You should record the Serial Number of your Tile Saw on this Owner’s/Operator’s Manual and on the Warranty Card. *The Warranty Card must be sent back with all the required pertinent information for the warranty to take effect.*

**Caution!** Read Safety and General Instructions carefully before using saw for the first time.

Covered by one or more of the following US Patents: 6,080,041; 6,119,676; 6,272,990; 6,460,533; and D458,282
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1. Know your power tool - read owner's/operator's manual carefully. Learn its applications and limitations as well as the specific potential hazards unique to this tool.
2. Keep guards in place - and in working order.
3. Ground all tools - if tools are equipped with three prong plug, it should be plugged into a three-hole electrical receptacle. If an adapter is used to accommodate a two-prong receptacle, the adapter lug must be attached to a known ground. Never remove the third prong.
4. Remove wrenches - Form a habit of checking to see that adjusting wrenches are removed from tool before turning it “on”.
5. Keep work area clean. Cluttered areas and benches invite accidents.
6. Do not use in dangerous environment. Do not use power tools in damp or wet locations, or expose them to rain. Keep work area well lighted. Do not use tool in the presence of flammable liquids or gasses.
7. Keep children and visitors away. All children and visitors should be kept at a safe distance from work area.
8. Make workshop childproof with padlocks, master switches or by removing starter keys.
9. Do not force tool. It will do the job better and be safer at the rate for which it was designed.
10. Use right tool. Do not force tool or attachment to do a job for which it was not designed.
11. Wear proper apparel. Do not wear loose clothing, gloves, neckties, rings, bracelets or other jewelry that may get caught in moving parts. Non-slip footwear is recommended. Wear protective hair covering to contain long hair.
12. **Always use safety glasses.** Wear safety glasses (must comply with ANSI Z87.1) at all times. Everyday eyeglasses only have impact resistant lenses; they are not safety glasses. Use face or dust mask if cutting operation is dusty, and ear protectors (plugs or muffs) during extended periods of operation.
13. Do not overreach. Keep proper footing and balance at all times.
14. Maintain tools in top condition. Keep tools sharp and clean for best and safest performance. Follow instructions for lubricating and changing accessories. Inspect tool cords periodically and if damaged, have repaired by authorized service facility.
15. Disconnect tools. When not in use, before servicing, and when changing accessories, such as blades, bits, cutters.
16. Avoid accidental starting. Make sure switch is in “off” position before plugging in power cord.
17. Use recommended accessories only. Consult the owner’s manual for recommended accessories. The use of improper accessories may cause risk of injury to persons.
18. Never stand on tool. Serious injury could occur if the tool is tipped or if the cutting tool is accidentally contacted.
19. Check Damaged Parts. Before further use of the tool, a guard or other part that is damaged should be carefully checked to ensure 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 part that is damaged should be properly repaired or replaced.
20. Never leave tool running unattended. Turn power “off”. Do not leave tool until it comes to a complete stop.
21. Extension cords. 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. Extension cord tables (refer to page 21) show 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 numbers the heavier the cord.

22. Do not abuse cord. Never carry tool by cord or pull it to disconnect from receptacle. Keep cord from heat, oil, and sharp edges.

23. Guard against electric shock. Prevent body contact with grounded surfaces. For example, pipes, radiators, ranges and refrigerator enclosures.

24. Outdoor use extension cords. When tool is used outdoors, use only extension cords intended for use outdoors and so marked.

25. Stay alert. Watch what you are doing. Use common sense. Do not operate tool when you are tired.

26. Drugs, alcohol, medication. Do not operate tool while under the influence of drugs, alcohol or any medication.

27. Store idle tool. When not in use, tool should be stored in a dry and locked place, out of reach of children.

---

**ii. SYMBOLS**

- **KEEP GUARD IN PLACE**
- **REPAIRS TO BE DONE**
- **WEAR HEARING PROTECTION**
- **DIAMOND BLADE**
- **MACHINE HAZARD**
- **WEAR EYE PROTECTION**
- **BLADE CUTTING DEPTH**
- **FLAMMABLE**
- **WEAR BREATHING PROTECTION**
- **ELECTRIC SWITCH OFF**
- **READ INSTRUCTIONS CAREFULLY**
- **WEAR HARD HAT**
- **ELECTRIC SWITCH ON**
- **WARNING**
- **WEAR PROTECTIVE CLOTHING**
- **ELECTRICAL HAZARD**
- **FRAGILE**
- **WEAR SAFETY SHOES**
- **REMOVE TOOLS**
- **KEEP DRY**
- **WELL VENTILATED**
- **PAY EXTREME ATTENTION**
- **DO NO STEP ON**
- **NO NON-WORKING PERSONNEL**
iii. FEATURES

The Pearl CX10 is a portable professional tile saw. Lightweight and compact it has innovative built in features that enable it to cut larger format tiles. The unique coaction movement of the cutting head and main table allow the saw to increase its cutting capacity whenever needed. The main table and extension carriage are supported by low friction, self cleaning, adjustable guide wheels. Water flow to the blade is provided by two (2) nozzles that direct the water to both sides of the blade. The rugged powder coated metal and aluminum frame sets in a removable water tray for easy clean up.

- **Powerful Motor - 2 hp.**
- **The cutting is done over the pan and drip trays contain the water run off.**
- **The table travels 50% less than conventional saws.**
- **Being able to work in smaller spaces.**
- **Chopping Action - plunge feature allows the user to make quick plunge cuts with the spring loaded cutting head.**
- **Tracking System - 8-sealed metal roller bearings and stainless steel rails allow the table to roll smoothly, ensuring accurate cuts. Long life.**
- **Lightweight - only 60 lbs.**
- **Circuit breaker protects your saw from power surges and overheating.**
- **High Impact ABS Water Tray.**
- **Adjustable Cutting Head allows user to alight saw at any time.**
- **Blade Capacity 10".**
- **Diagonal cut up to 18" tiles and rip cut up to 24" in length.**

The heavy duty, cast to last construction and quality components were designed to meet the highest demands of the professional.

*Read this manual completely* and then let the Pearl CX10 take your cutting capabilities to new dimensions.

iv. SPECIFICATIONS

### PEARL CX10 TILE SAW

<table>
<thead>
<tr>
<th>MOTOR</th>
<th>ARBOR SHAFT ROTATION</th>
<th>MAX. BLADE CAPACITY</th>
<th>WEIGHT</th>
<th>DIMENSIONS</th>
</tr>
</thead>
<tbody>
<tr>
<td>2 HP 115 v, 60 Hz, Single phase</td>
<td>Counter-Clockwise</td>
<td>5/8&quot; arbor blade, 10&quot; Blade</td>
<td>60 lbs</td>
<td>Width: 23-1/2&quot; Length: 35-1/2&quot;</td>
</tr>
</tbody>
</table>
v. GETTING TO KNOW YOUR SAW
vi. BLADE INSTALLATION

1. Carefully raise the cutting head to its highest position and secure it into place by tightening the cutting head adjustment knob located in the front of the saw, to the right of the power switch.

2. Raise the blade guard to the highest position and tighten the blade guard adjustment knob.

3. Remove the blade shaft nut and outer flange.

4. Place the blade onto the shaft making sure that the directional arrows are pointing in the direction of rotation.

5. After making sure that the blade is firmly placed against the inner flange, secure it into place with the outer flange and blade shaft nut. Make certain the nut is firmly tightened with the wrench provided, but do not over tighten!

6. Lower the blade guard and tighten the adjustment knob.

7. Slightly loosen the cutting head adjustment knob and lower the cutting head to its lowest position, and then tighten the adjustment knob firmly to hold the cutting head in place.

WARNING: Setting the blade too high may cause the blade to grasp the material being cut, causing damage and possibly injury.

Figure 1

vii. SAFE OPERATING PRACTICES FOR TILE SAW

1. Use safety equipment - wear safety approved hearing, eye, head and respirator protection.

2. Read and understand the symbol definitions contained in this manual.

3. Read and understand all warnings and instructions on the machine.

4. Read all safety materials and instructions that accompany any blade or accessory used with this machine.

5. Establish a training program for all operations of this machine.

6. Always provide a copy of this manual to the equipment user. If you need extra copies call our Customer Service Department at 1-800-969-5561.

7. Always select a diamond blade according to the manufacturers recommendation suitable for the material to be cut. Never use a blade having a maximum operating speed lower than the “No load R.P.M.” marked on the tool nameplate. Do not operate any saw without safety guards in place or with a blade diameter larger than the maximum
saw blade capacity.

8. Before mounting a blade on the saw clean and inspect the arbor shaft, blade flanges and the diamond blade for uneven wear or damage. If it appears to be damaged, **Do not operate the tool.** Have it serviced by a qualified service technician.

9. Before each use of the saw, inspect the diamond blade for hairline fatigue cracks. If such a crack or flaw is evident, discard the blade. **Using a damaged blade may cause injury to the operator or others.**

10. Be sure that the blade arbor hole matches the blade adapter flange supplied with the saw. Use only blade adapter flanges that came on your saw. Never use damaged or worn blade adapter flanges.

11. **Installing the blade,** install the blade with the arrow pointing the same direction as the rotation of the arbor shaft or the arrow on the blade guard. Be sure to tighten the blade shaft arbor nut with the wrench provided. **Be careful not to over tighten.**

**WARNING! Not dressing the blade frequently or setting the blade too high will cause it to grab the tile possibly causing injury to the operator and the saw.**

12. Check that the blade tracks near the center of the channel in the main table, and that the table moves freely from front to back.

13. Sometimes the material being cut is not abrasive enough to expose new diamonds on the blade. If the blade is not sharpened, it will rub against the surface resulting in heat build up in the core. To prevent this, it is necessary to dress the blade. To dress the blade simply cut something that is very abrasive such as a piece of cement block. Indications that the blade needs dressing includes:
   - The diamond in the matrix appear shiny because they are worn flat.
   - The blade stops cutting or noticeably slows down.

*Blade dressing stones are available from your local Pearl Warehouse.*

14. Before using the saw fill the water tub enough to submerge the water pump with clean water only. Replenish as necessary and clean the water tub frequently. Do not operate a wet cutting blade without adequate water flow to both sides of the blade. Never run the pump dry.

15. When cutting, always hold the material firmly lying flat, supported by the main table with one edge resting against the main table backstop.

   - Do not attempt to cut pieces too small to safely hold down on the main table.
   - Never use the side of the blade to cut or grind with, only cut in a straight line.
   - Keep all parts of your body away from the blade and all other moving parts.
   - Never touch or try to stop a moving blade with your hand.

16. When cutting dry - always unplug the water pump first. **Never run the pump dry.**

   - Do not use a wet cutting blade for dry cutting. Select the proper dry cutting blade for your application.
   - Never make long continuous cuts with dry cutting blades. To avoid heat build up, allow the blade to cool, remove the tile and allow the blade to run freely for a few minutes.

**IMPORTANT - If there is any tendency for the saw to move during certain operations, such as when cutting large heavy tile; the saw must be securely fastened to a supporting table.**

17. Make certain all adjusting knobs or locks are tight and engaged in their detents and that movable parts not intended to move during operation are securely locked before making a cut. **Be careful not to over tighten.**

18. Before connecting the machine to a power source check to see that the “On/Off” switch is in the “off” position.

   - Make sure the blade is not contacting anything before connecting to a power source and starting the motor.
   - Know how to stop the machine quickly in case of an emergency.
19. Grounding Instructions

- 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.
- 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.*

This tool is intended for use on a circuit that has an outlet that looks like the one illustrated in Figure 2(A). A temporary adapter, which looks like the adapter illustrated in Figure 2(B) and 2(C), may be used to connect this plug to a 2 pole receptacle as shown in Figure 2(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 permanent ground such as a properly grounded outlet box.

![Figure 2: Grounding Methods](image)

**NOTE - Use of a Temporary Adapter is not permitted in Canada.**

Additionally, water pump requires the use of a Ground Fault Circuit Interrupter. Therefore, when using the water pump receptacle, this tool must be plugged into a properly installed Ground Fault Circuit Interrupter outlet. See Figure 2(D). If a Ground Fault Circuit Interrupter outlet is not available, Pearl Abrasive Co. has it available as an accessory item. A plug-in Ground Fault Circuit Interrupter may be plugged into a properly installed and grounded 3-pole outlet. Refer to Figure 2(E).

20. Position of the Tile Saw

- To avoid the possibility of the appliance plug or receptacle getting wet, position tile saw to one side of a wall mounted receptacle to prevent water from dripping onto the receptacle or plug. The user should arrange a "drip loop" in the cord connecting the saw to a receptacle. The "drip loop" is that part of the cord below the level of the receptacle, or the connector if an extension cord is used, to prevent water traveling along the cord and coming in contact with the receptacle. See Figure 3.
- If the plug or receptacle does get wet, **Do not unplug the cord.** Disconnect the fuse or circuit breaker that supplies power to the tool. Then unplug and examine for presence of water in the receptacle.

*To reduce the risk of electrocution, keep all connections dry and off the ground. Do not touch plug with wet hands.*
21. Extension Cords

- Use only extension cords that are intended for outdoor use. These extension cords are identified by a marking "Acceptable for use with outdoor appliances; store indoors while not in use." Use only extension cords having an electrical rating not less than the rating of the product. Refer to chart on page 21. Do not use damaged extension cords. Examine extension cord before using and replace if damaged. Do not abuse extension cords and do not pull on any cord to disconnect. Keep cord away from heat and sharp edges. **Always disconnect the extension cord from the receptacle before disconnecting the saw from the extension cord.**

- Ground Fault Circuit Interrupter (GFCI) protection should be provided on the circuit(s) or outlet(s) to be used for the tile saw. Receptacles are available having built-in GFCI protection and may be used for this measure of safety.

---

**viii. USING THE CUTTING TABLE**

**Features:**

- Cutting table marked in inches for precision cuts.
- 14” cutting table provides more support during larger cutting jobs than the standard 11” cutting tables.

**Using 90° Rip Guide:**

1. Set the rip guide by positioning it on the desired dimension and tighten the threaded knob. Make sure that the rip guide is firmly tightened to avoid slippage. The rip guide can be used for 90° rip cuts from both the left and right side.

2. After the rip guide is positioned for the desired cut, place material flat against the rip guide and the table measurement rail.

3. Simply line-up the material being cut with the appropriate pre-marked lines on the cutting table surface.

4. Now you are ready to make your cut.

**Making Miter Cuts (Using Optional Miter Block):**

1. For miter cuts, place the lip of the miter block on the measurement rail, with the threaded knobs facing you.

2. Tighten the threaded knobs to secure the miter block in place.

3. Place material onto miter block and you are ready to cut.

---

Cutting large tile

CX10 can cut a 24" tile and diagonally cut a 18" tile.
The Pearl CX10 requires very little maintenance. However, keeping your saw clean and properly adjusted will ensure optimum performance. Take great care not to get water into the motor. Do no use pressure washer to clean motor area.

1. Cleaning

- Form a habit of cleaning your saw after each use. To clean the water tub, remove drain plug provided in bottom of tub. Remove saw including water pump from tub. Remove residual water and clean tub using soap and water only. Reinstall saw with pump into tub.
- To increase water pump life remove tile grit by purging water. Pump with fresh water after each use.
- With a damp cloth or sponge wipe clean the guide rails and all other surfaces on the saw where dust and debris has accumulated.

**NOTE - Do not lubricate the guide rails. The presence of oil or grease will cause an accumulation of dust and dirt.**

2. Transporting

- Unplug the power cord and store it in the empty, dry water tub. For convenience and safety, the saw should be transported with the main table locked, motor in upper position and all adjustment knobs tightened.

3. Sliding Vertical Arm Assembly Adjustment

- Make sure that all rails and rollers are clean.
- If the vertical arm assembly does not slide smoothly, it will require tension adjustment as follows:
  
  **A.** Locate the two tension rollers mounted on the black base of the vertical arm assembly furthest from the arm. Use a wrench to loosen the nyloc nut directly below each roller. Use another wrench to prevent the bolt on top from turning. See Figure 5.
  
  **B.** Use the horizontal set screw to adjust roller tension against the rails. The rollers should roll free but without side movement.

C. Tighten nyloc nut when finished to secure rollers in place. Be sure not to overtighten.

4. Table Roller Adjustment

- **A.** Loosen (4) hex screws on table top.
- **B.** Adjust tension on rollers by turning set screw (on outside of table) until desired tension is achieved. **DO NOT OVERTIGHTEN.** See Figure 6.
- **C.** Re-tighten the (4) hex screws on table top. Check table movement and re-adjust if necessary. Table should roll free but without side movement.

**NOTE - Whenever making tension adjustments to rollers on the vertical arm assembly or table, the stainless steel wire linking the two components together should be disconnected first. Otherwise, it will not be possible to determine which rollers will require adjustment. See Section 5 for steps.
5. Unlinking Coaction Wire

A. Remove the wire shield located between the rails by removing the screws at both ends.

B. Loosen the nyloc nuts on the wire anchor underneath the table so that the wire can pass freely through the bolt. **Be sure to use an allen key to prevent the bolt from turning. Failure to do so may cause the wire to break.** See Figure 7.

![Figure 7 Unlinking the Table](image)

Loosen both nyloc nuts
Insert allen key to prevent bolt from turning

C. Perform the necessary adjustments. Proceed to next step once completed.

D. Move the table towards the user, such that the forward-most roller touches the rubber stopper at the end of the rail. Then move the vertical arm assembly to the opposite end, while leaving a small gap between the rear-most roller and frame.

E. Tighten the nyloc nuts on the wire anchor, while preventing the bolts from turning.

F. Replace the wire shield.

6. Aligning the Blade to the Table

- While cutting, the material being cut must move in a straight line parallel to the saw blade. If the blade is out of plane it will bind at one end of the cut. To align the blade, perform the following:

A. Locate the pivot adjuster on the black base of the vertical arm assembly next to the arm. Loosen the socket hex bolt directly below the adjuster. See Figure 8.

B. Turn pivot adjuster using a wrench either clockwise (putting the roller into the rail) or counterclockwise (pulling the roller away from the rail). While the pivot adjuster determines blade alignment, the rollers on the opposite side of the assembly base (see Section 3) must also be adjusted simultaneously so that they run parallel to the rollers closest to the vertical arm. **Do not apply excessive force when turning the pivot adjuster.**

![Figure 8 Blade Alignment](image)

Pivot adjuster
Loosen socket hex bolt

C. Tighten lower socket hex bolt when finished. With the pivot adjuster secured, adjust the remaining rollers to obtain proper tension against the rails. See Section 3.

D. Check alignment by placing an L-shaped straight edge on the table with the short arm resting flat against the table back stop. The long arm should rest against the blade with the cutting head completely lowered. Check to see if there are any gaps between the leading or trailing edges of the blade and the straight edge. If gaps exist, then repeats steps A - C until alignment is attained. See Figure 9.

![Figure 9 Table Roller Adjustment](image)

L-shaped straight edge
Table back stop
Blade

7. Positioning the Saw in the Tub

A. Orient the saw such that the front is pointing towards the short side of the tub with the beveled corner.

B. While lowering the saw into the tub, ensure that brackets at both ends of the saw frame
fit over the recessed portions of the tub wall. See Figure 10.

**Figure 10**
Positioning the Saw

[Diagram showing positioning of the saw]

8. Tub & Tray
A. Insert the large rubber stopper in the drain hole. See Figure 11.

**Figure 11**
Rubber stopper

B. The saw must be properly sealed inside the tub before the drip trays can be attached. See Figure 12.

**Figure 12**
Attaching Drip Trays

STEP 2
Attach rear drip tray

STEP 1
Attach side drip tray

9. Replacing the Water Pump
   - In the event of a water pump failure, replace the pump by performing the following steps:
     A. Use a bent-nose plier to remove the cable gland from the shield by squeezing the cable gland tabs together. Once removed, detach the cable gland from the power cable. See Figure 13.

**Figure 13**
Remove Cable Gland

Apply force to tabs

B. Remove screws from the vertical arm shield, then remove the shield. See Figure 14.

**Figure 14**
Water Pump Replacement

C. Unplug the water pump power cable from the receptacle within the vertical arm.

D. Remove the water pump underneath the rails and install a new one in its place. Remove the water tube and adapter from the failed pump.

E. Plug the water pump power cable into the receptacle within the vertical arm.

F. Install shield onto vertical arm using screws.

G. Gently extract excess cable stored within vertical arm; some slack is ideal. **Tugging the cable may dislodge or disconnect critical electrical components.** Attach cable gland onto the power cable and install it into the shield using a bent-nose plier.

H. Attach the adapter to the pump and hand tighten. **Do not use a wrench** as it can strip the thread.

I. Connect clear tubing to male section of the adapter until it fits securely. See Figure 15.

**Figure 15**
Water tubing

Adapter
x. CUTTING DEPTH

The recommended cutting depth is 1/4" below the cutting table surface. To adjust the cutting depth, loosen the cutting head adjustment handle and set it to the lowest position, so that the blade is 1/4" below the top of the table surface.

WARNING: Setting the blade too high may cause the blade to grab the material being cut, possibly causing injury to the operator and the saw.

xi. REPLACEMENT PARTS LIST

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<thead>
<tr>
<th>MAIN ASSEMBLY</th>
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<table>
<thead>
<tr>
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<tr>
<td>1 Rail Platform Assembly</td>
<td>CX38001</td>
</tr>
<tr>
<td>2 Table Assembly</td>
<td>CX38002</td>
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<tr>
<td>3 Vertical Arm Assembly</td>
<td>CX38003</td>
</tr>
<tr>
<td>4 Cutting Head Assembly</td>
<td>CX38004</td>
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<td>5 Blade Guard Assembly</td>
<td>CX38005</td>
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<tr>
<td>6 Dia 5/8&quot; (15.9mm) Outer Flange</td>
<td>CX38006</td>
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<tr>
<td>7 10&quot; (254mm) Cont. General Purpose Blade</td>
<td>DTL10HPXL</td>
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<tr>
<td>8 D30 x 120L Handle</td>
<td>CX38007</td>
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<tr>
<td>9 Spring</td>
<td>CX38008</td>
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<td>10 Slip Collar</td>
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<td>12 Water Pump</td>
<td>CX38011</td>
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<td>13 M6 X 1.0 X 25L Socket Head Hex Bolt</td>
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<th>CUTTING DEPTH</th>
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</thead>
<tbody>
<tr>
<td>10 inch</td>
<td>2-1/4 inch</td>
</tr>
</tbody>
</table>
### PART NAME | PART NUMBER
---|---
1. Post | CX38058
2. Post Electrical Access Plate | CX38059
3. Rubber Gasket | CX38060
4. Plate | CX38061
5. Cutting Head Mounting Bracket | CX38062
6. Post Base | CX38063
7. Roller Adjustment Mount | CX38064
8. Roller Mount | CX38065
9. M8 X 1.25 X 20L Hex Bolt | CX38052
10. Wire Anchor Bracket | CX38066
11. M6 X 1.0 X 15L Hex Bolt | CX38067
12. M8 X 1.25 X 45L Hex Bolt | CX38068
13. M5 Spring Washer | CX38042
14. M5 X 0.8 X 15L Cross Screw | CX38049
15. 1/4" - 20 X 1/2" Flat Point Set Screw | CX38089
16. 1/4" - 20 Nut | CX38070
17. M6 Narrow Washer | CX38071
18. M8 X 1.25 X 35L Hex Bolt | CX38072
19. Lower Roller Spacer | CX38073
20. 1/4" Narrow Washer | CX38074
21. M5 Narrow Washer | CX38041
22. Wire Tension Adjustment Bolt | CX38075

### PART NAME | PART NUMBER
---|---
23. 1/4" - 20 X 2" L X 3/4" Cap Hex Bolt, B7 Grade | CX38076
24. 1/4" - 20 X 1-1/4" L X 3/4" Cap Hex Bolt, B7 Grade | CX38077
25. 1/4" - 20 Nylon Nut | CX38078
26. M8 X 1.25 Nylon Nut | CX38079
27. 16 Gauge Cable Gland | CX38080
28. M8 X 1.25 X 20L Countersunk Cross Screw | CX38081
29. M5 X 0.8 X 16L Countersunk Cross Screw | CX38082
30. M4 X 0.7 X 13L Countersunk Cross Screw | CX38083
31. M6 Spring Washer | CX38084
32. 20A 125V/12A 250V Toggle Switch | CX38085
33. 15A Circuit Breaker | CX38086
34. Power Switch Gasket | CX38087
35. M6 X 1.0 Nylon Nut | CX38088
36. Power Switch Plate | CX38089
37. Water Shield | V31005-MA
38. Bypass Spacer | V31004-MA
39. Type 5 Guide Roller | CX38090
40. M8 Spring Washer | CX38051
41. M8 Narrow Washer | CX38016
42. M4 Narrow Washer | CX38044
43. M4 X 0.7 X 8L Cross Screw | CX38091
TABLE ASSEMBLY

<table>
<thead>
<tr>
<th>PART NAME</th>
<th>PART NUMBER</th>
</tr>
</thead>
<tbody>
<tr>
<td>1  Main Table</td>
<td>CX38092</td>
</tr>
<tr>
<td>2  Wire Anchor Plate</td>
<td>CX38093</td>
</tr>
<tr>
<td>3  Roller Mounting Plate</td>
<td>V31014-MA</td>
</tr>
<tr>
<td>4  Nut Plate, Table</td>
<td>V31015-MA</td>
</tr>
<tr>
<td>5  Wire Bolt Anchor</td>
<td>CX38094</td>
</tr>
<tr>
<td>6  M6 x 1.0 Nylon Nut</td>
<td>CX38088</td>
</tr>
<tr>
<td>7  M6 Narrow Washer</td>
<td>CX38071</td>
</tr>
<tr>
<td>8  Upper Roller Spacer</td>
<td>CX38095</td>
</tr>
<tr>
<td>9  Water Shield</td>
<td>V31005-MA</td>
</tr>
<tr>
<td>10 Bypass Spacer</td>
<td>V31004-MA</td>
</tr>
<tr>
<td>11 Rolle</td>
<td>CX38096</td>
</tr>
<tr>
<td>12 Lower Roller Spacer</td>
<td>CX38073</td>
</tr>
<tr>
<td>13 M6 Wide Washer</td>
<td>CX38097</td>
</tr>
<tr>
<td>14 1/4&quot; - 20 x 1-1/4&quot;L x 3/4&quot; Hex Bolt</td>
<td>CX38098</td>
</tr>
<tr>
<td>15 1/4&quot; - 20 x 1-1/4&quot;L Flat Head Set Screw</td>
<td>V3816</td>
</tr>
<tr>
<td>16 1/4&quot; - 20 Nut</td>
<td>CX38070</td>
</tr>
<tr>
<td>17 M6 Spring Washer</td>
<td>CX38084</td>
</tr>
<tr>
<td>18 M6 X 1.0 X 14L Hex Bolt</td>
<td>CX38099</td>
</tr>
<tr>
<td>19 1/4&quot; - 20 X 1.5&quot;L Countersunk Socket Hex Bolt</td>
<td>V3815</td>
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</table>

BLADE GUARD ASSEMBLY

<table>
<thead>
<tr>
<th>PART NAME</th>
<th>PART NUMBER</th>
</tr>
</thead>
<tbody>
<tr>
<td>1 Pearl 10° Blade Guard</td>
<td>CX38100</td>
</tr>
<tr>
<td>2 Splash Guard</td>
<td>CX38101</td>
</tr>
<tr>
<td>3 M6 Narrow Washer</td>
<td>CX38071</td>
</tr>
<tr>
<td>4 M6 X 1.0 X 10L Hex Bolt</td>
<td>CX38102</td>
</tr>
<tr>
<td>5 M4 X 0.7 X 20IL Cross Screw</td>
<td>CX38046</td>
</tr>
<tr>
<td>6 12cm Pipe</td>
<td>CX38103</td>
</tr>
<tr>
<td>7 120cm Pipe</td>
<td>CX38104</td>
</tr>
<tr>
<td>8 39cm Pipe</td>
<td>CX38105</td>
</tr>
<tr>
<td>9 D8mm Y-Shaped Female Connectors</td>
<td>CX38106</td>
</tr>
<tr>
<td>10 M4 Narrow Washer</td>
<td>CX38044</td>
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## RAIL PLATFORM ASSEMBLY

<table>
<thead>
<tr>
<th>PART NAME</th>
<th>PART NUMBER</th>
</tr>
</thead>
<tbody>
<tr>
<td>Rail Platform</td>
<td>CX38107</td>
</tr>
<tr>
<td>Pulley Mount and Cap</td>
<td>CX38108</td>
</tr>
<tr>
<td>Front Platform Anchor</td>
<td>CX38109</td>
</tr>
<tr>
<td>Rear Platform Anchor</td>
<td>CX38110</td>
</tr>
<tr>
<td>Rail</td>
<td>CX38111</td>
</tr>
<tr>
<td>Skid Plate</td>
<td>CX38112</td>
</tr>
<tr>
<td>Shaft Spacer</td>
<td>CX38113</td>
</tr>
<tr>
<td>Shaft</td>
<td>CX38114</td>
</tr>
<tr>
<td>Rubber Bumper</td>
<td>CX38115</td>
</tr>
<tr>
<td>Wire Pulley Assembly</td>
<td>CX38116</td>
</tr>
<tr>
<td>Wire Shield</td>
<td>CX38117</td>
</tr>
<tr>
<td>D2 Stainless Steel Wire (1417mm)</td>
<td>CX38118</td>
</tr>
<tr>
<td>Screw Driven Wire Clamp Assembly (Set of 4)</td>
<td>CX38119</td>
</tr>
<tr>
<td>Rubber Feet</td>
<td>CX38120</td>
</tr>
<tr>
<td>M5 X 0.8 X 10L Cross Screw</td>
<td>CX38121</td>
</tr>
<tr>
<td>Chain</td>
<td>CX38122</td>
</tr>
<tr>
<td>D21 Ring</td>
<td>CX38123</td>
</tr>
<tr>
<td>D8 X 45L Quick Release Pin</td>
<td>CX38124</td>
</tr>
<tr>
<td>M4 Narrow Washer</td>
<td>CX38044</td>
</tr>
<tr>
<td>M4 Spring Washer</td>
<td>CX38045</td>
</tr>
<tr>
<td>M4 X 0.7 X 10L Cross Screw</td>
<td>CX38125</td>
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<tr>
<td>1/4&quot; - 20 X 5/8&quot;L Socket Head Hex Bolt</td>
<td>V3808</td>
</tr>
<tr>
<td>M5 Narrow Washer</td>
<td>CX38041</td>
</tr>
<tr>
<td>M5 Spring Washer</td>
<td>CX38042</td>
</tr>
<tr>
<td>M5 X 0.8 X 10L Cross Screw</td>
<td>CX38121</td>
</tr>
<tr>
<td>M4 X 0.7 Nut</td>
<td>CX38126</td>
</tr>
</tbody>
</table>
Optional
Name (Qty.)
Miter Block (1)
Part Number
S1000-34

Optional
Name (Qty.)
Side Extension Table (1)
Part Number
V38008

Name (Qty.)
45°/90° Rip Guide (1)
Part Number
V35000

Optional
Name (Qty.)
Knob for Rip Guide and Miter Block (1)
Part Number
V35016

Name (Qty.)
Rear Drip Tray (1)
Part Number
CX38129

Name (Qty.)
Drain Plug (1)
Part Number
V35015

Name (Qty.)
Side Drip Tray (1)
Part Number
CX38128

Optional
Name (Qty.)
Universal Saw Stand (1)
Part Number
V35010-UV

Name (Qty.)
ABS Water Tray (1)
Part Number
CX38127
THE RIGHT BLADE DOES THE RIGHT JOB

For the most effective cutting and blade life always use the recommended Pearl Abrasive Co. blade.

<table>
<thead>
<tr>
<th>PEARL BLADE SERIES</th>
<th>APPLICATION</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>CERAMIC TILE</td>
</tr>
<tr>
<td>HPXL Series</td>
<td>.</td>
</tr>
<tr>
<td>DTLB19 Series</td>
<td>.</td>
</tr>
<tr>
<td>HP Series</td>
<td>.</td>
</tr>
<tr>
<td>Glass Blade</td>
<td>.</td>
</tr>
<tr>
<td>SH Series</td>
<td>.</td>
</tr>
<tr>
<td>Pro-V Series</td>
<td>.</td>
</tr>
</tbody>
</table>

HOW TO ORDER PARTS

Please have the following information ready before calling:

- Serial Number of your Tile Saw
- Model Number of the Tile Saw
- When purchased and where
- Part Description

All parts listed may be ordered from your Local warehouses. If the part is not stocked locally, call our Corporate office and ask for our Customer Service Department. For Technical Support call 1-800-969-5561. In Canada call 1-800-387-0008. There is a $25.00 minimum order.

Return Policy: Return goods for credit or exchange on the basis of the following terms: (1) They must be current products; (2) Items returned for replacement or refund should be in original cartons and must be accompanied by a packing slip with the following information: Returned Goods Authorization (RGA) number obtainable from Customer Service Department • List of items returned • Reason(s) for return(s) • Copy of original invoice(s); (3) Freight charges must be assumed by sender; (4) Returning goods are subject to a 15% handling charge to cover our cost of repacking and restocking. All Prices are subject to change without notice.

Disclaimer: Pearl Abrasive Co. reserves the right to make changes or improvements on its products without incurring an additional obligation including any obligation to make corresponding changes or improvements to products previously manufactured or sold. Pearl reserves the right to discontinue products at any time without notice.

All illustrations displayed in this manual are the property of Pearl Abrasive Co. and shall not be duplicated or reproduced without the express written consent of Pearl Abrasive Co.
# xv. ELECTRICAL MOTOR SPECIFICATION

## CX10

<table>
<thead>
<tr>
<th>Specification</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Horse Power</td>
<td>2 hp</td>
</tr>
<tr>
<td>Volts</td>
<td>115 V</td>
</tr>
<tr>
<td>Amps</td>
<td>15 amps</td>
</tr>
<tr>
<td>Motor RPM</td>
<td>22,000 rpm</td>
</tr>
<tr>
<td>Cycle</td>
<td>60 Hz</td>
</tr>
<tr>
<td>Phase</td>
<td>1</td>
</tr>
<tr>
<td>Class</td>
<td>F</td>
</tr>
<tr>
<td>Blade Shaft</td>
<td>3,300 rpm</td>
</tr>
</tbody>
</table>

### Recommendations:
- It is recommended that a **15 amp circuit** be used while operating this saw. This will prevent possible power interruption or loss.
- Always plug saw as close as possible to the power source while operating. This will allow you to receive optimum electricity.

## LENGTH OF CORD

<table>
<thead>
<tr>
<th>Wire Gauge</th>
<th>2 HP 115V</th>
</tr>
</thead>
<tbody>
<tr>
<td>No. 12</td>
<td>25'</td>
</tr>
<tr>
<td>No. 10</td>
<td>50'</td>
</tr>
<tr>
<td>No. 8</td>
<td>75'</td>
</tr>
<tr>
<td>No. 6</td>
<td>–</td>
</tr>
</tbody>
</table>

### WARNING:
To avoid permanent motor damage you must use the correct extension cord. Never use more than one extension cord at a time. Follow the chart below for proper size.
xvi. TROUBLESHOOTING

⚠️ WARNING! For your safety and the safety of others, turn the power switch off and always remove the plug from power source before troubleshooting. Repairs performed by unauthorized personnel could cause serious hazard. We recommend that service to this tool be performed by a qualified service technician with original equipment replacement parts.

EXCESSIVE NOISE. Lack of lubrication to the gearbox and or possible bearing wear. Have tool serviced.

BLADE WILL NOT CUT. Check for worn out diamond edge. Be sure that the arrow on the blade is rotating the same direction as the motor arbor and/or arrow on the blade guard. Make sure the blade is suitable for the material to be cut. If blade has been used to cut a material that is hard, it may have become dull, dress the blade by cutting a light weight abrasive building block to expose fresh diamonds. Blade dressing stones are available from your local Pearl Warehouse.

MOTOR WILL NOT START. Check power supply. If the water pump turns on when the power switch is in the “on” position, but the motor does not, have the motor serviced.

MOTOR WILL NOT STOP. The contacts in the switch may have become arched together in the on position, have it serviced.

MOTOR SHUTS OFF DURING OPERATION. Check to see that the circuit you are using is not overloaded with lights or other equipment. The fuse or circuit breaker may not have sufficient capacity, use 20-amp power. If you are using an extension cord check the extension cord table to be sure it is heavy enough to carry the current this product will draw. See Page 21 for electric cord reference.

EXCESSIVE VIBRATION Check to see that the blade is mounted properly according to safe operating practices section. Blade may be out of balance, try a different blade. Arbor shaft bearings possibly worn, have tool serviced.

NOT CUTTING SQUARE. Check the main table and carriage adjustment as well as the blade alignment procedure located in the care and maintenance section.

MAIN TABLE DOES NOT MOVE FREELY. Inspect the guide rails and rollers for build up of tile chips or dry slurry deposits. Clean and check guide roll or adjustments, according to the procedure in the care and maintenance section.

NO WATER FLOW TO BLADE. Check the water feed tube for kinks or obstructions. Check the inlet screen to ensure it is not clogged. Remove the pump inlet and turn the impeller to ensure it is not damaged or jammed. Clean the impeller if necessary and apply a drop of light oil to the shaft - be sure the impeller spins freely.

POOR MACHINE PERFORMANCE WITH LITTLE POWER. Check cord/extension cable for appropriate length and gage. Check power network for sufficient power and circuit breaker capacity.

CENTER HOLE IN BLADE OVERSIZE OR WORN. Saw blade has slipped on shaft while running. Check shaft for damage and replace blade.
PEARL LIMITED WARRANTY

Every PEARL ABRASIVE CO. tool is thoroughly inspected and tested before leaving the factory. It is warranted to be free of defects in materials and workmanship for a period of ONE YEAR from the date of original purchase. Pearl will repair or (at our option) replace a product, or part thereof, found by PEARL ABRASIVE CO. to be defective, provided the defective product is returned to PEARL ABRASIVE CO., freight pre-paid, with proof of purchase.

RGA NUMBER IS REQUIRED. Prior to the return of any product or part, a Return Goods Authorization number must be obtained from PEARL ABRASIVE CO. by fax (562) 927-5561 or calling (800) 969-5561. The owner’s name, address, phone number, as well as the serial number of the product, proof of purchase, and a brief statement detailing the nature of the claimed defect, are required for authorization.

This Warranty does not apply where:
- repairs have been made or attempted by others
- repairs are required because of normal wear and tear
- the tool has been abused, mishandled or improperly maintained
- alterations have been made to the tool
- the product is used in a manner or with a blade not recommended by the manufacturer

In no event shall Pearl Abrasive Co. be liable for any indirect, incidental or consequential damages from the sale or use of the equipment. This disclaimer applies both during and after the term of warranty.

Pearl Abrasive Co. disclaims liability for any implied warranties, including implied warranties of “merchantability” and “fitness for a specific purpose”, after the one year term of this warranty.

This warranty gives you specific legal rights, and you may also have other rights which vary from state to state. Some states do not allow the exclusion or limitation of incidental or consequential damages, so the above limitation or exclusion may not apply to you. Some states do not allow limitations on how long an implied warranty lasts, so the above limitation may not apply to you.

All parts replaced under warranty will be considered as part of the original product and any warranty on these parts will expire coincidently with the original product warranty.

This warranty supersedes & previous PEARL ABRASIVE product warranties. EXCLUSION: Water pump and motor warranty is through the original equipment manufacturer.