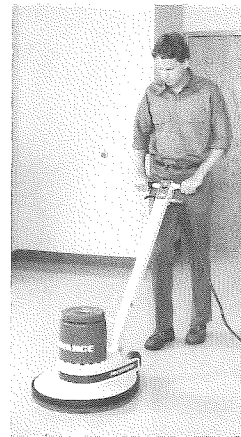
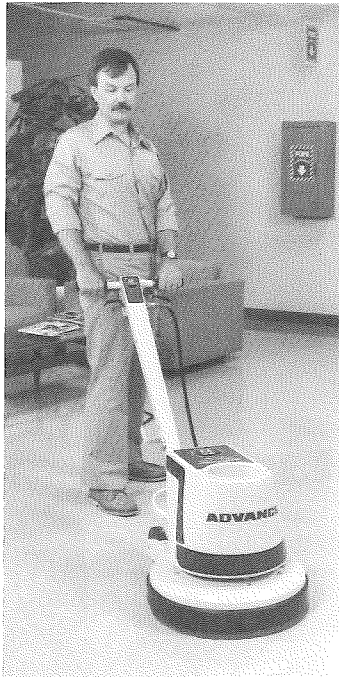
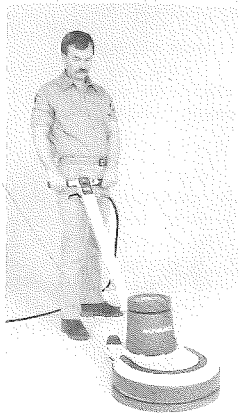


Pacemaker & Matador

This Manual is for Models P17, P20, P20-5, M17S, M17S-8, M17S-HR, M20S, 172390, M17HS-2, M17HS-2-8, M20HS, M20HS-8, AP17, AP17-8, AP17-J, AP20, AP20-8

OPERATION MANUAL



ADVANCE
MACHINE COMPANY

INTERNATIONAL HEADQUARTERS, Plymouth, MN 55447-3408
EUROPE, Llantrisant, Pontyclun, Mid-Glamorgan CR7 8YZ Wales
CANADA, 1295 Crestlawn Drive, Mississauga, Ontario L4W 1A9



IMPORTANT SAFETY INSTRUCTIONS

For additional information, cautions and warnings, read the entire Operation Manual before running the machine.

WARNING!

Do not use this machine in areas where flammable liquids or vapors are present.

WARNING!

Disconnect power to the machine before attempting any service or maintenance work.

WARNING!

Do not expose to rain. Store indoors.

WARNING!

This machine must be properly grounded to protect the operator from electrical shock.

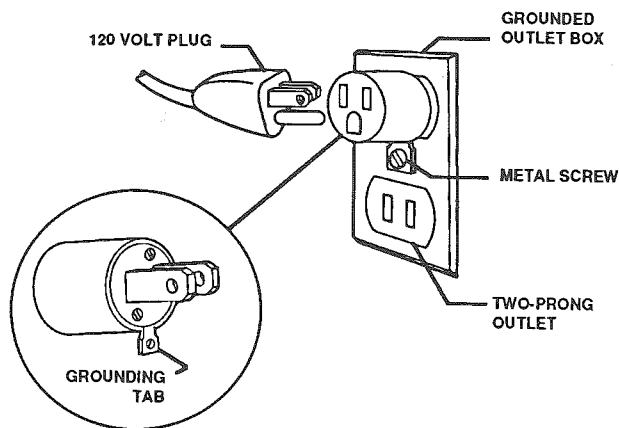
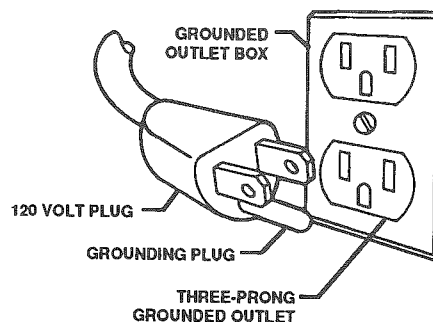
SAVE THESE INSTRUCTIONS

GROUNDING INSTRUCTIONS

WARNING!

This machine must be properly grounded to protect the operator from electrical shock. Read the safety instructions below before operating this machine.

120 volt machines have this kind of three-prong plug at the end of a three-wire electrical cord. The grounding pin on this plug grounds the machine when it is plugged into a three-prong outlet.



A grounding adapter must be installed as shown here if only two-prong outlets are available. The outlet box must be grounded and the grounding tab (or wire) on the adapter must be installed under the head of the screw in the center of the outlet cover. Grounding adapters for 120 volt plugs are available at most hardware stores.

Grounding adapters are not approved for use in Canada.

- Replace the plug if the grounding pin is damaged or broken.
- The green (or green/yellow) wire in the cord is the grounding wire. When replacing a plug, this wire must be attached to the grounding pin only.
- Extension cords connected to this machine should be 12 gauge, three-wire cords with three-prong plugs and outlets. Do not use extension cords more than 50 feet (15 m) long.

PREPARING THE MACHINE FOR USE

WARNING!

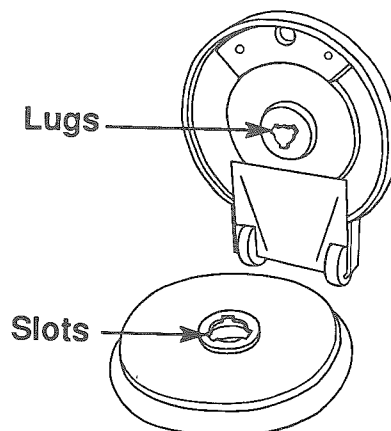
This machine contains moving parts. To reduce the risk of injury, always unplug the power cord before servicing.

INSTALLING THE BRUSH OR PAD HOLDER

Align the lugs with the corresponding slots in the brush or pad holder and turn the brush or pad holder to lock it in place. Use only the Advance Soft-Touch Brush for carpet shampooing. Your local Advance Dealer can provide the proper pads and floor finishes for use with this machine.

CAUTION!

Using the wrong brush or pad on this machine can damage the floor or overload the motor.



Installing the Brush or Pad Holder



FILLING THE SOLUTION TANK

(ALL-PURPOSE MATADOR ONLY)

Fill the tank with three gallons (11 liters) of cleaning solution. The solution should be a mixture of water and the proper cleaning chemical for the job. Always follow the dilution instructions on the chemical container label. If a powdered soap is used, mix it with water in a bucket before putting it into the tank. Do not fill above 4-1/2 inches (11.5 cm) from the top of the tank.

SPRAY BUFF MISTER (OPTIONAL)

Fill the chemical bottle with 2 quarts (1.9 liters) of the appropriate chemical. Check the spray nozzle on the machine base to make sure it is clean and pointed in the right direction. Pressurize the bottle by pumping the hand lever. Squeeze the trigger to dispense the solution.

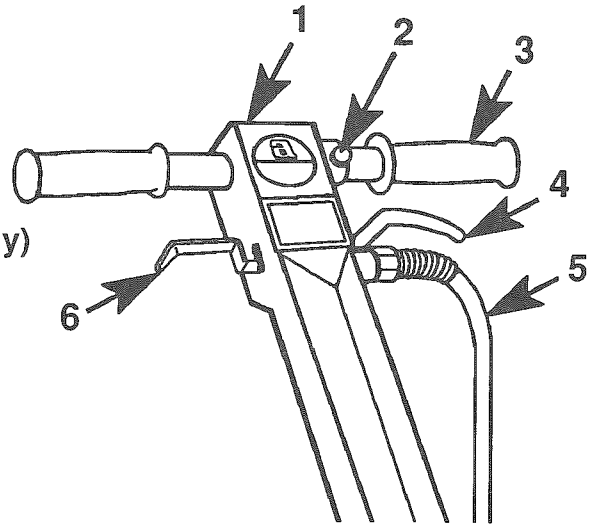
When spray buffing, check the pad every 15 minutes for buildup. If the pad is dirty, turn it over to expose the clean side or install a new pad.

SPLASH GUARD (OPTION FOR MATADOR AND ALL-PURPOSE MATADOR)

The optional splash guard prevents chemicals from splashing onto furniture or baseboards during wet operation. To install the splash guard, simply drop it over the machine base.

OPERATING CONTROLS

1. Operating Handle
2. Twist Grip Lock Button
3. Twist Grips
4. Solution Lever (All-Purpose Matador Only)
5. Power Cord
6. Handle Position Lever



OPERATION

1. Unwrap the Power Cord and plug it into a properly grounded outlet.
2. Pull the Handle Position Lever UP and move the Handle downward until your arms are straight. Then release the lever.
3. Lift the Handle until the brush (or pad) is flat against the floor.
4. When wet scrubbing with the All-Purpose Matador, hold the Solution Lever UP for five seconds to fill the solution hoses.

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**.

5. Hold the Twist Grips with both hands, push the Twist Grip Lock Button and turn the Twist Grips FORWARD to start the motor. **Immediately** start moving the machine back and forth.

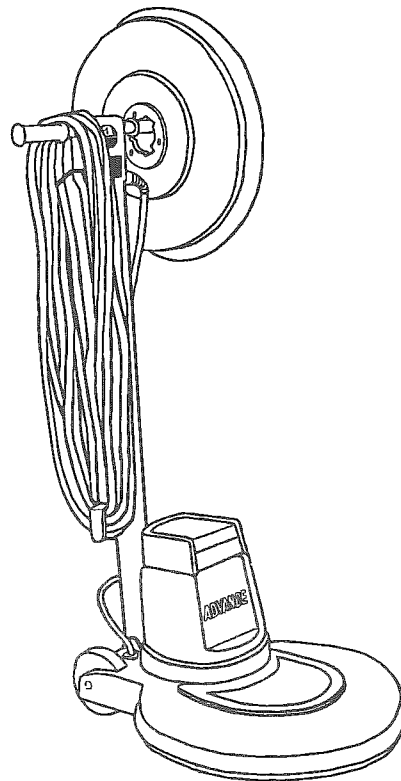
CAUTION!

Keep the machine moving while the motor is running to avoid damage to the floor or carpet.

6. Pull the Solution Lever on the All-Purpose Matador to dispense the proper amount of solution for the job.
7. When spray buffing, check the pad every 15 minutes for dirt and wax build-up. If the pad is dirty, turn it over to expose the clean side or install a clean pad.

AFTER USE

1. Flush the (optional) spray buff system with warm water.
2. Pour any unused solution from the All-Purpose Matador into a storage container for future use.
3. Hold the All-Purpose Matador's Solution Lever UP and flush the tank and valve with clean water.
4. Unplug the Power Cord and wrap it around the cord hook and the right Twist Grip.
5. Remove the pad holder or brush from the machine. Clean the pad or brush and hang it up to dry. Allow buffing pads to dry completely before using again. Store brushes and pad holders separate from the machine. Never store the machine with the pad holder or brush on the machine.
6. Wipe the entire machine with a clean, damp cloth. Wipe the underside of the brush housing after wet use.
7. Inspect the entire machine and all accessories for damage. Perform any required maintenance or repairs before storage.
8. Store the machine in a clean, dry place with the Handle locked in the upright position.



Storing the Machine

MAINTENANCE

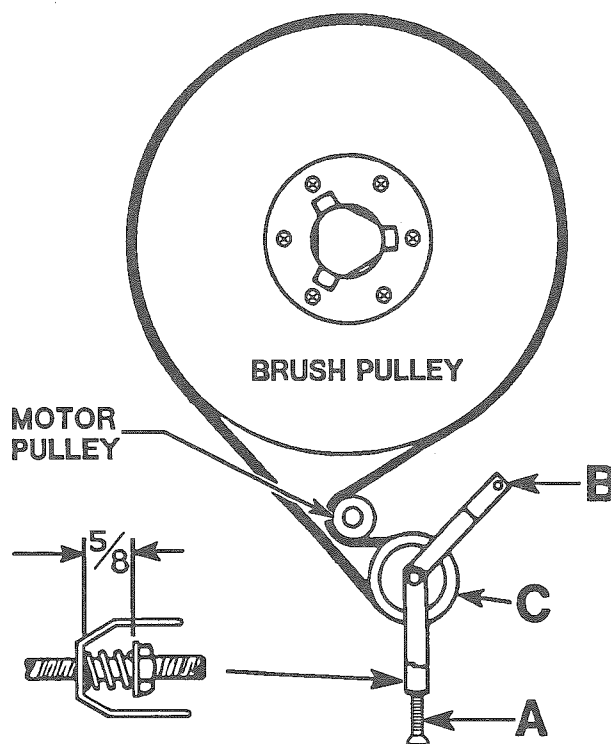
WARNING!

Unplug the power cord before attempting any service or maintenance work to the machine.

REPLACING THE DRIVE BELT

(MATADOR & ALL-PURPOSE MATADOR ONLY)

1. Tip the machine back and remove the bottom cover plate.
2. Remove belt tension screw "A" and hex bolt "B", lift the belt and idler assembly "C" out of the base housing.
3. Remove the two screws and brackets from the idler assembly and remove the belt.
4. Put a new belt around the idler assembly, install the brackets and screw and put the idler assembly back in the base of the machine. Put the belt around the motor and the brush pulleys.
5. Turn screw "A" to compress the belt tension spring to a length of $\frac{5}{8}$ inch (16 mm).



CARBON MOTOR BRUSHES

(HIGH SPEED MATADOR & ALL-PURPOSE MATADOR ONLY)

Contact your authorized Advance Service Center to have the carbon motor brushes checked once a year.

IMPORTANT!

The motor will be ruined if it is run with worn-out brushes. This kind of motor failure is not covered by warranty.

MAINTENANCE

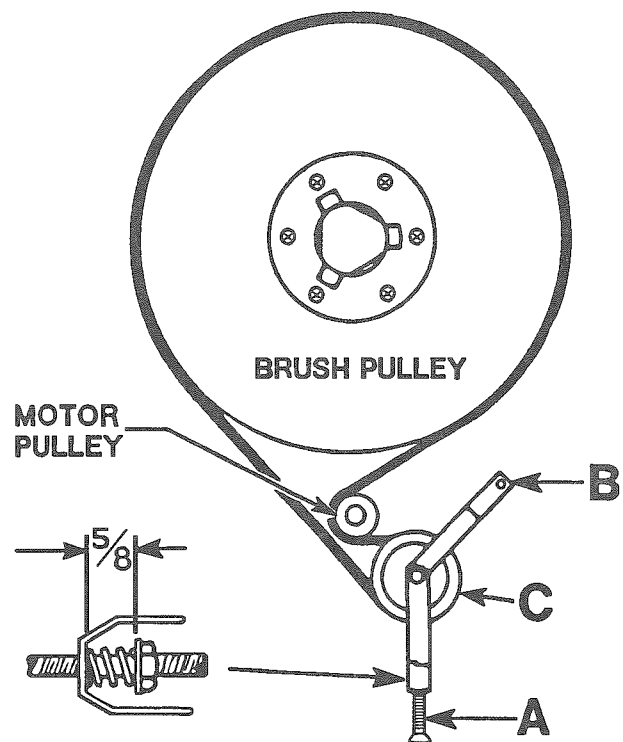
WARNING!

Unplug the power cord before attempting any service or maintenance work to the machine.

REPLACING THE DRIVE BELT

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1. Tip the machine back and remove the bottom cover plate.
2. Remove belt tension screw "A" and hex bolt "B", lift the belt and idler assembly "C" out of the base housing.
3. Remove the two screws and brackets from the idler assembly and remove the belt.
4. Put a new belt around the idler assembly, install the brackets and screw and put the idler assembly back in the base of the machine. Put the belt around the motor and the brush pulleys.
5. Turn screw "A" to compress the belt tension spring to a length of 5/8 inch (16 mm).



CARBON MOTOR BRUSHES

(HIGH SPEED MATADOR & ALL-PURPOSE MATADOR ONLY)

Contact your authorized Advance Service Center to have the carbon motor brushes checked once a year.

IMPORTANT!

The motor will be ruined if it is run with worn-out brushes. This kind of motor failure is not covered by warranty.

TROUBLESHOOTING

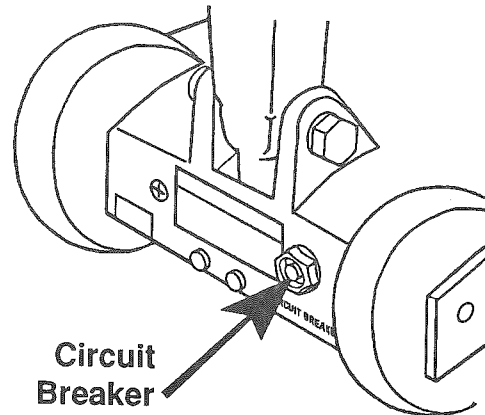
CIRCUIT BREAKER TRIPPING

(HIGH SPEED MATADOR & ALL-PURPOSE MATADOR ONLY)

Normally, circuit breaker tripping is caused by one or more of the following conditions:

- Loaded pad when spray cleaning, scrubbing or polishing.
- Excessive use of material when spray cleaning.
- Too-aggressive pad for the operation.
- Use of other than Soft-Touch brush for carpet shampooing.
- Not enough solution when shampooing or bonnet cleaning carpet.

When the cause of circuit breaker tripping is determined and corrected, reset the circuit breaker by pushing the button in. If the button does not stay in, wait 5 minutes and try again. If the circuit breaker trips repeatedly, call your local Advance Distributor for service.



Rear View of High Speed Matador and All-Purpose Matador

SWIRLS ON THE FLOOR AFTER SCRUBBING

- Floor not clean.
- Incorrect solution.
- Area not properly swept.
- Improper pad or brush for the job.
- Moving the machine too fast.

SWIRLS ON THE FLOOR AFTER DRY BUFFING

- Moving the machine too fast.
- Floor finish too soft.
- Area not properly swept.
- Improper pad or brush for the job.

CIRCLES ON THE FLOOR

- Machine standing still while the brush or pad is running.

FLOOR FINISH REMOVED

- Improper pad... too aggressive.
- Solution too strong.

PROCEDIMIENTO "A"

DIVIDA LAS GRANDES AREAS A LIMPIAR EN SECCIONES DE MENOR TAMAÑO, MAS FACILES DE LIMPIAR. CUANDO SE HAYA PRE-BARRIDO LOS PISOS Y ESTEN LISTOS PARA QUE LA MAQUINA SE USE, COMIENCE EN LA ESQUINA SUPERIOR IZQUIERDA DE LA PRIMERA SECCION A LIMPIAR Y TRABAJE HACIA ATRAS, EN DIRECCION DEL PUNTO DE ENTRADA (LA PUERTA) HACIENDO "PASADAS" DE IZQUIERDA A DERECHA Y DE NUEVO AL PUNTO INICIAL. ENSEGUIDA DESLICE LA MAQUINA DOS-TERCIOS DEL ANCHO DE LA FRANJA DE LIMPIEZA Y DE UNA TERCERA "PASADA". CUANDO SE HAYA LLEGADO AL PUNTO INICIAL DE PARTIDA SOBREMONTANTE LAS SUBSECUENTES "PASADAS" PARA ASEGURARSE DE QUE LA TOTALIDAD DEL PISO SE HA CUBIERTO. CONSEJOS PARA LA OPERACION.

CEPILLAR: Cuando se coloquen los cepillos o las almohadillas éstas deben ser de color oscuro rojo o azul. Mezcle la solución limpiadora de acuerdo a las instrucciones del fabricante. Use un trapeador húmedo para cubrir áreas de 6m x 6m. No permita que la solución se seque. Use el Procedimiento "A" para trabajar los pisos. Cuando se termine de limpiar, aspire la solución con una aspiradora wet/dry o use un trapeador nuevo.

REMOCION: Conecte el sostén de las almohadillas y la almohadilla recomendada de color oscuro, café o negro. Mezcle la solución removedora de acuerdo con las instrucciones del fabricante. Use un trapeador húmedo para limpiar un área de 6m x 6m. No permita que la solución se seque. Use el Procedimiento "A" para trabajar los pisos. Use un trapeador húmedo limpio para remover la solución.

PULIMIENTO: Conecte el sostén de la almohadilla que se recomienda sea de color claro, rojo o dorado. Use poca cantidad de la solución de rocío de pulimiento. Trabaje lentamente entre 2 y 5 pasadas sobremontando cada una de ellas mientras que se mueve hacia atrás. Las almohadillas deben voltearse o cambiarse cada 15 minutos para evitar que el motor se sobrecargue y para obtener como resultado un buen pulimiento.

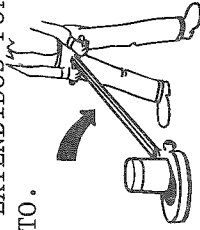
ROCIO PULIDOR: Coloque el sosten de la almohadilla, se recomienda una almohadilla roja o dorada. Use solución pulidora de rocío en poca cantidad. Trabaje lentamente entre 2 y 5 pasadas, sobremontando cada pasada mientras se mueva hacia atrás. Las almohadillas deben voltearse o cambiarse cada 15 minutos para evitar sobrecargar el motor y para obtener un buen pulimiento.

1. MANGO
2. PALANCA DEL NIVEL DEL MANGO
3. CORDON ELECTRICO
4. RUEDAS
5. CUBIERTA DEL MOTOR
6. BASE
7. SEGURO
8. GIRELOS MANGOS PARA ARRANCAR EL MOTOR, SUELTELLOS PARA DETENERLO.

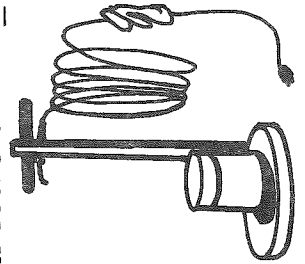
CONECTE EL CORDON ELECTRICO. LIBERE LA PALANCA DE AJUSTE DEL MANGO.



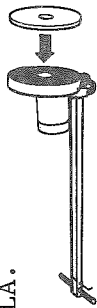
HAGA DESCENDER EL MANGO A LA POSICION DE OPERACION. BRAZOS EXTENDIDOS POR COMPLETO.



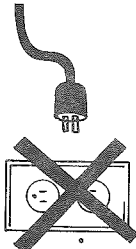
CUANDO SE HAYA TERMINADO DE TRABAJAR, DESCONECTE EL CORDON ELECTRICO, QUITE EL CEPILLO O LA ALMOHADILLA. LIMPIE EL CORDON ELECTRICO Y LA MAQUINA CON UN TRAPO HUMEDO. GUARDESE CON EL MANGO EN LA POSICION VERTICAL.



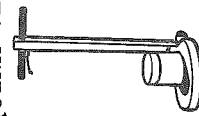
INCLINE LA MAQUINA HACIA ATRAS. COLOQUE EL CEPILLO O EL SOSTEN DE LA ALMOHADILLA Y LA ALMOHADILLA.



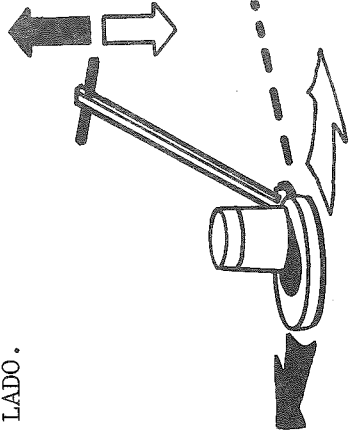
NUNCA COLOQUE EL CEPILLO O LA ALMOHADILLA CUANDO LA MAQUINA ESTE CONECTADA A LA TOMA DE CORRIENTE.



MAQUINA VERTICAL.



VEA PROCEDIMIENTOS DE OPERACION "A". OPERE LA MAQUINA EN REVERSA MOVIENDOLA DE LADO A LADO.



INSTRUCCIONES DE SEGURIDAD

ADVERTENCIA Esta máquina debe estar conectada a tierra mientras se encuentra en uso para proteger al operador en contra de posibles choques eléctricos.

La máquina está equipada con un cordón eléctrico de triple polaridad y un enchufe tripolar con conector a tierra.

El conductor verde (o verde y amarillo) en el cordón eléctrico es la conexión a tierra. **NUNCA** conecte este alambre a ninguna otra conexión que no sea a tierra.

Máquina con motor para menos de 150 V.

Si la máquina se provee con un enchufe tal y como se muestra en la figura A, es que está destinada a operar con una corriente de 120 voltios (circuito nominal).

Si el enchufe hembra con conexión a tierra, según como se muestra en la figura A, no se encuentra disponible, un adaptador como el que se muestra en la figura B está disponible y deberá usarse en la forma señalada. Si la placa del enchufe hembra se encuentra conectada a tierra, asegúrese de conectar la lengüeta de la conexión a tierra a la placa por medio del tornillo que fija la placa.

Máquina con motor entre 150 y 250 V.

Si la máquina está provista con un enchufe como el que se muestra en la figura C, es que esta máquina está destinada a usarse con una corriente de 240 voltios (nominal). No hay adaptador disponible para este tipo de enchufe.

Cordones de extensión

Use solamente cordones de extensión tripolares que tengan enchufes con tres conectores y con receptáculos también de tres conectores que aceptan el enchufe del cordón de la máquina. Reemplace o repare los cordones dañados inmediatamente. Los cordones eléctricos de extensión no deben ser más largos de 15-24 metros (50 pies).

ADVERTENCIAS

LEA POR COMPLETO ESTAS ADVERTENCIAS Y PRECAUCIONES ANTES DE OPERAR SU MÁQUINA PARA PISOS ADVANCE.

ESTA MÁQUINA DEBE TENER CONEXIÓN A TIERRA PARA PROTEGER AL OPERARIO EN CONTRA DE POSIBLE CHOQUE ELÉCTRICO.*

PARA PREVENIR INCENDIOS -- NO HAGA FUNCIONAR LA MÁQUINA CON SUBSTANCIAS INFLAMABLES O COMBUSTIBLES. NO USE LA MÁQUINA EN ÁREAS EN DONDE ESTE TIPO DE SUBSTANCIAS SE ENCUENTREN PRESENTES.

NO ENCIENDA EL MOTOR DE LA MÁQUINA CON EL MANGO EN LA POSICIÓN VERTICAL.

DESCONECTE EL CORDÓN ELÉCTRICO DE LA TOMA DE CORRIENTE CUANDO SE COLOQUEN LOS SOSTENES DE LAS ALMOHADILLAS O CEPILLOS Y CUANDO SE LE DE SERVICIO A LA MÁQUINA.

NO SE CONECTE EL CORDÓN ELÉCTRICO EN NINGUNA OTRA TOMA DE CORRIENTE QUE LA INDICADA EN LA PLACA DE INSTRUCCIONES EN LA MÁQUINA.

* LEA CUIDADOSAMENTE LAS INSTRUCCIONES DE SEGURIDAD ANTES DE CONECTAR LA MÁQUINA A LA TOMA DE CORRIENTE.

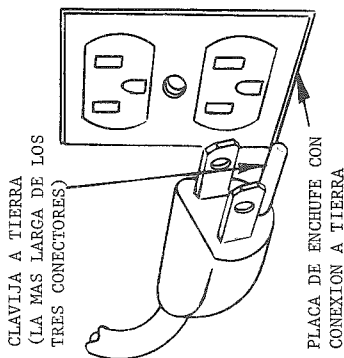


FIGURA A

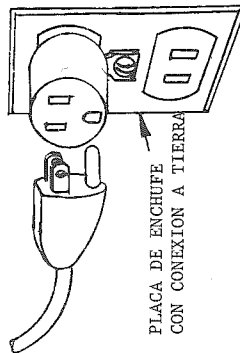
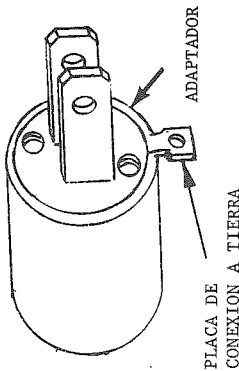


FIGURA B

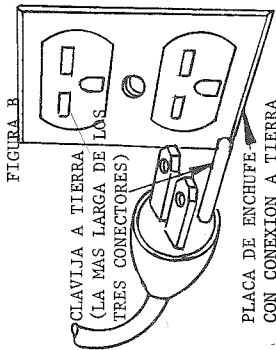


FIGURA C