

Speed Scrub[®] 2701/3301

Automatic Floor Scrubber Fregadora Automática



The safe scrubbing alternative ™

Model No.:

608695 - 2701

608696 - 2701 Quick Ship Pack

609239 - 2701 Can. Pac

614163 - 2701 FaST

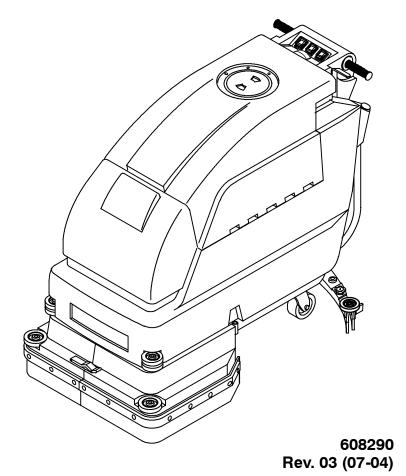
608275 - 3301

608276 - 3301 Quick Ship Pack

609238 - 3301 Can. Pac

614164 - 3301 FaST

Operator and Parts Manual Manual del Operador y Piezas



This manual is furnished with each new model. It provides necessary operation and maintenance instructions and an illustrated parts list.

Read this manual completely and understand the machine before operating or servicing it.

Use the illustrated Parts Lists to order parts. Before ordering parts or supplies, be sure to have your machine model number and serial number handy. Parts and supplies may be ordered by phone or mail from any authorized parts and service center, distributor or from any of the manufacturer's subsidiaries.

This machine will provide excellent service. However, the best results will be obtained at minimum costs if:

- The machine is operated with reasonable care.
- The machine is maintained regularly per the machine care instructions provided.
- The machine is maintained with manufacturer supplied or equivalent parts.

MACHINE DATA

Please fill out at time of installation for future reference.	
Model No	
Install. Date -	
Serial No	

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Specifications and parts are subject to change without notice.

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TABLE OF CONTENTS (ESPAÑOL ÍNDICE....23)

SAFETY PRECAUTIONS		TRANSPORTING MACHINE	
SAFETY LABELS	4	STORING MACHINE	18
MACHINE COMPONENTS	5	RECOMMENDED STOCK ITEMS	18
MACHINE INSTALLATION UNCRATING MACHINE INSTALLING BATTERIES MACHINE SETUP ATTACHING SQUEEGEE ASSEMBLY INSTALLING BRUSH OR PAD DRIVERS	6 6 7 7	TROUBLE SHOOTING SPECIFICATIONS ELECTRICAL DIAGRAM PARTS LIST REPLACEMENT BRUSHES AND PAD DRIVER GROUP	21 45
INSTALLING FaST-PAK AGENT (FaST MODEL) . FILLING SOLUTION TANK	8 9	RECOVERY TANK GROUP	48
MACHINE OPERATION PRE-OPERATION CHECKS OPERATING THE MACHINE OPERATING FaST SCRUB SYSTEM (FaST MODEL) WHILE OPERATING MACHINE CIRCUIT BREAKERS	10 10 10 11 12 12	CONTROL CONSOLE GROUP	52 54
DRAINING TANKS DRAINING RECOVERY TANK DRAINING SOLUTION TANK	13 13 13	SOLUTION GROUP - FaST MODEL SKIRT GROUP SQUEEGEE CONTROL GROUP CURVED SQUEEGEE GROUP	66 70 72
CHARGING BATTERIES	13		
MACHINE MAINTENANCE DAILY MAINTENANCE MONTHLY MAINTENANCE QUARTERLY MAINTENANCE BATTERY MAINTENANCE DRIVE CHAIN MAINTENANCE	16	OPTIONS ES (EXTENDED SCRUB) KIT SQUEEGEE WAND ASSEMBLY	74

2

SAFETY PRECAUTIONS

This machine is intended for commercial use. It is designed exclusively to scrub hard floors in an indoor environment and is not constructed for any other use. Use only recommended pads, brushes and commercially available floor cleaners intended for machine application.

All operators must read, understand and practice the following safety precautions.

The following warning alert symbol and the "FOR SAFETY" heading are used throughout this manual as indicated in their description:

WARNING: To warn of hazards or unsafe practices which could result in severe personal injury or death.

FOR SAFETY: To identify actions which must be followed for safe operation of equipment.

Failure to follow these warnings may result in personal injury, electrical shock, fire or explosion.



WARNING: Fire Or Explosion Hazard:

 Never Use Flammable Liquids Or Operate Machine in Or Near Flammable Liquids, Vapors Or Combustible Dusts.

This machine is not equipped with explosion proof motors. The electric motors will spark upon start up and during operation which could cause a flash fire or explosion if machine is used in an area where flammable vapors/liquids or combustible dusts are present.

- Do Not Pick Up Flammable Materials Or Reactive Metals.
- Batteries Emit Hydrogen Gas. Keep Sparks And Open Flame Away. Keep Battery Compartment Open When Charging.

WARNING: Electrical Hazard. Disconnect Battery Cables Before Servicing Machine.

The following information signals potentially dangerous conditions to the operator or equipment:

FOR SAFETY:

- 1. Do not operate machine:
 - With flammable liquids or near flammable vapors as an explosion or flash fire may occur.
 - Unless trained and authorized.
 - Unless operation manual is read and understood.
 - If not in proper operating condition.
- 2. Before starting machine:
 - Make sure all safety devices are in place and operate properly.
- 3. When using machine:
 - Go slow on inclines and slippery surfaces.
 - Wear no-slip shoes.
 - Reduce speed when turning.
 - Report machine damage or faulty operation immediately.
 - Never allow children to play on or around.
 - Follow mixing and handling instructions on chemical containers.
- 4. Before leaving or servicing machine:
 - Stop on level surface.
 - Turn off machine.
- 5. When servicing machine:
 - Avoid moving parts. Do not wear loose jackets, shirts, or sleeves.
 - Block machine tires before jacking up.
 - Use hoist or jack that will support the weight of the machine.
 - Disconnect battery connections before working on machine.
 - Wear protective gloves and eye protection when handling batteries or battery cables.
 - Avoid contact with battery acid.
 - Do not power spray or hose off machine. Electrical malfunction may occur.
 - Use manufacturer supplied or approved replacement parts.
 - All repairs must be performed by a qualified service person.
 - Do not modify the machine from its original design.

- 6. When transporting machine:
 - Turn machine off.
 - Get assistance when lifting machine.
 - Do not lift machine when batteries are installed.

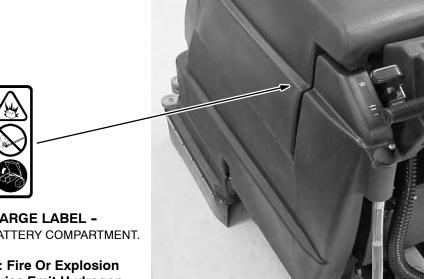
- Use a recommended ramp when loading/unloading into/off truck or trailer.
- Use tie-down straps to secure machine to truck or trailer.

SAFETY LABELS

The safety labels appear on the machine in the locations indicated. Replace labeld if they become damaged or illegible.

WARNING LABEL - LOCATED ON THE RECOVERY TANK.



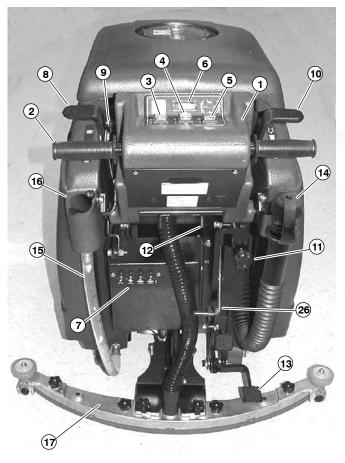




BATTERY CHARGE LABEL -LOCATED IN BATTERY COMPARTMENT.

WARNING: Fire Or Explosion Hazard. Batteries Emit Hydrogen Gas. Keep Sparks And Open Flame Away. Keep Battery Compartment Open When Charging.

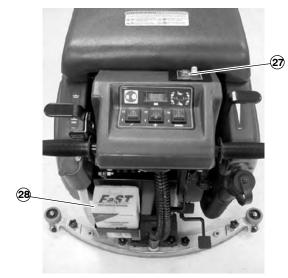
MACHINE COMPONENTS





- 1. Control Console
- 2. Control Grips
- 3. Main ON/OFF switch
- 4. Vacuum ON/OFF Switch
- 5. Brush ON/OFF Switch
- 6. Battery Meter
- 7. Circuit Breakers
- 8. Squeegee Lift Lever
- 9. Squeegee Release Lever
- 10. Solution Flow Lever
- 11. Solution Flow Adjustment Knob
- 12. Adjustable Control Console Levers
- 13. Scrub Head Lift Foot Pedal
- 14. Recovery Tank Drain Hose
- 15. Solution Tank Drain Hose with Gallon Markers
- 16. Rear Fill Port
- 17. Squeegee Assembly
- 18. Recovery Tank
- 19. Recovery Tank Lid
- 20. Solution Fill Door
- 21. Safety Lights
- 22. Rear Casters
- 23. Skirt Housing
- 24. Scrub Head Skirt

FaST Model



- 25. Wall Rollers
- 26. Brush Pressure Lever
- 27. FaST Scrub/Conventional Scrub Switch (FaST Model)
- 28. FaST-PAK Dispensing System (FaST Model)

MACHINE INSTALLATION

UNCRATING MACHINE

- Carefully check the shipping crate for signs of damage. Report damages at once to carrier.
- Check the contents list. Contact distributor for missing items.

Contents:

- 4-6V Batteries Optional
- 1-Battery Charger Optional
- 1-Battery Plate (#100707)
- 3-Battery Cables (#130367)
- 1-FaST-PAK Concentrate (FaST Model)
- 1-Squeegee Assembly

Pad drivers, brushes and pads must be purchased separately.

 To uncrate your machine, remove the shipping hardware and straps that secure the machine to the pallet. With assistance, carefully lift the machine off the pallet.

ATTENTION: Do not roll machine off pallet unless a ramp is used, machine damage may occur.

ATTENTION: To prevent possible machine damage, install batteries after removing machine from shipping pallet.

INSTALLING BATTERIES

WARNING: Fire Or Explosion Hazard.
Batteries Emit Hydrogen Gas. Keep Sparks And
Open Flame Away. Keep Battery Hood Open When
Charging.

FOR SAFETY: When servicing machine, wear protective gloves and eye protection when handling batteries and battery cables. Avoid contact with battery acid.

Battery Specifications:

Four 6 volt, deep cycle, 305 amp hour batteries. Part Number #606991. Maximum battery dimensions are 178mm (7 in.) W x 308mm (12.13 in.) L x 356mm (14 in.) H.

 Turn all switches to the off position and pull out the main (10 amp) circuit breaker button as shown (Figure 1).





FIG. 1

ATTENTION: To prevent motors from accidental starting, be certain to pull out the main circuit breaker button before installing batteries.

 Carefully hinge open recovery tank to access battery compartment. Remove loose battery cables from compartment (Figure 2).

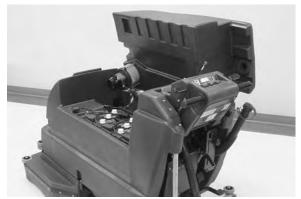


FIG. 2

3. Carefully install batteries into compartment and arrange battery posts as shown (Figure 3).

ATTENTION: Do not drop the batteries into the compartment, battery and machine housing damage may result.

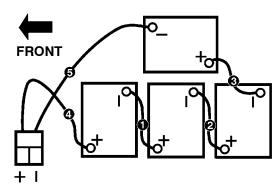


FIG. 3

 Before connecting the battery cables, make sure the terminals and posts are clean. Use a post cleaner and wire brush if necessary. **NOTE:** Apply a light coating of non-metallic grease or protective spray on the cable connections to prevent battery corrosion.

- Connect cables to battery posts in numerical order as labeled, RED TO POSITIVE & BLACK TO NEGATIVE (Figure 3).
- 6. Double check cable connections before closing up battery compartment.
- 7. Reset the main circuit breaker button.
- 8. Turn main switch on, and check battery meter charge level to ensure batteries are fully charged. If batteries need charging, see CHARGING BATTERIES.

MACHINE SETUP

ATTACHING SQUEEGEE ASSEMBLY

1. Turn main switch to the off position.

FOR SAFETY: Before leaving or servicing machine, stop on level surface and turn off machine.

2. Pull back on squeegee lift lever to raise squeegee mount bracket (Figure 4).



FIG. 4

3. Loosen two thumb knobs on squeegee and slide squeegee into slots at rear of squeegee mount bracket (Figure 5).

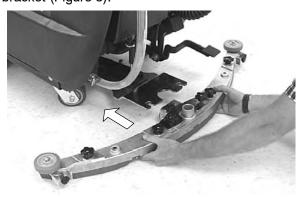


FIG. 5

- 4. Tighten thumb knobs securely.
- 5. Connect the vacuum hose from the machine to the squeegee assembly (Figure 6).

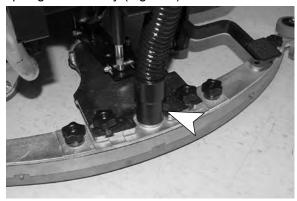


FIG. 6

INSTALLING BRUSHES OR PAD DRIVERS

1. Turn main switch to the off position and pull out the main circuit breaker button.

FOR SAFETY: Before leaving or servicing machine, stop on level surface and turn off machine.

ATTENTION: To prevent accidental starting, pull out the main circuit breaker button before installing brush or pad drivers. Circuit breaker button is located at rear of control housing.

2. Raise scrub head. Step down firmly on bottom brush lift foot pedal to raise (Figure 7).



FIG. 7

Unfasten black latch at front of machine and hinge open skirt housing to access motor hub (Figure 8).



FIG. 8

4. Select recommended pad or brush that best meets your cleaning needs.

NOTE: Consult your authorized distributor for pad and brush recommendations.

 (For Pad Installation) Attach pads to pad drivers before connecting drivers to motor hub. To attach pad to driver, remove plastic centerlock ring from pad driver. Position pad on pad driver and replace centerlock ring (Figure 9).



FIG. 9

Attach brush/pad drivers to motor hubs. Align (3)
mounting studs with slots in motor hub. Give driver
a quick turn toward spring clip located on motor
hub. Be certain pad driver is securely fastened
and spring clip locks into one of the studs before
operating machine (Figure 10).



FIG. 10

NOTE: Always make sure pad driver and motor hub surfaces are clean before installing drivers. Keeping surfaces clean will make it easier when removing pad drivers.

7. Close skirt housing and refasten latch.

INSTALLING FaST-PAK AGENT (FaST MODEL)

 Remove the perforated knock-out from the FaST-PAK carton. Do not remove the bag from the carton. Pull the hose connector through the knock-out and remove the orange cap (Figure 11).

ATTENTION: The FaST-PAK Concentrate Formula is specifically designed for the FaST system. NEVER use a substitute, machine damage will result.

FOR SAFETY: When using machine, always follow the handling instructions on chemical container.



FIG. 11

2. Place the FaST-PAK carton in the carton holder at the rear of the machine and connect the supply hose to the FaST-PAK bag (Figure 12).

NOTE: If any dried concentrate is visible on the supply hose connector or on the FaST-PAK connector, soak and clean with warm water.





FIG. 12

3. Make sure to connect the supply hose onto the hose storing plug when not in use (Figure 13). This will prevent the FaST solution system from drying out and clogging up the supply hose.



FIG. 13

4. The FaST solution system MUST be primed for first time use. To prime system, make sure the solution tank is empty and operate the machine in the FaST Scrub Mode for 3 minutes (See MACHINE OPERATION). This step is only required for first time FaST system use.

FILLING SOLUTION TANK

ATTENTION: For Models equipped with the FaST Option. USE CLEAR COOL WATER ONLY. DO NOT add cleaning agents in solution tank. Conventional cleaning agents/restorers may cause failure to the FaST solution system.

- 1. Transport machine to filling station. Raise squeegee and brush when transporting.
- 2. Turn off machine.

FOR SAFETY: Before leaving or servicing machine, stop on level surface and turn off machine.

Shut off solution flow. Pull solution flow lever completely back to shut off (Figure 14).



FIG. 14

4. Open solution fill door at front of machine and fill solution tank with clean water, 60°C (140°F) maximum temperature. Or you can fill solution tank using hose fill port at rear of machine. Pull off plug and insert hose to fill. The clear tube below the fill port has 19L (5 gallon) increment markers to indicate amount of water in tank (Figure 15).

NOTE: The water must **not** be hotter than 60°C (140°F) or tank damage may occur.





FIG. 15

NOTE: If filling with a bucket be certain that bucket is clean. This will prevent possible solution line clogs.

5. **FOR CONVENTIONAL SCRUBBING:** Pour a recommended cleaning detergent into the solution tank according to mixing instructions on the bottle.

ATTENTION: For Conventional Scrubbing, only use recommended cleaning detergents. Machine damage due to improper detergent usage will void the manufacturer's warranty.

WARNING: Fire or Exposion Hazard. Never Use Flammable Liquids.

FOR SAFETY: When using machine, follow mixing and handling instructions on chemical containers.

MACHINE OPERATION

FOR SAFETY: Do not operate machine unless operator manual is read and understood.

WARNING: Fire or Exposion Hazard. Never Operate Machine In Or Near Flammable Liquids, Vapors Or Combustible Dusts.

PRE-OPERATION CHECKS

- 1. Sweep and dust mop the floor.
- Check battery meter charge level to ensure batteries are fully charged (See CHARGING BATTERIES).
- 3. Check that pads or brushes are installed.
- 4. Check that squeegee is installed.
- FaST scrub mode: Make sure that the solution tank is filled with <u>clear cool water only</u>. All conventional cleaning agents/restorers must be drained and rinsed from solution tank. Check FaST-PAK agent level, replace carton as needed.

OPERATING THE MACHINE

NOTE: If your machine is equipped with the FaST Option, refer to page 11 for additional operation procedures.

 Adjust control grips to a comfortable operating height (three settings). Squeeze two levers together, located under console, to raise and lower control grips (Figure 16).

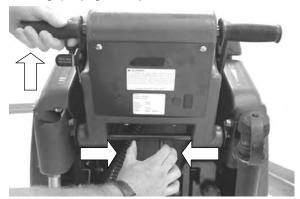


FIG. 16

Lower squeegee. Depress thumb lever on squeegee lift lever to lower (Figure 17).

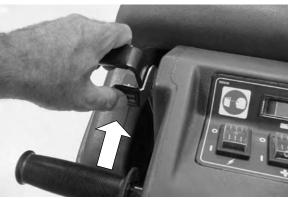


FIG. 17

Lower scrub head. Depress top brush lift foot pedal forward to lower (Figure 18).

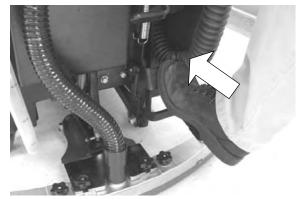


FIG. 18

4. Turn on the main, vacuum and brush switches.

NOTE: The brush motors will not start until control grips are rotated.

 Activate solution flow (for conventional scrubbing only). Push solution flow lever slightly forward to activate. The further the lever is pushed forward the more solution will flow. Push completely forward for maximum flow. Solution will immediately begin to flow once lever is activated (Figure 19).



FIG. 19

NOTE: To increase or decrease the maximum solution flow, turn solution flow adjustment knob (for conventional scrubbing only). Turn knob clockwise to decrease solution flow or counterclockwise to increase (Figure 20).



FIG. 20

 Slowly rotate control grips forward to begin scrubbing. The machine will continue to gain speed the further you rotate grips. To drive machine in reverse, simply rotate control grips backwards.

ATTENTION: Always start machine out slowly to prevent machine from leaping forward.

- 7. View amount of solution flow on floor and adjust solution control lever to desired solution flow (for conventional scrubbing only).
- 8. To stop machine, release control grips.

OPERATING FAST SCRUB SYSTEM (FAST MODEL)

How the FaST System operates (Foam Scrubbing Technology): The FaST-PAK concentrate agent is injected into the system with a mixture of a small amount water and compressed air. This mixture creates a large volume of expanded wet foam. The expanded foam mixture is then dispersed onto the floor while two scrubbing disks go to work. By the time the squeegee picks up the mixture, the patented foaming agent has collapsed and recovered into the recovery tank. By performing the FaST system application, you can increase your productivity rate by 30% by reducing your dump/fill cycle. You will also reduce your chemical usage and storage space. One FaST-PAK of concentrated agent allows you to scrub up to 1 million sq. ft.

 Make sure that the FaST-PAK carton is properly installed (See INSTALLING FaST-PAK AGENT).

- Make sure that the solution tank is filled with clear cool water only. DO NOT add conventional cleaning agents in solution tank. Conventional cleaning agents/restorers in the solution tank may result in premature FaST system failure.
- 3. Make sure that the main and brush switches are in the on position, and pull the solution flow lever all the way back (Figure 21).



FIG. 21

NOTE: The water flow rate from the solution tank is automatically regulated by the operation of the FaST system. The solution flow rate can not be adjusted by the Solution Control Adjustment Lever during the FaST Scrub mode.

4. Press the FaST Scrub/Conventional Scrub Switch toward the FaST Scrub mode position – switch light will come on (Figure 22).

NOTE: The solution flow lever must be in the pulled back position in order to activate the switch.



FIG. 22

NOTE: To scrub with clear water only, simply press the FaST Scrub/Conventional Scrub Switch toward the Conventional Scrub mode position. This allows you to operate the machine in a rinsing application.

5. Follow the standard MACHINE OPERATION instructions to begin scrubbing.

WHILE OPERATING MACHINE

FOR SAFETY: When using machine, go slow on inclines and slippery surfaces.

WARNING: Fire Or Explosion Hazard. Do Not Pick Up Flammable Materials Or Reactive Metals.

- Overlap each scrubbing path by 2 inches (5 cm).
- Conventional scrubbing: Pour a recommended foam control solution into the recovery tank if excessive foam appears.

ATTENTION: Do not allow foam or water to enter the float shut-off screen, vacuum motor damage will result. Foam will not activate the float shut-off screen.

- 3. If more scrubbing pressure is needed for small heavily soiled areas, follow steps below:
 - a. Lower brush.
 - b. Lift brush pressure lever to the locked position (Figure 23).

NOTE: Brush MUST be down to allow brush pressure lever to be lifted to the locked position. Do not leave lever in the lock position when brushes are raised.

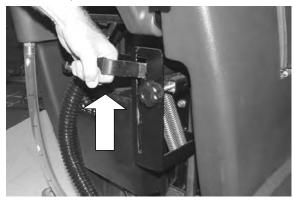


FIG. 23

- 4. If squeegee leaves streaks, raise and wipe blades with a cloth. Pre-sweep area to prevent streaking.
- 5. Before stopping or turning machine around, pull back on solution control lever to shut off solution flow (conventional scrubbing only).
- During brief stops, you do not have to turn off brush switch, the brush will automatically stop when control grips are released.
- 7. While cleaning, view clear tube gallon marker for remaining cleaning solution. Each mark on hose indicates 19 liters (5 gal).
- Periodically check battery meter discharge level. When needle drops to the red zone, recharge batteries.

ATTENTION: Do not continue to run machine when battery meter needle is in the red zone, battery damage will result.

 When solution tank runs dry, turn off brush switch, shut off solution control lever and continue to vacuum until all dirty water is consumed. Then drain recovery tank (See DRAINING TANKS).

CIRCUIT BREAKERS

The machine is equipped with (4) circuit breakers to protect motors from damage. If circuit breakers trip, they cannot be reset immediately. Determine reason why breaker tripped, allow motor to cool and then reset. Brush motor circuit breakers will trip due to excessive overload on pad. Clean or change pad if breaker should trip. Circuit breaker buttons are located at rear of machine as shown (Figure 24).

- 10A Main Circuit Breaker
- 35A Drive Motor/Vacuum Circuit Breaker
- 35A Brush Motor Circuit Breaker (2)
- 10A FaST System (FaST Model)

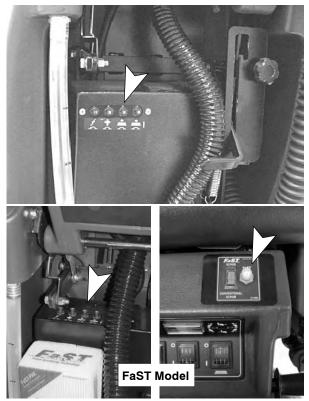


FIG. 24

NOTE: When servicing machine or when machine is left unattended, pull out the Main circuit breaker button. This will shut off all power to machine.

DRAINING TANKS

The recovery tank should be drained and cleaned out after every use. The solution tank should be cleaned out periodically to remove any corrosion.

Transport the machine to a draining site, turn the key off and follow the draining instructions below:

FOR SAFETY: Before leaving or servicing machine, stop on level surface and turn off machine.

DRAINING RECOVERY TANK

 Remove drain hose from holder, position hose over floor drain and twist off drain hose cap. To completely drain recovery tank, hinge open tank and flip up tank support stand to rest tank on (Figure 25).

NOTE: If using a bucket to drain machine, do not use same bucket for filling solution tank. This will prevent possible solution line clogs.





FIG. 25

 Rinse out recovery tank after each use. This will prevent foul odor buildup. Use a hose to rinse out the recovery tank. Be careful not to spray water into shut-off float screen.

DRAINING SOLUTION TANK

1. Pull clear hose off hose barb at rear of machine and drain solution into floor drain or bucket (Figure 26).



FIG. 26

- Rinse out solution tank with clean water after each use and flush out solution flow system by pushing solution flow lever forward. This will prevent clogging due to chemical buildup. Use clear hose to drain solution tank.
- 3. Reconnect clear hose to hose barb. Be certain hose is completely pushed onto hose barb.

CHARGING BATTERIES

ATTENTION: To prolong the life of the batteries and to provide optimum machine performance, ONLY recharge the batteries after a total of 30 minutes of use or more. Do not leave batteries discharged for lengthy periods.

The following charging instructions are intended for battery chargers supplied with the machine. Only use a battery charger with the following specifications to prevent battery damage.

BATTERY CHARGER SPECIFICATIONS:

- CHARGER TYPE: FOR LEAD ACID BATTERIES
- OUTPUT VOLTAGE 24 VOLTS
- OUTPUT CURRENT 25 AMPS
- AUTOMATIC SHUT-OFF CIRCUIT
- FOR DEEP CYCLE BATTERY CHARGING
- Transport machine to a well ventilated area for charging.

WARNING: Fire Or Explosion Hazard.
Batteries Emit Hydrogen Gas. Keep Sparks And
Open Flame Away. Keep Battery Compartment
Open When Charging.

Before charging the batteries, check the electrolyte level in each battery cell (Figure 27).

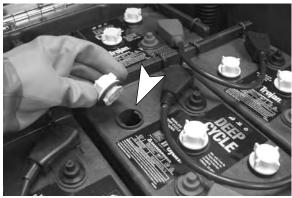


FIG. 27

FOR SAFETY: When servicing machine, wear protective gloves and eye protection when handling batteries and battery cables. Avoid contact with battery acid.

The electrolyte level (A) should slightly cover the battery plates (B). Add distilled water as needed. DO NOT OVERFILL, the fluid may expand and overflow while charging. Replace cell caps before charging (Figure 28).

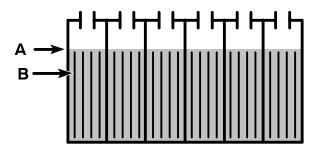


FIG. 28

3. Connect the charger's AC power supply cord to a properly grounded receptacle (Figure 29).

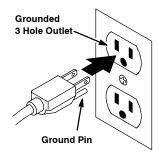


FIG. 29

 Plug charger's DC output connector to battery connector located near battery compartment (Figure 30).

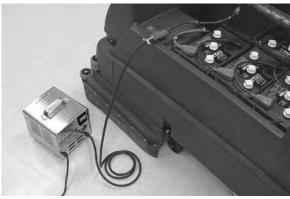


FIG. 30

- The charger will automatically begin charging and shut off when fully charged.
- Rest the recovery tank on the support stand to promote ventilation during charging (Figure 31).

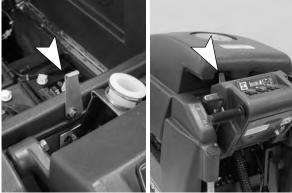
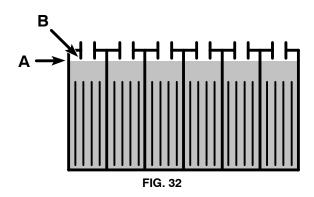


FIG. 31

ATTENTION: Do not disconnect the charger's DC cord from the machine's receptacle when the charger is operating. Arcing may result. If the charger must be interrupted during charging, disconnect the AC power supply cord first.

WARNING: Fire Or Explosion Hazard.
Batteries Emit Hydrogen Gas. Keep Sparks And
Open Flame Away. Keep Battery Compartment
Open When Charging.

 Lead Acid Batteries: After charging, check the electrolyte level (A) again. The level should be approximately 1 cm from the bottom of the fill-port (B) (Figure 32). Add distilled water if needed. DO NOT OVERFILL.



MACHINE MAINTENANCE

To keep the machine in good working condition, simply follow the daily, monthly and quarterly maintenance procedures.

WARNING: Electrical Hazard. Disconnect Battery Cables Before Servicing Machine.

DAILY MAINTENANCE (Every 4 Hours of Use)

- 1. Remove and clean pads or brushes. Never use soiled pads when cleaning. Replace pads when they become loaded with residue.
- 2. Remove and clean lint from float shut-off screen located in recovery tank (Figure 33).



FIG. 33

- Drain and rinse tanks thoroughly. After draining tanks, hinge recovery tank until you can see vacuum intake hole at rear of tank. Remove any clogging debris in hole if necessary.
- 4. Raise squeegee and wipe it down with a dry cloth. Store squeegee in the up position to prevent squeegee damage.
- Clean machine housing with a nonabrasive, non-solvent cleaner.

FOR SAFETY: When cleaning machine, do not power spray or hose off machine. Electrical malfunction may occur.

6. FaST Model: Connect the FaST-PAK supply hose to the storage plug when not it use (Figure 34). Remove any dried concentrate from the hose connector by soaking it in warm water.



FIG. 34

7. Recharge the batteries after a total of 30 minutes of use or more (See CHARGING BATTERIES).

MONTHLY MAINTENANCE (Every 80 Hours of Use)

- 1. Check water level in battery cells (See BATTERY MAINTENANCE).
- 2. Clean battery tops to prevent corrosion.
- 3. Check for loose or corroded battery cables.
- 4. FaST Model: Open right side skirt housing, remove and rinse out inline strainer filter. Before removing filter, be certain solution tank is empty (Figure 35).

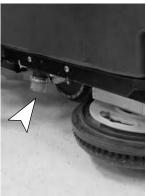




FIG. 35

5. Check drive chain for excess slack and lubricate with a water resistant grease. If chain needs tightening, see DRIVE CHAIN MAINTENANCE.

- Lubricate axle and caster grease fittings with a water resistant grease.
- Lubricate all linkage pivot points with silicone spray then coat with a water resistant grease to maintain a smooth operation.
- Check machine for water leaks and loose nuts and bolts.

QUARTERLY MAINTENANCE (Every 250 Hours of Use)

- Inspect motors for carbon brush wear. Replace brushes when worn to a length of 10mm (0.38 in.) or less. Contact an Authorized Service Center for carbon brush inspection.
 - Contact an Authorized Service Center for motor maintenance.
- 2. FaST Model: Unscrew and remove the filter from the air pump, then clean out the filter using forced air. To access the air pump, remove the two mounting screws that attach the pump to the front of the machine (Figure 36).

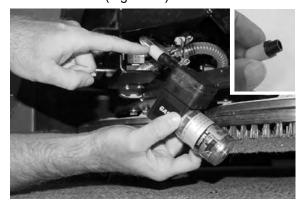


FIG. 36

BATTERY MAINTENANCE

WARNING: Fire Or Explosion Hazard.
Batteries Emit Hydrogen Gas. Keep Sparks And
Open Flame Away. Keep Battery Compartment
Open When Charging.

FOR SAFETY: When servicing machine, wear protective gloves and eye protection when handling batteries and battery cables. Avoid contact with battery acid.

 Check the specific gravity using a hydrometer to determine the charge level and the condition of the batteries (Figure 37). If one or more of the battery cells read lower than the other battery cells (0.050 or more), the cell is damaged, shorted, or is about to fail. Check the hydrometer readings against the following chart to determine the remaining battery charge level. **NOTE:** Do not take readings immediately after adding distilled water. If the water and acid are not thoroughly mixed, the readings may not be accurate.



FIG. 37

SPECIFIC GRAVITY at 27°C (80°F)	BATTERY CHARGE
1.265	100% CHARGED
1.223	75% CHARGED
1.185	50% CHARGED
1.148	25% CHARGED
1.110	DISCHARGED

NOTE: If the readings are taken when the battery electrolyte is any temperature other than 27°C (80°F), the reading must be temperature corrected. Add or subtract to the specific gravity reading 0.004, 4 points, for each 6°C (43°F) above or below 27°C (80°F).

- Always follow proper charging instructions (See CHARGING BATTERIES).
- Check the electrolyte level (A) in each battery cell after charging batteries. The level should be approximately 1 cm from the bottom of the fill-port (B). Add distilled water if needed (Figure 38). DO NOT OVERFILL.

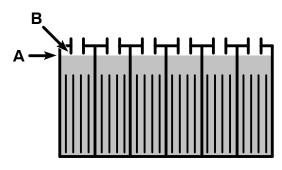


FIG. 38

16

Keep the battery tops clean to prevent battery corrosion.

To clean batteries:

FOR SAFETY: When servicing machine, wear protective gloves and eye protection when handling batteries and battery cables. Avoid contact with battery acid.

 a. Mix a strong solution of baking soda and water (Figure 39).



FIG. 39

b. Brush the solution sparingly over the battery tops and cable connectors.

NOTE: Do not allow baking soda solution to enter battery cells.

- Use a wire brush to clean the battery terminals and cable connectors.
- After cleaning, apply a coating of clear battery post protectant to the terminals and cable connectors.
- 5. Check for loose or worn cables. Replace if worn.

DRIVE CHAIN MAINTENANCE

FOR SAFETY: Before leaving or servicing machine, stop on level surface and turn off machine.

Inspect drive chain for proper tension. Chain should flex between 6.35mm (0.25 in.) and 12.7mm (0.50 in.) from center. If chain flexes more than 12.7mm (0.50 in.), chain should be tightened. To tighten chain, follow steps below:

- Turn main switch to the off position and pull out the main circuit breaker button.
- From operators right side of machine, locate and loosen 4 motor mount bolts, do not remove bolts.
- 3. Loosen locking nut on tension bolt (Figure 40).

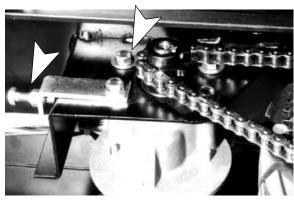


FIG. 40

- Turn tension bolt clockwise until chain is taut.
- 5. Retighten locking nut and 4 motor mount screws.
- 6. Lubricate chain with a water resistant oil.

TRANSPORTING MACHINE

When transporting machine by use of trailer or truck, be certain to follow tie-down procedures below:

FOR SAFETY: When using machine, go slow on inclines and slippery surfaces.

- Remove squeegee from machine and raise brush head. Leave pad or brush installed.
- 2. Load machine using a recommended loading ramp.
- Position front of machine up against front of trailer or truck. Once machine is positioned, lower brush head.
- Place a block behind the drive wheel and the rear casters.
- Place tie-down straps over top of machine and secure straps to floor. It may be necessary to install tie-down brackets to the floor of your trailer or truck.

STORING MACHINE

- Before storing machine, be certain to flush tanks and drain machine of all water.
- Store machine in a dry area with squeegee removed and pad driver in the raised position.
- 3. Remove recovery lid to promote air circulation.
- When storing machine for short periods, raise pad driver and squeegee off floor to prevent damage.

ATTENTION: If storing machine in freezing temperatures, be certain to drain machine of all water. Damage due to freezing temperatures is not covered by warranty.

ATTENTION: Do not expose machine to rain; store indoors.

RECOMMENDED STOCK ITEMS

Refer to the Parts List section for recommended stock items. Stock Items are clearly identified with a bullet preceding the parts description. See example below:

	^		
Ref.	Part No.	Description	Qly
1	701100	ASM., GTANDPIPE	1.
- 2	180813	◆FLCAT, BHUTOFF	1
3	230187	NIPPLE	11
4	101714	• GASKET	1
5.	210240	NUT, FLANGED	1

18

TROUBLE SHOOTING

PROBLEM	CAUSE	SOLUTION
No power, nothing runs.	Batteries need charging.	See CHARGING BATTERIES.
	Faulty battery(s).	Replace battery(s).
	Loose battery cable.	Tighten loose cable.
	Battery connection is improper.	See INSTALLING BATTERIES.
	Faulty Main switch	Contact Service Center.
	Main circuit breaker has tripped.	Determine cause and reset circuit breaker button.
Brush motor does not run.	Brush circuit breakers have tripped, or has been pulled out.	Clean or change to a less aggressive pad. Also, release brush pressure lever if it's in the up position. Reset breaker button.
	Control grips are not twisted.	Control grips must be twisted to activate brushes.
	Faulty brush motor or wiring.	Contact Service Center.
	Faulty brush switch.	Contact Service Center.
	Carbon brushes worn.	Contact Service Center.
	Faulty solenoid.	Contact Service Center.
Vacuum motor does not run.	Vacuum circuit breaker has tripped.	Remove obstruction and reset breaker.
	Faulty vacuum switch.	Contact Service Center.
	Faulty vacuum motor or wiring.	Contact Service Center.
	Faulty solenoid.	Contact Service Center.
	Carbon brushes worn.	Contact Service Center.
Short run time.	Batteries not fully charged.	Charge batteries.
	Bad cell in one or more batteries.	Replace battery.
	Batteries need maintenance.	See BATTERY MAINTENANCE.
	Faulty charger.	Replace battery charger.
Poor squeegee pick up.	Recovery tank is full.	Empty recovery tank.
	Ball float shutoff screen inside recovery tank is clogged.	Remove screen and clean.
	Squeegee is clogged with debris.	Clean squeegee.
	Squeegee blades are worn.	Replace squeegee blades.
	Squeegee thumbscrews are loose.	Tighten thumbscrews.
	Vacuum hose connections are loose or hose has a hole.	Push hose cuffs firmly on connections. Replace hose if damaged.
	Vacuum hose is clogged with debris.	Remove clogged debris.
	Recovery tank water inlet is plugged. Inlet is located at bottom of recovery tank.	Empty recovery tank and tilt it sideways to locate inlet hole, remove clogged debris.
	Tank gasket is defective.	Replace gasket.

Speed Scrub® 2701/3301 (07-04)

TROUBLE SHOOTING -continued

PROBLEM	CAUSE	SOLUTION
Poor squeegee pick up - continued.	Drain hose plug is loose.	Tighten drain plug.
	Clear recovery tank lid is loose.	Tighten lid.
	Vacuum motor is loose.	Contact Service Center.
	Battery charge is low.	Charge batteries. Do not run machine when battery meter is in the red zone.
Drive motor does not run.	Main circuit breaker has tripped or is pulled.	Determine cause and reset breaker.
	Faulty Main switch.	Contact Service Center.
	Faulty speed control circuit board or connection.	Contact Service Center.
	Faulty solenoid.	Contact Service Center.
	Faulty wiring.	Contact Service Center.
	Faulty drive motor.	Contact Service Center.
	Worn carbon brushes.	Contact Service Center.
Drive motor runs, but not correctly.	Faulty potentiometer or speed control board.	Contact Service Center.
	Faulty resistor.	Contact Service Center.
Little or no solution flow.	Solution flow lever in not activated.	Push solution flow lever forward.
	Solution line or filter is clogged.	Remove hose and blow compressed air through it. Flush solution tank after each use.
	Solution valve is clogged.	Remove valve and clean. Do not scratch or damage inside of valve.
	Solution flow adjustment knob needs adjusting.	Turn solution flow knob clockwise to increase flow.
Safety lights do not work.	Flasher is burned out.	Contact Service Center.
FaST Model: FaST System does not operate or operate correctly.	Solution flow lever not pulled back.	Pull back solution flow lever.
	Scrub Mode switch is not selected on FaST Scrub.	Select FaST Scrub Mode.
	FaST circuit breaker has tripped.	Determine cause and reset the 10A circuit breaker button.
	Clogged FaST-PAK supply hose and/or connectors.	Soak connector and hose in warm water and clean.
	FaST-PAK carton is empty or not connected.	Replace FaST-PAK carton and/or connect supply hose.
	Clogged flow control orifice.	Remove orifice, clean and reinstall (refer to parts list diagram).
	Faulty scrub mode switch.	Contact Service Center.
	Faulty pump or air compressor.	Contact Service Center.
	Clogged solution tank filter.	Drain solution tank. Remove solution tank filter, clean and reinstall.

20

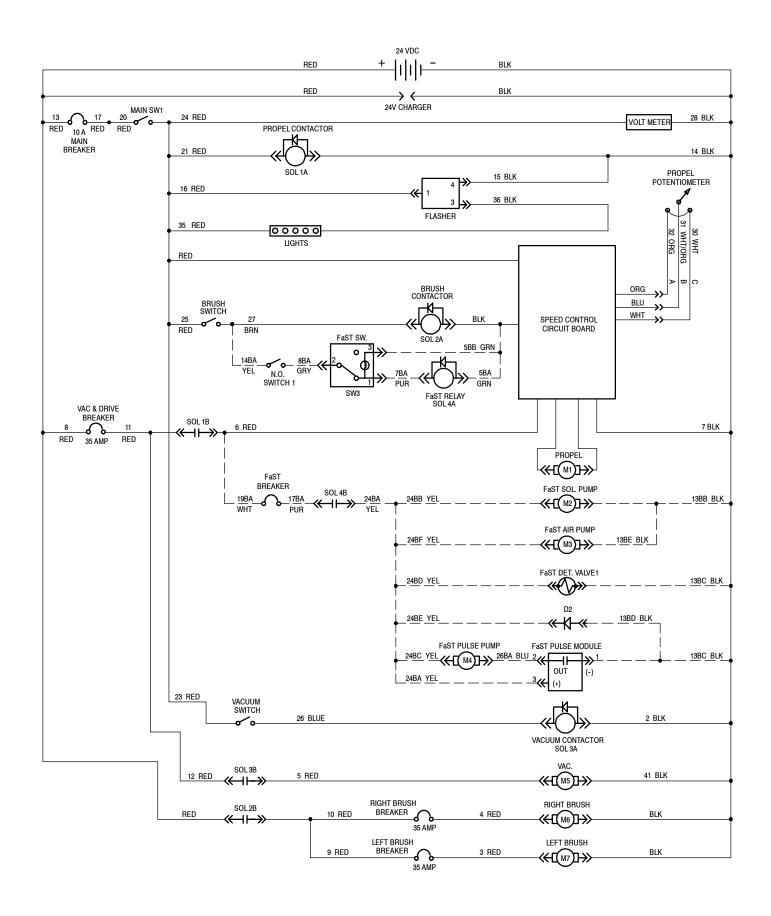
SPECIFICATIONS

MODEL	SPEED SCRUB® 2701	SPEED SCRUB® 3301
LENGTH	1500 mm (59 in.)	1500 mm (59 in.)
WIDTH	740 mm (29 in.)	890 mm (35 in.)
HEIGHT	1040 mm (41 in.)	1040 mm (41 in.)
WEIGHT - WITH BATTERIES	352kg (760 lbs)	355kg (765 lbs)
TANKS CAPACITY	102L (27 Gal)	102L (27 Gal)
SPEED CONTROL	VARIABLE FWD/REV	VARIABLE FWD/REV
CLEANING SPEED (MAX.)	2787 sq. m.(30,000 sq. ft.)/hr.	3251 sq. m. (35,000 sq. ft.)/hr.
CLEANING PATH WIDTH	680 mm (27 in.)	830 mm (33 in.)
PAD DIAMETER	2 - 355 mm (14 in.)	2 - 430 mm (17 in.)
SQUEEGEE WIDTH	965 mm (38 in.)	1067 mm (42 in.)
DRIVE MOTOR	.5 h.p., 0-1800 rpm, 24V, 10A	.5 h.p., 0-1800 rpm, 24V, 10A
BRUSH MOTOR	275 h.p., 220 rpm, 24V, 20A, 550W	275 h.p., 220 rpm, 24V, 20A, 550W
VACUUM MOTOR	.75 h.p., 3-stage 5.7", 24V, 21A, 550W	.75 h.p., 3-stage 5.7", 24V, 21A, 550W
WATER LIFT	1720 mm (68 in.)	1720 mm (68 in.)
BATTERIES	4-305A/hr, 6V deep cyc	4-305A/hr, 6V deep cyc
RUN TIME on full charge	4.76 Hours	4.76 Hours
DECIBEL RATING AT OPERATOR'S EAR, INDOORS ON TILE.	<70dB(A)	<70dB(A)

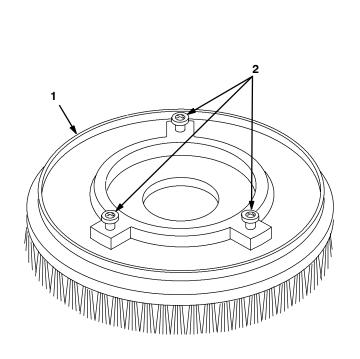
FaST SYSTEM (FaST MODEL)	
SOLUTION PUMP	24 Volt DC, 3.5 A, 1.5 GPM open flow, 45 psi bypass setting
SOLUTION FLOW RATE	0.68 LPM (0.18 GPM)
DETERGENT PUMP	24 Volt, 24 Watts
CONCENTRATE FLOW RATE	0.80 CC/Minute (0.02 Ounces/Minute)
CONCENTRATE TO WATER DILUTION RATIO	1:850
AIR COMPRESSOR	24 Volt DC, 0.6 Maximum Amp draw
AIR COMPRESSOR FLOW RATE	8.7 LPM (0.3 CFM) open flow

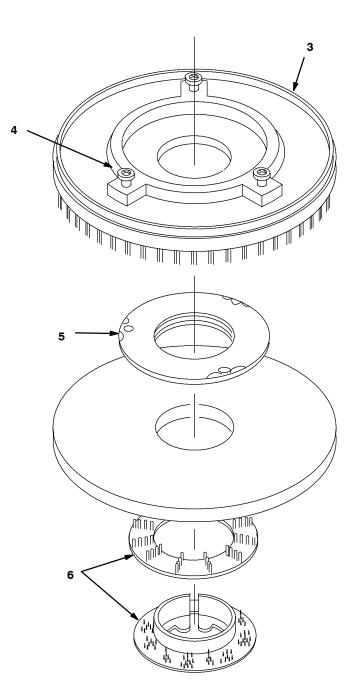
Speed Scrub® 2701/3301 (07-04)

OPERATION



REPLACEMENT BRUSHES AND PAD DRIVER GROUP CEPILLO DEL REEMPLAZO Y GRUPO DEL MANDO DE LA ALMOHADILLA





46

REPLACEMENT BRUSHES AND PAD DRIVER GROUP CEPILLO DEL REEMPLAZO Y GRUPO DEL MANDO DE LA ALMOHADILLA

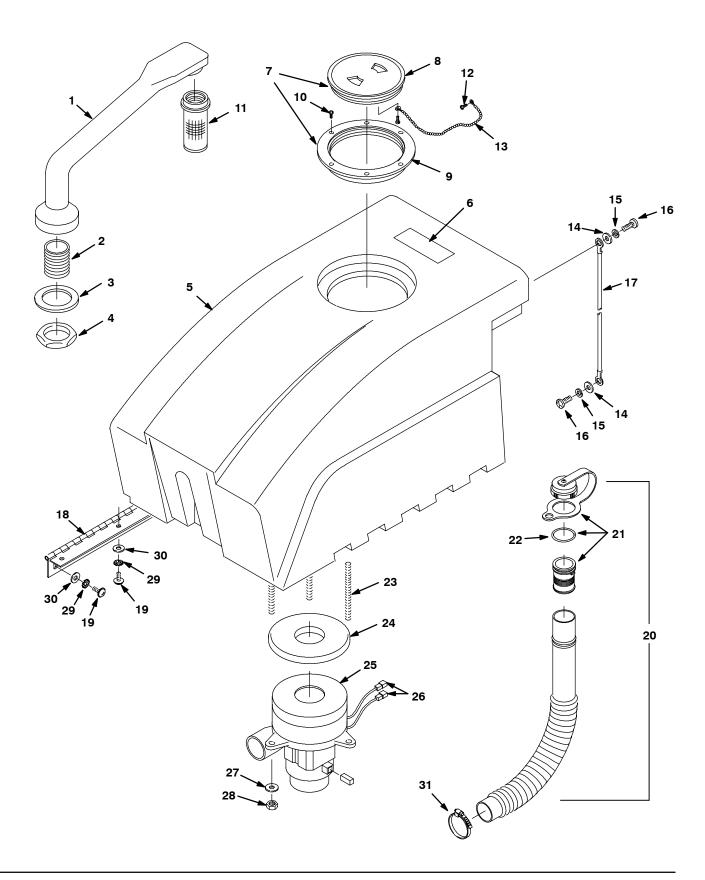
REF	PART #	DESCRIPTION	QTY.
∇ 1	240227	BRUSH, 14" POLY SCRUB PK/2 (2701)	2
	240234	BRUSH, 14" NYLON GRIT PK/2 (2701)	2
	240236	BRUSH, 14" DYNA SCRUB PK/2 (2701)	2
	240243	BRUSH, 14" SCRUB/STRIP PK/2 (2701)	2
	240230	BRUSH, 17" POLY SCRUB PK/2 (3301)	2
	240235	BRUSH, 17" NYLON GRIT PK/2 (3301)	2
	240237	BRUSH, 17" DYNA SCRUB PK/2 (3301)	2
	240241	BRUSH, 17" SCRUB/STRIP PK/2 (3301)	2
▲ 2	240238	LUGS, W/ SCREWS (SET OF 3)	6

Ī	REF PART#		PART #	DESCRIPTION	QTY.
	∇	3	240232	●ASM, 14" PAD DRIVER (2701)	2
			240233	●ASM, 17" PAD DRIVER (3301)	2
Ī	A	4	240238	LUGS, W/ SCREWS (SET OF 3)	6
Ī	A	5	100106	PLATE, PAD DRIVER BASE	2
Ī	A	6	100107	●RING, PAD RETAINER SNAP-IN	2

∇ ASSEMBLY / CONJUNTO

- ▲ INCLUDED IN ASSEMBLY / INCLUIDO EN EL CONJUNTO
- RECOMMENDED STOCK ITEMS / ARTICULOS RECOMENDADOS PARA MANTENER EN EXISTENCIA

RECOVERY TANK GROUP CONJUNTO DESPOSITO RECUPERAR



RECOVERY TANK GROUP CONJUNTO DESPOSITO RECUPERAR

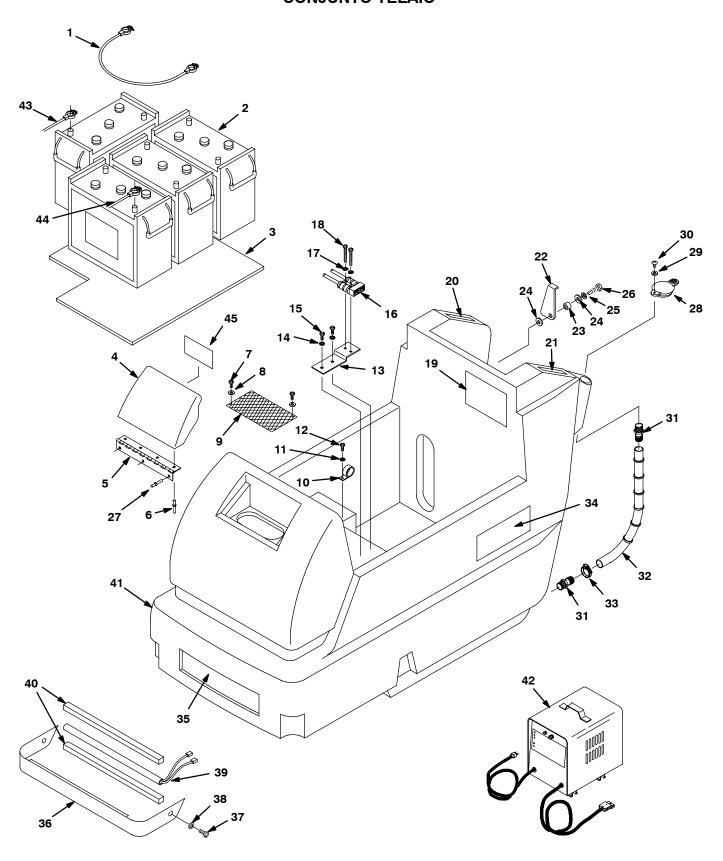
RI	EF	PART #	DESCRIPTION	QTY.
∇		100162	ASM, STANDPIPE W/NIPPLE	1
A	1	100759	STANDPIPE, RM-NAT	1
A	2	606088	FITTING, 1-1/2" NIPPLE CPVC	1
	3	101714	●GASKET, WASTE AIR CHAMBER	1
	4	210240	NUT, FLANGED 1-1/2 FPT	1
V	5	614118	ASM, RECOVERY TANK WITH LABEL, GREEN	1
		614119	ASM, RECOVERY TANK WITH LABEL, DK. GRAY	1
A	6	613287	LABEL, WARNING	1
∇	7	100102	●CLEAR LID W/STANDARD HOLE	1
A	8	100105	●LID, CENTER ONLY, CLEAR	1
A	9	100109	●LID, OUTER RING	1
	10	140826	SCREW, #6X3/4 PANPHL SHTMTL	6
	11	180613	●FLOAT, SHUT-OFF	1
	12	3701.6	SCREW, #6X3/8 PANPHL SHTMTL	2
	13	230513	ASSEMBLY, CHAIN	1
	14	140027	WASHER, 5/16 FLAT	2
	15	140015	WASHER, 5/16 LOCK	2
	16	16931	SCREW, M8X1.25X20 HEXHD	2

REF	PART #	DESCRIPTION	QTY.
17	140960	●CABLE, REC TANK SUPPORT	1
18	230938	●HINGE, REC TANK	1
19	363503	SCREW, M6X1.0X12 PANHD	11
∇ 20	1010143	●ASSEMBLY, DRAIN HOSE	1
▲ ∇21	1008639	●ASSEMBLY, CAP, DRAIN HOSE	1
▲ 22	1008637	●O-RING	1
23	140353	SCREW, M6X1.0X108 STUD	3
24	626092	●GASKET, VAC MOTOR	1
25	130477	●MOTOR, VAC 5.7 3S 24V	1
	190163	●BRUSH, CARBON 2/PK	1
26	130096	TERMINAL, MALE	2
27	140000	WASHER, 0.28B, 0.62D, .04, FLAT	3
28	08712	NUT, M6X1.0 NYLOCK	3
29	140052	WASHER, 1/4 LOCK	11
30	140000	WASHER, 0.28B, 0.62D, .04, FLAT	11
31	140308	CLAMP, HOSE 1-5/16 TO 2-1/4	1

∇ ASSEMBLY / CONJUNTO

- ▲ INCLUDED IN ASSEMBLY / INCLUIDO EN EL CONJUNTO
- RECOMMENDED STOCK ITEMS / ARTICULOS RECOMENDADOS PARA MANTENER EN EXISTENCIA

CHASSIS GROUP CONJUNTO TELAIO



CHASSIS GROUP CONJUNTO TELAIO

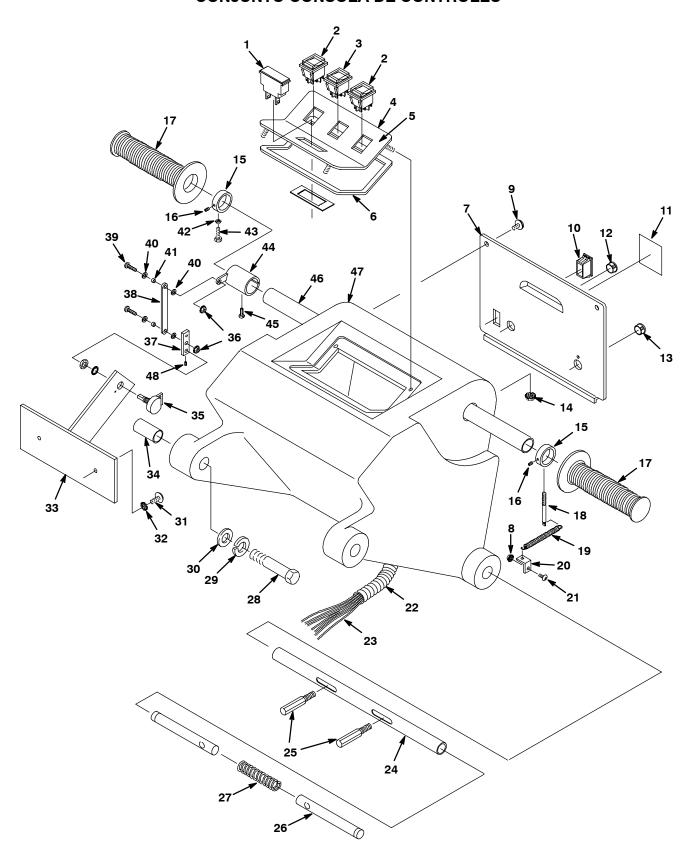
F	REF	PART #	DESCRIPTION	QTY.
	1	130367	CABLE, BATTERY 15" BLK X 6 GA.	3
	2	606991	BATTERY 6V 305AH DUAL TERM	4
		130986	BATTERY 6V 250AH	4
	3	100707	PLATE, BATTERY SUPPORT	1
∇		608518	ASM, COVER SOL. TANK GREEN	1
		701196	ASM, COVER SOL. TANK DK. GRAY	1
A	4	612518	COVER, SOL. TANK GREEN	1
		612520	COVER, SOL. TANK DK. GRAY	1
A	5	611068	HINGE, COVER	1
A	6	140706	RIVET, POP 1/8	4
	7	3701.6	SCREW, #6X3/8 PANPHL SHTMTL	2
	8	140032	WASHER, #6 FLAT	2
	9	602529	FILTER, SCREEN	1
	10	140300	CLAMP, INSULATED 1/2" ID	1
	11	07514	WASHER, #10 LOCK	1
	12	578141000	SCREW, M5X0.8X10 PANPHL	1
	13	230665	BRACKET, CHARGER PLUG	1
	14	07514	WASHER, #10 LOCK	2
	15	578141000	SCREW, M5X0.8X10 PANPHL	2
	16	604556	ASM, WIRE, CHARGE PLUG	1
	17	140019	WASHER, #6 LOCK	2
	18	2728.12	SCREW #6-32X3/4 PANPHL	2
	19	120567	DECAL, WARNING BATT. DIAGRAM	1
	20	600649	DECAL, SOLUTION LEVER, CE	1
		614356	DECAL, SOLUTION LEVER, FaST	1
	21	600650	DECAL, SQUEEGEE LEVER CE	1
	22	230925	SUPPORT, RECOVERY TANK	1
	23	611418	SLEEVE, .437D, .315B, .14L	1

REF	PART #	DESCRIPTION	QTY.
24	140027	WASHER, 5/16 FLAT	2
25	140015	WASHER, 5/16 LOCK	1
26	578237000	SCREW M8X1.25X18 HXHDCP	1
27	140706	RIVET, POP 1/8	3
28	1012965	●CAP, PORT, SOLUTION FILL	1
29	01683	WASHER, FLAT #10	1
30	140340	SCREW, PAN #10-24 X 0.62	1
31	150529	FITTING, 3/4M X 3/4H BARB	2
32	600796	HOSE, DRAIN W/LEVEL INDCTR	1
33	630369	CLAMP, HOSE .50 - 1.1	1
34	608448	DECAL, SPEED SCRUB 2701	2
	608447	DECAL, SPEED SCRUB 3301	2
34	614357	DECAL, SPEED SCRUB 2701, FaST	2
	614358	DECAL, SPEED SCRUB 3301, FaST	2
35	608184	LABEL, NOBLES LOGO	1
36	230937.BK	SHIELD, LIGHT	1
37	578141000	SCREW, M5X0.8X10 PANPHL	2
38	07514	WASHER, #10 LOCK	2
39	130020	LIGHT, SAFETY 19"	1
40	613453	GASKET, 1/2" CLOSED CELL	2
41	608282	TANK, SOLUTION GREEN	1
	101801	TANK, SOLUTION DK. GRAY	1
42	130871	CHARGER, 24VDC 25AMP (FOR 250-305 AMP BATTERIES)	1
	601734	CHARGER, 24VDC 36AMP (FOR 250-335 AMP BATTERIES)	1
43	130390	ASM., WIRE #6 BLK 29"	1
44	130391	ASM., WIRE #6 RED 64"	1
45	613733	LABEL, ATTENTION (FaST MODEL)	1

∇ ASSEMBLY / CONJUNTO

- ▲ INCLUDED IN ASSEMBLY / INCLUIDO EN EL CONJUNTO
- RECOMMENDED STOCK ITEMS / ARTICULOS RECOMENDADOS PARA MANTENER EN EXISTENCIA

CONTROL CONSOLE GROUP CONJUNTO CONSOLA DE CONTROLES



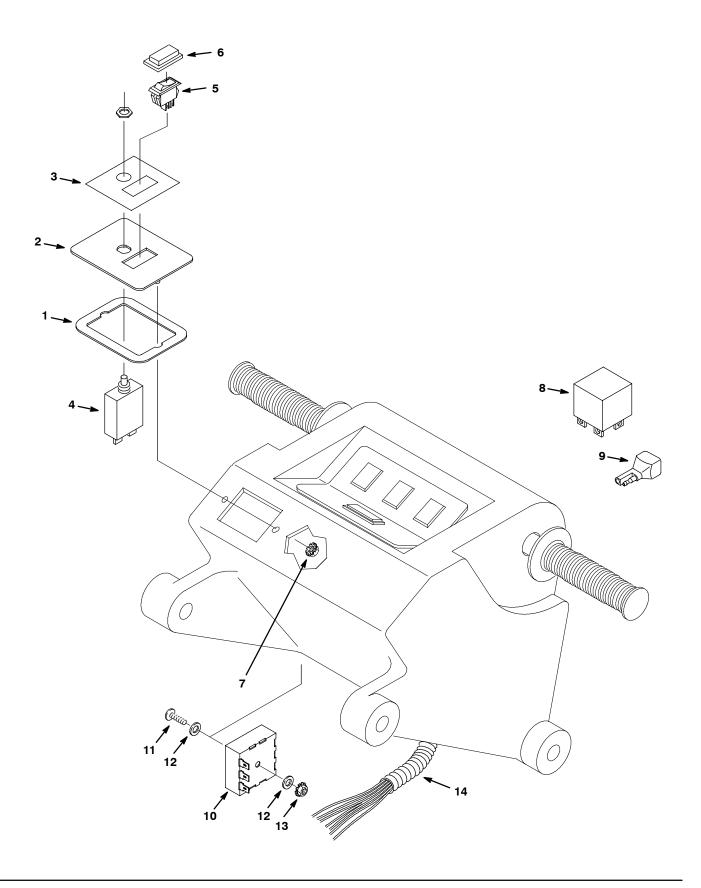
CONTROL CONSOLE GROUP CONJUNTO CONSOLA DE CONTROLES

REF	PART #	DESCRIPTION	QTY.
1	606020	●METER, BATTERY VOLTAGE 24V	1
2	130816	•SWITCH, ROCKER SPST	2
3	130764	•SWITCH, ROCKER DPST 240V	1
4	230698.BK	PANEL, CONSOLE	1
5	600648	DECAL, DASH CE	1
6	100057	GASKET, CONSOLE	1
7	606276	PANEL, REAR COVER	1
8	140519	NUT, #10-24 KEP	1
9	140197	SCREW, #10-24X3/8 TRSPHL	2
10	582150	PLUG, ACCESSORY SWITCH	1
11	606105	LABEL, DO NOT SPRAY	1
12	130198	PLUG, PRY OUT .500 OD	1
13	069764626	PLUG, HOLE 012.7MM	1
14	140519	NUT, #10-24 KEP	4
15	230652	COLLAR, HANDLE	2
16	140859	SCREW, 1/4-20X1/4 SET	2
17	200823	GRIP, HANDLE TUBE	2
18	230491	PIN, SPRING RETURN	1
19	1002114	SPRING, ROLL THROTTLE	1
20	230564	BRACKET, SPRING	1
21	140900	SCREW, #10-24X3/4 TRSPHL	1
22	611986	WRAP, LOOM .50DX1.5'	1
23	600646	HARNESS, HOUSING	1
24	230613	TUBE, HANDLE ADJUSTMENT	1

RECOMMENDED STOCK ITEMS / ARTICULOS RECOMENDADOS PARA MANTENER EN EXISTENCIA

REF	PART #	DESCRIPTION	QTY.
25	230649	PIN, HANDLE ADJUSTMENT	2
26	230648	PIN, HANDLE ADJUSTMENT LOCK	2
27	140415	SPRING, LOCK PIN	1
28	140351	SCREW, M12X1.75X70 HXHDCP	2
29	140024	WASHER, 1/2 LOCK	2
30	3148.816	WASHER, .875X.515X.06 FLAT	2
31	140885	SCREW, 1/4-20X1/2 TRSPHL	2
32	140052	WASHER, 1/4 LOCK	2
33	230690	BRACKET, SPEED POT	1
34	140155	BUSHING, .48X.62X2.00	2
35	700898	POTENTIOMETER, 5K W/ WIRES	1
36	140519	NUT, #10-24 KEP	2
37	230688	LEVER ARM, SPEED POT	1
38	230689	LINK, SPEED POT	1
39	140900	SCREW, #10-24X3/4 TRSPHL	2
40	41579	WASHER, #8 FLAT	4
41	140138	BUSHING, .19X.25X.14	2
42	32520	NUT, 1/4-20 HXJM	1
43	24672	SCREW, 1/4-20X3/4 HEXHD	1
44	230687	BRACKET, SPEED POT TUBE	1
45	140899	SCREW, #10-24X1-1/4 RNDHD	1
46	230671	HANDLE, TUBE	1
47	100454	HOUSING, CONTROL DK. GRAY	1
	608278	HOUSING, CONTROL GREEN	1
	614359	HOUSING, CONTROL GREEN, FaST	1
48	140948	SCREW, #10-24X1/4 SET	1

CONTROL CONSOLE GROUP - FaST MODEL CONJUNTO CONSOLA DE CONTROLES - MODELO FaST



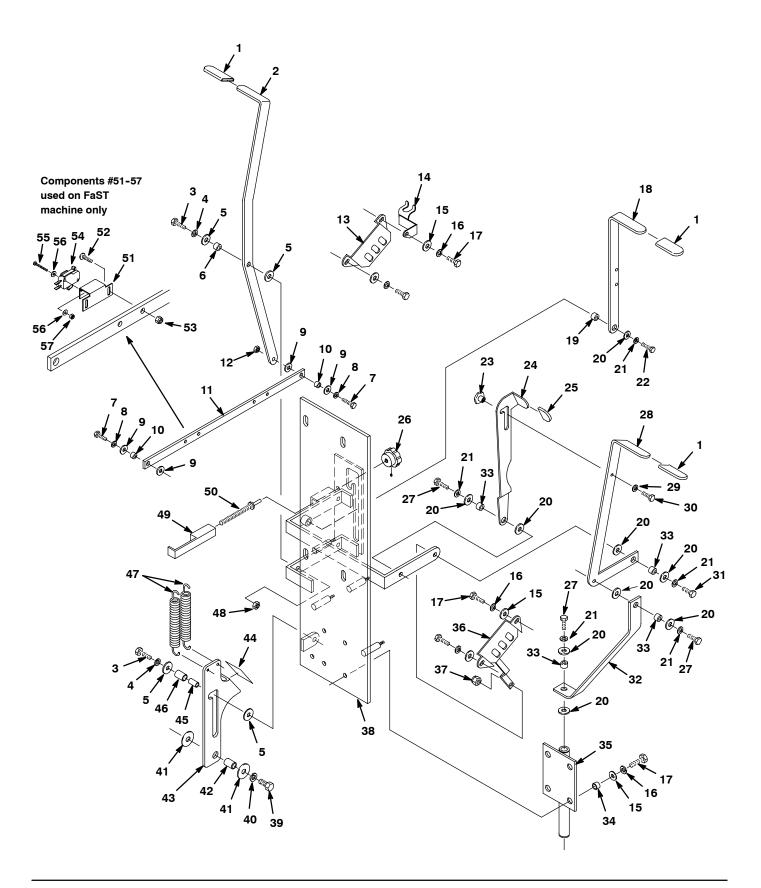
CONTROL CONSOLE GROUP - FaST MODEL CONJUNTO CONSOLA DE CONTROLES - MODELO FaST

REF	PART #	DESCRIPTION	QTY.
1	1018717	●GASKET, SWITCH, FaST PLATE	1
2	1018645	PLATE, MTG, SWITCH, FaST	1
3	613399	LABEL, FaST SWITCH	1
4	383721	●BREAKER, CIRCUIT, 10 AMP	1
5	630419	•SWITCH, ROCKER, 28VDC	1
6	578720	●SPLASHGUARD, RCKR SWITCH	1
7	140519	NUT, #10-24 KEP	2

•	RECOMMENDED STOCK ITEMS / ARTICULOS RECOMENDADOS PARA
	MANTENER EN EXISTENCIA

REF	PART #	DESCRIPTION	QTY.
8	49309	RELAY, 24VDC	1
9	222290	DIODE, ELEC, PLUG	1
10	1018093	TIMER, PUMP, DETGT, 12-40VDC	1
11	140899	SCREW, #10-24X1.25 RNDHD PHL	1
12	19066	WASHER, #10 FLAT	2
13	140519	NUT, #10-24 KEP	1
14	391937	HARNESS, WIRE, FaST	1

LEVER GROUP CONJUNTO DE PALANCAS

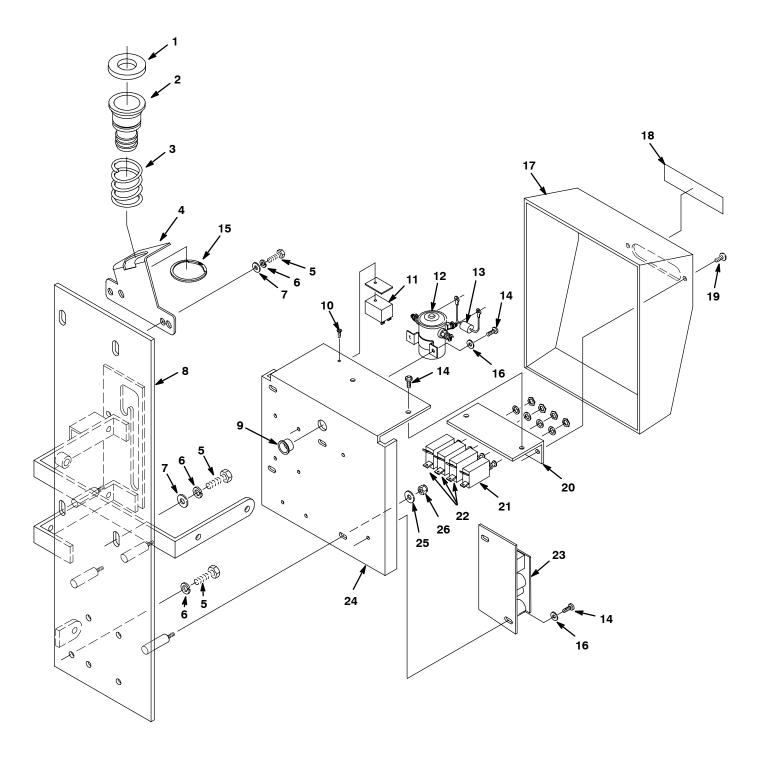


LEVER GROUP CONJUNTO DE PALANCAS

REF	PART#	DESCRIPTION	QTY.
1	200816	GRIP, HANDLE 1/4X1X2-1/4	3
2	230680	HANDLE, VALVE HANDLE	1
•	1018009	HANDLE, VALVE HANDLE, FaST	1
3	140202	SCREW, 3/8-16X1 HEXHD	2
4	140017	WASHER, 3/8 LOCK	2
5	140028	WASHER, 3/8 FLAT	4
6	140136	BUSHING, .38X.50X.28	1
7	140208	SCREW, 1/4-20X1 HEXHD	2
8	140016	WASHER, 1/4 LOCK	2
9	140000	WASHER, 0.28B, 0.62D, .04, FLAT	4
10	140134	SLEEVE, .376D, .253B, .28L	2
11	230656	LEVER, VALVE	1
,	1018486	LEVER, VALVE, FaST	1
12	32520	NUT, 1/4-20 HXJM	1
13	230661	PLATE, LOCK CONTROL HOUSING	1
14	611979	BRACKET, DRAIN HOSE HANGER	1
15	140027	WASHER, 5/16 FLAT	8
16	140015	WASHER, 5/16 LOCK	8
17	578237000	SCREW M8X1.25X18 HXHDCP	8
18	230654	HANDLE, BRUSH PRESSURE	1
19	140144	SLEEVE, .496D, .318B, .33L	1
20	140028	WASHER, 3/8 FLAT	9
21	140017	WASHER, 3/8 LOCK	5
22	2949.7	SCREW, 3/8-16X7/8 HEXHD	1
23	230631	SPACER, SQUEEGEE LIFT	1
24	230659	LATCH, SQUEEGEE HANDLE	1
25	200817	GRIP, HANDLE .095X7/8X1-3/8	1
26	240208	KNOB, HEIGHT ADJUSTMENT	1

REF	PART #	DESCRIPTION	QTY.
27	02994	SCREW, 3/8-16X3/4 HEXHD	3
28	230658	HANDLE, SQUEEGEE LEVER	1
29	140016	WASHER, 1/4 LOCK	1
30	01697	SCREW, 1/4-20X5/8 HEXHD	1
31	140231	SCREW, 3/8-16X1-1/2 HEXHD	1
32	230660	LINK, SQUEEGEE HANDLE	1
33	140136	BUSHING, .38X.50X.28	4
34	140133	BUSHING, SQUEEGEE MNT BRKT	4
35	230750	BRACKET, SQUEEGEE MOUNT	1
36	230297	PLATE, LOCK CONTROL HOUSING	1
37	59156	NUT, 3/8-16 NYLOCK	1
38	611982	WELDMENT, REAR PANEL	1
39	140237	SCREW, 1/2-13X1 HEXHD	1
40	140024	WASHER, 1/2 LOCK	1
41	140045	WASHER, 1/2 FLAT	2
42	140139	SLEEVE, .625D, .500B, .25L	1
43	230775	LATCH, BRUSH LIFT PEDAL	1
44	102560	PAD, NON-SLIP 1.62 SQ.	1
45	140136	BUSHING, .38X.50X.28 (INNER)	1
46	140145	SLEEVE, .625D, .50B, .25L (OUTER)	1
47	140423	SPRING, BRUSH PRESSURE	2
48	140525	NUT, 3/8-16 HEX	1
49	230944	BLOCK, VALVE STOP	1
50	230945	STUD, VALVE ADJUSTMENT STOP	1
51	1017449	BRACKET, SWITCH (FaST ONLY)	1
52	140890	SCREW, #10-24X0.50 TRSPHL (FaST ONLY)	2
53	140519	NUT, #10-24 KEP (FaST ONLY)	2
54	12259	SWITCH, SNAP (FaST ONLY)	1
55	578403000	SCREW, M3X0.5X20 PANPHL (FaST ONLY)	2
56	200301012	WASHER, M3 FLAT (FaST ONLY)	4
57	579211	NUT, M3X0.5 HEXLK (FaST ONLY)	2

ELECTRICAL PANEL GROUP CONJUNTO CONSOLA ELÉCTRICO



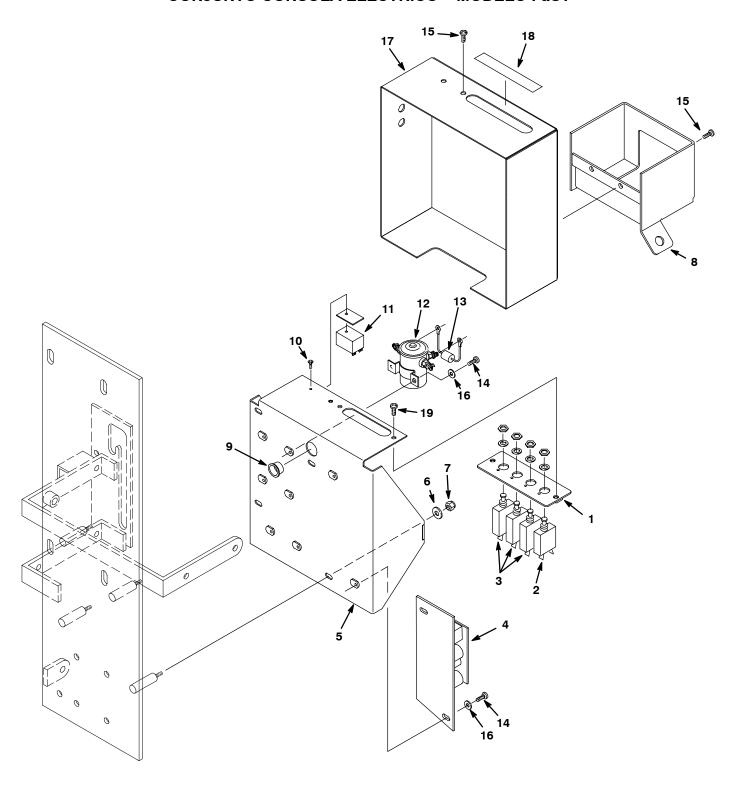
ELECTRICAL PANEL GROUP CONJUNTO CONSOLA ELÉCTRICO

REF	PART #	DESCRIPTION	QTY.
1	630010	GASKET, TUBE-ADAPTER	1
2	630011	TUBE, VAC TRANS	1
3	630267	SPRING, TUBE-ADAPTER	1
4	608706	BRACKET, VAC TRANS	1
5	578237000	SCREW M8X1.25X18 HXHDCP	5
6	140015	WASHER, 5/16 LOCK	5
7	140027	WASHER, 5/16 FLAT	4
8	611982	WELDMENT, REAR PANEL	1
9	130104	BUSHING, SNAP .88ID - BLACK	1
10	140565	SCREW, #4-40X3/8 FLTPHL	1
11	130021	●FLASHER, 24VDC	1
12	605905	●SOLENOID, 24VDC	3
13	606404	●ASM, DIODE W/RING TERMINALS	3

•	RECOMMENDED STOCK ITEMS / ARTICULOS RECOMENDADOS PARA
	MANTENER EN EXISTENCIA

REF	PART #	DESCRIPTION	QTY.
14	140197	SCREW, #10-24X3/8 TRSPHL	10
15	630016	RING, RETAINING	1
16	19066	WASHER, #10 FLAT	8
17	611756	COVER, ELECTRICAL PANEL	1
18	600651	DECAL, CIRCUIT BREAKER CE	1
19	140197	SCREW, #10-24X3/8 TRSPHL	2
20	230553	BRACKET, CIRCUIT BREAKER	1
21	130755	●BREAKER, CIRCUIT 10A	1
22	130756	●BREAKER, CIRCUIT 35A	3
23	190959	ASM, SPEED CONTROL	1
24	230552	PANEL, ELECTRICAL	1
25	140000	WASHER, 0.28B, 0.62D, .04, FLAT	4
26	08712	NUT, M6X1.0 NYLOCK	4

ELECTRICAL PANEL GROUP - FaST MODEL CONJUNTO CONSOLA ELÉCTRICO - MODELO FaST



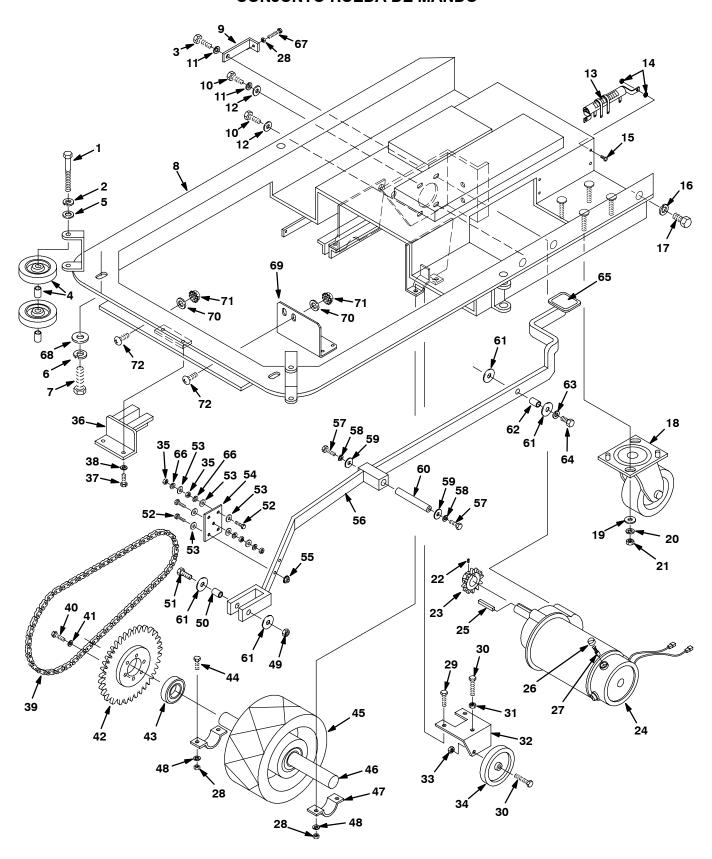
ELECTRICAL PANEL GROUP - FaST MODEL CONJUNTO CONSOLA ELÉCTRICO - MODELO FaST

REF	PART #	DESCRIPTION	QTY.
1	1018628	BRACKET, CIRCUIT BREAKER	1
2	130755	●BREAKER, CIRCUIT 10A	1
3	130756	●BREAKER, CIRCUIT 35A	3
4	190959	ASM, SPEED CONTROL	1
5	1017119	PANEL, ELECTRICAL	1
6	140000	WASHER, 1/4 FLAT	4
7	08712	NUT, M6X1.0 NYLOCK	4
8	1016745	BRACKET, BOX, DETERGENT	1
9	130104	BUSHING, SNAP .88ID - BLACK	1
10	140565	SCREW, #4-40X3/8 FLTPHL	1

REF	PART #	DESCRIPTION	QTY.
11	130021	●FLASHER, 24VDC	1
12	605905	●SOLENOID, 24VDC	3
13	606404	●ASM, DIODE W/RING TERMINALS	3
14	140197	SCREW, #10-24X3/8 TRSPHL	8
15	605975	SCREW, TRS, #10-24X0.50 SEM	3
16	19066	WASHER, #10 FLAT	8
17	1016968	COVER, ELECTRICAL PANEL	1
18	600651	DECAL, CIRCUIT BREAKER CE	1
19	140197	SCREW, #10-24X3/8 TRSPHL	2

[•] RECOMMENDED STOCK ITEMS / ARTICULOS RECOMENDADOS PARA MANTENER EN EXISTENCIA

DRIVE WHEEL GROUP CONJUNTO RUEDA DE MANDO



DRIVE WHEEL GROUP CONJUNTO RUEDA DE MANDO

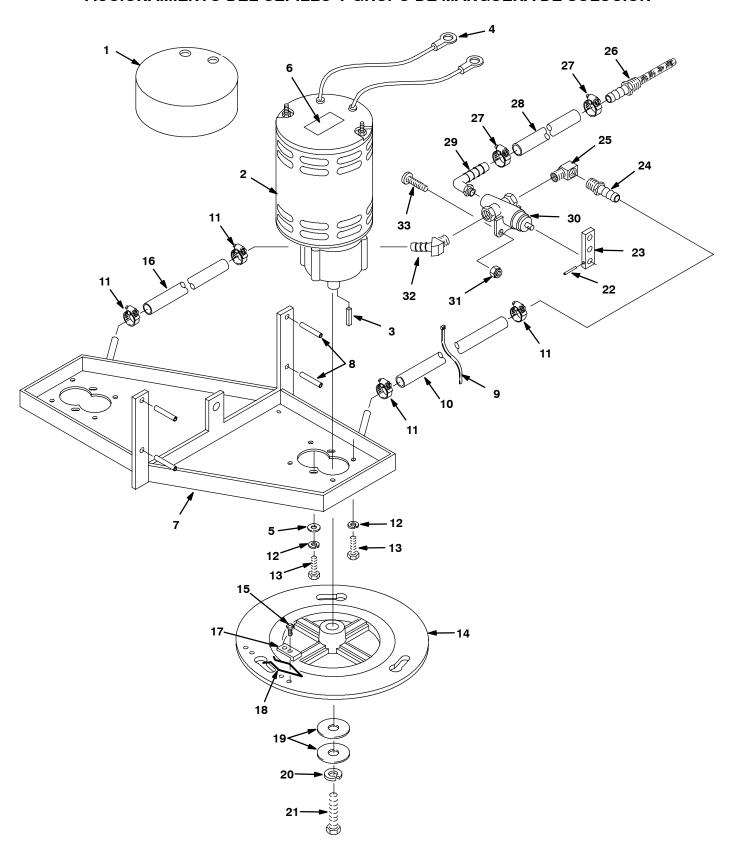
1 600349 SCREW, 5/16-18X2-3/4 HEXHD 2 2 140015 WASHER, 5/16 LOCK 2 3 611048 SCREW, 3/8-16X1-1/4 HEXHD 1 4 1014918 ●WHEEL, RUBBER, 3"X1" 4 5 140027 WASHER, 5/16 FLAT 2 6 140333 WASHER, M10 LOCK 2 7 140276 SCREW, M10X1.5X16 HEXHD 2 8 230932.BK CHASSIS, WELDMENT 1 1016124 CHASSIS, WELDMENT, FAST 1 9 230655 BRACKET, DRIVE MTR TENSION 1 10 140202 SCREW, 3/8-16X1 HEXHD 3 11 140017 WASHER, 3/8 LOCK 3 12 140028 WASHER, 3/8 FLAT 3 13 130713 ●RESISTOR, 100 WATT .9 OHM 2 14 140519 NUT, #10-24 KEP 8 15 140900 SCREW, #10-24X3/4 TRSPHL 4 16 140024 WASHER, 1/2 LOCK 3 17 09745 SCREW, M12X1.75X25 HEXHD 3 18 103002 ●CASTER, 4" SWIVEL 2 19 140036 WASHER, 3/8 FLAT 8 20 140333 WASHER, M10 LOCK 8 21 140285 NUT, M10X1.5 HEX 8 22 140859 SCREW, 1/4-20X1/4 SET 1 23 240071 SPROCKET, DRIVE MOTOR #40-10 1 V 24 613422 ●MOTOR, DRIVE, 24V, 5HP 1 A 26 613424 ●CAP, CARBON BRUSH 4 A 27 130508 ●CARBON BRUSH 4 A 28 140525 NUT, 3/8-16 HEX 5 B 30796 BRACKET, WHEEL SUPPORT 1 B 1403207 WHIEEL A" X 4" 1	R	EF	PART #	DESCRIPTION	QTY.
3 611048 SCREW, 3/8-16X1-1/4 HEXHD 1 4 1014918 ●WHEEL, RUBBER, 3"X1" 4 5 140027 WASHER, 5/16 FLAT 2 6 140333 WASHER, M10 LOCK 2 7 140276 SCREW, M10X1.5X16 HEXHD 2 8 230932.BK CHASSIS, WELDMENT 1 1016124 CHASSIS, WELDMENT, FaST 1 9 230655 BRACKET, DRIVE MTR TENSION 1 10 140202 SCREW, 3/8-16X1 HEXHD 3 11 140017 WASHER, 3/8 LOCK 3 12 140028 WASHER, 3/8 FLAT 3 13 130713 ●RESISTOR, 100 WATT.9 OHM 2 14 140519 NUT, #10-24 KEP 8 15 140900 SCREW, #10-24X3/4 TRSPHL 4 16 140024 WASHER, 1/2 LOCK 3 17 09745 SCREW, M12X1.75X25 HEXHD 3 18 103002 ●CASTER, 4" SWIVEL 2 19 140036 WASHER, 3/8 FLAT 8 20 140333 WASHER, M10 LOCK 8 21 140285 NUT, M10X1.5 HEX 8 22 140859 SCREW, 1/4-20X1/4 SET 1 23 240071 SPROCKET, DRIVE MOTOR #40-10 1 V 24 613422 ●MOTOR, DRIVE, 24V, .5HP 1 ▲ 25 140632 KEY, 1/4X1/4X1" 1 ▲ 26 613424 ●CAP, CARBON BRUSH 4 ▲ 27 130508 ●CARBON BRUSH 4 ▲ 27 130508 ●CARBON BRUSH 4 ▲ 27 130508 ●CARBON BRUSH 4 ▲ 27 130508 ●CARBON BRUSH 4 A 27 130508 SCREW, 3/8-16X1-3/4 HEXHD 2 30 140233 SCREW, 3/8-16X1-3/4 HEXHD 2 31 140525 NUT, 3/8-16 HEX 1 32 230796 BRACKET, WHEEL SUPPORT 1 33 140525 NUT, 3/8-16 HEX 1 31 140525 NUT, 3/8-16 HEX 1		1	600349	SCREW, 5/16-18X2-3/4 HEXHD	2
4 1014918		2	140015	WASHER, 5/16 LOCK	2
5 140027 WASHER, 5/16 FLAT 2 6 140333 WASHER, M10 LOCK 2 7 140276 SCREW, M10X1.5X16 HEXHD 2 8 230932.BK CHASSIS, WELDMENT 1 106124 CHASSIS, WELDMENT, FaST 1 9 230655 BRACKET, DRIVE MTR TENSION 1 10 140202 SCREW, 3/8-16X1 HEXHD 3 11 140017 WASHER, 3/8 LOCK 3 12 140028 WASHER, 3/8 FLAT 3 13 130713 ◆RESISTOR, 100 WATT .9 OHM 2 14 140519 NUT, #10-24 KEP 8 15 140900 SCREW, #10-24X3/4 TRSPHL 4 16 140024 WASHER, 1/2 LOCK 3 17 09745 SCREW, M12X1.75X25 HEXHD 3 18 103002 ◆CASTER, 4" SWIVEL 2 19 140036 WASHER, 3/8 FLAT 8 20 140333 WASHER, M10 LOCK 8 21 140285 NUT, M10X1.5 HEX 8 22 140859		3	611048	SCREW, 3/8-16X1-1/4 HEXHD	1
6 140333 WASHER, M10 LOCK 7 140276 SCREW, M10X1.5X16 HEXHD 2 8 230932.BK CHASSIS, WELDMENT 1 1016124 CHASSIS, WELDMENT, FaST 1 9 230655 BRACKET, DRIVE MTR TENSION 1 10 140202 SCREW, 3/8-16X1 HEXHD 3 11 140017 WASHER, 3/8 LOCK 3 12 140028 WASHER, 3/8 FLAT 3 13 130713 ●RESISTOR, 100 WATT .9 OHM 2 14 140519 NUT, #10-24 KEP 8 15 140900 SCREW, #10-24X3/4 TRSPHL 4 16 140024 WASHER, 1/2 LOCK 3 17 09745 SCREW, M12X1.75X25 HEXHD 3 18 103002 ●CASTER, 4" SWIVEL 2 19 140036 WASHER, 3/8 FLAT 8 20 140333 WASHER, M10 LOCK 8 21 140285 NUT, M10X1.5 HEX 8 22 140859 SCREW, 1/4-20X1/4 SET 1 23 240071 SPROCKET, DRIVE MOTOR #40-10 1 ∇ 24 613422 ●MOTOR, DRIVE, 24V, 5HP 1 ▲ 25 140632 KEY, 1/4X1/4X1" 1 ▲ 26 613424 ●CAP, CARBON BRUSH 4 ▲ 27 130508 ●CARBON BRUSH 4 ▲ 27 130508 ●CARBON BRUSH 4 A 27 130508 ●CARBON BRUSH 4 A 27 130508 ●CARBON BRUSH 4 A 27 140233 SCREW, 3/8-16X1-1/4 HEXHD 2 30 140233 SCREW, 3/8-16X1-3/4 HEXHD 2 31 140525 NUT, 3/8-16 HEX 1 32 230796 BRACKET, WHEEL SUPPORT 1 33 140525 NUT, 3/8-16 HEX 1		4	1014918	●WHEEL, RUBBER, 3"X1"	4
7 140276 SCREW, M10X1.5X16 HEXHD 2 8 230932.BK CHASSIS, WELDMENT 1 1016124 CHASSIS, WELDMENT, FaST 1 9 230655 BRACKET, DRIVE MTR TENSION 1 10 140202 SCREW, 3/8-16X1 HEXHD 3 11 140017 WASHER, 3/8 LOCK 3 12 140028 WASHER, 3/8 FLAT 3 13 130713 ◆RESISTOR, 100 WATT .9 OHM 2 14 140519 NUT, #10-24 KEP 8 15 140900 SCREW, #10-24X3/4 TRSPHL 4 16 140024 WASHER, 1/2 LOCK 3 17 09745 SCREW, M12X1.75X25 HEXHD 3 18 103002 ◆CASTER, 4" SWIVEL 2 19 140036 WASHER, 3/8 FLAT 8 20 140333 WASHER, M10 LOCK 8 21 140285 NUT, M10X1.5 HEX 8 22 140859 SCREW, 1/4-20X1/4 SET 1 23 240071 SPROCKET, DRIVE MOTOR #40-10 1 V 24		5	140027	WASHER, 5/16 FLAT	2
8 230932.BK CHASSIS, WELDMENT 1 1016124 CHASSIS, WELDMENT, FaST 1 9 230655 BRACKET, DRIVE MTR TENSION 1 10 140202 SCREW, 3/8-16X1 HEXHD 3 11 140017 WASHER, 3/8 LOCK 3 12 140028 WASHER, 3/8 FLAT 3 13 130713 ●RESISTOR, 100 WATT .9 OHM 2 14 140519 NUT, #10-24 KEP 8 15 140900 SCREW, #10-24X3/4 TRSPHL 4 16 140024 WASHER, 1/2 LOCK 3 17 09745 SCREW, M12X1.75X25 HEXHD 3 18 103002 ●CASTER, 4" SWIVEL 2 19 140036 WASHER, 3/8 FLAT 8 20 140333 WASHER, M10 LOCK 8 21 140285 NUT, M10X1.5 HEX 8 22 140859 SCREW, 1/4-20X1/4 SET 1 23 240071 SPROCKET, DRIVE MOTOR #40-10 1 ∇ 24 613422 ●MOTOR, DRIVE, 24V, .5HP 1 Δ 25 140632 KEY, 1/4X1/4X1" 1 Δ 26 613424 ●CAP, CARBON BRUSH 4 Δ 27 130508 ●CARBON BRUSH 4 Δ 27 130508 ●CARBON BRUSH 4 Δ 27 130508 ●CARBON BRUSH 4 Δ 27 130508 SCREW, 3/8-16X1-1/4 HEXHD 2 30 140233 SCREW, 3/8-16X1-3/4 HEXHD 2 31 140525 NUT, 3/8-16 HEX 1 32 230796 BRACKET, WHEEL SUPPORT 1 33 140525 NUT, 3/8-16 HEX 1		6	140333	WASHER, M10 LOCK	2
1016124 CHASSIS, WELDMENT, FaST 1 9 230655 BRACKET, DRIVE MTR TENSION 1 10 140202 SCREW, 3/8-16X1 HEXHD 3 11 140017 WASHER, 3/8 LOCK 3 12 140028 WASHER, 3/8 FLAT 3 13 130713 ●RESISTOR, 100 WATT .9 OHM 2 14 140519 NUT, #10-24 KEP 8 15 140900 SCREW, #10-24X3/4 TRSPHL 4 16 140024 WASHER, 1/2 LOCK 3 17 09745 SCREW, M12X1.75X25 HEXHD 3 18 103002 ●CASTER, 4" SWIVEL 2 19 140036 WASHER, 3/8 FLAT 8 20 140333 WASHER, M10 LOCK 8 21 140285 NUT, M10X1.5 HEX 8 22 140859 SCREW, 1/4-20X1/4 SET 1 23 240071 SPROCKET, DRIVE MOTOR #40-10 1 V 24 613422 ●MOTOR, DRIVE, 24V, 5HP 1 A 25 140632 KEY, 1/4X1/4X1" 1 A 26 613424 ●CAP, CARBON BRUSH 4 A 27 130508 ●CARBON BRUSH 4 A 27 130508 ●CARBON BRUSH 4 A 28 140525 NUT, 3/8-16 HEX 5 29 611048 SCREW, 3/8-16X1-3/4 HEXHD 2 30 140233 SCREW, 3/8-16X1-3/4 HEXHD 2 31 140525 NUT, 3/8-16 HEX 1 32 230796 BRACKET, WHEEL SUPPORT 1 33 140525 NUT, 3/8-16 HEX 1		7	140276	SCREW, M10X1.5X16 HEXHD	2
9 230655 BRACKET, DRIVE MTR TENSION 1 10 140202 SCREW, 3/8-16X1 HEXHD 3 11 140017 WASHER, 3/8 LOCK 3 12 140028 WASHER, 3/8 FLAT 3 13 130713 ●RESISTOR, 100 WATT .9 OHM 2 14 140519 NUT, #10-24 KEP 8 15 140900 SCREW, #10-24X3/4 TRSPHL 4 16 140024 WASHER, 1/2 LOCK 3 17 09745 SCREW, M12X1.75X25 HEXHD 3 18 103002 ●CASTER, 4" SWIVEL 2 19 140036 WASHER, 3/8 FLAT 8 20 140333 WASHER, M10 LOCK 8 21 140285 NUT, M10X1.5 HEX 8 22 140859 SCREW, 1/4-20X1/4 SET 1 23 240071 SPROCKET, DRIVE MOTOR #40-10 1 ∇ 24 613422 ●MOTOR, DRIVE, 24V, .5HP 1 Δ 25 140632 KEY, 1/4X1/4X1" 1 Δ 26 613424 ●CAP, CARBON BRUSH 4 Δ 27 130508 ●CARBON BRUSH 4 Δ 27 130508 ●CARBON BRUSH 4 Δ 28 140525 NUT, 3/8-16 HEX 5 29 611048 SCREW, 3/8-16X1-3/4 HEXHD 2 30 140233 SCREW, 3/8-16X1-3/4 HEXHD 2 31 140525 NUT, 3/8-16 HEX 1 32 230796 BRACKET, WHEEL SUPPORT 1 33 140525 NUT, 3/8-16 HEX 1		8	230932.BK	CHASSIS, WELDMENT	1
10 140202 SCREW, 3/8-16X1 HEXHD 3 11 140017 WASHER, 3/8 LOCK 3 12 140028 WASHER, 3/8 FLAT 3 13 130713 ●RESISTOR, 100 WATT .9 OHM 2 14 140519 NUT, #10-24 KEP 8 15 140900 SCREW, #10-24X3/4 TRSPHL 4 16 140024 WASHER, 1/2 LOCK 3 17 09745 SCREW, M12X1.75X25 HEXHD 3 18 103002 ●CASTER, 4" SWIVEL 2 19 140036 WASHER, 3/8 FLAT 8 20 140333 WASHER, M10 LOCK 8 21 140285 NUT, M10X1.5 HEX 8 22 140859 SCREW, 1/4-20X1/4 SET 1 23 240071 SPROCKET, DRIVE MOTOR #40-10 1 ∇ 24 613422 ●MOTOR, DRIVE, 24V, .5HP 1 Δ 25 140632 KEY, 1/4X1/4X1" 1 Δ 26 613424 ●CAP, CARBON BRUSH 4 Δ 27 130508 ●CARBON BRUSH 4 Δ 27 130508 ●CARBON BRUSH 4 Δ 28 140525 NUT, 3/8-16 HEX 5 29 611048 SCREW, 3/8-16X1-1/4 HEXHD 2 30 140233 SCREW, 3/8-16X1-3/4 HEXHD 2 31 140525 NUT, 3/8-16 HEX 1 32 230796 BRACKET, WHEEL SUPPORT 1 33 140525 NUT, 3/8-16 HEX 1			1016124	CHASSIS, WELDMENT, FaST	1
11 140017 WASHER, 3/8 LOCK 12 140028 WASHER, 3/8 FLAT 13 130713 ●RESISTOR, 100 WATT .9 OHM 2 14 140519 NUT, #10-24 KEP 15 140900 SCREW, #10-24X3/4 TRSPHL 16 140024 WASHER, 1/2 LOCK 3 17 09745 SCREW, M12X1.75X25 HEXHD 18 103002 ●CASTER, 4" SWIVEL 2 19 140036 WASHER, 3/8 FLAT 20 140333 WASHER, M10 LOCK 21 140285 NUT, M10X1.5 HEX 22 140859 SCREW, 1/4-20X1/4 SET 1 23 240071 SPROCKET, DRIVE MOTOR #40-10 1 ▼ 24 613422 ●MOTOR, DRIVE, 24V, .5HP 1 ★ 25 140632 KEY, 1/4X1/4X1" ★ 26 613424 ●CAP, CARBON BRUSH ★ 27 130508 ●CARBON BRUSH ★ 27 130508 ●CARBON BRUSH ★ 28 140525 NUT, 3/8-16 HEX 5 30 140233 SCREW, 3/8-16X1-1/4 HEXHD 2 30 140233 SCREW, 3/8-16X1-3/4 HEXHD 2 31 140525 NUT, 3/8-16 HEX 1 32 230796 BRACKET, WHEEL SUPPORT 1 1 33 140525 NUT, 3/8-16 HEX 1 1 10 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1		9	230655	BRACKET, DRIVE MTR TENSION	1
12 140028 WASHER, 3/8 FLAT 3 13 130713 ●RESISTOR, 100 WATT 9 OHM 2 14 140519 NUT, #10-24 KEP 8 15 140900 SCREW, #10-24X3/4 TRSPHL 4 16 140024 WASHER, 1/2 LOCK 3 17 09745 SCREW, M12X1.75X25 HEXHD 3 18 103002 ●CASTER, 4" SWIVEL 2 19 140036 WASHER, 3/8 FLAT 8 20 140333 WASHER, M10 LOCK 8 21 140285 NUT, M10X1.5 HEX 8 22 140859 SCREW, 1/4-20X1/4 SET 1 23 240071 SPROCKET, DRIVE MOTOR #40-10 1 ∇ 24 613422 ●MOTOR, DRIVE, 24V, .5HP 1 Δ 26 613424 ●CAP, CARBON BRUSH 4 Δ 27 130508 ●CARBON BRUSH 4 Δ 27 130508 ●CARBON BRUSH 4 Δ 28 140525 NUT, 3/8-16 HEX 5 29 611048 SCREW, 3/8-16X1-1/4 HEXHD 2 30 140233 SCREW, 3/8-16X1-3/4 HEXHD 2 31 140525 NUT, 3/8-16 HEX 1 32 230796 BRACKET, WHEEL SUPPORT 1 33 140525 NUT, 3/8-16 HEX 1		10	140202	SCREW, 3/8-16X1 HEXHD	3
13 130713 ●RESISTOR, 100 WATT .9 OHM 2 14 140519 NUT, #10-24 KEP 8 15 140900 SCREW, #10-24X3/4 TRSPHL 4 16 140024 WASHER, 1/2 LOCK 3 17 09745 SCREW, M12X1.75X25 HEXHD 3 18 103002 ●CASTER, 4" SWIVEL 2 19 140036 WASHER, 3/8 FLAT 8 20 140333 WASHER, M10 LOCK 8 21 140285 NUT, M10X1.5 HEX 8 22 140859 SCREW, 1/4-20X1/4 SET 1 23 240071 SPROCKET, DRIVE MOTOR #40-10 1 V 24 613422 ●MOTOR, DRIVE, 24V, .5HP 1 ▲ 25 140632 KEY, 1/4X1/4X1" 1 ▲ 26 613424 ●CAP, CARBON BRUSH 4 27 130508 ●CARBON BRUSH 4 28 140525 NUT, 3/8-16 HEX 5 29 611048 SCREW, 3/8-16X1-1/4 HEXHD 2 30 140233 SCREW, 3/8-16X1-3/4 HEXHD 2 31 140525 NUT, 3/8-16 HEX 1 32 230796 BRACKET, WHEEL SUPPORT 1 33 140525 NUT, 3/8-16 HEX 1		11	140017	WASHER, 3/8 LOCK	3
14 140519 NUT, #10-24 KEP 8 15 140900 SCREW, #10-24X3/4 TRSPHL 4 16 140024 WASHER, 1/2 LOCK 3 17 09745 SCREW, M12X1.75X25 HEXHD 3 18 103002 •CASTER, 4" SWIVEL 2 19 140036 WASHER, 3/8 FLAT 8 20 140333 WASHER, M10 LOCK 8 21 140285 NUT, M10X1.5 HEX 8 22 140859 SCREW, 1/4-20X1/4 SET 1 23 240071 SPROCKET, DRIVE MOTOR #40-10 1 ∇ 24 613422 •MOTOR, DRIVE, 24V, .5HP 1 ▲ 25 140632 KEY, 1/4X1/4X1" 1 ▲ 26 613424 •CAP, CARBON BRUSH 4 ▲ 27 130508 •CARBON BRUSH 4 28 140525 NUT, 3/8-16 HEX 5 29 611048 SCREW, 3/8-16X1-1/4 HEXHD 2 30 140233 SCREW, 3/8-16X1-3/4 HEXHD 2 31 140525 NUT, 3/8-16 HEX 1		12	140028	WASHER, 3/8 FLAT	3
15 140900 SCREW, #10-24X3/4 TRSPHL 4 16 140024 WASHER, 1/2 LOCK 3 17 09745 SCREW, M12X1.75X25 HEXHD 3 18 103002 ●CASTER, 4" SWIVEL 2 19 140036 WASHER, 3/8 FLAT 8 20 140333 WASHER, M10 LOCK 8 21 140285 NUT, M10X1.5 HEX 8 22 140859 SCREW, 1/4-20X1/4 SET 1 23 240071 SPROCKET, DRIVE MOTOR #40-10 1 ∇ 24 613422 ●MOTOR, DRIVE, 24V, .5HP 1 Δ 25 140632 KEY, 1/4X1/4X1" 1 Δ 26 613424 ●CAP, CARBON BRUSH 4 Δ 27 130508 ●CARBON BRUSH 4 Δ 27 130508 ●CARBON BRUSH 4 28 140525 NUT, 3/8-16 HEX 5 29 611048 SCREW, 3/8-16X1-1/4 HEXHD 2 30 140233 SCREW, 3/8-16X1-3/4 HEXHD 2 31 140525 NUT, 3/8-16 HEX 1 32 230796 BRACKET, WHEEL SUPPORT 1 33 140525 NUT, 3/8-16 HEX 1		13	130713	●RESISTOR, 100 WATT .9 OHM	2
16 140024 WASHER, 1/2 LOCK 3 17 09745 SCREW, M12X1.75X25 HEXHD 3 18 103002 ●CASTER, 4" SWIVEL 2 19 140036 WASHER, 3/8 FLAT 8 20 140333 WASHER, M10 LOCK 8 21 140285 NUT, M10X1.5 HEX 8 22 140859 SCREW, 1/4-20X1/4 SET 1 23 240071 SPROCKET, DRIVE MOTOR #40-10 1 V 24 613422 ●MOTOR, DRIVE, 24V, .5HP 1 ▲ 25 140632 KEY, 1/4X1/4X1" 1 ▲ 26 613424 ●CAP, CARBON BRUSH 4 ▲ 27 130508 ●CARBON BRUSH 4 28 140525 NUT, 3/8-16 HEX 5 29 611048 SCREW, 3/8-16X1-1/4 HEXHD 2 30 140233 SCREW, 3/8-16X1-3/4 HEXHD 2 31 140525 NUT, 3/8-16 HEX 1 32 230796 BRACKET, WHEEL SUPPORT 1 33 140525 NUT, 3/8-16 HEX 1 </td <td></td> <td>14</td> <td>140519</td> <td>NUT, #10-24 KEP</td> <td>8</td>		14	140519	NUT, #10-24 KEP	8
17 09745 SCREW, M12X1.75X25 HEXHD 3 18 103002 ◆CASTER, 4" SWIVEL 2 19 140036 WASHER, 3/8 FLAT 8 20 140333 WASHER, M10 LOCK 8 21 140285 NUT, M10X1.5 HEX 8 22 140859 SCREW, 1/4-20X1/4 SET 1 23 240071 SPROCKET, DRIVE MOTOR #40-10 1 ∇ 24 613422 ◆MOTOR, DRIVE, 24V, .5HP 1 Δ 25 140632 KEY, 1/4X1/4X1" 1 Δ 26 613424 ◆CAP, CARBON BRUSH 4 Δ 27 130508 ◆CARBON BRUSH 4 Δ 27 130508 ◆CARBON BRUSH 4 28 140525 NUT, 3/8-16 HEX 5 29 611048 SCREW, 3/8-16X1-1/4 HEXHD 2 30 140233 SCREW, 3/8-16X1-3/4 HEXHD 2 31 140525 NUT, 3/8-16 HEX 1 32 230796 BRACKET, WHEEL SUPPORT 1 33 140525 NUT, 3/8-16 HEX 1		15	140900	SCREW, #10-24X3/4 TRSPHL	4
18 103002		16	140024	WASHER, 1/2 LOCK	3
19 140036 WASHER, 3/8 FLAT 8 20 140333 WASHER, M10 LOCK 8 21 140285 NUT, M10X1.5 HEX 8 22 140859 SCREW, 1/4-20X1/4 SET 1 23 240071 SPROCKET, DRIVE MOTOR #40-10 1 V 24 613422 ●MOTOR, DRIVE, 24V, .5HP 1 ▲ 25 140632 KEY, 1/4X1/4X1" 1 ▲ 26 613424 ●CAP, CARBON BRUSH 4 27 130508 ●CARBON BRUSH 4 28 140525 NUT, 3/8-16 HEX 5 29 611048 SCREW, 3/8-16X1-1/4 HEXHD 2 30 140233 SCREW, 3/8-16X1-3/4 HEXHD 2 31 140525 NUT, 3/8-16 HEX 1 32 230796 BRACKET, WHEEL SUPPORT 1 33 140525 NUT, 3/8-16 HEX 1		17	09745	SCREW, M12X1.75X25 HEXHD	3
20 140333 WASHER, M10 LOCK 8 21 140285 NUT, M10X1.5 HEX 8 22 140859 SCREW, 1/4-20X1/4 SET 1 23 240071 SPROCKET, DRIVE MOTOR #40-10 1 ▼ 24 613422 ●MOTOR, DRIVE, 24V, .5HP 1 ▲ 25 140632 KEY, 1/4X1/4X1" 1 ▲ 26 613424 ●CAP, CARBON BRUSH 4 ▲ 27 130508 ●CARBON BRUSH 4 28 140525 NUT, 3/8-16 HEX 5 29 611048 SCREW, 3/8-16X1-1/4 HEXHD 2 30 140233 SCREW, 3/8-16X1-3/4 HEXHD 2 31 140525 NUT, 3/8-16 HEX 1 32 230796 BRACKET, WHEEL SUPPORT 1 33 140525 NUT, 3/8-16 HEX 1		18	103002	●CASTER, 4" SWIVEL	2
21 140285 NUT, M10X1.5 HEX 8 22 140859 SCREW, 1/4-20X1/4 SET 1 23 240071 SPROCKET, DRIVE MOTOR #40-10 1 ∇ 24 613422 ●MOTOR, DRIVE, 24V, .5HP 1 ▲ 25 140632 KEY, 1/4X1/4X1" 1 ▲ 26 613424 ●CAP, CARBON BRUSH 4 27 130508 ●CARBON BRUSH 4 28 140525 NUT, 3/8-16 HEX 5 29 611048 SCREW, 3/8-16X1-1/4 HEXHD 2 30 140233 SCREW, 3/8-16X1-3/4 HEXHD 2 31 140525 NUT, 3/8-16 HEX 1 32 230796 BRACKET, WHEEL SUPPORT 1 33 140525 NUT, 3/8-16 HEX 1		19	140036	WASHER, 3/8 FLAT	8
22 140859 SCREW, 1/4-20X1/4 SET 1 23 240071 SPROCKET, DRIVE MOTOR #40-10 1 ∇ 24 613422 ●MOTOR, DRIVE, 24V, .5HP 1 Δ 25 140632 KEY, 1/4X1/4X1" 1 Δ 26 613424 ●CAP, CARBON BRUSH 4 27 130508 ●CARBON BRUSH 4 28 140525 NUT, 3/8-16 HEX 5 29 611048 SCREW, 3/8-16X1-1/4 HEXHD 2 30 140233 SCREW, 3/8-16X1-3/4 HEXHD 2 31 140525 NUT, 3/8-16 HEX 1 32 230796 BRACKET, WHEEL SUPPORT 1 33 140525 NUT, 3/8-16 HEX 1		20	140333	WASHER, M10 LOCK	8
23 240071 SPROCKET, DRIVE MOTOR #40-10 1 ∇ 24 613422		21	140285	NUT, M10X1.5 HEX	8
∇ 24 613422 ●MOTOR, DRIVE, 24V, .5HP 1 ▲ 25 140632 KEY, 1/4X1/4X1" 1 ▲ 26 613424 ●CAP, CARBON BRUSH 4 ▲ 27 130508 ●CARBON BRUSH 4 28 140525 NUT, 3/8-16 HEX 5 29 611048 SCREW, 3/8-16X1-1/4 HEXHD 2 30 140233 SCREW, 3/8-16X1-3/4 HEXHD 2 31 140525 NUT, 3/8-16 HEX 1 32 230796 BRACKET, WHEEL SUPPORT 1 33 140525 NUT, 3/8-16 HEX 1		22	140859	SCREW, 1/4-20X1/4 SET	1
▲ 25 140632 KEY, 1/4X1/4X1" 1 ▲ 26 613424 ◆CAP, CARBON BRUSH 4 ▲ 27 130508 ◆CARBON BRUSH 4 28 140525 NUT, 3/8-16 HEX 5 29 611048 SCREW, 3/8-16X1-1/4 HEXHD 2 30 140233 SCREW, 3/8-16X1-3/4 HEXHD 2 31 140525 NUT, 3/8-16 HEX 1 32 230796 BRACKET, WHEEL SUPPORT 1 33 140525 NUT, 3/8-16 HEX 1		23	240071	SPROCKET, DRIVE MOTOR #40-10	1
▲ 26 613424 ●CAP, CARBON BRUSH 4 ▲ 27 130508 ●CARBON BRUSH 4 28 140525 NUT, 3/8-16 HEX 5 29 611048 SCREW, 3/8-16X1-1/4 HEXHD 2 30 140233 SCREW, 3/8-16X1-3/4 HEXHD 2 31 140525 NUT, 3/8-16 HEX 1 32 230796 BRACKET, WHEEL SUPPORT 1 33 140525 NUT, 3/8-16 HEX 1	∇	24	613422	●MOTOR, DRIVE, 24V, .5HP	1
▲ 27 130508 ◆CARBON BRUSH 4 28 140525 NUT, 3/8-16 HEX 5 29 611048 SCREW, 3/8-16X1-1/4 HEXHD 2 30 140233 SCREW, 3/8-16X1-3/4 HEXHD 2 31 140525 NUT, 3/8-16 HEX 1 32 230796 BRACKET, WHEEL SUPPORT 1 33 140525 NUT, 3/8-16 HEX 1	A	25	140632	KEY, 1/4X1/4X1"	1
28 140525 NUT, 3/8-16 HEX 5 29 611048 SCREW, 3/8-16X1-1/4 HEXHD 2 30 140233 SCREW, 3/8-16X1-3/4 HEXHD 2 31 140525 NUT, 3/8-16 HEX 1 32 230796 BRACKET, WHEEL SUPPORT 1 33 140525 NUT, 3/8-16 HEX 1	A	26	613424	●CAP, CARBON BRUSH	4
29 611048 SCREW, 3/8-16X1-1/4 HEXHD 2 30 140233 SCREW, 3/8-16X1-3/4 HEXHD 2 31 140525 NUT, 3/8-16 HEX 1 32 230796 BRACKET, WHEEL SUPPORT 1 33 140525 NUT, 3/8-16 HEX 1	A	27	130508	●CARBON BRUSH	4
30 140233 SCREW, 3/8-16X1-3/4 HEXHD 2 31 140525 NUT, 3/8-16 HEX 1 32 230796 BRACKET, WHEEL SUPPORT 1 33 140525 NUT, 3/8-16 HEX 1		28	140525	NUT, 3/8-16 HEX	5
31 140525 NUT, 3/8-16 HEX 1 32 230796 BRACKET, WHEEL SUPPORT 1 33 140525 NUT, 3/8-16 HEX 1		29	611048	SCREW, 3/8-16X1-1/4 HEXHD	2
32 230796 BRACKET, WHEEL SUPPORT 1 33 140525 NUT, 3/8-16 HEX 1		30	140233	SCREW, 3/8-16X1-3/4 HEXHD	2
33 140525 NUT, 3/8-16 HEX 1		31	140525	NUT, 3/8-16 HEX	1
		32	230796	BRACKET, WHEEL SUPPORT	1
24 102007 WHEEL 4" V 1"		33	140525	NUT, 3/8-16 HEX	1
34 103007 WHEEL, 4 X I		34	103007	WHEEL, 4" X 1"	1

∇ ASSEMBLY / CONJUNTO

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REF	PART #	DESCRIPTION	QTY.
35	140510	NUT, 1/4-20 HEXJAM	6
36	230941	BRACKET, FRONT LIFT GUIDE	1
37	140015	WASHER, 5/16 LOCK	2
38	15675	SCREW, M8X1.25X16 HEXHD	2
39	606426	●KIT, CHAIN & LINKS	1
40	02991	SCREW, 5/16-18X3/4 HEXHD	6
41	140015	WASHER, 5/16 LOCK	6
42	240070	SPROCKET, #40-39 DRIVE WHEEL	1
43	140124	BEARING	2
44	611048	SCREW, 3/8-16X1-1/4 HEXHD	2
45	103058	WHEEL, 8" DRIVE	1
46	230205	SHAFT, DRIVE WHEEL	1
47	611980	CLAMP, AXLE	2
48	140017	WASHER, 3/8 LOCK	4
49	140509	NUT, 1/2-13 HEXJAM	1
50	604646	SLEEVE, .625D, .501B, .66L	1
51	140235	SCREW, 1/2-13X2 HEXHD	1
52	140208	SCREW, 1/4-20X1 HEXHD	5
53	140000	WASHER, 0.28B, 0.62D, .04, FLAT	8
54	230554	BOARD, CONNECTION	1
55	140524	NUT, 1/4-20 KEP	2
56	611396	PEDAL, LIFT, SCRUBHEAD	1
57	15678	SCREW, M6X1.0X16 HEXHD	2
58	140016	WASHER, 1/4 LOCK	2
59	140003	WASHER, 1/4X1 FENDER	2
60	230940	PIN, LIFT ARM PIVOT	1
61	140045	WASHER, 1/2 FLAT	2
62	140139	SLEEVE, .625D, .500B, .25L	1
63	140024	WASHER, 1/2 LOCK	1
64	140237	SCREW, 1/2-13X1 HEXHD	1
65	102560	PAD, NON-SLIP 1.62 SQ.	1
66	140016	WASHER, 1/4 LOCK	6
67	140231	SCREW, 3/8-16X1-1/2 HEXHD	1
68	140028	WASHER, 3/8 FLAT	2
69	1017046	BRACKET, MTG, PUMP (FaST MACHINE ONLY)	1
70	140000	WASHER, 0.28B, 0.62D, .04, FLAT (FaST MACHINE ONLY)	3
71	140524	NUT, 1/4-20 KEP (FaST MACHINE ONLY)	3
72	140824	SCREW, .25-20X0.62 TRSPHL (FaST MACHINE ONLY)	3

BRUSH DRIVE AND SOLUTION HOSE GROUP ACCIONAMIENTO DEL CEPILLO Y GRUPO DE MANGUERA DE SOLUCIÓN



BRUSH DRIVE AND SOLUTION HOSE GROUP ACCIONAMIENTO DEL CEPILLO Y GRUPO DE MANGUERA DE SOLUCIÓN

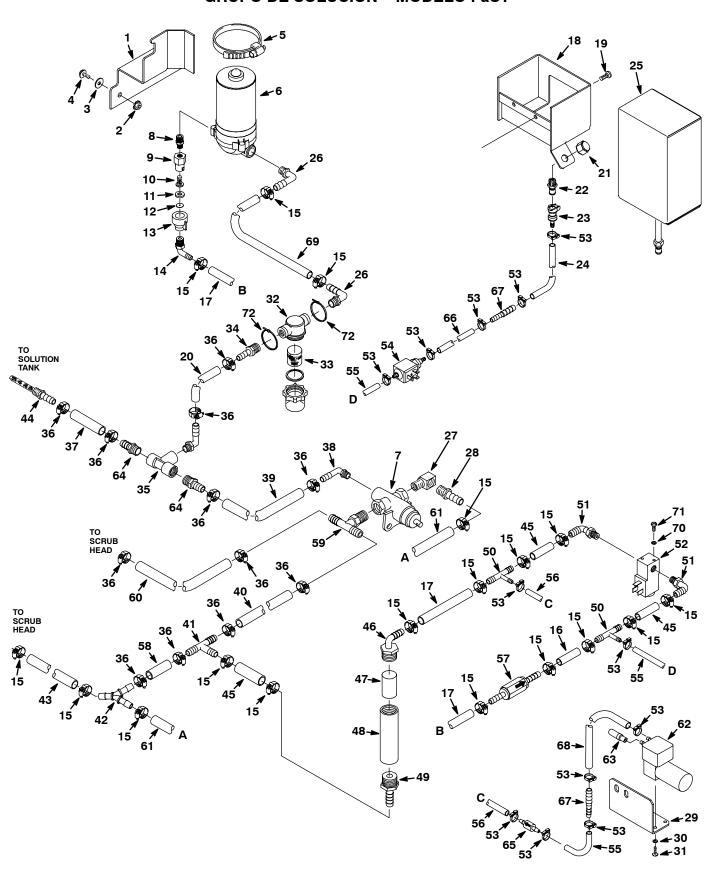
REF	PART #	DESCRIPTION	QTY.
1	100764	COVER, BRUSH MOTOR	2
∇ 2	130491	●MOTOR, W/GEARBOX 3/4HP IMP	2
A	190970	●CARBON BRUSH	4
▲ 3	140632	KEY, 1/4X1/4X1"	1
4	281001014	TERMINAL, RING	4
5	140028	WASHER, 3/8 FLAT	4
6	606243	TAPE, DOUBLE STICK	1
7	230691	BRACKET, BRUSH MOTOR MOUNT	1
8	140618	PIN, ROLL 1/4 X 1-1/2	4
9	130041	WIRE TIE	1
10	606248	HOSE, 3/8ID X 17"	1
11	54333	CLAMP, HOSE 5/16-7/8	4
12	140017	WASHER, 3/8 LOCK	8
13	140202	SCREW, 3/8-16X1 HEXHD	8
14	606335	PLATE, DRIVE	2
15	606915	SCREW, #10-16X3/8 HIGH-LOW	4
16	613440	HOSE, 3/8ID X 8"	1
17	230651	CLAMP, BRUSH PLATE	2

REF	PART #	DESCRIPTION	QTY.
18	140417	CLIP, SPRING	2
19	25732	WASHER, 1.25 X .359 X .093	4
20	140015	WASHER, 5/16 LOCK	2
21	140219	SCREW, 5/16-18X1 HEXHD	2
∇	501216	ASSEMBLY, VALVE	1
▲ 22	140616	PIN, ROLL 3/32DIAX5/8	1
▲ 23	230657	ARM, VALVE	1
▲ 24	150516	FITTING, STR, BM06/PF04	1
▲ 25	27048	FITTING, E90, PM04/PF04	1
26	180640	FILTER, SCREEN, 012 MESH	1
27	54333	CLAMP, HOSE 5/16-7/8	2
28	605098	TUBING, 5/8ID X 1.13FT.	1
▲ 29	150409	FITTING, 1/4MX5/8H ELBOW 90	1
▲ 30	210259	VALVE, BALL, 3-WAY, 05PF	1
31	140552	NUT, #10-24 NYLCK	2
▲ 32	605394	FITTING, E45, BM06/PM04	1
33	140895	SCREW, #10-24X3/4 RNDPHL	2

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SOLUTION GROUP - FaST MODEL GRUPO DE SOLUCIÓN - MODELO FaST



SOLUTION GROUP - FaST MODEL GRUPO DE SOLUCIÓN - MODELO FaST

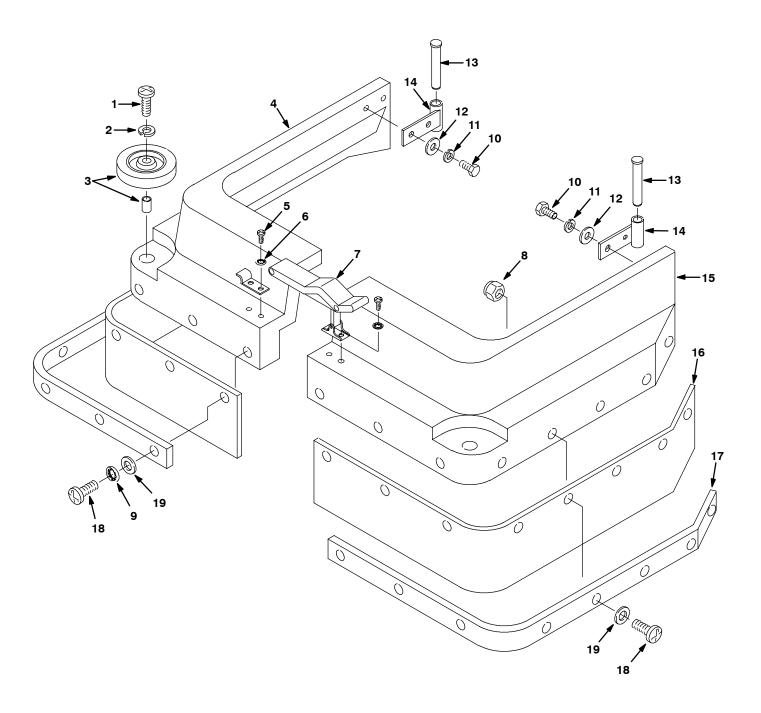
R	REF	PART #	DESCRIPTION	QTY.
	1	1002603	BRACKET, PUMP, SOLUTION	1
	2	140524	NUT, 1/4-20 KEP	2
	3	140000	WASHER, FLAT, 0.28B 0.62D	2
	4	140824	SCREW, .25-20X0.62 TRS PHL	2
	5	43555	CLAMP, HOSE 1.62-3.50D	1
∇	6	1002345	PUMP, SOLUTION ELE 24VDC	1
A		78951	TERMINAL, FEMALE	2
A		391433	PUMP HEAD	1
A		78950	CONNECTOR	1
A		78952	LOCK	1
A		10917	SEAL	2
	7	210259	VALVE, BALL, 3-WAY, 05PF	1
	8	1005219	FITTING, PLSTC, STR PM04/PM06	1
∇		1005522	ASSY, FITTING, CAP, 0.040B, PF04	1
A	9	1005507	FITTING, PLSTC, BODY SPRAY	1
A	10	1006447	•STRAINER, ORIFICE	1
A	11	1005508	WASHER, .034B 0.75D 0.12	1
A	12	1005510	PLATE, ORIFICE, 0.040ID	1
A	13	1005506	FITTING, PLSTC CAP SPRAY	1
	14	57248	FITTING, PLSTC E90 BM06/PM04	1
	15	54333	CLAMP, HOSE, 0.31-0.88D	18
	16	613724	HOSE, PVC, BRD, 0.38IDX5	1
	17	606249	HOSE, PVC, BRD, .38IDX7	2
	18	1016745	BRACKET, BOX, DETGT.	1
	19	605975	SCREW, TRS, #10-24X0.50 SEM	2
	20	613724	HOSE, PVC, BRD, 0.38IDX9.5	1
	21	1005435	FITTING, PLSTC, CAP, PF04	1
	22	1006206	COUPLING, MALE .25NPT	1
	23	1006204	COUPLING, FEM W/VALVE .25 BRB	1
	24	613842	HOSE, PVC, 0.25IDX12.5	1
	25	1005232	CONCENTRATE, 2-PACK	-
		1005249	CONCENTRATE, 6-PACK	-
	26	1005630	FITTING, PLSTC E90 BM06/PM06	3
	27	27048	FITTING, BRS E90 PM04/PF04	1
	28	150516	FITTING, BRS STR BM06/PM04	1
	29	1017046	BRACKET, MTG, PUMP	1
	30	19066	WASHER, #10 FLAT	2
	31	577031000	SCREW, #8X1/2 PANPHL	2
∇	32	1005302	FILTER, INLINE, PF06/PF06 80 MESH	1
A	33	1005304	●SCREEN, FILTER, 80 MESH	1
	34	61118	FITTING, PLSTC STR, BM06/PM06	1

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F	REF	PART #	DESCRIPTION	QTY.
	35	1017319	FITTING, PLSTC TEE, PF06/PF06/PF06	1
	36	54333	CLAMP, HOSE, 0.31-0.88D	11
	37	605100	HOSE, 5/8IDX2	1
	38	150409	FITTING, PLSTC, E90 PM04/BM10	1
	39	605098	HOSE, 5/8IDX8.5	1
	40	613724	HOSE, PVC, BRD, 0.38IDX8.5	1
	41	160310	FITTING, TEE BM06/BM06/BM06	1
	42	1017255	FITTING, PLSTC Y BM06/BM06/BM06	1
	43	613717	HOSE, PVC, BRD, 3/8IDX2	1
	44	180640	FILTER, SCREEN, 012 MESH	1
	45	613717	HOSE, PVC BRD, 3/8IDX2	3
	46	79484	FITTING, PLSTC E90 BM06/PM12	1
	47	1002789	FILTER, FOAM	3
	48	1005086	TUBE, PLASTIC 25MM ID	1
	49	73467	FITTING, STR BM06/PM12 NYLON	1
	50	61456	FITTING, TEE BM06/BM03/BM06	2
	51	1017938	FITTING, BRS E90 BM06/PM02	2
	52	1002530	VALVE, SHUTOFF ELECT 24VDC	1
	53	1014575	CLAMP, HOSE, PLSTC	12
	54	1005413	PUMP, CONCENTRATE 24VDC	1
	55	613720	HOSE, PVC, 0.19IDX2	2
	56	613720	HOSE, PVC, 0.19IDX2	1
	57	210044	VALVE, CHECK BM06/BM06	1
	58	606249	HOSE, 3/8IDX5/8ODX8 MAYON	1
	59	1017340	FITTING, PLSTC TEE, BM06/PM04/BM06	1
	60	606667	HOSE, 3/8IDX5/8ODX10	1
	61	613722	HOSE, PVC BRD, 0.38IDX14	1
∇	62	1002344	PUMP, AIR	1
A		391449	KIT, DIAPHRAGM	1
A		78950	CONNECTOR	1
A		78952	LOCK	1
A		25837	TERMINAL, FEMALE	2
A		25830	SEAL	2
	63	1005255	FILTER, ASM AIR	1
	64	1013900	FITTING, PLSTC STR, BM10/PM06	2
	65	1005327	FITTING, CVALVE BM03/BM03	1
	66	1006420	HOSE, PVC, 0.19IDX34	1
	67	1005324	FITTING, PLSTC STR BM03/BM04	2
	68	613727	HOSE, PVC, 0.25IDX2	1
	69	606249	HOSE, 3/8IDX3	1
	70	19066	WASHER, #10 FLAT	2
	71	606915	SCREW, #10-16X3/8 HIGH-LOW	2
	72	130041	TIE, CABLE	2

SKIRT GROUP CONJUNTO JUEGO



SKIRT GROUP CONJUNTO JUEGO

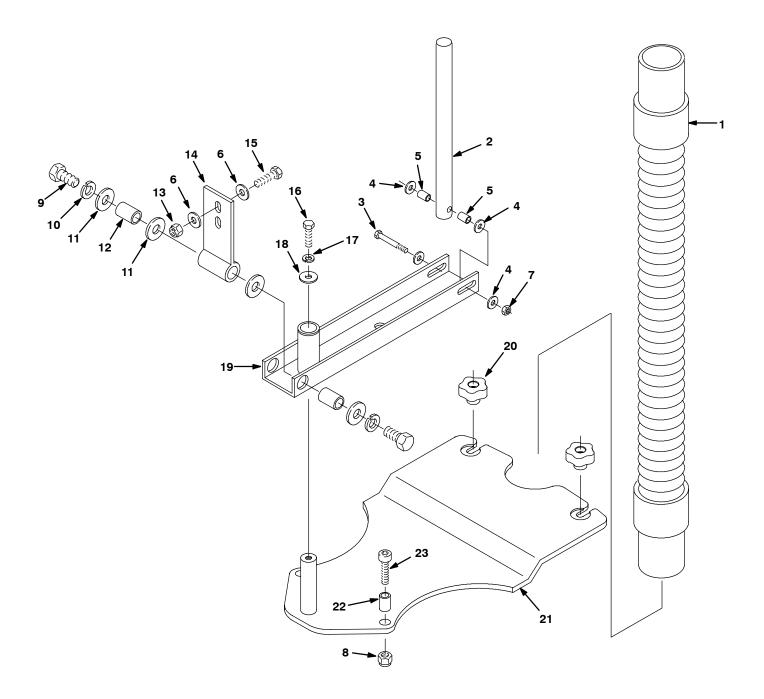
RE	ΞF	PART #	DESCRIPTION	QTY.
∇		611016	ASSEMBLY, SKIRT, RIGHT SIDE GREEN (2701)	1
∇		601334	ASSEMBLY, SKIRT, RIGHT SIDE DK. GRAY (2701)	1
V		611018	ASSEMBLY, SKIRT, RIGHT SIDE GREEN (3301)	1
V		601336	ASSEMBLY, SKIRT, RIGHT SIDE DK. GRAY (3301)	1
V		611017	ASSEMBLY, SKIRT, LEFT SIDE GREEN (2701)	1
∇		601333	ASSEMBLY, SKIRT, LEFT SIDE DK. GRAY (2701)	1
∇		611019	ASSEMBLY, SKIRT, LEFT SIDE GREEN (3301)	1
∇		601335	ASSEMBLY, SKIRT, LEFT SIDE DK. GRAY (3301)	1
	1	603154	SCREW, M8X1.25X40 PANPHL	1
	2	140015	WASHER, 5/16 LOCK	1
	3	1014918	●WHEEL, RUBBER, 3"X1"	1
•	4	608699	SKIRT, RIGHT SIDE GREEN (2701)	1
		101072	SKIRT, RIGHT SIDE DK. GRAY (2701)	1
		608288	SKIRT, RIGHT SIDE GREEN (3301)	1
		101074	SKIRT, RIGHT SIDE DK. GRAY (3301)	1
	5	200070340	SCREW, M4X0.7X8 PANPHL	2
	6	02938	WASHER, #8 LOCK	2
A	7	140932	LATCH, HOOD W/KEEPER	1

REF	PART #	DESCRIPTION	QTY.
▲▲ 8	09739	NUT, M5X0.8 NYLOCK	3-6
▲▲ 9	07514	WASHER, #10 LOCK	6-8
▲▲10	578237000	SCREW M8X1.25X18 HXHDCP	2
▲▲ 11	140015	WASHER, 5/16 LOCK	2
▲▲ 12	140027	WASHER, 5/16 FLAT	2
13	230943	PIN, SKIRT	2
▲▲ 14	230942	BRACKET, MOUNTING, SKIRT	1
▲ 15	608697	SKIRT, LEFT SIDE GREEN (2701)	1
	101071	SKIRT, LEFT SIDE DK. GRAY (2701)	1
	608286	SKIRT, LEFT SIDE GREEN (3301)	1
	101073	SKIRT, LEFT SIDE DK. GRAY (3301)	1
▲▲16	240277	SPLASH GUARD (2701)	1
	240276	SPLASH GUARD (3301)	1
▲▲17	230935.BK	STRAP, SPLASH GUARD (2701)	1
	230934.BK	STRAP, SPLASH GUARD (3301)	1
▲▲ 18	578144000	SCREW, M5X0.8X16 PANPHL	11-12
▲▲ 19	140011	WASHER, 3/16 FLAT	11-12

∇ ASSEMBLY / CONJUNTO

- ▲ INCLUDED IN ASSEMBLY / INCLUIDO EN EL CONJUNTO
- RECOMMENDED STOCK ITEMS / ARTICULOS RECOMENDADOS PARA MANTENER EN EXISTENCIA

SQUEEGEE CONTROL GROUP GROUPO DE CONTROL DE LA ESCOBILLA DE GOMA



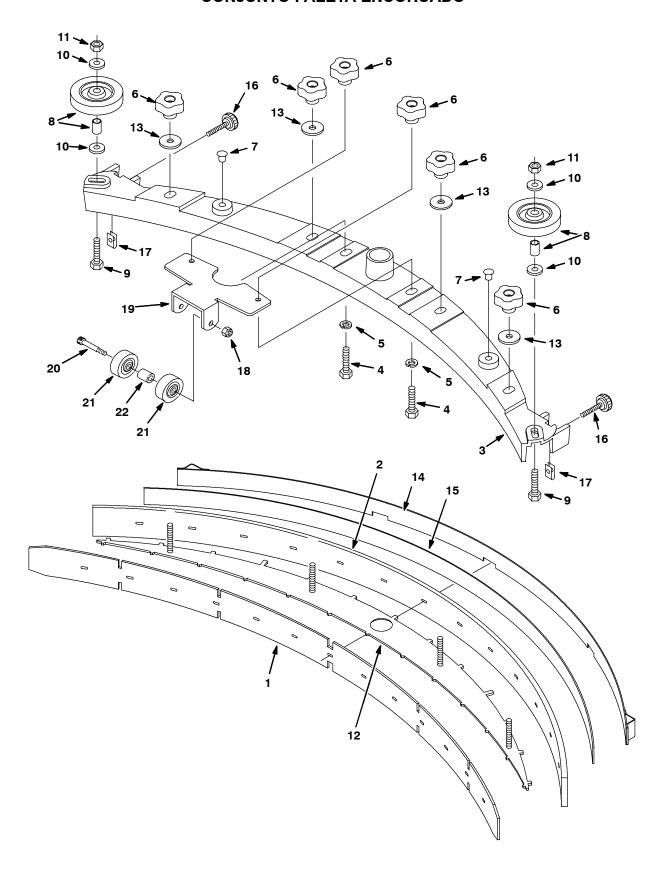
SQUEEGEE CONTROL GROUP GROUPO DE CONTROL DE LA ESCOBILLA DE GOMA

REF	PART #	DESCRIPTION	QTY.
1	611847	●HOSE, VAC 1.5 X 30" W/ CUFFS	1
2	230441	SHAFT, LIFT	1
3	140209	SCREW, 1/4-20X2-1/2 HEXHD	1
4	140000	WASHER, 0.28B, 0.62D, .04, FLAT	4
5	605422	BEARING SLEEVE	2
6	140027	WASHER, 5/16 FLAT	4
7	41169	NUT, 1/4-20 NYLK	1
8	08714	NUT, M10X1.5 HEXLK	2
9	140237	SCREW, 1/2-13X1 HEXHD	2
10	140024	WASHER, 1/2 LOCK	2
11	3148.816	WASHER, 1/2 FLAT	4
12	140139	SLEEVE, .625D, .500B, .25L	2

12	140139	SLEEVE, .625D, .500B, .25L			
RECOMMENDED STOCK ITEMS / ARTICULOS RECOMENDADOS PARA					
MANITENED EN EVICTENCIA					

REF	PART #	DESCRIPTION	QTY.
13	140546	NUT, 5/16-18 NYLCK	2
14	611777	BRACKET, SQUEEGEE PIVOT	1
15	140219	SCREW, 5/16-18X1 HEXHD	2
16	01697	SCREW, 1/4-20X5/8 HEXHD	1
17	140016	WASHER, 1/4 LOCK	1
18	140003	WASHER, 1/4 X 1 FENDER	1
19	230440.BK	BRACKET, SQUEEGEE PIVOT	1
20	1011094	●KNOB	2
21	611397	BRACKET, MOUNT, SQUEEGEE	1
22	390879	SLEEVE, .625D, .406B, .38L	2
23	611476	SCREW, M10X1.5X30, SHCS	2

CURVED SQUEEGEE GROUP CONJUNTO PALETA ENCORUADO



CURVED SQUEEGEE GROUP CONJUNTO PALETA ENCORUADO

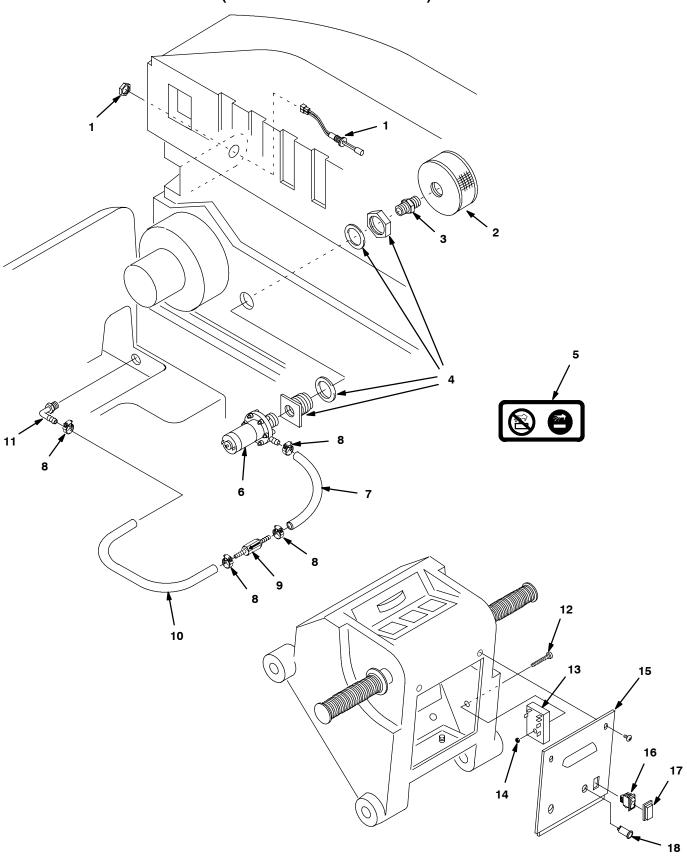
REF	PART #	DESCRIPTION	QTY.
V	612029	ASM., SQUEEGEE LINATEX & GUM	1
v	012029	RUBBER 965MM (38 IN) (2701 MODEL)	'
	612030	ASM., SQUEEGEE LINATEX & GUM RUBBER 1067MM (42 IN) (3301 MODEL)	1
∇	609114	•KIT, SQUEEGEE BLADES, LINATEX & GUM RUBBER 965MM (38 IN) (2701 MODEL)	1
1	222381	•BLADE, FRONT SQUEEGEE, LINATEX RED 965MM (38 IN) (2701 MODEL)	1
A 2	609056	•BLADE, REAR SQUEEGEE GUM RUBBER TAN 965MM (38 IN) (2701 MODEL)	1
▲ ∇	609115	•KIT, SQUEEGEE BLADES, LINATEX 965MM (38 IN) (2701 MODEL)	1
1	222381	•BLADE, FRONT SQUEEGEE, LINATEX RED 965MM (38 IN) (2701 MODEL)	1
A 2	609055	•BLADE, REAR SQUEEGEE LINATEX RED 940MM (37 IN) (2701 MODEL)	1
1	222241	•BLADE, FRONT SQUEEGEE, LINATEX RED 1067MM (42 IN) (3301 MODEL)	1
A 2	611402	•BLADE, REAR SQUEEGEE LINATEX RED 1067MM (42 IN) (3301 MODEL)	1
1	222391	•BLADE, FRONT SQUEEGEE URETHANE WHITE 965MM (38 IN) (2701 MODEL)	1
,	222392	•BLADE, FRONT SQUEEGEE URETHANE WHITE 1067MM (42 IN) (3301 MODEL)	1
2	611713	•BLADE, REAR SQUEEGEE URETHANE WHITE 965MM (38 IN) (2701 MODEL)	1
	611457	•BLADE, REAR SQUEEGEE URETHANE WHITE 1067MM (42 IN) (3301 MODEL)	1
	611405	•BLADE, REAR SQUEEGEE GUM RUBBER TAN 1067MM (42 IN) (3301 MODEL)	1
1	222385	•BLADE, FRONT SQUEEGEE GUM RUBBER TAN 965MM (38 IN) (2701 MODEL - FOR GROUTED TILE FLOOR)	1
	222384	•BLADE, FRONT SQUEEGEE GUM RUBBER TAN 1067MM (42 IN) (3301 MODEL - FOR GROUTED TILE FLOOR)	1

F	REF	PART #	DESCRIPTION	QTY.
•	3	611661	CASTING, SQUEEGEE (2701 MODEL)	1
		611401	CASTING, SQUEEGEE (3301 MODEL)	1
A	4	140799	SCREW, 5/16-18X1-1/2 TRSPHL	2
A	5	140015	WASHER, 5/16 LOCK	2
•	6	1011094	●KNOB	6
A	7	130164	PLUG, DOME 3/8"	2
A	8	1014918	●WHEEL, RUBBER, 3"X1"	2
A	9	222505	SCREW, M8X1.25X45 HEXHD	2
A	10	140027	WASHER, 5/16 FLAT	4
A	11	08709	NUT, M8 HEXLCK	2
A	12	222368	PLATE, BLADE RETAINER (2701 MODEL)	1
		222240	PLATE, BLADE RETAINER (3301 MODEL)	1
A	13	140055	WASHER, .343X1.25X.051080	4
A	14	222378	BAND WELDMENT, SQUEEGEE BLADE (2701 MODEL)	1
		222243	BAND WELDMENT, SQUEEGEE BLADE (3301 MODEL)	1
A	15	609110	SPACER, SQUEEGEE * (2701 MODEL)	1
		611398	SPACER, SQUEEGEE * (3301 MODEL)	1
A	16	222794	●KNOB, 1/4-20X1-1/2	2
A	17	82138	NUT, SPEED RETAINER .25-20	2
A	18	601108000	NUT, 5/16-18 HEXLCK THIN	1
A	19	611399	BRACKET, ROLLER, SQUEEGEE	1
A	20	603144	SCREW, 5/16-18 SHOULDER	1
A	21	630477	WHEEL, 2.00D X .38W	2
A	22	603368	SPACER, .39X.75X.75 NYLON	1

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- * NOTE: TWO SQUEEGEE SPACERS ARE REQUIRED WITH REAR URETHANE BLADES #611713 & 611457 / SE REQUIEREN DOS SEPARADORES DE ESCOBILLA CON LA HOJA DE URETANO #611713 Y 611457.

ES (EXTENDED SCRUB) KIT ES (FREGADO PROLONGADO) JUEGO



ES (EXTENDED SCRUB) KIT ES (FREGADO PROLONGADO) JUEGO

REF	PART #	DESCRIPTION	QTY.
∇	605555	*KIT, ES (EXTENDED SCRUB)	1
▲ 1	603166	SENSOR, LEVEL, LIQUID	1
▲ 2	630138	FILTER, SCREEN, 100-MESH	1
▲ 3	630385	FITTING, STR, PM12/PM12	1
▲ 4	601490	FITTING, 3/4NPT BULKHEAD	1
▲ 5	630440	DECAL, FILTER REMOVE	1
▲ 6	630136	PUMP, SOLUTION 24VDC	1
▲ 7	560497	TUBING, 3/8IDX.5'	1
▲ 8	54333	CLAMP, HOSE, 0.31-0.88D	4
▲ 9	210044	VALVE, CHECK, 1PSI 06BM/06BM	1

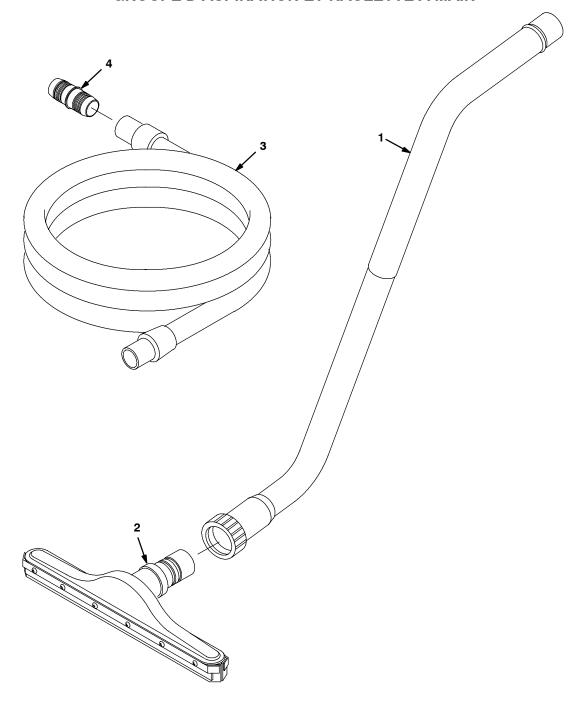
F	REF	PART #	DESCRIPTION	QTY.
A	10	607103	TUBING, 3/8IDX1.25'	1
A	11	150415	FITTING, E90, PM04/BM06	1
A	12	578008000	SCREW, M5X0.8X30 PANPHL	1
A	13	630145	●TIMER, 24VDC, RANGE: 30SEC	1
A	14	09739	NUT, M5X.08 NYLOCK	1
	15	606276	COVER, CONTROL PANEL	1
A	16	630419	•SWITCH, ROCKER	1
A	17	578720	SPLASHGUARD, RCKR SWITCH	1
A	18	130738	●LIGHT, INDICATOR GREEN	1
▲ N	N/S	605551	HARNESS, WIRE ES	1

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- * KIT NOT INTENDED FOR FAST MODELS / LA OPCIÓN DEL ES NO ESTÁ DISPONIBLE PARA LOS MODELOS FAST.

Speed Scrub® 2701/3301 (07-04)

SQUEEGEE WAND ASSEMBLY GROUPE D'ASPIRATION ET RACLETTE À MAIN



R	EF	PART #	DESCRIPTION	QTY.
∇		190928	●ASM., WAND DOUBLE BEND	1
A	1	6108.1	WAND, TWO BEND ALUMINUM	1
A	2	13840	SQUEEGEE ASM, PUSH/PULL 14"	1

REF		PART #	DESCRIPTION	QTY.
A	З	160481	●HOSE, VAC 1-1/2X10'	1
A	4	160451	CONNECTOR, 1-1/2 VAC HOSE	1

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