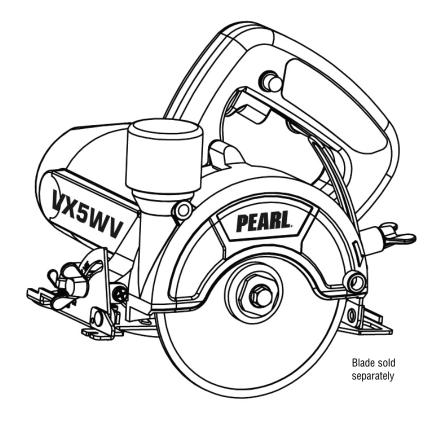
PEARL VX5WV

MODEL VX5WV™ PORTABLE HANDHELD TILE SAW

OWNER'S/OPERATOR'S MANUAL



SERIAL NUMBER -

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.

WARNING: This product can potentially expose you to chemicals that are known to the State of California to cause cancer and birth defects or other reproductive harm. For more information, go to: www.P65Warnings.ca.gov

REV. 1

TABLE OF CONTENTS

	PAGE
I.	GENERAL SAFETY RULES FOR ALL POWER TOOLS
II.	SYMBOLS
III.	FEATURES
IV.	SPECIFICATIONS
V.	UNPACKING6
VI.	ASSEMBLE AND SET-UP6
VII.	SET-UP FOR WET AND DRY CUTTING
VIII.	OPERATING THE SAW7
IX.	SAFE OPERATING PRACTICES
X.	CARE AND MAINTENANCE
XI.	PROPER BLADE USE
XII.	AVAILABLE ACCESSORIES
XIII.	NOTES

i. GENERAL SAFETY RULES FOR ALL POWER TOOLS

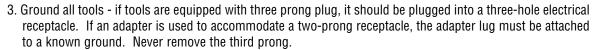
NARNING! Read all instructions. As with all machinery there are certain hazards involved with operation and use of the machine. The following basic safety precautions should be followed at all times to reduce the risk of fire, electric shock and serious personal injury to you or others. Keep these important operating instructions with this product.



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.





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.



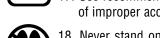
14. Maintain tools in top condition. Keep tools sharp and clean for best and safest performance. Follow instructions for lubricating and changing accessories. Inspect tool cords periodically and if damaged, have repaired by authorized service facility.



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 it's intended function. Check for alignment of moving parts, binding of moving parts, breakage of parts, mounting, and any other conditions that may affect it's 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.

WARNING! <u>CALIFORNIA PROPOSITION 65:</u> Sawing and drilling generates dust. Excessive airborne particles may cause irritation to eyes, skin and respiratory tract. To avoid breathing impairment always employ dust controls and protection suitable to the material being saw or drilled in accordance with OSHA (29 CFR Part 1910.1). Diamond blades improperly used are dangerous. Comply with ANSI Safety Code B7.1 and OSHA covering speed, safety guards, flanges, mounting procedures, general operating rules, handling, storage and general machine condition.

ii. SYMBOLS



KEEP GUARD IN PLACE



DIAMOND BLADE



BLADE CUTTING DEPTH



ELECTRIC SWITCH OFF



ELECTRIC SWITCH ON



ELECTRICAL HAZARD



REMOVE TOOLS



PAY EXTREME ATTENTION



REPAIRS TO BE DONE



MACHINE HAZARD



FLAMMABLE



READ INSTRUCTIONS CAREFULLY



WARNING



FRAGILE



KEEP DRY



DO NOT STEP ON



WEAR HEARING PROTECTION



WEAR EYE PROTECTION



WEAR BREATHING PROTECTION



WEAR HARD HAT



WEAR PROTECTIVE CLOTHING



WEAR SAFETY SHOES

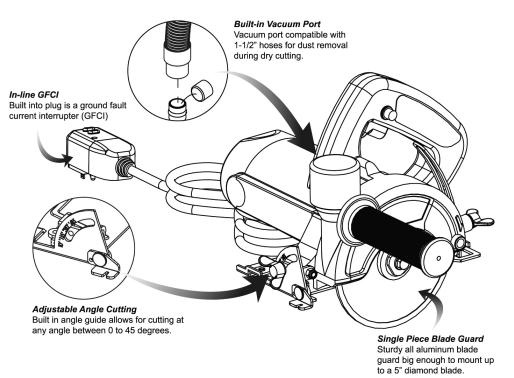


WELL VENTILATED



NO NON-WORKING PERSONNEL

iii. FEATURES



- Powerful 11 amps motor
- Rip guide
- Miter cut
- Vacuum port and blade guard cover for dust control
- Trigger lock
- Over 4cm depth of cut with 5" blade
- Side handle for additional support
- Water hose system with control valve
- GFCI Included

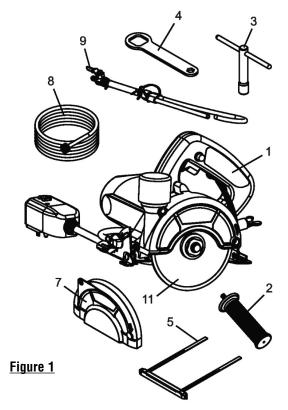
iv. SPECIFICATIONS

VX5WV PORTABLE TILE SAW									
MOTOR	MAX. BLADE CAPACITY	CUTTING LENGTH	CUTTING DEPTH	WEIGHT					
11 AMPS 115 v, 60 Hz, 12,000 rpm	5" Blade with 20mm arbor size	Length: Unlimited Diagonal: Unlimited	Depth of Cut: 1-11/16" Depth of Cut (miter): 1-3/8"	8.4 lbs.					

v. UNPACKING

Open the carton box cover by lifting the top portion. Locate the accessory box and check its content for the following items before discarding any packaging:

- 1 Saw
- 2 Side handle
- 3 T-Socket wrench
- 4 Closed box wrench
- 5 Rip guide
- 6 Owner's manual
- Dust guard cover
- Garden hose assembly
- 9 Blade guard hose assembly (partially installed on power cable)
- 10 Manual
- 11 Blade (sold separately)



vi. ASSEMBLY and SET-UP

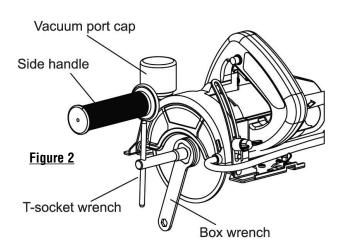
- 1. Open the carton box.
- 2. Remove the rip guide and dust guard cover.
- 3. Remove the carton partition and remove the remaining components. Recycle packaging but retain the manual.
- 4. Remove the blade shaft bolt and outer flange. Install the provided blade and reinstall the outer flange and blade shaft bolt.
- 5. Using the provided closed box wrench and Isocket wrench, tighten and blade shaft nut.
- 6. If cutting wet, install the blade guard hoses onto the blade guard. Install the garden hose assembly onto blade quard hose assembly valve if necessary.
- 7. Install side handle onto blade guard.

BLADE INSTALLATION



WARNING: Disconnect the power plug before installing the blade onto the blade shaft.

- 1. Using the provided close box wrench and tsocket wrench (turning clockwise), loosen the blade shaft nut. Remove the outer flange.
- 2. Install the blade and reinstall the outer flange and blade shaft bolt (see fig. 2).
- 3. Screw in the side handle if removed (see fig. 4).



vii. SETUP FOR WET OR DRY CUTTING

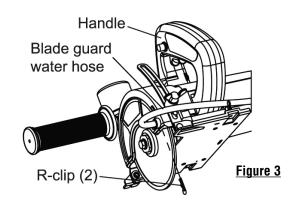
WARNING: Water pressure going to hose assembly should not exceed 80 psi.



WARNING: Disconnect the power plug before installing the blade onto the blade shaft.

WET CUTTING

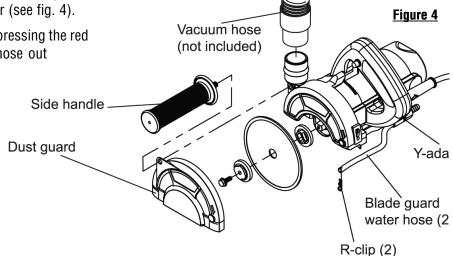
- 1. To cut wet remove side handle to remove the dust guard (see fig 4).
- 2. Insert the hose (2) to the the ports on the guard. Reinsert the r-clip into each hose (see fig. 3).
- 3. Attach each hose to the y-fitting below the handle. Pull hoses from both ends to check if secure (see fig. 4).



DRY CUTTING

 If cutting dry, locate r-clips inserted in the hose portion protruding in the blade guard. Pull out each hose's respective r-clip. With the blade guard water hoses removed, insert r-clips back into the hose for storage. Store hoses for use later (see fig. 4).

- Pull out hoses going to y-adapter by pressing the red rings inwards and then pulling the hose out the opposite direction.
- 3. Install the dust guard.
- Screw the side handle onto the blade guard (see fig. 4). Remove the vacuum port cap and attach a vacuum hose (see fig. 2 and 4).



viii. OPERATING THE SAW



1. ANSI Z87.1 Eye protection

WARNING: Everyday eyeglasses are NOT safety glasses

2. ANSI S12.6 (S3.19) Hearing protection WARNING: Under some conditions and duration of use, noise from this product may contribute to hearing lose

- \triangle
 - 3. NIOSH/OSHA/MSHA Respiratory protection WARNING: Some dust created by power sanding, sawing, grinding, drilling, and other construction activities contains chemicals known to the State of California to cause cancer, birth defects or other reproductive harm. Some examples of these chemicals are:
- lead from lead-based paints,
- crystalline silica from bricks and cement and other masonry products, and
- arsenic and chromium from chemically-treated lumber.



Your risk from these exposures varies, depending on how often you do this type of work. To reduce your exposure to these chemicals: work in a well ventilated area, and work with approved safety equipment, such as those dust masks that are designed to filter out microscopic particles.

 \triangle

WARNING: Disconnect the power plug before installing or removing the blade or accessories, and before adjusting or making repairs to the power tool.



CAUTION: Never cut overhead. Cut only on horizontal surfaces when using water.

 \triangle

CAUTION: Use clamps or other mechanical means to support and hold the workpiece to a stable platform placed on a reliable flat surface. DO NOT hold the workpiece by hand or against the body.

DEPTH ADJUSTMENT

- 1. Loosen depth adjustment screw (see fig. 6).
- 2. Move the skid to the desired position.
- 3. Retighten the depth adjustment screw.

ANGLE ADJUSTMENT

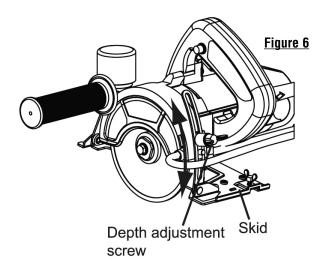
- 1. Loosen angle adjustment screw (see fig. 7).
- 2. Move the skid to the desired position.
- 3. Retighten the angle adjustment screw.

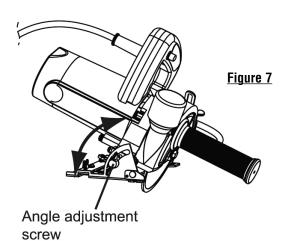
USING THE RIP GUIDE

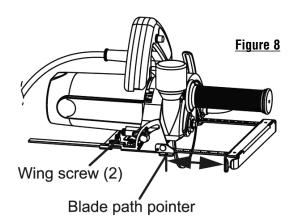
- 1. Loosen the two wing screws.
- 2. Slide the rip guide into the skid (see fig. 8).
- 3. Using the blade path pointer as reference, slide the rip guide into position.
- 4. Retighten the two wings screws.

STRAIGHT/ANGLED CUTS

- 1. Using a marker or grease pencil, mark the area to be cut.
- 2. Place the skid of the saw on the workpiece such that the blade does not touch the workpiece.
- 3. Align the blade path pointer with the outline of the marked area.
- 4. Turn the tool on and wait for the blade to reach its maximum rpm.
- 5. Move the tool slowly forward while keeping the blade aligned with the cut line.







ix. SAFE OPERATING PRACTICES

WARNING! For your own safety and the safety of others do not attempt to operate this saw until you have read and understand the general safety rules for all power tools and the following additional safety precaution unique to this saw.

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

WARNING! The dust generated by cutting of tile, marble, stone, bricks etc. can be injurious to your health. Always operate machinery in well ventilated areas and provide proper dust removal. Always wear a dust mask approved for respiratory protection against these types of dusts and mists.



- 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.



 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. <u>Using a damaged blade may cause</u> 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. Setting the blade depth too low will cause it to cut into the main table that may result in injury.

- 12. 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.

- Do not attempt to cut pieces too small to safely hold down.
- 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.
- 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.

- 13. 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.
 - 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.

14. 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 equipmentgrounding 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 9*. The tool has a grounding plug that looks like the plug illustrated in *Figure 9(A)*. A temporary adapter, which looks like the adapter illustrated in *Figure 9(B)* and 9(C), may be used to connect this plug to a 2 pole receptacle as shown in *Figure 9(B)* if a properly grounded outlet is not available. The temporary adapter should be used only until a

properly grounded outlet can be installed by a qualified electrician. The green-colored rigid ear, lug, and the like, extending from the adapter must be connected to a permanent ground such as a properly grounded outlet hox.

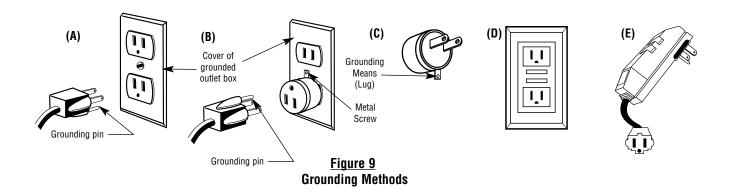
NOTE - Use of a Temporary Adapter is not permitted in Canada.

15. Position of the 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 10.
- If the plug or receptacle does get wet,
 <u>Do not unplug the cord.</u> Disconnect the fuse or circuit breaker that supplies power to the tool. Then unplug and examine for presence of water in the receptacle.

16. 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 11. 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.





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

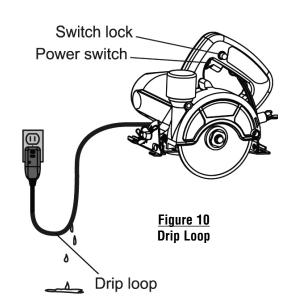
EXTENSION CORD CHART

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 for proper size.

WIRE GAUGE	LENGTH OF CORD		
No. 14	50'		
No. 12	100'		



- 1. Plug GFCI into power outlet. Indicator should turn red.
- 2. Press test button. Red indicator should turn off.
- 3. Press reset button for use. Do not use if above test fails.

















x. CARE AND MAINTENANCE

MARNING! For your safety before performing any maintenance on the saw turn off the power switch and unplug the power cord.

GENERAL RULES

- Always clean the machine before performing any maintenance/ repair.
- Before performing any cleaning/maintenance /repair, the machine must be switched off with the main power switch.

Steps to Follow When Cleaning:

- Please do not use aggressive cleaners (i.e. containing solvents). Do not use high-pressure water jets, aggressive detergents or solutions and liquids with a temperature exceeding 86°F! Use a fluff-free cloth only.
- Use a cloth which may be lightly moistened only for removing dust and dirt. Hard packed dirt can be removed with a soft brush.
- For the sake of safety, no water/cleaning liquid/vapor may penetrate into the electric motor, connectors/plugs, switches, etc. Therefore cover all apertures, holes in the housing, connectors or plugs, etc. or seal them with adhesive tape!
- Use a soft, low-pressure water jet and a brush to rinse dirt and incrustations away. Be particularly careful when near hazardous parts of the machine (e.g. switch, motor). Clean the motor and switches only by wiping with a moist cloth.
- Do not "rinse" the bearings of the drive elements to prevent them from running dry. The ball bearings of the machine are permanently lubricated.
- After cleaning, remove all covers and adhesive tape! All screws/nuts which you may have loosened must be tightened again!
- After wet cleaning, try the machine on a power outlet which is equipped with a power breaker (i.e. fault current circuit breaker). If the fault current circuit breaker cuts the power supply, the machine must be inspected by an authorized dealer prior to use!

CLEANING

- 1. Use a slightly moist cloth to clean the surface of the power tool after every use. Hard packed dirt can be removed with a soft brush.
- 2. Blow dirt out of the air vent after every week of use.
- 3. Clean the surface using a slightly moist cloth. Hard packed dirt can be removed with a soft brush the pump, or replace if necessary.

CARBON BRUSH REPLACEMENT

- 1. Remove the motor fan cover (see fig. 11).
- 2. Locate the carbon brush cap. Remove the caps (turning counter-clockwise) to access the brushes (2).
- 3. Remove the brushes.
- 4. When installing the new brushes, make sure they fit snugly into the slots. Do not modify the replacement brushes (i.e. file them down) or use non OEM brushes, as it may damage the armature and in doing so voids the manufacturer warranty.
- 5. Replace the carbon brush caps.
- 6. Reassemble the motor fan cover.

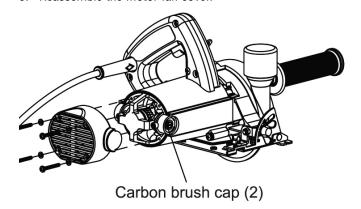


Figure 11

xi. PROPER BLADE USE

WET CUT BLADES

DO'S

- Inspect blades daily for cracks or uneven wear.
- Always use appropriate blade for material being cut.
- Inspect arbor shaft for uneven wear before mounting blade.
- Always use blades with the correct arbor shaft size.
- Ensure that blade is mounted in the correct direction.
- Use proper safety equipment when operating the saw.
- Always have a continuous flow of water on both sides of blade.
- Secure the blade to the arbor with a wrench.

DONT'S

- Do not cut dry with blades marked "Use Wet".
- Do not exceed manufacturer's recommended maximum RPM.
- Do not force blade into material. Let blade cut at its own speed.

DRY CUT BLADES

D0'S

- In addition to the following, always follow wet recommendations.
- Use appropriate blade for material being cut.
- Inspect segment blades for segment cracking or loss.
- Do not use damaged blades.
- Use proper safety equipment when operating the saw.

DONT'S

- In addition to the following, always follow wet recommendations.
- Do not make long cuts with dry blades. Allow them to air cool.
- Do not use the edge or side of blade to cut or grind.
- Do not attempt to cut a radius or curve without a contour blade.
- Do not cut too deep or too fast into the material.
- Do not cut any material not recommended by blade manufacturer.

xii. AVAILABLE ACCESSORIES



RAIL C-CLAMPS (X2)
Part Number VX5CC



QUICK-ADJUST RAIL CLAMPS (X2) Part Number VX5FC



RAIL CONNECTORS (X3)
Part Number VX5RCON



SAW RAIL CARRIAGEPart Number VX5CARR



RAIL SUCTION CUPS (X2)
Part Number VX5SC



RAIL 7.5' Part Number VX5R7.5

xiii. NOTES



CORPORATE OFFICE: SO. CALIFORNIA • USA

4900 ZAMBRANO ST., COMMERCE, CA 90040-0031

562-927-5561 • FAX 562-928-3857

Toll Free: 800-969-5561 www.pearlabrasive.com





International Flooring Center, Inc

www.FlooringSupplyShop.com 323-731-8453