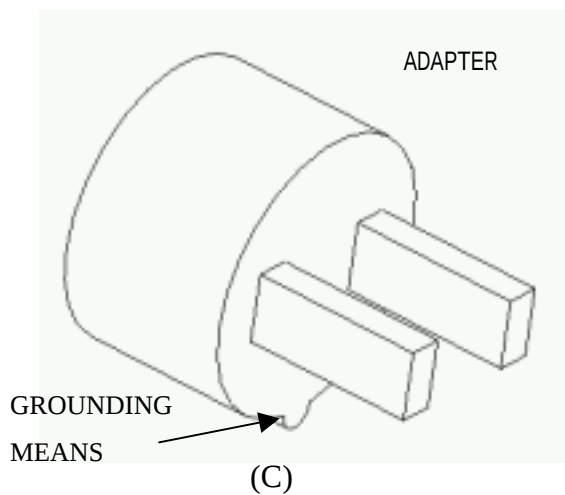
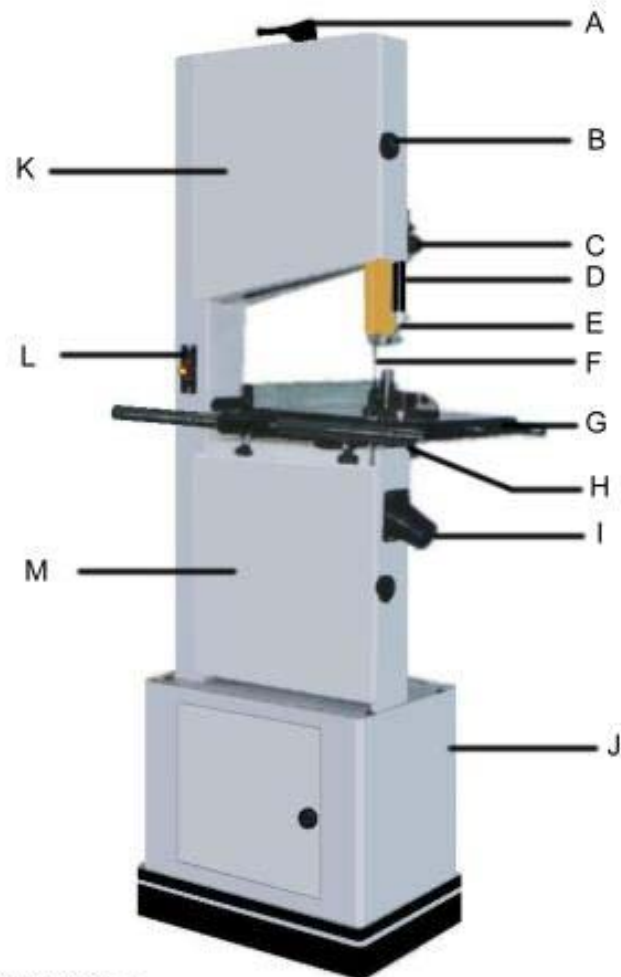


Table 1
Minimum gage for **cord**

Ampere Rating	Volta	Total length of cord in feet			
		25ft.	50ft.	100ft.	150ft.
More Than	Not More Than	AWG			
		18	16	16	14
0	6	18	16	14	12
6	10	18	16	14	12
10	12	16	16	14	12
12	16	14	12	Not	Recommended

- ADJUSTMENTS



- A. ADJUSTING HANDLE
- B. CROSS KNOB
- C. GUIDE BAR KNOB
- D. GUIDE BAR
- E. BLADE GUIDE SUPPORT(UPPER)
- F. BLADE
- G. TABLE
- H. BLADE GUIDE SUPPORT(LOWER)
- I. DUST CHUTE
- J. STAND
- K. UPPER WHEEL GUARD
- L. SWITCH
- M. LOWER WHEEL GUARD

Quick release / blade tensioning

Lifting the quick release handle to release blade tension. Remove blade and replace with new one. Turn down the handle to tighten blade. (Figure5)

Turn the handle clockwise to minor tighten blade tension and counterclockwise to release blade tension.

A blade under tension may also pull drive wheel out of alignment. Adjust alignment of drive wheel with tracking knob.

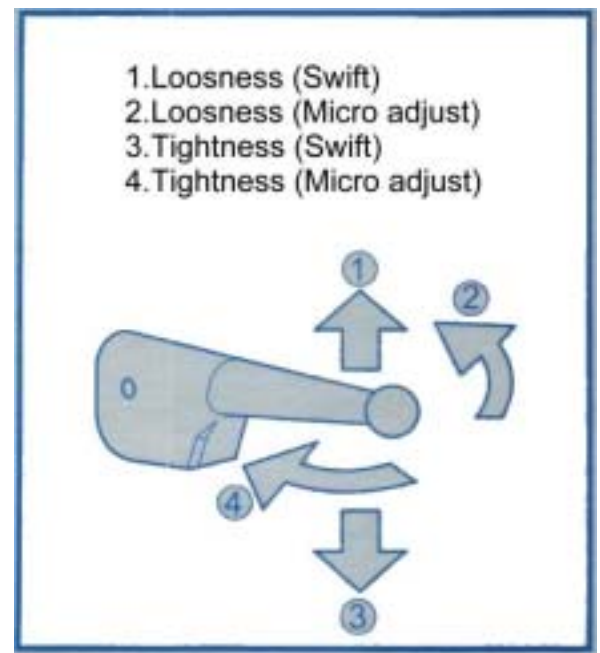
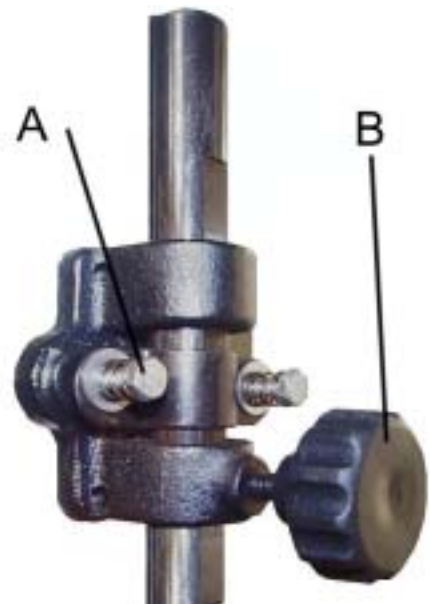


FIGURE 5

LOCATION OF BLADE GUIDE CONTROLS

- A. This spring-loaded bolts apply pressure against the U-clamp to prevent the guide post from dropping when the upper blade guide knob is loosened.
- B. This knob locks the upper blade guide assembly in position. The upper guide should be adjusted to within 1/4" of the workpiece for optimum blade support. Do not operate bandsaw without locking the guide post knob.



UPPER BLADE GUIDE ASSEMBLY

Whenever changing a blade or adjusting tension and tracking, the upper and lower blade support bearings and guide blocks must be re-adjusted. Always adjust the assemblies away from the blade before installing a new blade or making blade tracking adjustments. After blade tension and tracking are set correctly, re-adjust the upper and lower support bearings and guide block assemblies into position. See **Figure 8-1** for upper blade guide and **Figure 8-2** for lower blade guide.

The support bearings back-up the blade during the sawing operation. To adjust the support bearings, loosen the screws the support bearing shafts. See **Figure 8-3**. Adjust the shafts in or out so that the upper and lower support bearings are within 1/64" of the back edge of the blade. Retighten the screws.

For optimum support, the guide block assemblies should be adjusted so they are just behind the gullet line (the hollow points) of the blade. To adjust the guide block assemblies, loosen the screws securing the guide block yoke assemblies. Move in or out in relation to the blade gullets. Once adjusted, retighten the screw.

Now adjust the guide blocks. Loosen the guide block screws and adjust each block so it is about 0.004" from the blade. This is about the same thickness as a piece of typing paper. Retighten the screws and turn the upper wheel by hand through a complete revolution for the blade length to ensure that the blade weld passes through the guide blocks unhindered.

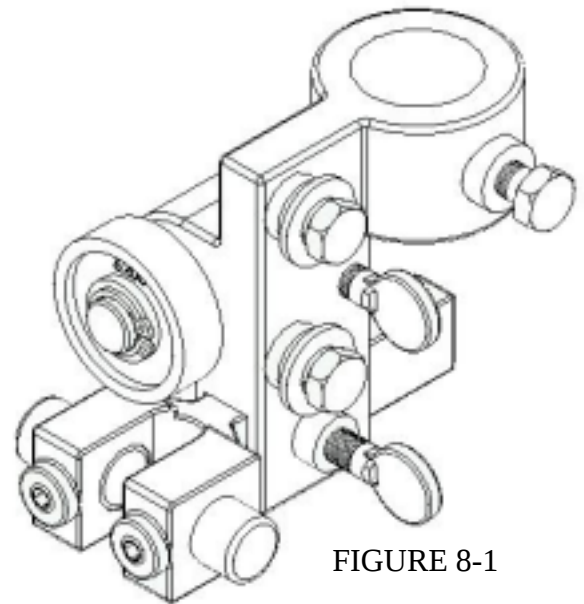


FIGURE 8-1

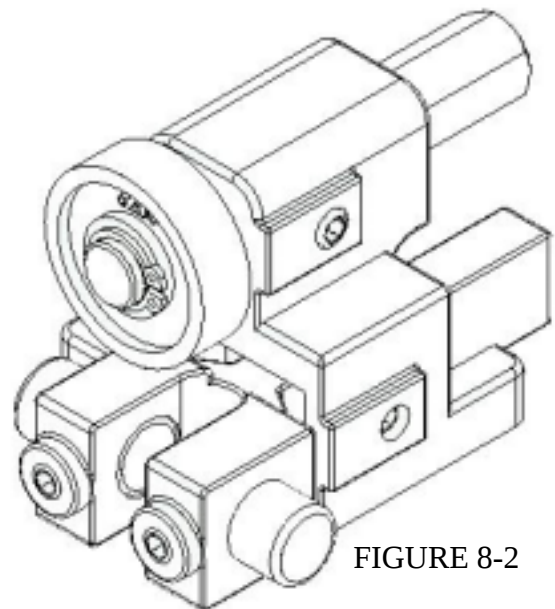


FIGURE 8-2

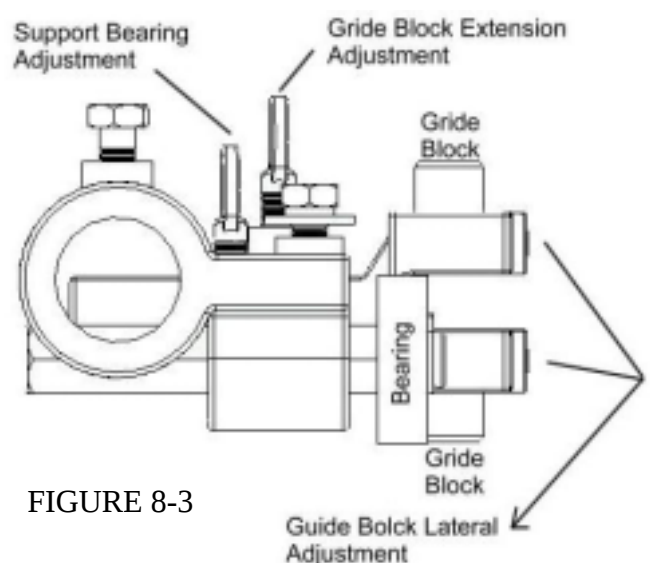
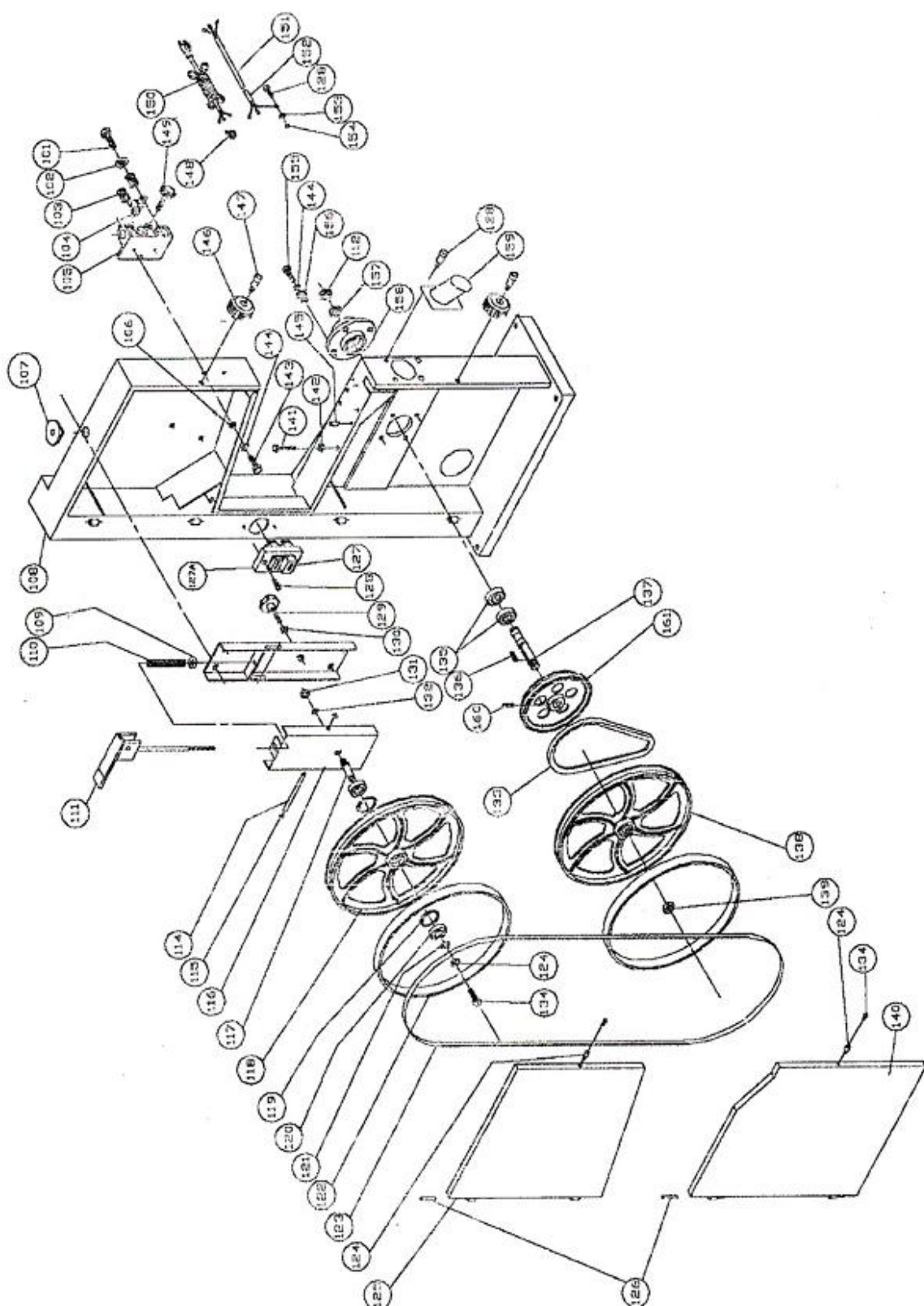


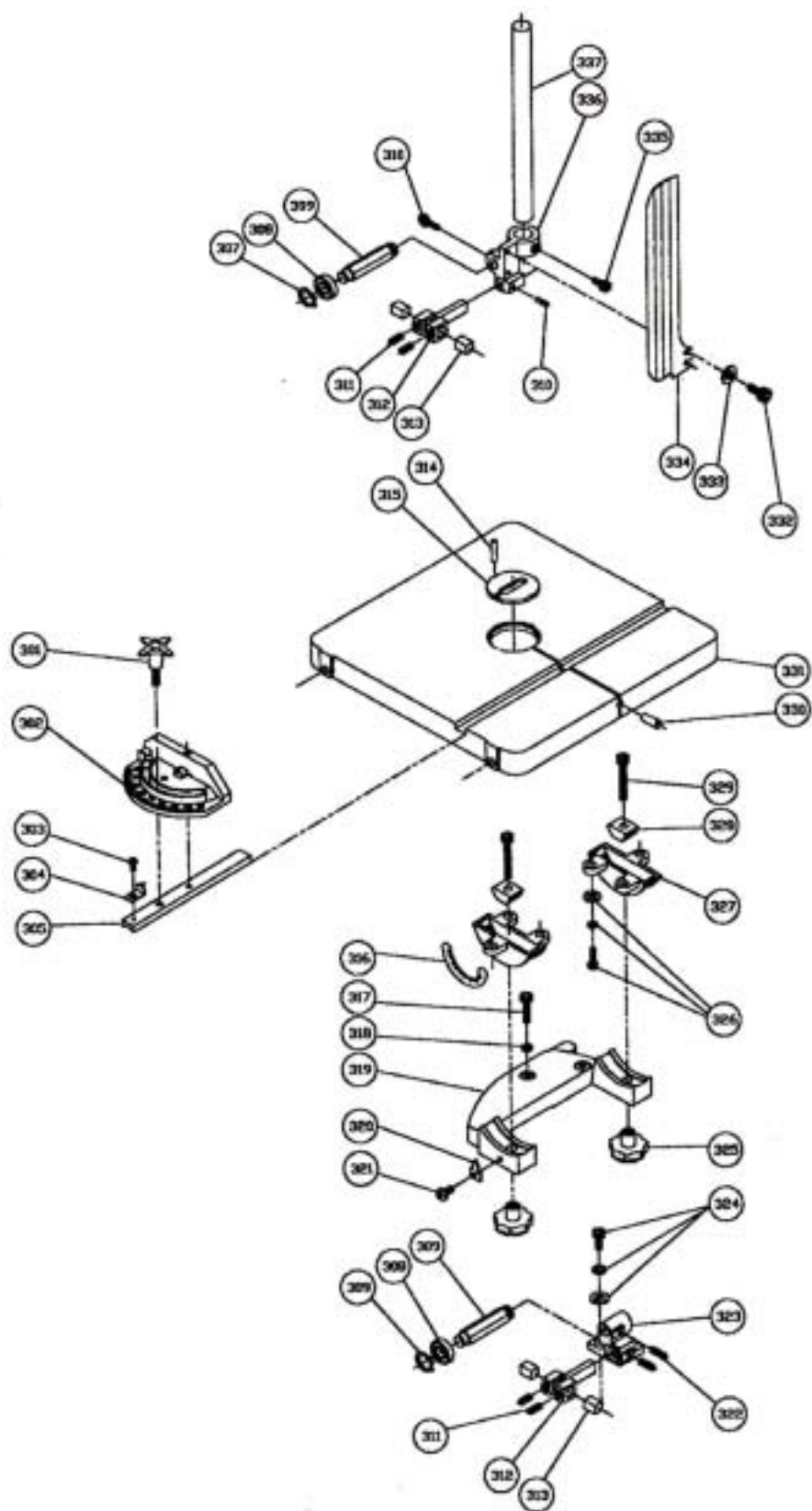
FIGURE 8-3



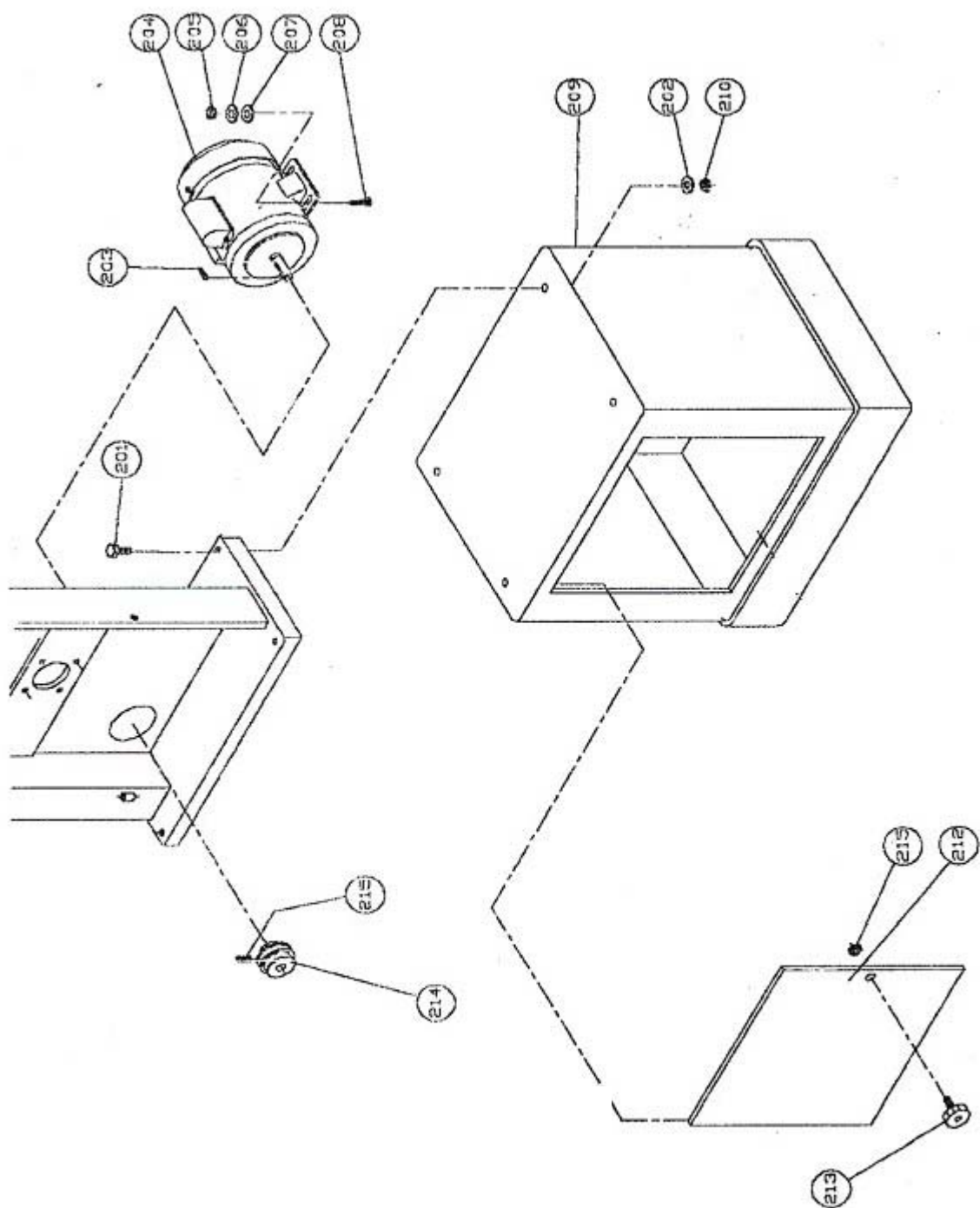
BAND SAW PARTS LIST

Item	Description
101	Screw – 5/16"
102	Washer – 5/16"
103	Spring
104	Bracket
105	Bar Setting Plate
106	Washer – 5/16"
107	Special Washer
108	Body
109	Special Nut
110	Spring
111	Quick-Release Handle
112	Dust Cover
113	
114	Guide Rod
115	C-Ring
116	Upper Wheel Mount
117	Upper Wheel Shaft
118	Upper Wheel
119	C-Ring
120	Bearing (6202ZZ)
121	Washer 1/4"
122	Rubber Tire
123	Blade
124	Lock Washer 1/4"
125	Upper Wheel Guard
126	Pin
127	Switch
127a	Switch Plate
128	Screw 3/16" x 1/2"
129	Tracking Knob
130	Nut 5/16"
131	Nut 1/2"
132	Lock Washer 1/2"
133	V-Belt
134	Cap Screw 1/4" x 3/8"
135	Bearing 6204ZZ
136	Key 5 x 5 x 40mm
137	Shaft
138	Drive Wheel
139	Nut 3/8", LH Thread
140	Lower Wheel Guard
141	Screw 3/8" x 3"
142	Nut 3/8"
143	Screw 5/16" x 5/8"
144	Lock Washer 5/16"
145	Pin
146	Guard locking Knob
147	Special Screw

Item	Description
148	Strain Relief
149	Knob
150	Power Cord
151	Motor Side
152	Switch Side
153	Lock Washer 3/16"
154	Nut 3/16"
155	Screw 5/16 x 1 1/2"
156	Adjusting Screw
157	Nut 5/8"
158	Bearing Housing
159	Adapter
160	Set Screw 1/4" x 1/4
161	Idler Pulley



ITEM	DESCRIPTION
301	Locking Bolt
302	Gauge
303	Pan Screw, 3/16" x 3/8"
304	Pointer
305	Gauge Bar
306	
307	C-Ring – C10
308	Bearing – 6200ZZ
309	Upper Spacing Sleeve
310	Screw 1/4" x 3/4"
311	Screw 1/4" x 1/2"
312	Support Bracket
313	Guide Block
314	Pin, 3 x 10mm
315	Table Insert
316	Scale
317	Bolt, 5/16" x 20mm
318	Washer, 5/16" x 20mm
319	Table Bracket
320	Pointer
321	Pan Screw, 3/16" x 3/8"
322	Set Screw 1/4" x 5/8" #20
323	Lower Support Bracket Post
324	Bolt, 1/4" x 3/4" #20
325	Locking Knob
326	Bolt, 1/4" x 3/4" #20
327	Trunion
328	Trunion Clamp Shoe
329	Bolt, 3/8" x 2 1/2" #16
330	Table Pin, 6mm x 30mm
331	Table
332	Bolt, 1/4" x 3/8", #20
333	Washer, 1/4" x 16mm
334	Upper Blade Guide
335	Screw, 1/4" x 16mm
336	Upper Support Bracket
337	Guide Post



BS14L LOWER CABINET PARTS LIST

ITEM	DESCRIPTION
201	SCREW 3/8"x 2"
202	WASHER 3/8"
203	KEY
204	MOTOR
205	NUT 5/16"
206	LOCK WASHER 5/16"
207	WASHER 5/16"
208	SCREW 5/16" x 5/8"
209	STAND
210	NUT 3/8"
212	STAND GUARD
213	KNOB
214	MOTOR PULLEY
215	SET SCREW 1/4" x 1/4"

TROUBLE SHOOTING GUIDE

PROBLEM	REASON & ACTION
Motor won't start	1. Bandsaw is not connected to power source → check, and connect it. 2. Switch is not in “on” position, or the switch is damaged. → Check, and restart. 3. Power cable is damaged → check, and replace. 4. Fuse blown or circuit breaker tripped. 5. Motor requires service.
Saw blade won't run when motor is running	1. Blade tension is not tight enough → turn motor off. Then adjust the blade tension knob to tension the blade. 2. Belt has slipped off the pulley → turn motor off check, and slip the belt onto the groove of the pulley 3. Blade has slipped off the wheel → turn motor off. Open upper wheel cover and lower wheel cover, and check. 4. Blade is broken → turn motor off. Replace blade
Blade makes unsatisfactory cuts of cuts slowly	1. Dulled blade → replace blade. 2. Blade has been contacted with hardened material → replace blade.
Blade is unable to track properly when operating	1. Blade support bearing is not properly adjusted → turn motor off. Then adjust 2. Blade tension is not properly adjusted → turn motor off. Then adjust. 3. Bad blade → Turn motor off. Replace blade.

Note : if the problem can not be finish. Please contact your local distributor for the help.