KING INDUSTRIAL

10” SCORING SAW WITH SLIDING TABLE

SHOWN HERE WITH OUTRIGGER TABLE AND SWING ARM MODEL: 360ST

* This manual also contains assembly and adjustment instructions for Outrigger Table and Swing Arm model 360ST.

MODEL: KC-36FXT

INSTRUCTION MANUAL

WARRANTY INFORMATION

2-YEAR LIMITED WARRANTY FOR THIS 10” SCORING SAW	**KING CANADA TOOLS OFFERS A 2-YEAR LIMITED WARRANTY FOR INDUSTRIAL USE.**

PROOF OF PURCHASE

Please keep your dated proof of purchase for warranty and servicing purposes.

REPLACEMENT PARTS

Replacement parts for this product are available at our authorized King Canada service centers across Canada. Please use the 10 digit part numbers listed in this manual for all part orders where applicable.

PARTS DIAGRAM & PARTS LISTS

Refer to the Parts section of the King Canada web site for the most updated parts diagram and parts list.

LIMITED TOOL WARRANTY

King Canada makes every effort to ensure that this product meets high quality and durability standards. King Canada warrants to the original retail consumer a 2-year limited warranty as of the date the product was purchased at retail and that each product is free from defects in materials. Warranty does not apply to defects due directly or indirectly to misuse, abuse, normal wear and tear, negligence or accidents, repairs done by an unauthorized service center, alterations and lack of maintenance. King Canada shall in no event be liable for death, injuries to persons or property or for incidental, special or consequential damages arising from the use of our products.

To take advantage of this limited warranty, return the product at your expense together with your dated proof of purchase to an authorized King Canada service center. Contact your retailer or visit our web site at www.kingcanada.com for an updated listing of our authorized service centers. In cooperation with our authorized service center, King Canada will either repair or replace the product if any part or parts covered under this warranty which examination proves to be defective in workmanship or material during the warranty period.

NOTE TO USER

This instruction manual is meant to serve as a guide only. Specifications and references are subject to change without prior notice.

KING CANADA INC. DORVAL, QUÉBEC, CANADA H9P 2Y4

www.kingcanada.com

GENERAL SAFETY INSTRUCTIONS FOR POWER TOOLS

1. KNOW YOUR TOOL
Read and understand the owners manual and labels affixed to the tool. Learn its application and limitations as well as its specific potential hazards.

2. GROUND THE TOOL.
This tool is equipped with an approved 3-conductor cord and a 3-prong grounding type plug to fit the proper grounding type receptacle. The green conductor in the cord is the grounding wire. **NEVER** connect the green wire to a live terminal.

3. KEEP GUARDS IN PLACE.
Keep in good working order, properly adjusted and aligned.

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. Make sure the floor is clean and not slippery due to wax and sawdust build-up.

6. AVOID DANGEROUS ENVIRONMENT.
Don't use power tools in damp or wet locations or expose them to rain. Keep work area well lit and provide adequate surrounding work space.

7. KEEP CHILDREN AWAY.
All visitors should be kept a safe distance from work area.

8. MAKE WORKSHOP CHILD-PROOF.
-with padlocks, master switches or by removing starter keys.

9. USE PROPER SPEED.
A tool will do a better and safer job when operated at the proper speed.

10. USE RIGHT TOOL.
Don't force the tool or the attachment to do a job for which it was not designed.

11. WEAR PROPER APPAREL.
Do not wear loose clothing, gloves, neckties or jewelry (rings, watch) because they could get caught in moving parts. Non-slip footwear is recommended. Wear protective hair covering to contain long hair. Roll up long sleeves above the elbows.

12. ALWAYS WEAR SAFETY GLASSES.
Always wear safety glasses (ANSI Z87.1). Everyday eyeglasses only have impact resistant lenses, thet are **NOT** safety glasses. Also use a face or dust mask if cutting operation is dusty.

13. DON'T OVERREACH.
Keep proper footing and balance at all times.

14. MAINTAIN TOOL WITH CARE.
Keep tools sharp and clean for best and safest performance. Follow instructions for lubricating and changing accessories.

15. DISCONNECT TOOLS.
Before servicing, when changing accessories or attachments.

16. AVOID ACCIDENTAL STARTING.
Make sure the switch is in the ''OFF'' position before plugging in.

17. USE RECOMMENDED ACCESSORIES.
Consult the manual for recommended accessories. Follow the instructions that accompany the accessories. The use of improper accessories may cause hazards.

18. NEVER STAND ON TOOL.
Serious injury could occur if the tool tips over. Do not store materials such that it is necessary to stand on the tool to reach them.

19. CHECK DAMAGED PARTS.
Before further use of the tool, a guard or other parts that are damaged should be carefully checked to ensure that they will operate properly and perform their intended function. Check for alignment of moving parts, breakage of parts, mounting, and any other conditions that may affect its operation. A guard or other parts that are damaged should be properly repaired or replaced.

20. NEVER LEAVE MACHINE RUNNING UNATTENDED.
Turn power ''OFF''. Don't leave any tool running until it comes to a complete stop.

SPECIFIC SAFETY INSTRUCTIONS FOR SCORING SAWS

1. ALWAYS USE A GUARD.
Always use a guard and splitter on all "thru-sawing" operations. Thru-sawing operations are those when the blade cuts completely through the workpiece as in ripping or crosscutting.

2. ALWAYS HOLD THE WORK.
Always hold the work firmly against the miter gauge or fence.

3. ALWAYS USE A PUSH STICK.
For ripping narrow stock. Refer to ripping applications in instruction manual where push sticks are covered in detail.

4. NEVER.
Never perform any operations "free-hand" which means using your hands to support or guide the workpiece. Always use either the fence or the miter gauge to position and guide the workpiece.

5. NEVER.
Never stand or have any part of your body in line with the path of the saw blade.

6. NEVER REACH BEHIND.
Never reach behind or over the cutting tool with either hand for any reason.

7. MOVE THE RIP FENCE.
Move the rip fence out of the way when crosscutting.

8. DIRECTION OF FEED.
Feed work into the blade against the direction of rotation.

9. NEVER.
Never use the fence as a cut-off gauge when you are crosscutting.

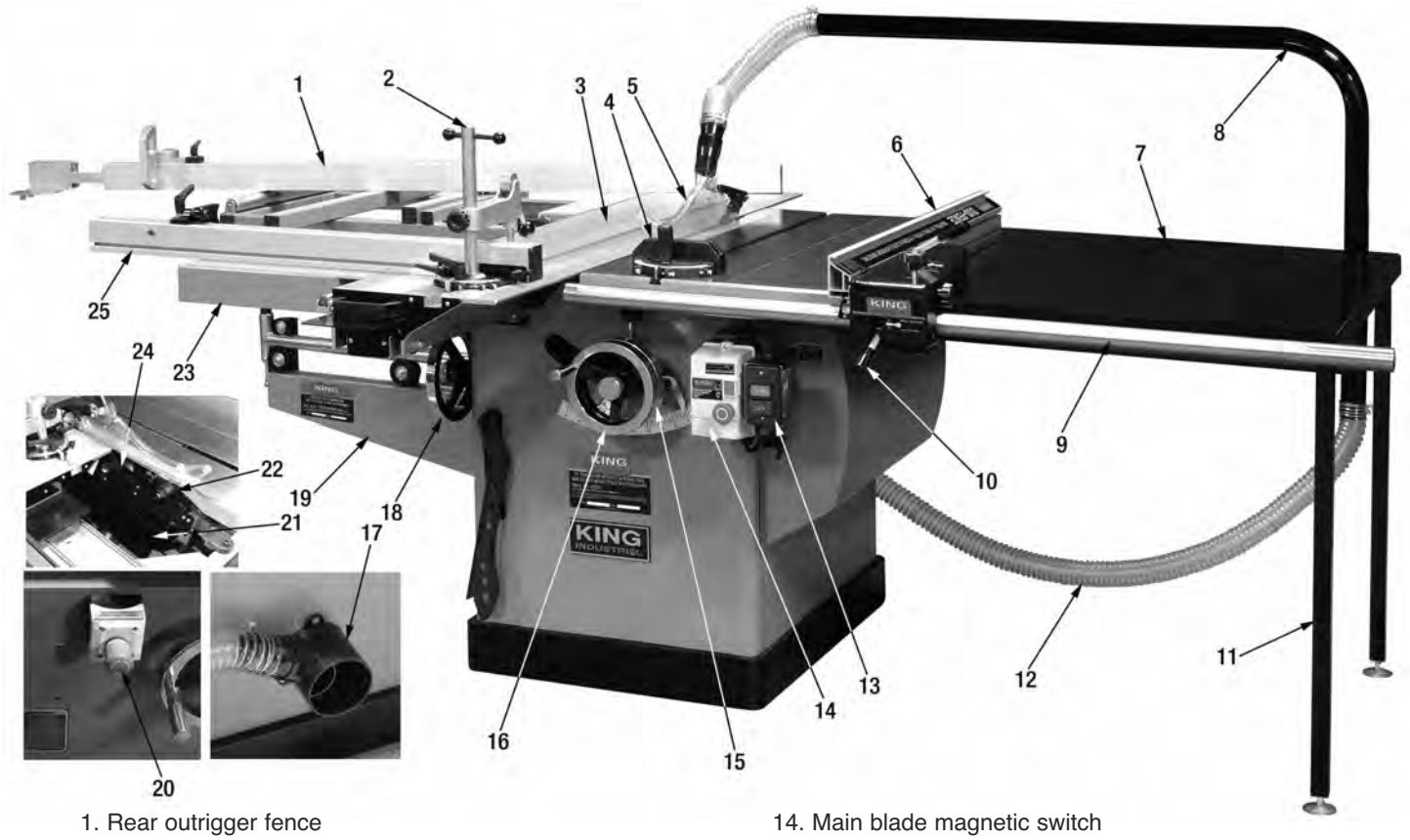
10. NEVER.
Never attempt to free a stalled saw blade without first turning the saw OFF.

11. PROVIDE ADEQUATE SUPPORT.
To the rear and sides of the table saw for wide or long workpieces.

12. AVOID KICKBACKS.
Avoid kickbacks (work thrown back towards you) by keeping the blade sharp, by keeping the rip fence parallel to the saw blade, by keeping the splitter and guard in place and operating, by not releasing work before it is pushed all the way past the saw blade, and by not ripping work that is twisted or warped or does not have a straight edge to guide along the fence.

13. AVOID AWKWARD OPERATIONS.
Avoid awkward operations and hand positions where a sudden slip could cause your hand to move into the spinning blade.

GETTING TO KNOW YOUR 10” SCORING SAW & SPECIFICATIONS



1. Rear outrigger fence
2. Miter hold-down
3. Sliding table
4. Miter gauge
5. Blade guard with riving knife
6. DUO-FENCE rip fence system with aluminum guide
7. Steel extension table
8. Dust extraction frame
9. Front rail
10. Rip fence lock lever
11. Extension table supporting leg (1 of 2)
12. Dust extraction hose
13. Scoring blade On/Off switch
14. Main blade magnetic switch
15. Scoring blade raising handwheel (rear)
16. Main blade raising handwheel
17. Dust chute with blade guard dust extraction port
18. Blade tilting handwheel
19. Outrigger table swing arm
20. Emergency stop button
21. Inner guard protected by limit switch
22. Scoring blade
23. Outrigger extension table
24. Main blade arbor
25. Outrigger fence

SPECIFICATIONS

MODEL	KC-36FXT
Blade and arbor diameters	10” / 5/8”
Scoring blade & arbor diameters	4” / 20mm
Maximum Dado width	3/4”
Maximum crosscut	55”
Maximum rip (right of blade)	50”
Maximum depth of cut at 90^0	3-1/8”
Maximum depth of cut at 45°	2-1/8”
Sliding table size	59-1/4” x 12-7/8”
Table size with extension	21-1/4” x 36-5/8”
Main motor/RPM	3 HP, 15.7 Amp., 4,200 RPM
Scoring motor/RPM	1/2 HP, 3.4 Amp., 8,000 RPM
Voltage	220V, 60 Hz, 1 phase
Assembled dimensions (LxWxH)/weight	128-1/8” x 63-5/8” x 51-1/2” / 840 lbs

ELECTRICAL REQUIREMENTS & SWITCH OPERATION

WARNING!

ALL ELECTRICAL CONNECTIONS MUST BE DONE BY A QUALIFIED ELECTRICIAN. FAILURE TO COMPLY MAY RESULT IN SERIOUS INJURY! ALL ADJUSTMENTS OR REPAIRS MUST BE DONE WITH THE MACHINE DISCONNECTED FROM THE POWER SOURCE. FAILURE TO COMPLY MAY RESULT IN SERIOUS INJURY!

GENERAL INFORMATION- 220V single phase operation

WARNING: YOUR SCORING SAW MUST BE CONNECTED TO A 220V, 1 PHASE 20 AMP. MINIMUM ELECTRICAL SUPPLY. FAILURE TO CONNECT IN THIS WAY CAN RESULT IN INJURY FROM SHOCK OR FIRE.

This Scoring Saw is intended for use on an electrical circuit that has an outlet and a plug which looks like the one illustrated in Fig.1.

WARNING: DO NOT USE A TWO-PRONG ADAPTER FOR THEY ARE NOT IN ACCORDANCE WITH LOCAL CODES AND ORDINANCES. NEVER USE IN CANADA.

GROUNDING

Your Scoring Saw must be properly grounded. Not all outlets are properly grounded. If you are not sure if your outlet is properly grounded, have it checked by a qualified electrician. If it should malfunction or breakdown, grounding provides a path of least resistance for electric current, to reduce the risk of electric shock. This Scoring Saw is not equipped with a power cord having an equipment-grounding conductor and grounding plug, one must be installed by a qualified electrician. Once power cord and appropriate plug is installed, the plug must be plugged into an appropriate outlet that is properly installed and grounded in accordance with all local codes and ordinances.

WARNING: TO MAINTAIN PROPER GROUNDING, DO NOT REMOVE OR ALTER THE GROUNDING PRONG IN ANY MANNER.

WARNING: IF NOT PROPERLY GROUNDED, THIS SCORING SAW CAN CAUSE ELECTRICAL SHOCK, PARTICULARLY WHEN USED IN DAMP LOCATIONS. TO AVOID SHOCK OR FIRE, IF THE POWER CORD IS WORN OR DAMAGED IN ANY WAY, HAVE IT REPLACED IMMEDIATELY.

220V OPERATION

A 220V 20 Amp. plug and power cord is not supplied with this Scoring Saw and must be purchased at your local hardware store. The 220V plug and power cord must be approved CSA, suitable for 220V 20 Amp. operation. This plug is illustrated in Fig.1. Contact your authorized service centre or qualified electrician to install the plug.

EXTENSION CORDS

The use of any extension cord will cause some loss of power. Use the table (Fig.2) to determine the minimum wire size (A.W.G-American Wire Gauge) extension cord needed. Use only 3-wire extension cords which have 3-prong grounding type plugs and 3-hole receptacles which accept the tool's plug.

For circuits that are further away from the electrical circuit box, the wire size must be increased proportionately in order to deliver ample voltage to the Scoring Saw motor. Refer to Fig.2 for wire length and size.

MAGNETIC SWITCH- MAIN BLADE

The magnetic switch (A) Fig.3 turns the main blade (10") on/off. Do not turn the Scoring Saw "On" until all assembly and adjustment instructions have been done.

To turn on the main blade, press the green start button (B) Fig.3. To stop the Scoring Saw, press the red emergency stop button (C). Once you push down on the emergency stop button (C), twist the button clockwise until it pops up, only then will you be able to restart the machine.

SWITCH- SCORING BLADE

The scoring blade has an independant switch (D) Fig.3 which turns the scoring blade (4") on/off. Do not turn the scoring blade "On" until all assembly and adjustment instructions have been done.

To turn on the scoring blade, press the green start button (E) Fig.3. To stop the scoring blade, press the red stop button (F).

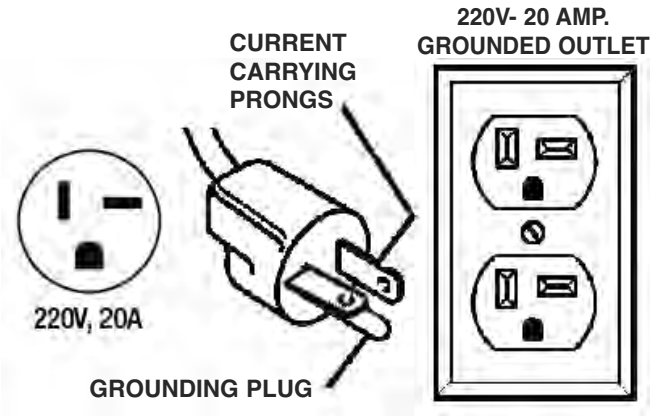


FIGURE 1

LENGTH OF EXTENSION CORD	WIRE SIZES REQUIRED (AMERICAN WIRE GAUGE) 220V LINES ONLY
0-25 FEET	NO.12
26-50 FEET	NO.12
51-100 FEET	NO.10

FIGURE 2

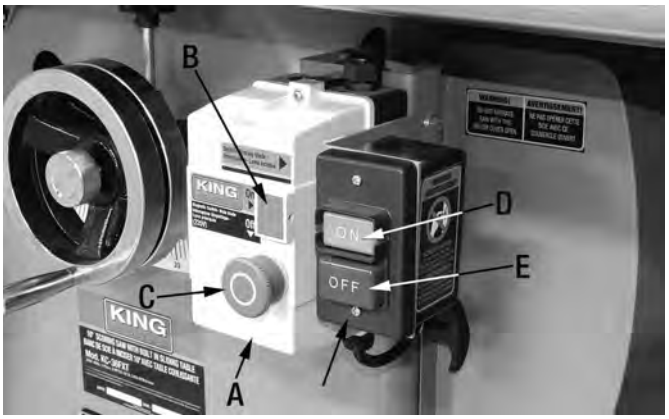


FIGURE 3

UNPACKING & ASSEMBLY

UNPACKING & CLEANING

Unpack the Scoring Saw and place it in an area where you have plenty of space to move freely around the saw (minimum space required: 130” x 65” x 52”). Place Scoring saw in a dry location, with adequate lighting. It is important to level the Scoring saw using shims (if floor is uneven), the Scoring saw must be stable before attempting to assemble parts.

The unpainted surfaces of your machine are coated with a heavy-duty anti-rust coating that prevents corrosion during shipment and storage. There are many ways to remove this anti-rust coating, make sure you work in a well-ventilated area to minimize exposure to toxic fumes. Basic steps for removing anti-rust coating:

1. Wear safety glasses.
2. Coat the anti-rust coating with a cleaner/degreaser, then let it soak for 5 minutes.
3. Wipe off the surfaces. If you have a plastic paint scraper, scrape off as much as you can first, then wipe off the rest with a rag.
4. Repeat until completely clean, then coat all unpainted surfaces with a quality paste wax or metal protectant to prevent rust.

INSTALLING SWITCH ASSEMBLY TO CABINET

1. Remove the switch assembly (A) Fig.4 from the inside of the saw cabinet. Mount switch assembly mounting bracket (B) to the cabinet as shown using two carriage bolts (C) and hex. nuts.

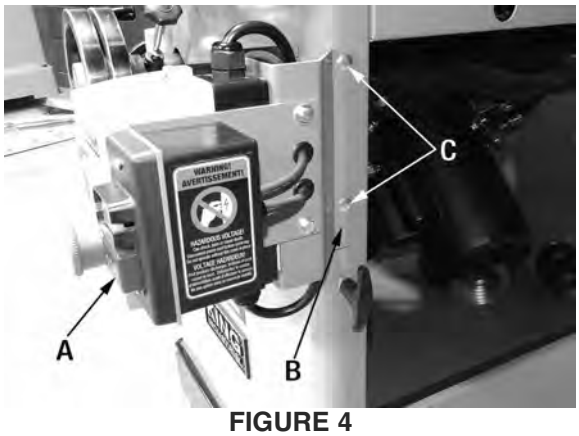


FIGURE 4

INSTALLING CAST-IRON EXTENSION TABLE

1. Install the extension table (A) Fig.5 to the right side of the main table (B) using 4 large hex. bolts, spring washers and washers (C). To allow adjustment, do not fully tighten the hex. bolts. Align the front edge of the extension table with the front edge of the main table.

2. Using a straight edge (D) Fig.5, level the extension table to the table surface as shown in Fig.5. Verify the adjustments, once the extension table is flush with the front and top of the main table, tighten all the 4 hex. bolts.

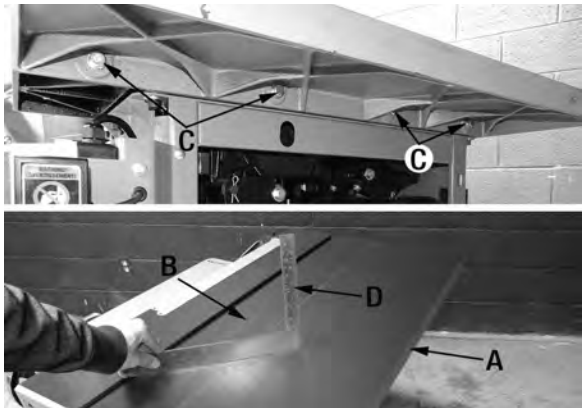


FIGURE 5

INSTALLING MOTOR ACCESS DOOR

1. To prevent air born saw dust, the motor access door (A) Fig.6 should be installed to the cabinet. Slide the motor access door hinges (B) into the hinge pins in the cabinet.

2. Pull out the door latch handle (C), then swing and close the access door and secure it closed by releasing the door latch handle over the notch in the motor access door.

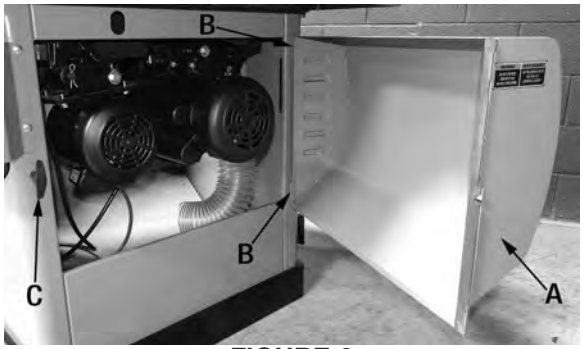


FIGURE 6

INSTALLING STEEL EXTENSION TABLE AND SUPPORTING LEGS

1. The steel extension table (A) Fig.7 gets mounted to the edge of the cast-iron extension table (B). Mount the steel extension table using 2 cap screws, spring washers and washers (A) Fig.8.

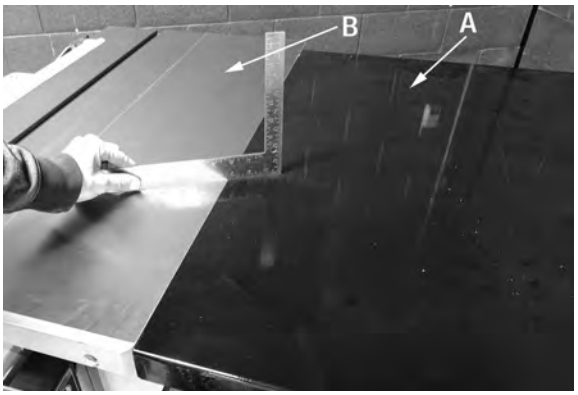


FIGURE 7

2. Place a straight edge on the steel and cast-iron extension tables as shown in Fig.7 and verify that the tables are perfectly flush. If an adjustment is needed, loosen the hex. nuts (B) Fig.8 at both ends of the extension table. Adjust the bottom set screws (C) to raise the table or adjust the top set screws (D) to lower the table. Once this adjustment is done, retighten all 4 hex. nuts (B).

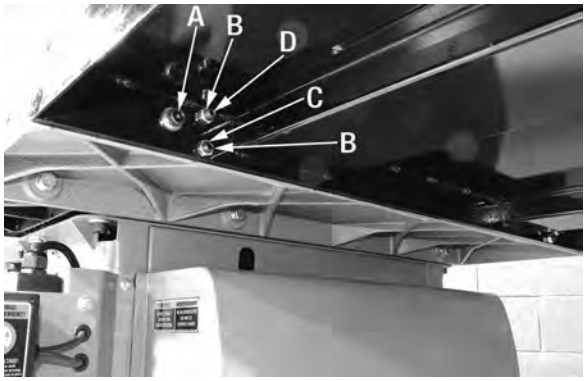


FIGURE 8

3. Fasten the 2 support legs (A) Fig.9 to the extension table using 4 hex. bolts, spring washers and washers (B). Once installed, the adjustment feet (C) must be adjusted properly to offer adequate support. Turn the adjustment feet until they both bottom out against the floor and tighten the upper hex. nut against each support leg to secure them in place.

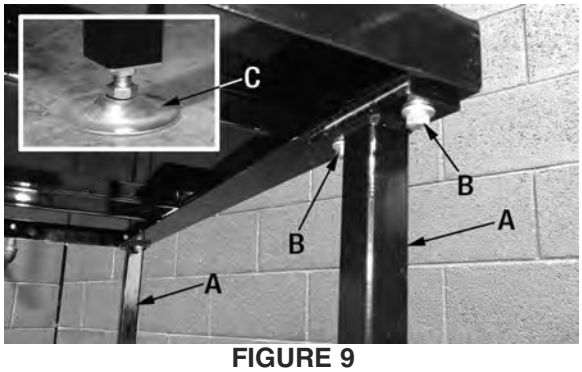


FIGURE 9

INSTALLING RIP FENCE BAR AND RIP FENCE

1. The rip fence bar (A) Fig.10 gets installed to the front of the main table, cast-iron extension table and the steel extension table. Remove one hex. nut and washer from all three shafts, then tighten the remaining hex. nuts up against the bar as shown in Fig.10.

2. Insert all three shafts of the rip fence bar into the mounting holes. To pevent the bar from falling, hand tighten a washer and hex. nut on each shaft under the tables.

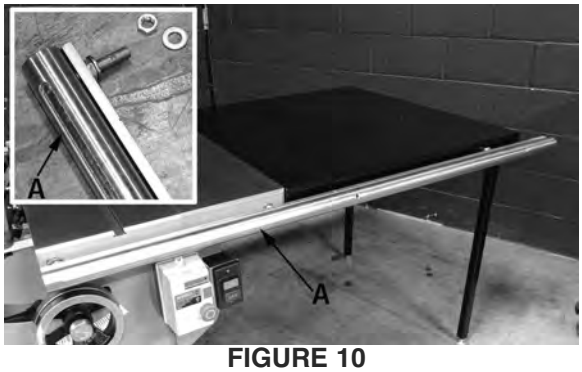


FIGURE 10

INSTALLING RIP FENCE BAR AND RIP FENCE continued...

3. Remove the stop washer (A) Fig.11 and cap screw (B) from the end of the rip fence bar (C).

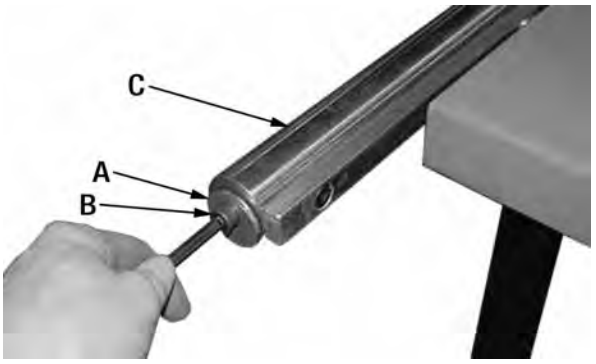


FIGURE 11

4. Slide the rip fence body (A) Fig.12 onto the rip fence bar and place it on the table.

5. Install the rip fence lever (B) Fig.12, then install the lock handle (C) into the rip fence body as shown.

6. Install the main lock lever (D) into the rip fence body as shown.

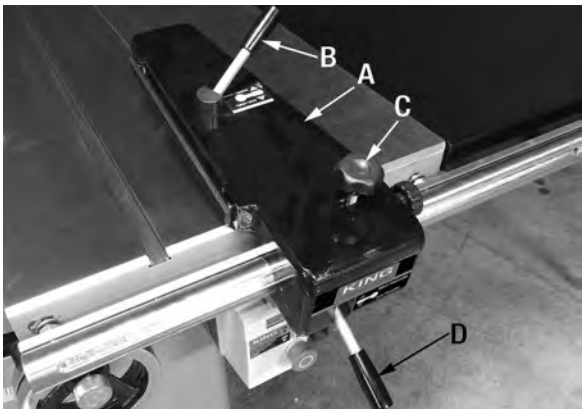


FIGURE 12

7. Align the slot of the rip fence face (A) Fig.13 (up or down position) with the t-bar (B) of the rip fence body, and slide fence face onto the rip fence body. Lock the face to the body by turning rip fence lever (C) Fig.12 clockwise.

FIGURE 13

8. Install rip fence pointer (A) Fig.14 using two pan head screws (B).

9. Move the rip fence so the face (C) lines up perfectly with the T-slot (D) of the main table. Lock the rip fence by lowering the main lock lever (D) Fig.12.

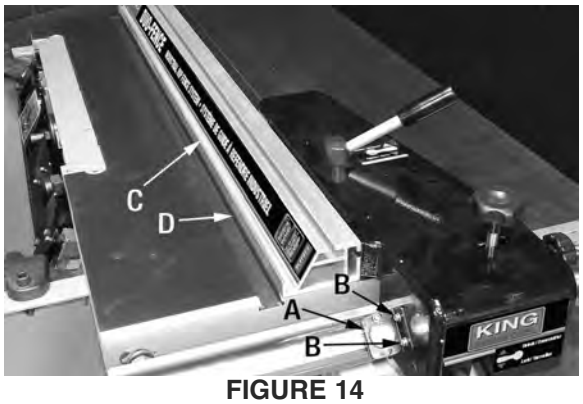


FIGURE 14

INSTALLING RIP FENCE BAR AND RIP FENCE continued...

10. It is now time to secure the rip fence bar at the correct distance from the tables. This adjustment can be tricky. Normally the rear square bar (A) Fig. 15 is set approximately 3/4" away from the tables, keep in mind that this is only a guideline. It is very important to make the following adjustments correctly so the rip fence bar is parallel to the tables and when the rip fence is locked, that it is also parallel with the main table T-slot.

11. Using a 17mm open end wrench, tighten hex. nut (B) Fig.15 up against the extension table until the face of the rip fence aligns perfectly parallel with the main table T-slot.

12. Then tighten the two remaining hex. nuts up against the tables and verify adjustment. These hex. nuts only need to touch the tables with little pressure, this will maintain the alignment of the rip fence.

13. Place a wrench on hex. nut (B) Fig.15 at the end of the bar and tighten the rear hex. nut (A) Fig.16 to secure that end of the rip fence bar. Repeat this step for the other two hex. nuts.

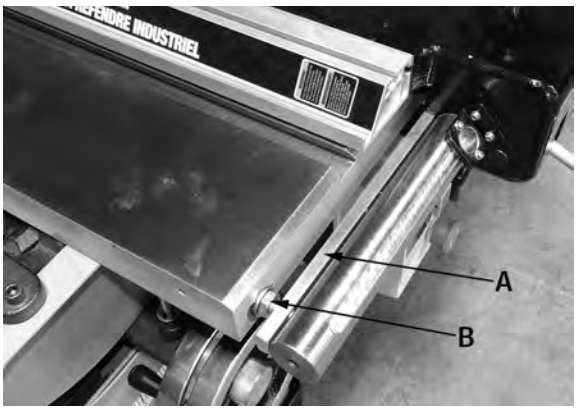


FIGURE 15

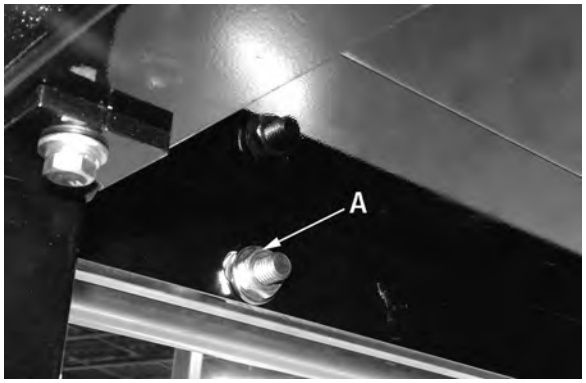


FIGURE 16

INSTALLING RIP FENCE SCALE ON BAR

IMPORTANT: THE FOLLOWING INSTRUCTIONS ARE DESCRIBED WITH THE FENCE FACE (A) FIG.17 IN THE DOWN POSITION. THE ORIENTATION OF THE FENCE FACE WILL DETERMINE THE ZERO MARK POSITION ON THE SCALE. IF YOU WANT THE FENCE FACE TO BE IN THE UP POSITION, SET THE FENCE FACE IN THE UP POSITION AND FOLLOW THE INSTRUCTIONS BELOW.

1. Unlock the rip fence (A) Fig.17. **Determine the desired position of the rip fence face and adjust accordingly**, then slide rip fence over until it comes in contact with the 10" saw blade as shown.

Note: Refer to the "Installing main blade" section for instructions on how to install blade.

2. Using a pen or thin marker, mark the rip fence bar (B) Fig.17 aligned with the pointer, this will mark the zero point of the scale.

3. Remove the rip fence from the machine. The recessed section of the rip fence bar must be perfectly clean and dry before installing scale.

4. Peel the backing off from the scale sticker, line up the zero mark on the scale with the thin marker line you made previously. Once perfectly aligned, stick the scale in the recessed section of the rip fence bar. Cut end of scale to fit.

5. Reinstall the rip fence on the machine, then reinstall the stop washer (A) Fig.11 and cap screw on the end of the rip fence bar. This will prevent the rip fence from sliding off the rip fence bar.

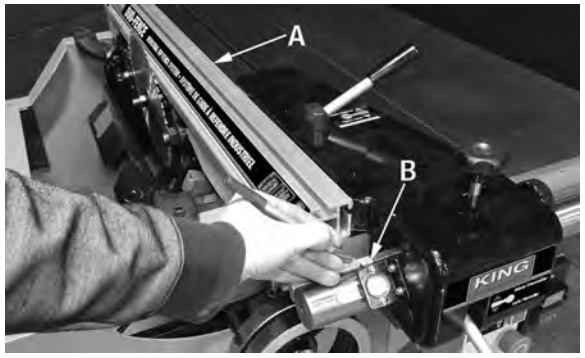


FIGURE 17

INSTALLING BLADE GUARD AND RIVING KNIFE ASSEMBLY

1. The blade guard with riving knife (A) Fig.18 gets installed in between the riving knife fixing plates (B) and is secured in place with the lock handle (C).

2. Pull the lock handle to release tension on the fixing plates. Slide the riving knife in between the fixing plate and push down to make sure it is fully inserted.

3. Push the lock handle back in to secure the riving knife.

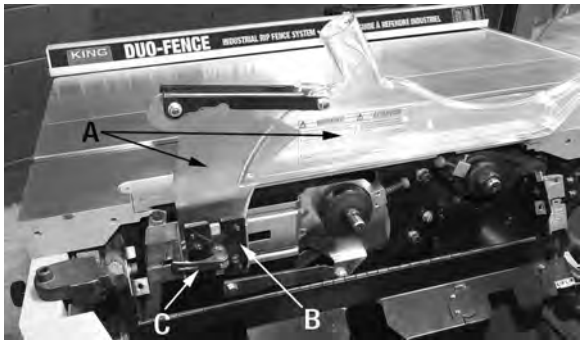


FIGURE 18

ASSEMBLY & ADJUSTMENTS

ADJUSTING BLADE GUARD AND RIVING KNIFE ASSEMBLY

1. The riving knife assembly has been factory set and should not require any adjustment. Over time it may be needed to re-adjust.

2. The riving knife plates (A) Fig.19 are held together with two locking screws (B). These two locking must be slightly loosened before an adjustment can be made. Loosen locking screws (B).

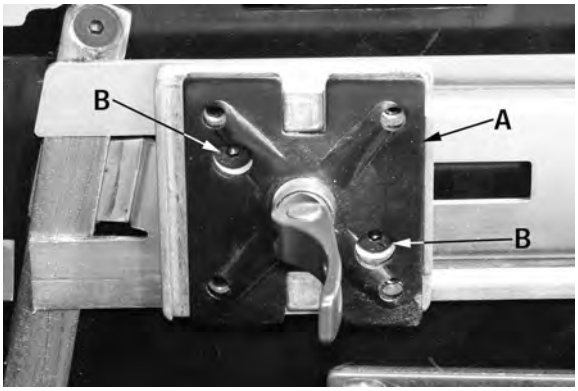


FIGURE 19

3. Make sure the blade is set at a perfect 90 degree, and is raised to its highest point. Raise blade guard out of the way, then place a square (A) Fig.20 on the table and up against the riving knife (B) as shown. If the riving knife is not at a 90 degree angle to the table, an adjustment can be made.

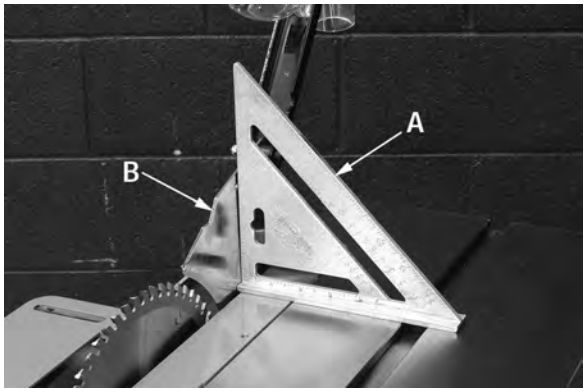


FIGURE 20

4. Pull the lock handle (A) Fig.21 to release tension on the fixing plates. Remove the blade guard and riving knife assembly.

5. To adjust the position of the fixing plates, adjust the upper or lower set screws (B) in the required direction to square the riving knife.

6. Reinstall the blade guard and riving knife assembly and verify your adjustment. Readjust if needed.

7. Once adjustment is done, retighten locking screws (B) Fig.19.

Note: The above adjustment also applies to setting the riving knife parallel with the blade. Place a straight edge against the main blade and the riving knife and follow the same instructions mentioned above.

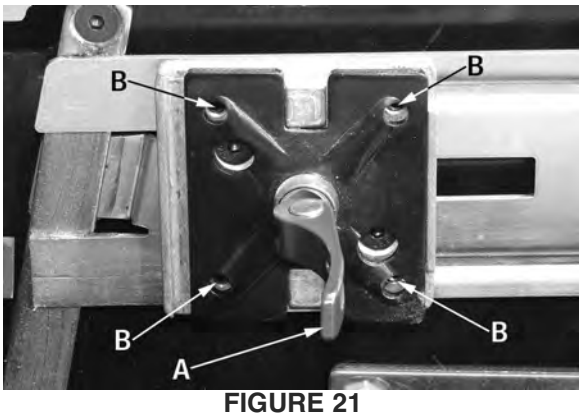


FIGURE 21

INSTALLING DUST COLLECTION SYSTEM

1. This machine comes with a dual collection system. Dust is collected from the inside of the cabinet and the blade guard.

2. Install the dual 4” dust chute (A) Fig. 22 to the rear of the cabinet as shown using 3 hex. bolts and hex. nuts (B).

3. From inside the cabinet, connect the 4” dust hose (C) to the dust chute (A) as shown and secure hose with wire clamp (D).

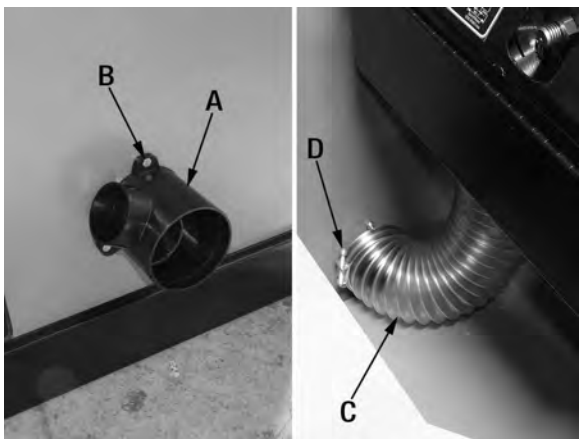


FIGURE 22

INSTALLING DUST COLLECTION SYSTEM continued...

4. This machine comes with a overarm 2” dust collection system. It allows you to connect a 2” hose directly from the blade guard to the overarm, and the overarm system allows you to connect the 2” hose to the 2” inlet on the 4” dust chute at the rear of the cabinet.

5. Install the overarm support brackets (A) Fig.23 to the rear of the cabinet as shown.

6. Position a rear plate (B) Fig.23 inside the cabinet, then fix the support bracket and spacers (C) to the cabinet using two cap screws, spring washers and washers (D). Repeat for the second support bracket.

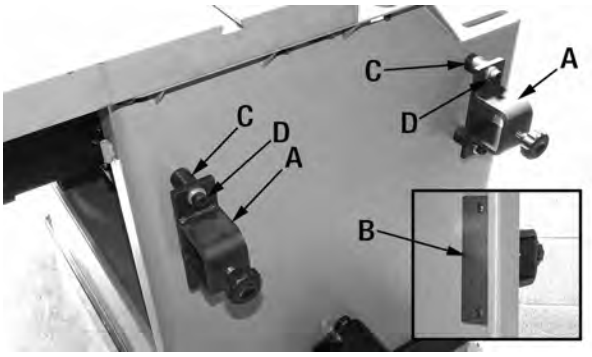


FIGURE 23

7. Slide the overarm tube (A) Fig.24 into the two support brackets (B) and secure it in place by tightening both lock knobs (C).

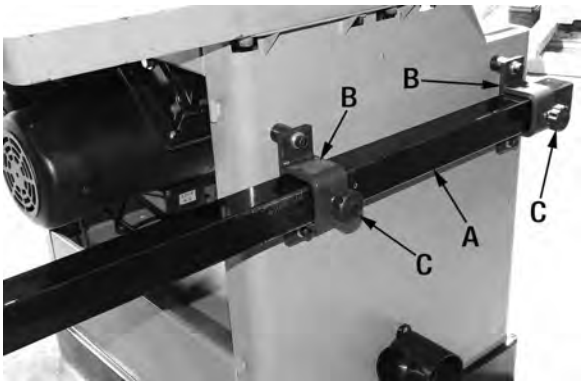


FIGURE 24

8. Install the fitting end of the short 2” hose (A) Fig.25 onto the blade guard dust chute (B) as shown. Install the other end of the 2” hose to the overarm (C) and secure it in place using a 2” wire clamp (D).

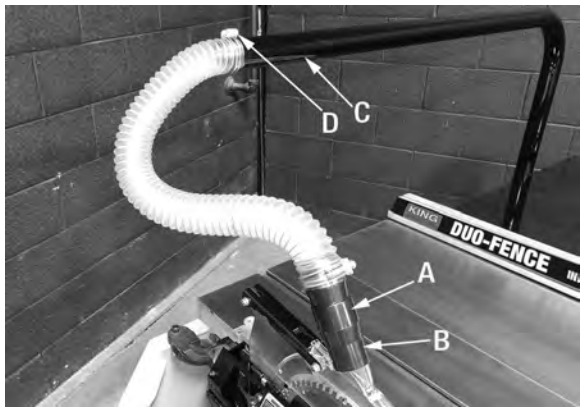


FIGURE 25

9. Install one end of the long 2” hose (A) Fig.26 to the overarm (B) as shown and secure it in place using a 2” wire clamp (C). Install the other end to the 2” inlet (D) on the 4” dust chute. Secure 2” hose using a 2” wire clamp (E).

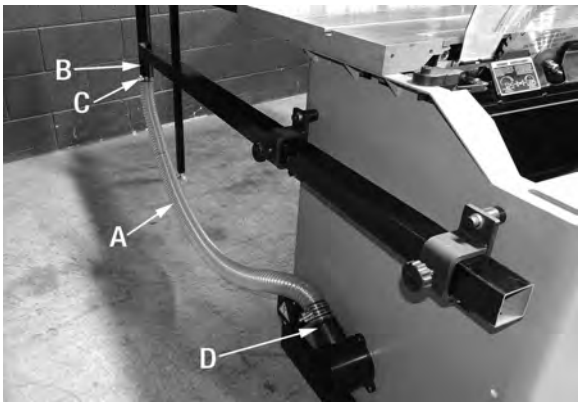


FIGURE 26

POSITIONING AND ADJUSTING MITER GAUGE

The miter gauge shown in Fig.27 gets installed on the right side of the blade by sliding the miter gauge bar into the table T-slot as shown. To operate the miter gauge, loosen lock knob (A) Fig.27, pivot the positive stop plate (B) out of the way and then pivot the miter gauge body (C) to the desired angle and retighten lock knob (A).

If you desire a preset positive stop such as 0^0 or 45^0 setting, loosen lock knob (A) Fig.27, pivot the positive stop plate (B) out of the way and slightly pivot the miter gauge body (C). Once you get close to the desired angle, reposition the positive stop plate (B), continue to rotate the miter gauge body until the positive stop plate comes in contact with the positive stop screw (D) as shown, once the preset angle is set, retighten lock knob (A).

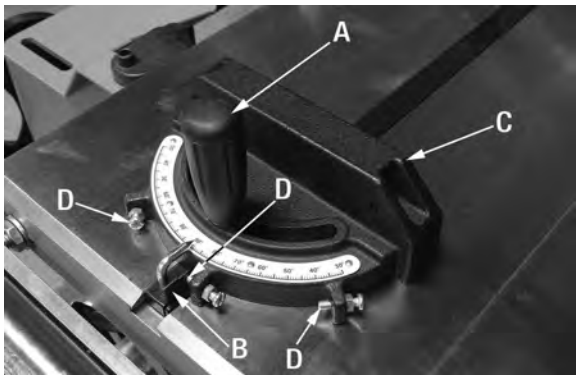


FIGURE 27

INSTALLING SLIDING TABLE

1. Position the sliding table (A) Fig.28 upside down and remove the 4 top hex. nuts (B) and 4 washers (C), this hardware will be used to secure the sliding table from inside the cabinet. Also remove the 2 steel plates (D) and the 4 washers underneath the steel plates.

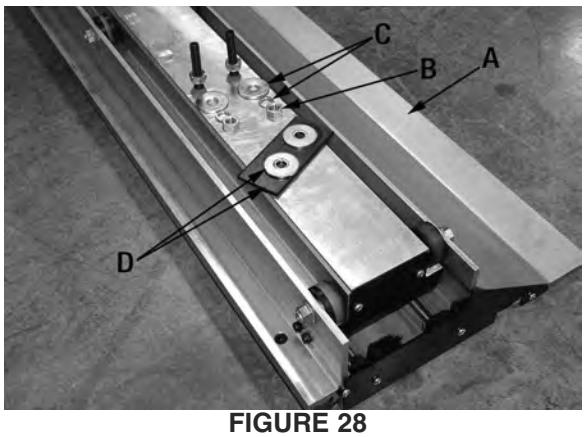


FIGURE 28

2. Position the steel plates (A) Fig.29 on the cabinet, make sure they line up with the mounting holes in the cabinet. Then place 4 washers (B) on top of the steel plates as shown.

3. With the help of another person, lift and position the four threaded shafts of the sliding table into the mounting holes in the cabinet as shown in Fig.29.

4. The sliding table now needs to be set flush with the main table. This is done by adjusting the 4 hex. nuts (C) Fig.29. Place a square on the main table and adjust the height of the sliding table until it is perfectly level and flush with the main table.

5. Once the sliding table is set flush to the main table, the sliding table gap between the main table must be set. If this scoring saw is to be used with a standard saw blade, then position the two spacer blocks (A) Fig.30 as shown (smallest gap) and push the sliding table towards the main table. If this scoring saw is to be used with a Dado blade and Dado table insert, then position the two spacer blocks (B) Fig.30 as shown (largest gap) and push the sliding table towards the main table.

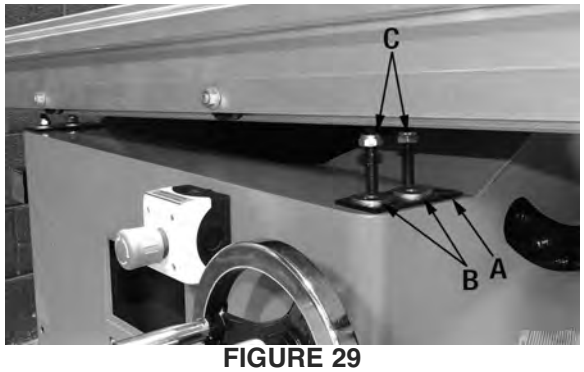


FIGURE 29

Optional accessories
Dado blade set (mod. KSC-8000)
Dado table insert (mod. KW-164)

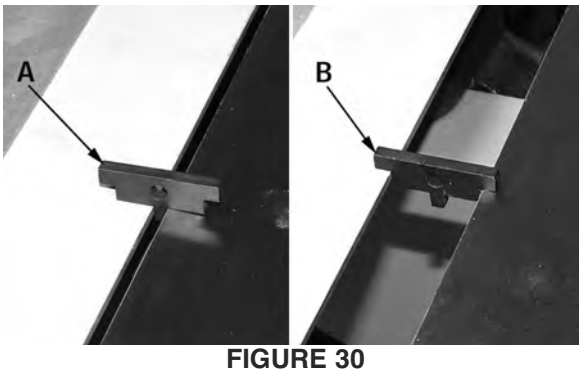


FIGURE 30

INSTALLING SLIDING TABLE continued...

6. Once the sliding table is flush and the proper gap has been set, the sliding table now needs to be secured to the cabinet. Remove side panel (A) Fig.31 to gain access to the inside of the cabinet. Secure sliding table using the 4 washers and hex. nuts removed previously.

INSTALLING SLIDING TABLE EXTENSION TABLE

1. The sliding table extension table (A) Fig.32 gets installed to the round bar (B) on the left side of the sliding table. This extension table can only be installed from the back of the sliding table. Slide extension table from the rear onto the round bar until the outer edge is close to the front edge of the sliding table. Tighten lock handle (C) under the extension table to secure extension table.
2. The extension table must be level, place a bubble level on the extension table and verify the adjustment. If an adjustment is needed, loosen hex. nuts (D) and adjust the hex. bolts (E) in or out until the extension table is set perfectly level. Retighten hex. nuts (D).

INSTALLING OUTRIGGER TABLE SWING ARM (MOD. 360ST)

1. The outrigger table swing arm gets installed to the left side of the cabinet. Install the support bracket (A) Fig.33 with 2 hex. bolts, spring washers and washers (B) on the bottom section, and 2 hex. bolts, spring washers, washers and special nuts (C) (special nut inside cabinet) on the top section. Before attempting to install swing arm to the support bracket, loosen hex. nut (D) and remove hex. bolt (E).
2. With the help of another person, position the swing arm (A) Fig.34 over the support bracket (B) and slide the large pivot shaft with retaining ring on top (C) into the opening as shown.
3. Once the swing arm is installed, it is important to make sure it is perfectly level. Place a bubble level on the swing arm and verify if the swing arm is perfectly level. If an adjustment is needed, slightly loosen the 4 large bolts (B & C) Fig.33 and adjust the hex. bolts (E & F) in or out until the swing arm is level. Once properly adjusted, tighten the hex. nuts against the bracket to lock the setting. Retighten the large hex. bolts (B & C).

INSTALLING OUTRIGGER TABLE (MOD. 360ST)

1. Slide the outrigger table (A) Fig.34B onto the round bar on the left side of the sliding table and place the outrigger table near the rear as shown. Secure the outrigger table by tightening the lock handle (B) under the outrigger table.
2. Install outrigger table hooks (C) Fig.34B on both sides of the outrigger table, position them as shown and lock them in place with the lock handles (D).

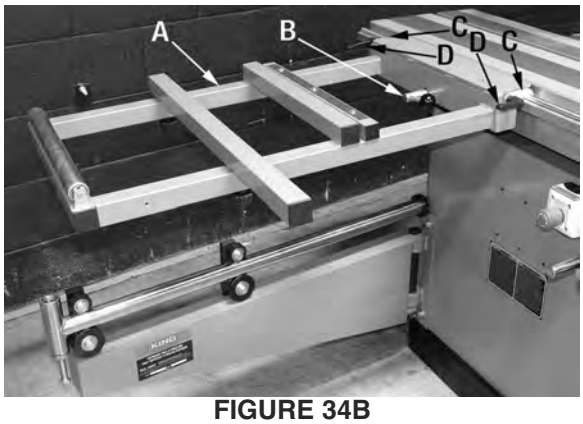


FIGURE 34B

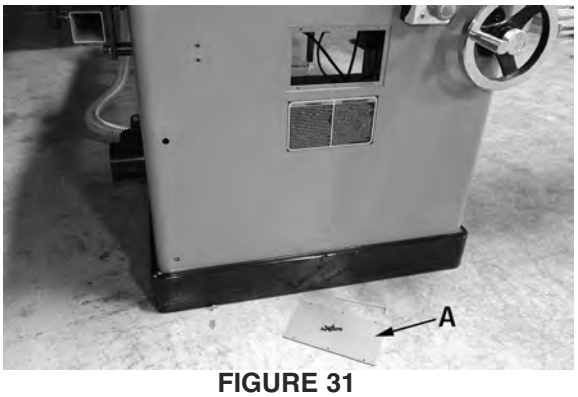


FIGURE 31

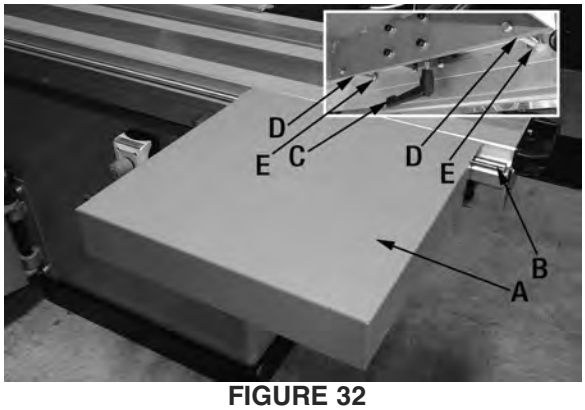


FIGURE 32

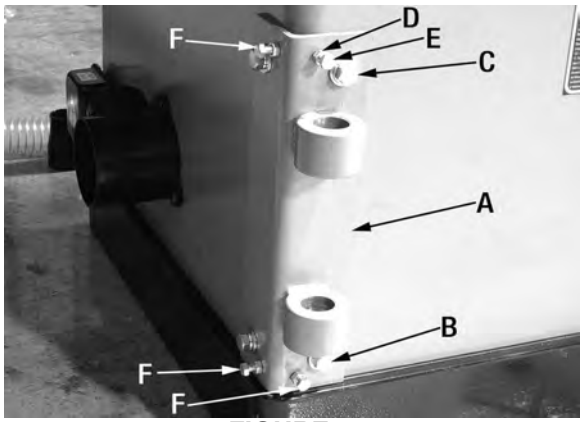


FIGURE 33

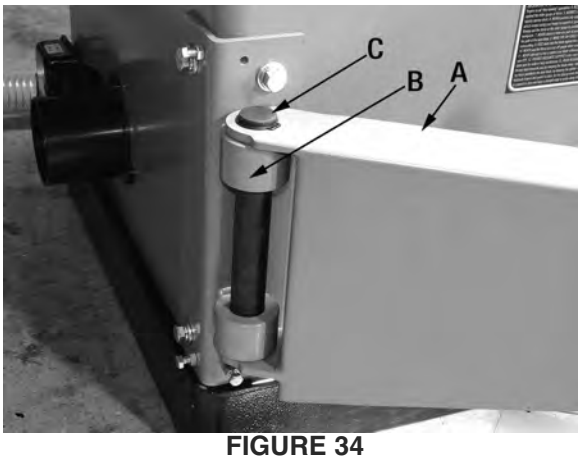


FIGURE 34

INSTALLING OUTRIGGER TABLE (MOD. 360ST) continued...

3. The outrigger table gets supported by a swing arm bracket (A) Fig.35. Slide the post (B) into the hole at the end of the swing arm. Secure the upper bracket (C) to the edge of the outrigger table as shown using 2 hex. bolts, spring washers and washers (D).

4. The outrigger table must be level, place a bubble level on the outrigger table and verify the adjustment. If an adjustment is needed, loosen hex. nut (E) and adjust the height of the large bolt (F) until the table is set perfectly level. Retighten hex. nut (E).

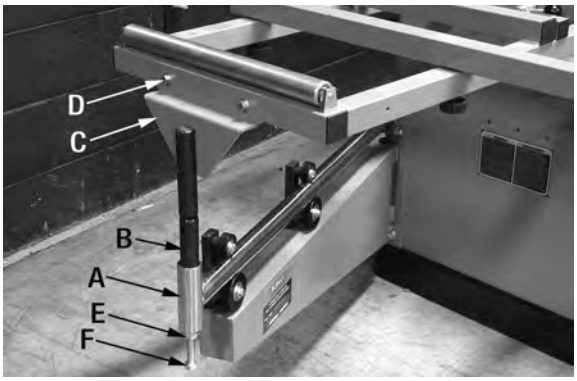


FIGURE 35

INSTALLING OUTRIGGER TABLE FENCE (MOD. 360ST)

1. Position the long outrigger table fence (A) Fig.36 on its side. Locate the 2 long bolts and lock knobs. Remove end cap and slide short T-bolt then long T-bolt into the slot under the fence, remove lock knobs and washers as shown in Fig.36.

2. The outrigger table fence can be positioned in two positions, the right end of the fence can be installed in one of two mounting holes (B) Fig.36 on the top of the outrigger table (C), depending on your operation.

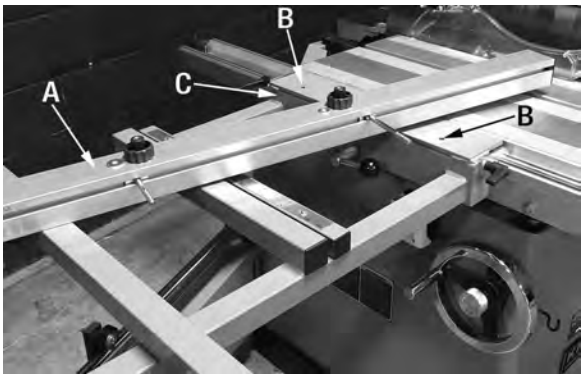


FIGURE 36

3. Position the longest T-bolt in the desired mounting hole (B) Fig.36 and insert the other long T-bolt in between the two beams (A) Fig.37. Secure the fence with the 2 washers and lock knobs (B) removed previously (one lock knob is not visible in Fig.37).

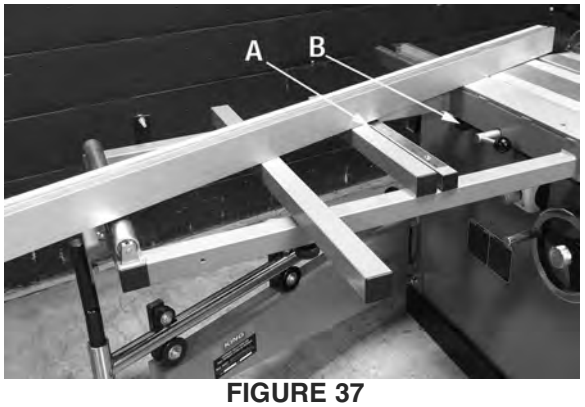


FIGURE 37

4. Install the outrigger table fence flip stop (A) Fig.38 to the fence. Slide the flip stop into the top slot in the fence. Secure flip stop by tightening lock handle (B).

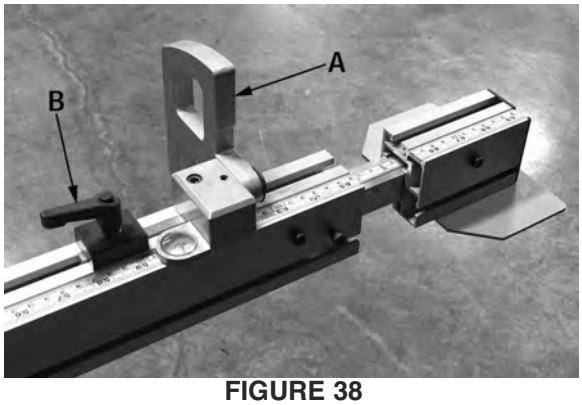


FIGURE 38

INSTALLING SLIDING TABLE HOLD-DOWN & CROSS CUT FENCE

1. The sliding table hold-down (A) Fig.39 get installed in the sliding table t-slot as shown. Once installed, tighten the top handle (B) to secure the assembly to the sliding table.

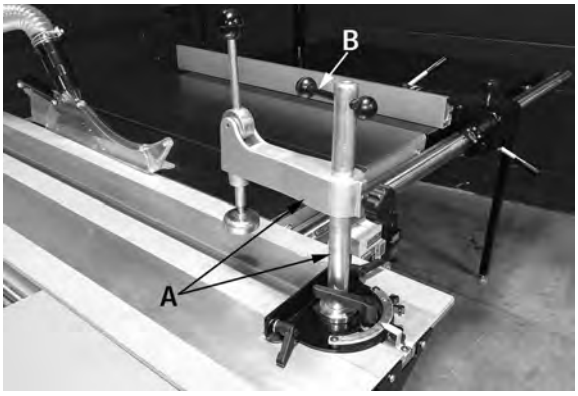


FIGURE 39

2. Remove the plastic end cap on the right end of the cross cut fence (A) Fig.40. Slide the t-slot (B) of the short cross cut fence over the hold-down bar. Secure the cross cut fence with the two lock handles (C).

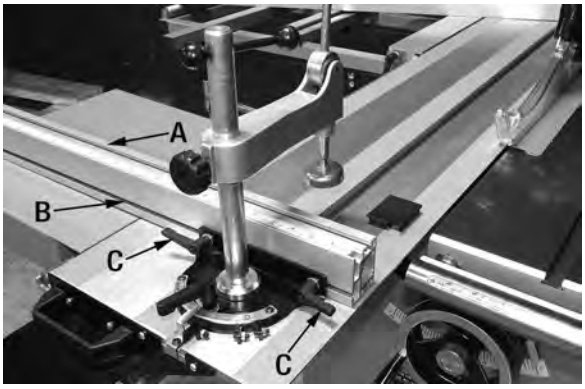


FIGURE 40

3. Install flip stop (A) Fig.41 in the top T-slot of the cross cut fence. Reinstall the plastic end cap.

4. To operate the hold-down and cross cut fence, loosen lock knob (B) Fig.41, pivot the positive stop plate (C) out of the way and then pivot the body (D) to the desired angle and retighten lock knob (B).

5. If you desire a preset positive stop such as 0^0 or 45^0 setting, loosen lock knob (B) Fig.41, pivot the positive stop plate (C) out of the way and slightly pivot the body (D). Once you get close to the desired angle, reposition the positive stop plate (C), continue to rotate the body until the positive stop plate comes in contact with the positive stop screw (E) as shown, once the preset angle is set, retighten lock knob (B).

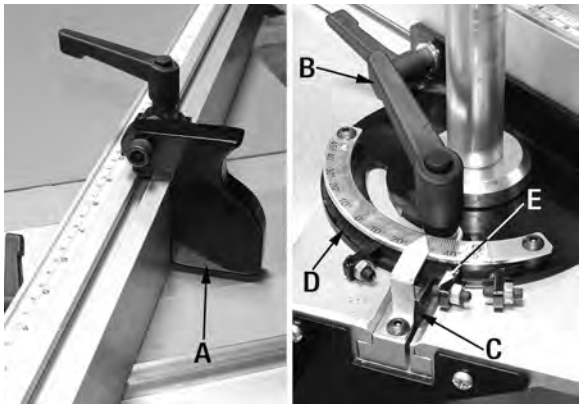


FIGURE 41

INSTALLING MITER GAUGE STORAGE BRACKET

1. Remove the two screws (A) Fig.42 from the left side of the cabinet.

2. Install miter gauge storage bracket (B) using the same screws.

3. When not in use the miter gauge should be placed on the storage bracket as shown.

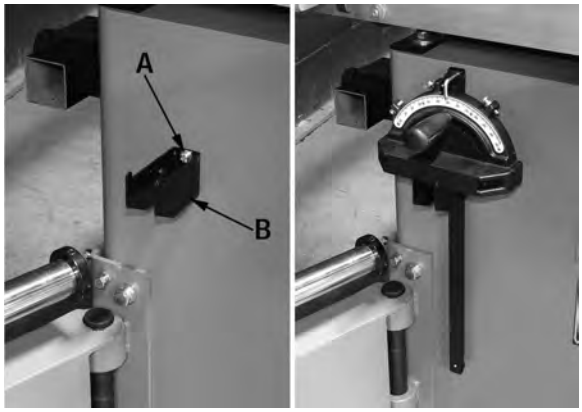


FIGURE 42

INSTALLING 10" MAIN BLADE (BLADE NOT INCLUDED)

Warning: Make sure the machine is disconnected form the power source before attempting to install, change or make adjustments to the blade or blade mechanism.

This scoring saw was designed for use with a 10" saw blade having an arbor diameter of 5/8". Only use saw blades rated for operating speeds of 4200 RPM or higher.

1. To access the blade area of this scoring saw, the sliding table must be moved forward. To do this, pull the lock/unlock spring lever (A) Fig.43 and pull the sliding table forward.

FIGURE 43

2. Loosen the two cap screws (A) Fig.44 which secure the lower blade guard (B). Flip the lower blade guard down to gain access to the main spindle.

Note: The lower blade guard is protected by a limit switch. Once the lower blade guard is opened the scoring saw will automatically stop. This is a safety feature designed to protect the operator.

3. Remove the standard table insert (C) Fig.44 from the table top.

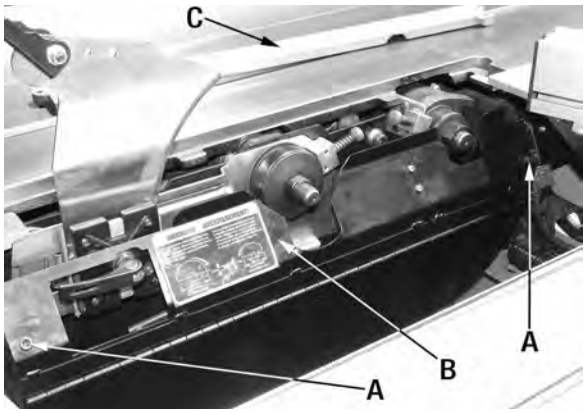


FIGURE 44

4. Remove the arbor nut (A) Fig.45 by turning it clockwise, then remove the blade flange (B).

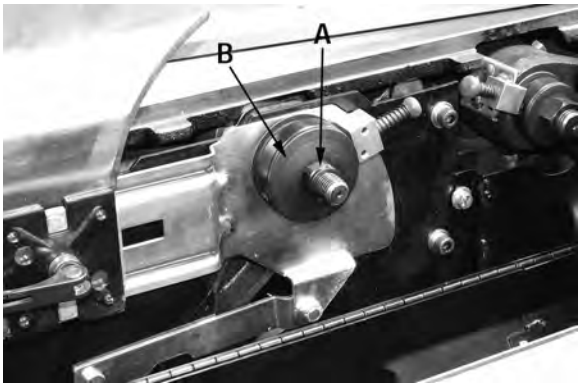


FIGURE 45

5. Install 10" saw blade (A) Fig.46 (not included) on the main spindle shaft (B) with the blade teeth facing towards the front of the scoring saw as shown.

6. Reinstall the blade flange (C) Fig.46 and hand tighten the arbor nut (D) by turning it counterclockwise.

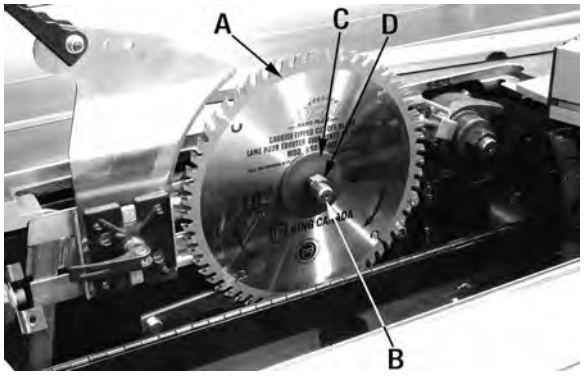


FIGURE 46

INSTALLING 10" MAIN BLADE (BLADE NOT INCLUDED) continued...

7. Press spindle lock button (A) Fig.47 and turn blade until the spindle locks and blade no longer turns. Using the provided blade wrench, tighten the arbor nut by turning it counterclockwise. To do tighten excessively, it may make it very difficult to remove the arbor nut at a later time.

8. Reinstall table insert (C) Fig.44.

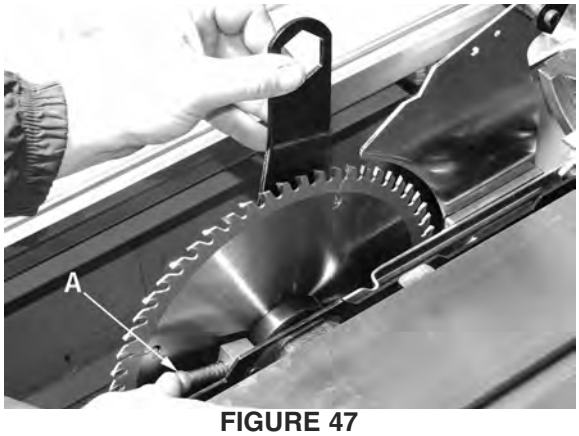


FIGURE 47

INSTALLING 4" SCORING BLADE

Warning: Make sure the machine is disconnected from the power source before attempting to install, change or make adjustments to the blade or blade mechanism.

This scoring saw was designed for use with a 4" scoring saw blade having an arbor diameter of 20mm. Only use scoring saw blades rated for operating speeds of 4200 RPM or higher. The scoring saw blade rotates in the opposite direction than the 10" main blade.

1. Refer to step 1-4 in previous section.

2. Remove the arbor nut (A) Fig.48 by turning it counterclockwise, then remove the blade flange (B).

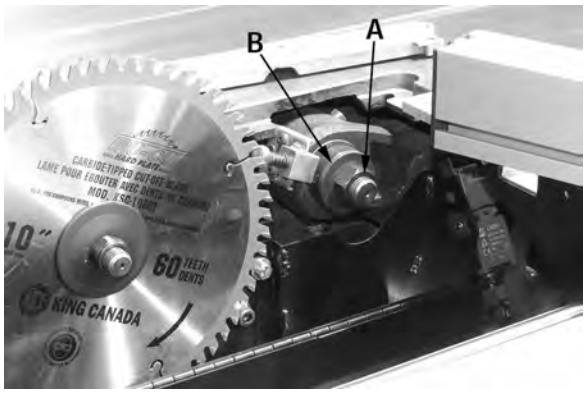


FIGURE 48

3. Install 4" scoring saw blade (A) Fig.49 on the scoring spindle shaft (B) with the blade teeth facing towards the rear of the scoring saw as shown.

4. Reinstall the blade flange (C) Fig.49 and hand tighten the arbor nut (D) by turning it clockwise.

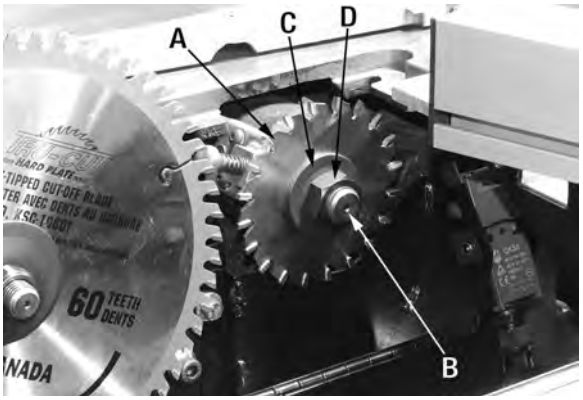


FIGURE 49

5. Press spindle lock button (A) Fig.50 and turn blade until the spindle locks and blade no longer turns. Using the provided blade wrench, tighten the arbor nut by turning it clockwise. To do tighten excessively, it may make it very difficult to remove the arbor nut at a later time.

6. Reinstall table insert (C) Fig.44.

FIGURE 50

ADJUSTING BLADE TILT ANGLE

1. The blade angle is set by turning the side handwheel (A) Fig.51.

2. Loosen lock knob (B) and then turn the handwheel (A) to the right or left to set the blade to the desired angle.

3. Use the front angle scale (C) as a guide.

4. Once the blade angle is set, retighten lock knob (B) to secure the tilting mechanism.

FIGURE 51

ADJUSTING MAIN BLADE AND SCORING BLADE HEIGHT

1. The blade height adjusting handwheels (A & B) Fig.52 are located at the front of the cabinet.

2. The main blade height is adjusted by loosening lock knob (C) and turning handwheel (A). Turn handwheel clockwise to raise main blade. Turn handwheel counterclockwise to lower the main blade. Once the height of the main blade is set, retighten lock knob (C).

3. The scoring blade height is adjusted by loosening lock knob (D) and turning rear handwheel (B). Turn rear handwheel clockwise to raise scoring blade. Turn rear handwheel counterclockwise to lower the scoring blade. Once the height of the scoring blade is set, retighten lock knob (D).

Note: The scoring blade should be set just above the table top, just enough to score the underside of your workpiece.

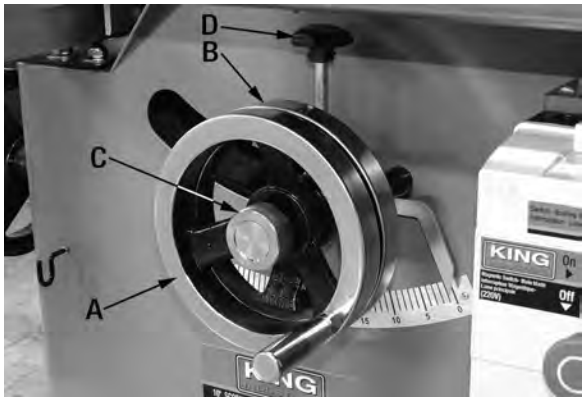


FIGURE 52

ADJUSTING TABLE INSERT

1. The table insert (A) Fig.53 must be set flush with the table top. Lower blades below the table surface and then place a straight edge over the table insert as shown and verify flushness. If an adjustment is needed, adjust the 6 set screws (B) in or out until the top of the table insert is flush with the surface of the main table.

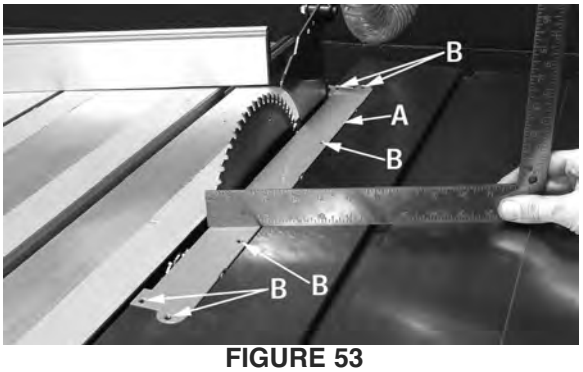


FIGURE 53

USING THE MICRO-ADJUSTMENT FEATURE ON RIP FENCE

1. The included rip fence comes with a micro-adjustment feature which allows you to adjust the position of the rip fence in very small increments.

2. Raise the rip fence lock lever (A) Fig.54 to unlock the rip fence. Loosen the top lock knob (B), then turn the side lock knob (C) to adjust the rip fence position in small increments.

3. Turn lock knob (C) clockwise to move the rip fence towards the right, and counterclockwise to move the rip fence towards the left.

4. Once adjustment is made, retighten top lock knob (B) and lower lock lever (A) to lock the rip fence position.

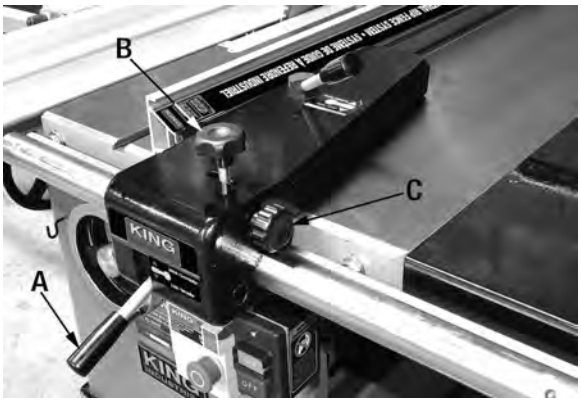


FIGURE 54

ADJUSTING TABLE SQUARE WITH MAIN BLADE

1. The main table was set square with the main blade at the factory and should not require further adjustment. Yet over time it may be necessary to readjust.

2. Place a precision square (A) Fig.55 against the blade and the T-slot. Position the square at the rear of the blade as shown. Note the distance between the blade and the t-slot.

3. Reposition the precision square at the front of the blade and verify the distance from the blade to the t-slot. The distance should be identical. If the rear and front measurements are not identical, an adjustment is needed.

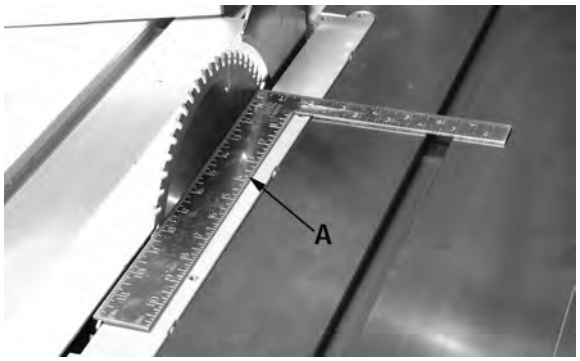


FIGURE 55

4. To adjust main table position, loosen the 4 cap screws (A) Fig.56 underneath the main table, two of them are shown in Fig.56. Move the table slightly, just enough to bring the table in line so the rear and front measurements are identical.

5. Retighten all 4 cap screws (A) Fig.56 and reverify your adjustment. Readjust if needed.

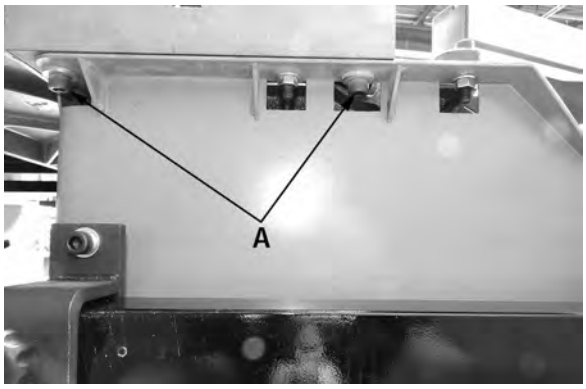


FIGURE 56

ALIGNING SCORING BLADE WITH MAIN BLADE

1. The scoring blade must be perfectly aligned with the main blade before making any cuts to ensure clean chip-free cuts. Raise both blades to their maximum height above the table.

2. Place a precision square against the centre of the main blade. Note the distance between the blade and the t-slot.

3. Place a precision square against the centre of the scoring blade. Note the distance between the blade and the t-slot. If the distance is not identical, an adjustment is needed.

4. To align the scoring blade with the main blade, insert the scoring blade alignment tool (A) Fig.57 into the opening (B) on the right side of the cabinet.

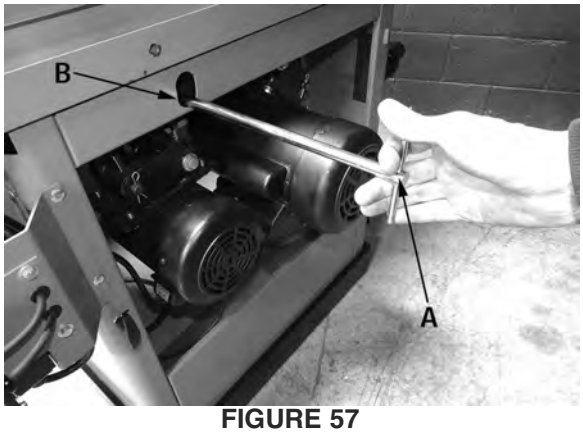


FIGURE 57

5. Turn alignment tool to adjust the position of the scoring blade. The distance between the scoring blade and the T-slot must be identical to the distance from the main blade to the T-slot.

CHECK LIST BEFORE OPERATING

The following check list should be checked before every time you operate this saw:

1. Make sure that both arbor nuts are tight and that both blades turn freely.
2. Check blade angle and blade height, adjust accordingly, and make sure handwheel lock knobs are tight.
3. Before making a rip cut, make sure the rip fence is locked and is adjusted parallel to the blade, or you risk sudden workpiece kickback.
4. Before making a cross cut, make sure miter gauge is in the locked position.
5. Always wear safety glasses when operating this scoring saw.
6. Make sure the blade guard riving knife is properly adjusted and is aligned with the main blade.

OPERATION

OPERATION
Plain sawing includes ripping and crosscutting, plus a few other standard operations of a fundamental nature. The following methods feature safety. As with all power tools there is a certain amount of hazard involved with the operation and use of the tool.
Using the tool with the respect and caution demanded as far as safety precautions are concerned will considerably lessen the possibility of personal injury. However, if normal safety precautions are overlooked or completely ignored, personal injury to the operator can develop. It is good practice to make trial cuts using scrap material when setting up your saw for operation.

RIPPING (FOLLOWING GRAIN OF WOOD)
Ripping is the operation of making a lengthwise cut through a board using the rip fence (traditional method) or using the mitre fence and sliding table to position and guide the work.

Ripping using the rip fence
One edge of the work rides against the rip fence while the flat side of the board rests on the table. The work can be pushed along the fence using push blocks, the workpiece must have a straight edge and make solid contact with the table. Start the motor and advance the work holding it down and against the fence. Never stand in the line of the saw blade and workpiece when ripping.

Ripping using the mitre fence and sliding table
Install the mitre fence (A) Fig.58 on the sliding table perpendicular to the blade (90^0). Set the mitre fence stop plate (B) to the desired width of cut. Place your workpiece onto the main table and the sliding table. Secure the board to the sliding table by using the holddown (C). The work can then be fed through the saw blade by pushing the sliding table towards the blade.

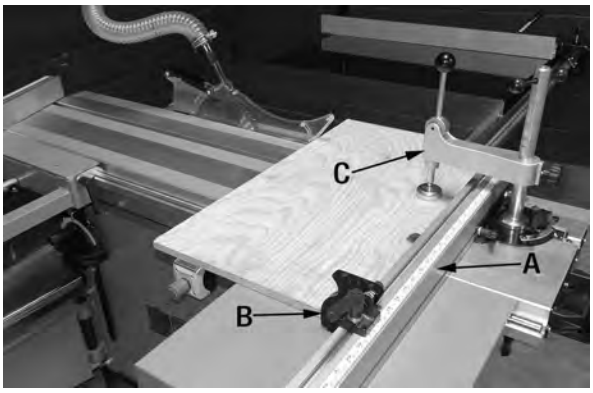


FIGURE 58

CROSSCUTTING (AGAINST GRAIN OF WOOD)
Crosscutting is the operation of making a crosscut through a board using the miter gauge (traditional method) or using the mitre fence and sliding table to position and guide the work. The sawing method is very similar to ripping, except the direction of the board changes. See Ripping instructions above.

MITRE CUTS (ANGLED CUT)
Mitre cut is the operation of making an angled cut through a board using the mitre fence and sliding table to position and guide the work. The sawing method is very similar to ripping or crosscutting with the mitre fence, except the board is positioned on an angle.
Install the mitre fence on the sliding table in the desired angle. Set the mitre fence stop plate (B) Fig.58 to the desired width of cut. Place your workpiece onto the main table and the sliding table. Secure the board to the sliding table using the holddown (C). The work can then be fed through the saw blade by pushing the sliding table towards the blade.

USING A DADO BLADE SET (OPTIONAL)
Dadoing is cutting a rabbet or a wide groove into the work. Most dado head sets are made up of two outside blades and four or five inside cutters. Various combination of saws and cutters are used to cut grooves from 1/8” to 13/16” for use in shelving, making joints, tenoning, grooving, ect.

A dado blade set can be used with this scoring saw, the following guidelines must be respected.

1. The blade guard and riving knife assembly must be removed before making Dado cuts. The blade guard and riving knife assembly must be reinstalled once the Dado cut is completed.
2. The sliding table must be repositioned away from the main table to allow clearance for the Dado blade set.
3. Maximum Dado head width is 3/4”.
4. Maximum diameter allowed is 8”.
5. Never use a Dado blade set in the beveled position (angled).

Installing optional Dado table insert (KW-164) and optional Dado blade set

1. Remove the blade guard and riving knife assembly from the scoring saw.
2. Reposition the sliding table further away from the main table as described in the “Installing Sliding Table” section in this manual, refer to (B) Fig.30 for full instructions.
3. An **optional Dado blade table insert kit (mod. KW-164) must be purchased** and installed on the saw before a Dado blade set can be installed. Make sure the dado table insert is set flush with the surface of the main table. Refer to KW-164 instructions for assembly.
4. A dado blade set is assembled to the main saw arbor in the same manner as the main 10” saw blade, see “Installing 10” Main Blade” section in this manual, refer to Figures 43 to 47 for full instructions. Also refer to Dado blade set instructions for assembly.

MAINTENANCE

This saw requires very little maintenance other than minor lubrication and cleaning. The following sections detail what will need to be done in order to assure continued operation of your scoring saw.

LUBRICATION

This saw has sealed lubricated bearings in the motor housing and the arbor assembly, they will not require any additional lubrication. Use a wire brush to clean off the worm gears and trunnions and apply a white lithium grease to keep them lubricated.

CLEANING

Keep the inside of the cabinet clear of saw dust and wood chips. With the saw unplugged, open the motor access door. Vacuum out the inside of the cabinet or blow out the inside with an air hose.

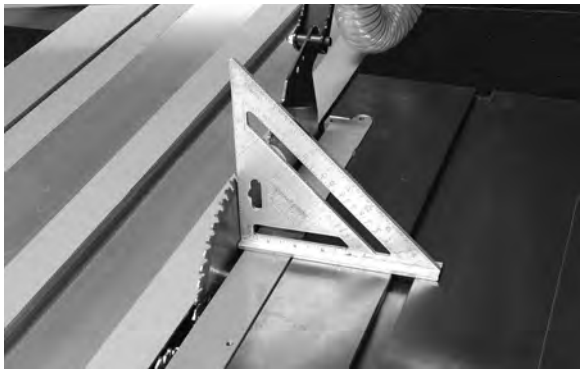


FIGURE 59

ADJUSTING 90⁰ BEVEL STOP

1. Raise the main blade to its highest position, then turn the blade tilt handwheel clockwise until it stops.
2. Place a square up against the blade as shown in Fig.59. Verify and make sure the blade is set at a 90⁰ angle. If not, an adjustment is needed.
3. Open motor door (or remove it) to gain access to the inside of the cabinet.
4. Loosen lock nut (A) Fig.60. Turn hex. bolt (B) in or out until the blade is perfectly set at a 90⁰ angle. Once adjustment is done, retighten hex. nut.

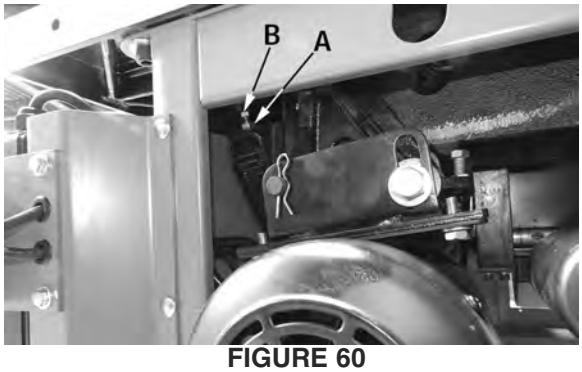


FIGURE 60

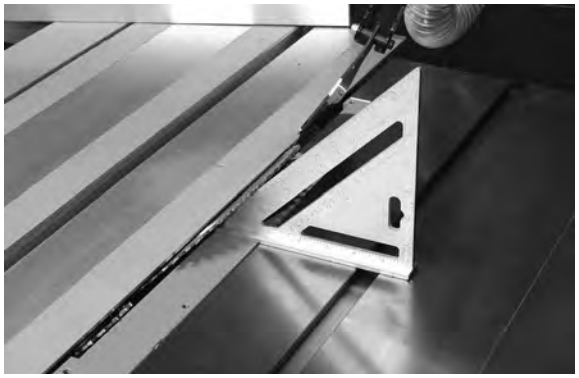


FIGURE 61

ADJUSTING 45⁰ BEVEL STOP

1. Raise the main blade to its highest position, then turn the blade tilt handwheel counterclockwise until it stops.
2. Place a combination square up against the blade as shown in Fig.61. Verify and make sure the blade is set at a 45⁰ angle. If not, an adjustment is needed.
3. Loosen lock nut (A) Fig.62. Turn hex. bolt (B) in or out until the blade is perfectly set at a 45⁰ angle. Once adjustment is done, retighten hex. nut.

FIGURE 62

REPLACING MAIN MOTOR BELT

1. Lower the main blade to its lowest position.

2. Open the motor cover (or remove motor cover).

3. Loosen but do not remove hex. bolts (A & B) Fig.63.

4. Pivot the motor upwards to release tension on the belt, then remove belt (C).

5. Install new belt around the blade pulley, then lift the motor and place belt around the motor pulley and lower motor. The weight of the motor will tension the belt, retighten hex. bolts (A & B).

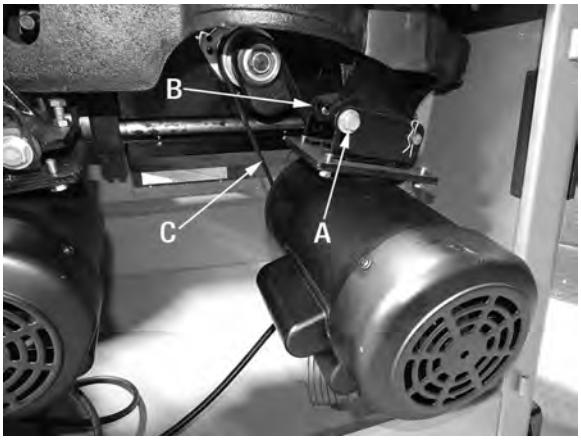


FIGURE 63

REPLACING SCORING MOTOR BELT

1. Lower the scoring blade to its lowest position.

2. Open the motor cover (or remove motor cover).

3. Loosen but do not remove hex. bolts (A & B) Fig.64.

4. Pivot the motor upwards to release tension on the belt, then remove belt (C).

5. Install new belt around the blade pulley, then lift the motor and place belt around the motor pulley and lower motor. The weight of the motor will tension the belt, retighten hex. bolts (A & B).

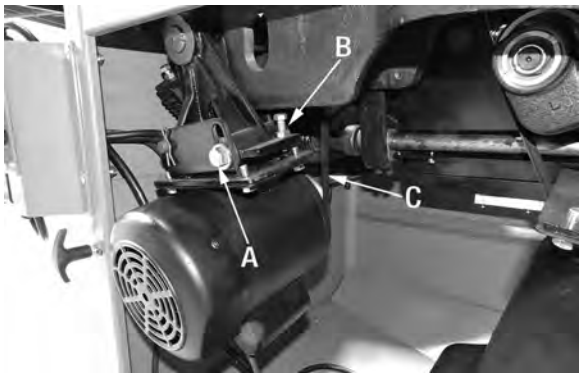


FIGURE 64

TROUBLESHOOTING

PROBLEM	SOLUTION
SAW WILL NOT START	
1. Saw not plugged in.	1. Plug in saw.
2. Fuse blown or circuit breaker tripped.	2. Replace fuse or reset circuit breaker.
3. Cord damaged.	3. Have cord replaced by a certified electrician.
4. Emergency button is depressed.	4. Rotate button clockwise and allow it to pop out.
CHIP OUT ON THE BOTTOM EDGE	
1. Scoring blade height is incorrect.	1. Adjust the height of the scoring blade.
2. Riving knife out of alignment.	2. Align scoring blade with main blade.
3. Scoring blade kerf doesn't match the main blade kerf.	3. Adjust the scoring blade kerf.
OVERLOAD KICKS OUT FREQUENTLY	
1. Extension cord too light or too long.	1. Replace with adequate size cord.
2. Feeding stock too fast.	2. Feed stock more slowly.
3. Blade in poor condition (dull, warped, gummed).	3. Clean or replace blade.
4. Blade binding due to misaligned rip fence.	4. Check and adjust the rip fence. See rip fence instructions.
5. Blade binding due to warped wood.	5. Select another piece of wood.
6. Low house current.	6. Contact your electrical company.
BLADE DOES NOT REACH 45^0 OR 90^0	
1. Positive stop(s) not adjusted properly.	1. Check blade with square and adjust positive stop.
2. Tilt angle pointer not set properly.	2. Check blade with square and adjust pointer to zero.
MATERIAL PINCHES BLADE WHEN RIPPING	
1. Rip fence not aligned with blade.	1. Check and adjust rip fence.
2. Warped wood.	2. Select another piece of wood.
SLIDING TABLE DOESN'T CUT SQUARE	
1. Sliding table is not parallel to blade.	1. Adjust sliding table parallel to blade.
2. Rip fence is not parallel to blade.	2. Adjust rip fence parallel to blade.
3. Mitre fence is not perpendicular to blade.	3. Adjust mitre fence perpendicular to blade.
MATERIAL BINDS ON SPLITTER	
1. Splitter not aligned correctly with blade kerf.	1. Check and align splitter with blade kerf.
SAW MAKES UNSATISFACTORY CUTS	
1. Dull blade.	1. Replace blade.
2. Blade mounted backwards.	2.Turn blade around.
3. Gum or pitch on blade.	3. Remove blade and clean with terpentine and steel wool.
4. Incorrect blade for work being done.	4. Change the blade.
5. Gum or pitch on table causing erratic feed.	5. Clean the table with turpentine and steel wool.
BLADE DOES NOT COME UP TO SPEED	
1. Extension cord too light or too long.	1. Replace with adequate size extension cord.
2. Low house current.	2. Contact your electric company.
3. Motor not wired for correct voltage.	3. Refer to motor and /or nameplate.
MACHINE VIBRATES EXCESSIVELY	
1. Table not mounted securely to cabinet stand.	1. Tighten all mounting hardware.
2. Stand is on uneven floor.	2. Use leveling feet or reposition on flat level surface.
3. Damaged saw blade.	3. Replace blade.
4. Bad V-belt(s).	4. Replace V-belt(s).
5. V-belts not tensioned properly.	5. Adjust V-belt tension.
6. Bent pulley.	6. Replace pulley.
7. Improper motor mounting.	7. Check and adjust motor mounting.
8. Loose hardware.	8. Tighten all nuts, bolts and set screws.