

Our associates will ensure the tool works properly before you leave the store. If you experience issues with the tool while completing your project, simply bring it back to the Tool Rental Center to get a replacement. If you purchase Damage Protection at the time of your rental, you are not responsible for repair costs for tools that break due to normal use.



↑ Dust control



Rotary Sander
RS-16
RS-16 DC
Operator's Manual



Intertek

READ THIS BOOK

This book has important information for the use and safe operation of this machine. Failure to read this book prior to operating or attempting any service or maintenance procedure to your American Sanders machine could result in injury to you or to other personnel; damage to the machine or to other property could occur as well. You must have training in the operation of this machine before using it. If your operator(s) cannot read this manual, have it explained fully before attempting to operate this machine.

All directions given in this book are as seen from the operator's position at the rear of the machine.

EN

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WARNING!

The Products sold with this Manual contain or may contain chemicals that are known to certain governments (such as the State of California, as identified in its Proposition 65 Regulatory Warning Law) to cause cancer, birth defects or other reproductive harm. In certain locations (including the State of California) purchasers of these Products that place them in service at an employment job site or a publicly accessible space are required by regulation to make certain notices, warnings or disclosures regarding the chemicals that are or may be contained in the Products at or about such work sites. It is the purchaser's responsibility to know the content of, and to comply with, any laws and regulations relating to the use of these Products in such environments. The Manufacturer disclaims any responsibility to advise purchasers of any specific requirements that may be applicable to the use of the Products in such environments.

*****This product is intended for commercial use only*****

Operator Safety Instructions

In this Operation Manual you will find three statements that you must read and observe to ensure safe operation of this machine.

DANGER means: Severe bodily injury or death can occur to you or other personnel if the **DANGER** statements found on this machine or in this Operation Manual are ignored or are not adhered to. Read and observe all **DANGER** statements found in this Operation Manual and on your machine.

WARNING means: Injury can occur to you or to other personnel if the **WARNING** statements found on your machine or in the Operation Manual are ignored or are not adhered to. Read and observe all **WARNING** statements found in this Operation Manual and on your machine.

CAUTION means: Damage can occur to the machine or to other property if the **CAUTION** statements found on your machine or in this Operation Manual are ignored or are not adhered to. Read and observe all **CAUTION** statements found in this Operation Manual and on your machine.

**DANGER:**

Failure to read the Owner's Manual prior to operating or servicing your American Sanders machine could result in injury to you or to other personnel; damage to the machine or to other property could occur as well. You must have training in the operation of this machine before using it. If you or your operator(s) cannot read English, have this manual explained fully before attempting to operate this machine.

**DANGER:**

A. Sanding/finishing wood floors can create an explosive or combustible environment. Do not operate this machine around solvents, thinners, alcohol, fuels, floor finishes, wood dust or any other flammable materials. Cigarette lighters, pilot lights, electrical sparks and all other sources of ignition should be extinguished or avoided. Keep work area well ventilated.

B. Dust generated from sanding wood floors can spontaneously ignite or explode. Promptly dispose of any sanding dust in a metal container clear of any combustibles. Do not dispose in a fire.

**DANGER:**

A. Electrocutation could occur if the machine is being serviced while the machine is connected to a power source. Disconnect the power supply before servicing.

B. Electrocutation or fire could occur if the machine is being operated with a damaged power cord. Keep the power cord clear of the pad. Always lift the cord over the machine. Do not move the machine by the power cord.

C. Shock hazard. Do not use the machine if it has been rained on or sprayed with water.

**DANGER:**

To avoid injury keep hands, feet, and loose clothing away from all moving parts on the machine. Disconnect the power cord before replacing the pad, changing the abrasive, or when servicing. Do not operate the machine unless all guards are in place. Never leave the machine unattended while connected to a power source.

DANGER:

Machine can have high starting torque. Do not operate machine on rough or uneven surfaces. Do not operate on a slope. It is possible for the machine to move suddenly from side to side and even leave the ground if misused during operation. Only experienced operators should use machine for applications that impart high torque on the machine. If unable to control the machine during operation, release the handle and step away from the machine. It will stop automatically.

**WARNING:**

Injury can occur if protective clothing or equipment is not used while sanding. Always wear safety goggles, protective clothing, and dust mask while sanding.

**WARNING:**

This sander is not to be used on pressure treated wood. Some pressure treated woods contain arsenic and sanding pressure treated wood produces hazardous dust. Inhaling hazardous dust from pressure treated wood can cause serious injury or death. Sanding pressure treated wood decks or uneven surfaces can damage the sander which is not covered under warranty or damage waiver.

**WARNING:**

Any alterations or modifications of this machine could result in damage to the machine or injury to the operator or other bystanders. Alterations or modifications not authorized by the manufacturer voids any and all warranties and liabilities.

**WARNING:**

Risk of explosion. Floor sanding can result in an explosive mixture of fine dust and air. Use floor sanding machine only in a well-ventilated area free from any flame or match.

General Power Tool Safety Warnings

WARNING: Read all safety warnings and instructions. Failure to follow warnings and instructions may result in electric shock, fire and or serious injury.

Save all warnings and instructions for future use.

The term "power tool" in the warnings refers to your main-operated (corded) power tool or battery operated (cordless) power tool.

1) Work area safety

- Keep work area clean and well lit.** Clutter or dark areas invite accidents.
- Do not operate power tools in explosive atmospheres, such as in the presence of flammable liquids, gases, or dust.** Power tools create sparks which may ignite the dust or fumes.
- Keep children and bystanders away while operating a power tool.** Distractions can cause you to lose control.

2) Electrical safety

- Power tool plugs must match the outlet. Never modify the plug in any way. Do not use any adapter plugs with earthed (grounded) power tools.** Unmodified plugs and matching outlets will reduce risk of electric shock.
- Avoid body contact with earthed or grounded surfaces such as pipes, radiators, ranges, and refrigerators.** There is an increased risk of electric shock if your body is earthed or grounded.

- c) **Do not expose power tools to rain or wet conditions.** Water entering a power tool will increase the risk of electric shock.
- d) **Do not abuse the cord. Never use the cord for carrying, pulling or unplugging the power tool. Keep cord away from heat, oil, sharp edges or moving parts.** Damaged or entangled cords increase the risk of electric shock.
- e) **When operating a power tool outdoors, use an extension cord suitable for outdoor use.** Use of cord suitable for outdoor use reduces the risk of electric shock.
- f) **If operating a power tool in a damp location is unavoidable, use a residual current device (RCD) or ground fault circuit interrupter (GFCI) protected supply.** Use of a RCD or GFCI reduces the risk of electric shock.

3) Personal safety

- a) **Stay alert, watch what you are doing and use common sense when operating a power tool. Do not use a power tool while you are tired or under the influence of drugs, alcohol, or medication.** A moment of inattention while operating power tools may result in serious personal injury.
- b) **Use personal protective equipment. Always wear eye protection.** Protective equipment such as dust mask, non-skid safety shoes, hard hat, or hearing protection used for appropriate conditions will reduce personal injury.
- c) **Prevent unintentional starting. Ensure switch is in off-position before connecting to power source and/or battery pack, picking up, or carrying the tool.** Carrying power tools with your finger on the switch or energizing power tools that have the switch on invites accidents.
- d) **Remove any adjustment wrench or key before turning the power tool on.** A wrench or key left attached to a rotating part of the power tool may result in personal injury.
- e) **Do not overreach. Keep proper footing and balance at all times.** This enables better control of the power tool in unexpected situations.
- f) **Dress properly. Do not wear loose clothing or jewelry. Keep your hair, clothing and gloves away from moving parts.** Loose clothes, jewelry, or long hair can be caught in moving parts.
- g) **If devices are provided for the connection of dust extraction and collection facilities, ensure these are connected and properly used.** Use of dust collection can reduce dust related hazards. It is recommended that the tool always be supplied via a residual current device with a rated residual current of 30mA or less.

4) Power tool use and care

- a) **Do not force the power tool. Use the correct power tool for your application.** The correct power tool will do the job better and safer at the rate for which it was designed.
- b) **Do not use the power tool if the switch does not turn it on and off.** Any power tool that cannot be controlled with the switch is dangerous and must be repaired.
- c) **Disconnect the plug from the power source and/or the battery pack from the power tool before making any adjustments, changing accessories or storing power tools.** Such preventative safety measures reduce the risk of starting the power tool accidentally.
- d) **Store idle power tools out of the reach of children and do not allow persons unfamiliar with the power tool or these instructions to operate the power tools.** Power tools are dangerous in the hands of untrained users.
- e) **Maintain power tools. Check for misalignment or binding of moving parts, breakage of parts and any other condition that may affect the power tool's operation. If damaged, have the power tool repaired before use.** Many accidents are caused by poorly maintained power tools.
- f) **Keep cutting tools sharp and clean.** Properly maintained cutting tools with sharp cutting edges are less likely to bind and are easier to control.
- g) **Use the power tool, accessories and tool bits ect. in accordance with these instructions, taking into account the working conditions and the work to be performed.** Use of the power tool for operations different from those intended could result in a hazardous situation.

5) Service

- a) **Have the power tool serviced by a qualified repair person using only identical replacement parts.** This will ensure that the safety of the power tool is maintained. If the supply cord is damaged, it must be replaced by the manufacturer, its service agent or similarly qualified persons in order to avoid a hazard.

Safety Warnings For Sanding Operations

1. This power tool is intended to function as a sander. Read all safety warnings, instructions and specifications provided with this power tool. Failure to follow all instructions listed below may result in electric shock, fire, or personal injury.
2. Operations such as grinding, wire brushing, polishing or cutting-off, are not recommended to be performed with this power tool. Operations for which the tool was not designed may create a hazard and cause personal injury.
3. Do not use accessories which are not specifically designed and recommended by the tool manufacturer. Just because the accessory can be attached to your power tool, it does not assure safe operation.
4. The rated speed of the accessory must be at least equal to the maximum speed marked on the power tool. Accessories running faster than their rated speed can break and fly apart.
5. The outside diameter and thickness of your accessory must be within the capacity rating of your power tool. Incorrectly sized accessories cannot be adequately guard or controlled.
6. The arbor size of wheels, flanges, backing pads or any other accessory must fit the spindle of the power tool. Accessories with arbor holes that do not match the mounting hardware of the power tool will run out of balance, vibrate excessively and may cause loss of control.
7. Do not use damaged accessory. Before each use inspect the accessory such as abrasive wheel for chips or cracks, backing

pad for cracks, tear or excess wear, wire brush for loose or cracked wires. If power tool or accessory is dropped, inspect for damage or install an undamaged accessory. After inspecting or installing an accessory, position yourself or bystanders away from the plane of the rotating accessory and run the power tool at maximum no-load speed for one minute. Damaged

8. Wear personal protective equipment. Depending on application, use face shield, safety goggles or safety glasses. As appropriate, wear dust mask, hearing protectors, gloves and workshop apron capable of stopping flying debris generated by various operations. The eye protection must be capable of stopping flying debris generated by various operations. The dust mask or respirator must be capable of filtering particles generated by your operations. Prolonged exposure to high intensity noise may cause hearing loss.
9. Keep bystanders a safe distance away from work area. Anyone entering the work area must wear personal protective equipment. Fragments of work piece or a broken accessory may fly away and cause injury beyond immediate area of operation.
10. Hold power tool by gripping insulated surfaces (handle) only, when performing an operation where the cutting accessory may contact hidden wiring or its own cord. Cutting accessory contacting a "live" wire may make exposed metal parts of the power tool "live" and shock the operator.
11. Position the cord clear of the spinning accessory. If you lose control, the cord may be cut or snagged and your arm or hand may be pulled into the spinning accessory.
12. Never lay the power tool down until the accessory has come to a complete stop. The spinning accessory may grab the surface and pull the power tool out of your control.
13. Do not run the power tool while carrying it at your side. Accidental contact with the spinning accessory could snag your clothing, pulling the accessory into your body.
14. Regularly clean the power tools air vents. The motor's fan will draw the dust inside the housing and excessive accumulation may cause electrical hazards.
15. Do not operate the power tool near flammable materials. Sparks could ignite these materials.
16. Do not use excessively oversized sanding disc paper. Follow manufacturer's recommendations when selecting sanding paper. Larger sanding paper extending beyond the sanding pad presents a laceration hazard and may cause snagging, tearing of the disc or kickback.
17. Risk of explosion. Floor sanding can result in an explosive mixture of fine dust and air. Use floor sanding machine only in a well-ventilated area free from any flame or match.

Kickback and Related Warnings

Kickback is a sudden reaction to a pinched or snagged rotating wheel, backing pad, brush or any other accessory. Pinching or snagging causes rapid stalling of the rotating backing pad which in turn causes uncontrolled power tool to be forced in the opposite direction of the backing pad's rotation at the point of the binding.

For example, if an abrasive wheel is snagged or pinched by the work piece, the edge of the wheel that is entering into the pinch point can dig into the surface of the material causing the wheel to climb out or kick out. The wheel may either jump toward or away from the operator, depending on direction of the wheel's movement at the point of pinching. Abrasive wheels may also break under these conditions.

Kickback is the result of power tool misuse and incorrect operating procedures or conditions and can be avoided by taking proper precautions as given below.

1. Maintain a firm grip on the power tool and position your body and arms to allow you to resist kickback forces. Always use auxiliary handles, if provided for maximum control over kickback or torque reactions during start up. The operator can control torque reactions or kickback forces, if proper precautions are taken.
2. Never place your hand near the rotating accessory. Accessory may kickback over your hand.
3. Do not position your body in the area where power tool will move if kickback occurs. Kickback will propel the tool in the direction opposite to the wheel's movement at the point of the snagging.
4. Use special care when working corners, sharp edges etc. Avoid bouncing and snagging the accessory. Corners, sharp edges or bouncing have a tendency to snag the rotating accessory and cause loss of control or kickback.

Additional Rules For Safe Operation

1. Empty the dust bag or dust collection receiver frequently. Do not leave residue in dust bag or dust collection receiver unattended. Always empty in a non-combustible metal container. Sanding wood or varnish produces dust that can self ignite and cause injury or damage. Follow this precaution for storage.
2. Set all exposed nails. Sweep loose abrasive away from work area. Do not strike metal pipes, ect., with sanding paper. Striking metal or abrasive particles with sanding paper produces sparks that could ignite the sanding dust which can cause injury or damage.
3. Do not operate a partially assembled power tool. Keep all adjustments within manufacturer's specifications. Keep all fasteners tight. Operating a partially assembled power tool could result in injury to the operator or bystander and could cause damage to the equipment or surroundings.
4. Do not attempt to change the sanding paper while the power tool is running. The sanding drum can snag clothing and cause injury to limbs, and moving sanding paper can cause abrasions.
5. The power tool should only be used on an electrical system (mains) that is rated for the electrical requirements of the power tool as shown on the nameplate. Use only on an earthing (grounded) system. Do not service the power tool if it is energized or connected to an electrical circuit. Improper use could cause fire or electric shock.

Introduction

UNCRATE THE MACHINE

When the machine is delivered, carefully inspect the shipping carton and the machine for damage. If damage is evident, save the shipping carton so that it can be inspected. Contact the American Customer Service Department.

KNOW YOUR MACHINE

- 1 Operator Handle Grips
- 2 Switch Lever Safety Lock Button
- 3 Switch Levers - Squeeze - ON / Release - OFF
- 4 Handle Release Compression Lever
- 5 Power Cord
- 6 Operator Handle
- 7 Cord Hook
- 8 Skirt (RS-16 DC)

WARNING: This machine contains moving parts. To reduce the risk of injury, always unplug the power cord before servicing.

INSTALLING THE PAD DRIVER

1. Align the lugs with the corresponding slots in the pad driver and turn the pad driver counterclockwise to lock it in place (figure 2). To remove pad driver, give it a quick hard turn clockwise.

CAUTION! Using the wrong pad on this machine can overload the motor.

2. Install skirt (RS-16 DC) as shown in figure 1, item 8; stiffening the strip down.

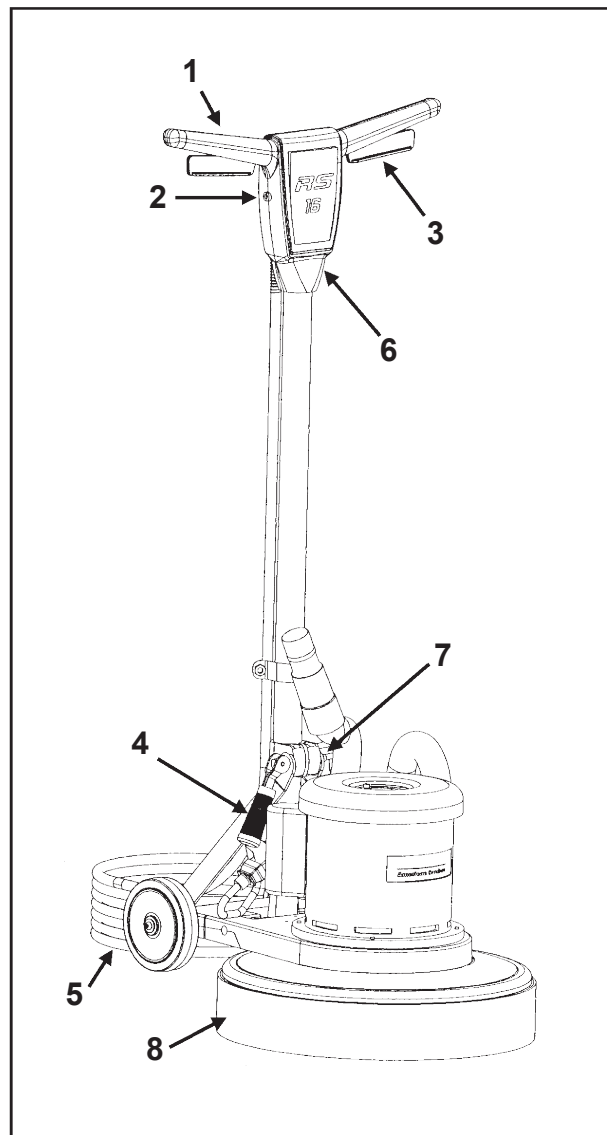


Figure 1

MACHINE SPECIFICATIONS

Model	RS-16	RS-16DC	RS-16DC
Part Number	07161A	07162A	56381748
Voltage (Volts)	120	120	230
Frequency (Hz)	60	60	50
Current (Amps)	15	15	8.3
Pad /Brush Speed	175 rpm	175 rpm	145 rpm
Power	1.5 hp (1.1 kW)	1.5 hp (1.1 kW)	1.1 kW
Gearbox	3-Planet	3-Planet	3-Planet
Pad Driver Size	16" (41 cm)	16" (41 cm)	16" (41 cm)
Cord Length	50' (15 m)	50' (15 m)	50' (15 m)
Height w/handle	46" (117 cm)	46" (117 cm)	46" (117 cm)
Weight w/cord	91 lbs. (41.1 kg)	91 lbs. (41.1 kg)	91 lbs. (41.1 kg)
Handle Tube	Tubular Steel	Tubular Steel	Tubular Steel
Main Frame	Die Cast Alum.	Die Cast Alum.	Die Cast Alum.

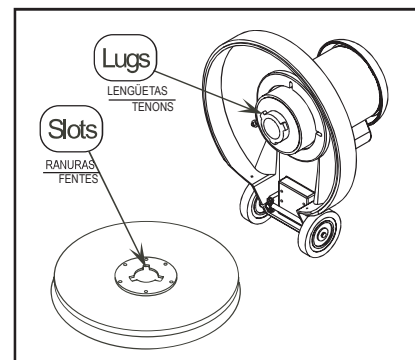


Figure 2

Electrical Connection Instructions

Extension Cords (120V)

Use only an approved extension cord with three conductors, a plug with three terminals, and a connector body with three holes.

- ⚠ WARNING:** If you use an extension cord, use an extension cord with minimum wire size 12 AWG. Do not use an extension cord longer than 50 feet. Do not join two extension cords.

Extension Cords (230V)

Use only an approved extension cord with two main conductors and one earthing conductor.

- ⚠ WARNING:** If you use an extension cord, use an extension cord with minimum wire size 1.50 mm². Do not use an extension cord longer than 15 meters. Do not join two extension cords.
- ⚠ WARNING:** Do not cut, remove, or break the ground terminal. Do not try to fit a three-terminal plug into a receptacle or connector body that does not fit the plug. If the receptacle or connector body does not fit the plug, see your Authorized person to make the connection.

Electrical Connection Instructions (120V)

Instructions for connection to the power supply and the electrical ground.

This product must be grounded. If it should malfunction or breakdown, grounding provides a path of least resistance for electric current to reduce the risk of electrical shock. This product is equipped with a cord having an equipment-grounding conductor and grounding plug. The plug must be inserted into an appropriate outlet that is properly installed and grounded in accordance with all local codes and ordinances.

- ⚠ WARNING:** Improper connection of the equipment-grounding conductor can result in a risk of electric shock. Check with qualified electrician or service person if you are in doubt as to whether the outlet is properly grounded. Do not modify the plug provided with the product – if it will not fit the outlet, have a proper outlet installed by a qualified electrician.

This product is for use on a nominal 120 volt circuit and has a grounding attachment plug that looks like the plug illustrated in figure 3. Make sure that the product is connected to an outlet having the same configuration as the plug. No adapter should be used with this product. Always connect the machine to a dedicated 20 amp electrical line to prevent nuisance breaker tripping and line overload due to other devices.

- ⚠ WARNING:** To prevent possible electric shock, protect the machine from rain. Keep the machine in a dry building.
- ⚠ WARNING:** To prevent possible electric shock, always use a 3-wire electrical system connected to the electrical ground. For maximum protection against electrical shock, use a circuit that is protected by a ground fault circuit interrupter. Consult your electrical contractor.
- ⚠ WARNING:** Do not cut, remove or break the ground pin. If the outlet does not fit the plug, consult your electrical contractor.
- ⚠ WARNING:** Have worn, cut or damaged cords replaced by an authorized service person.

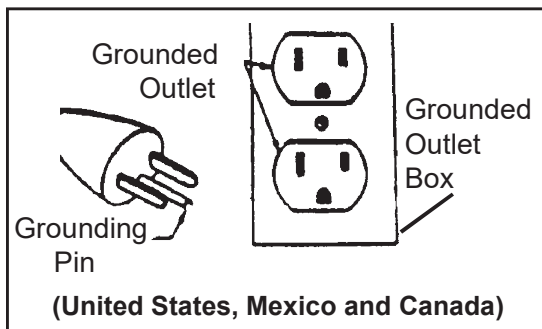


Figure 3

Electrical Connection Instructions (230V)

CAUTION: This machine will operate only on the AC frequency and electrical voltage shown on the nameplate. Make sure you have the correct frequency and voltage before connecting the power cord to an outlet.

This machine must be connected to the electrical ground to protect the operator from electric shock. The machine has a power cord with two main conductors and one earthing conductor. Connect the plug to the type of receptacle shown in figure 5. The green and yellow conductor cord is the ground wire. Never connect this wire to any terminal other than the ground terminal.

WARNING: Always use this machine with an AC three-conductor electrical system connected to the electrical ground. Replace any worn, cut, or damaged cords. Replace any damaged plugs, receptacles, or connector bodies. Do not move the machine over an electrical cord. Always lift the cord over the machine.

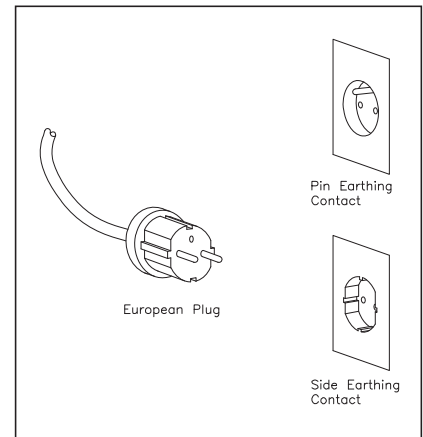


Figure 5

Operating Instructions

OPERATION (Figure 4)

- 1 Unwrap the Power Cord (5) and plug it into a properly grounded outlet.
- 2 Pull up on the Handle Release Compression Lever (4). Move the Operator Handle (6) downward until your arms are almost straight. Push down on the Handle Release Compression Lever (4) to lock it in place.
- 3 Lift up on the Operator Handle (6) until the brush (or pad) is flat against the floor.

DANGER: Machine can have high starting torque. Do not operate machine on rough or uneven surfaces. Do not operate on a slope. It is possible for the machine to move suddenly from side to side and even leave the ground if misused during operation. Only experienced operators should use machine for applications that impart high torque on the machine. If unable to control the machine during operation, release the handle and step away from the machine. It will stop automatically.

WARNING: Be prepared to control the machine as soon as the motor starts. Just a slight up or down movement of the Handle will make the machine move from side to side. Raise the Handle to go right. Lower the Handle to go left.

CAUTION! Immediately start moving the machine back and forth. Keep the machine moving while the motor is running to avoid damage to the floor.

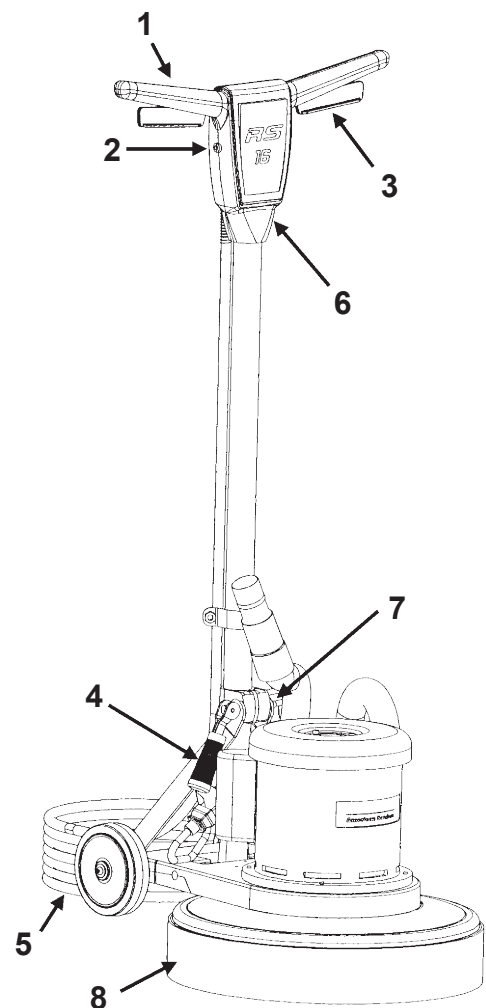


Figure 4

Operating Instructions - continued

- 4 Hold one of the Operator Hand Grips (1) firmly, push the Safety Lock Button (2) and then compress the Switch Levers (3) to start the motor. NOTE: When the Switch Levers (3) are released, the machine shuts off immediately.

Inexperienced users should practice operating the machine prior to beginning their project. Practice in a large open area where the floor is smooth, with only a cleaning pad on the machine. The user should practice operating in this manner until they can control the machine consistently.

AFTER USE (Figure 4)

- 1 Place the Operator Handle (6) in the upright position and unplug the Power Cord (5). Wrap the Power Cord (5) around the Operator Handle Grips (1) and the Cord Hook (7).
- 2 Remove the pad driver from the machine. Never store the machine with the pad driver on the machine.
- 3 Wipe the entire machine with a clean, damp cloth.
- 4 Inspect the entire machine and all accessories for damage. Perform any required maintenance or repairs before storage.
- 5 Store the machine in a clean, dry place with the Operator Handle (6) locked in the upright position.

Troubleshooting

MACHINE WOBBLER DURING OPERATION	<p>Defective pad... one side is more dense than the other.</p> <p>Machine left sitting on pad for extended period of time causing pad to "take a set".</p> <p>Pad not "seated" properly into pad holder bristles.</p> <p>Warped block on brush or padholder - replace.</p>
MACHINE DOES NOT RUN	<p>Check plug for proper connection - on machine and at wall outlet.</p> <p>Check building circuit breaker.</p> <p>Call for service.</p>