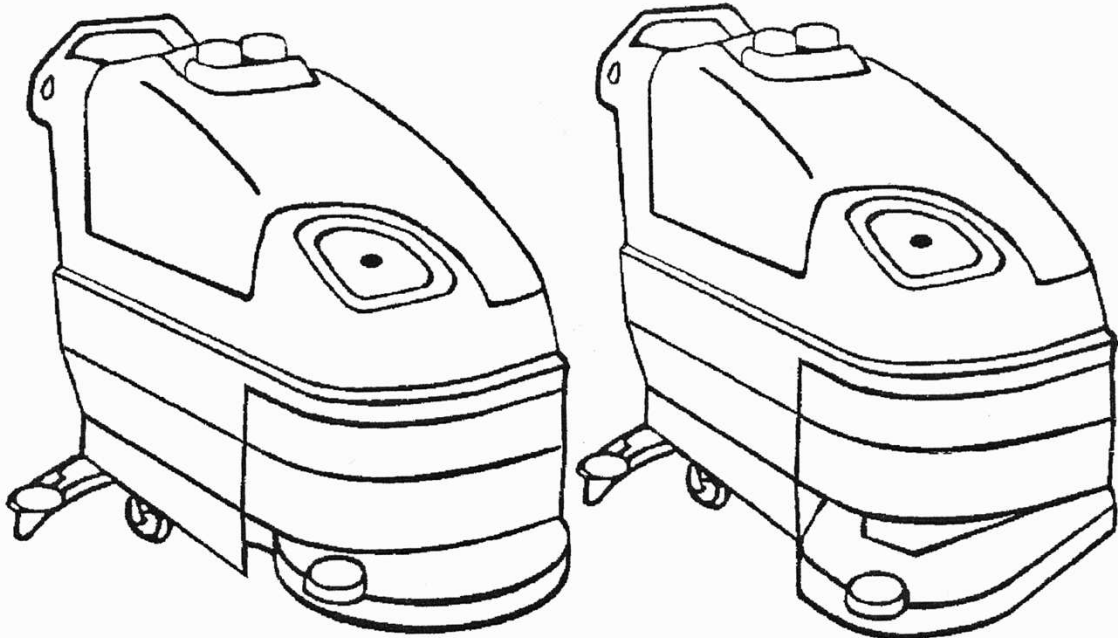




MANUAL

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VS20B/VS51B

VS20/VS51

VS26/VS66

Operating Instructions

Mode d'emploi

Operación

Bedienungsanleitung

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TABLE OF CONTENTS

ENGLISH	3-7
FRANÇAIS	8-12
ESPAÑOL	13-17
DEUTSCH.....	18-23

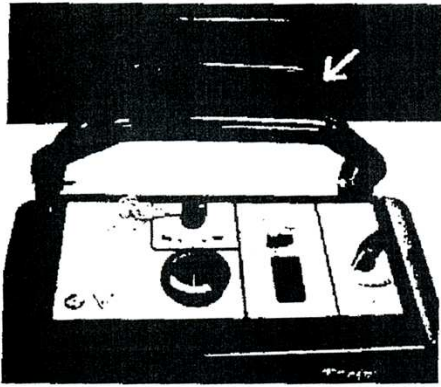


FIGURE 1



FIGURE 2

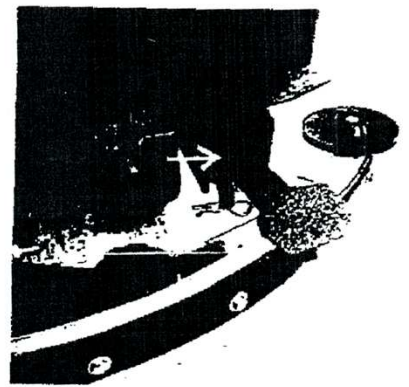


FIGURE 3



FIGURE 4

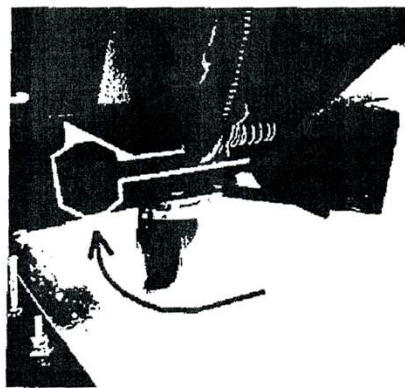


FIGURE 5

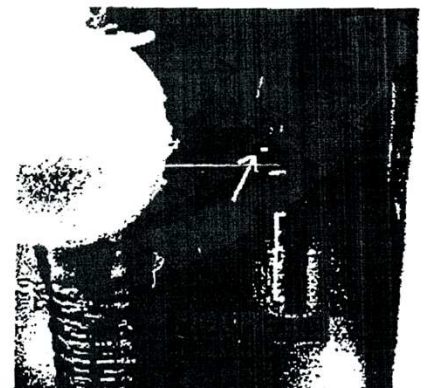


FIGURE 6

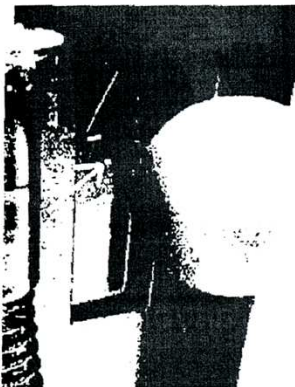


FIGURE 7

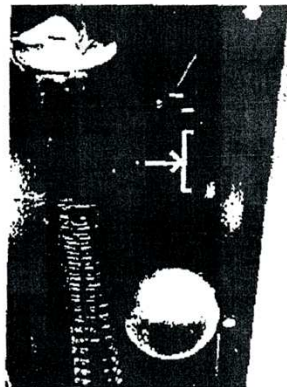


FIGURE 8



FIGURE 9



FIGURE 10

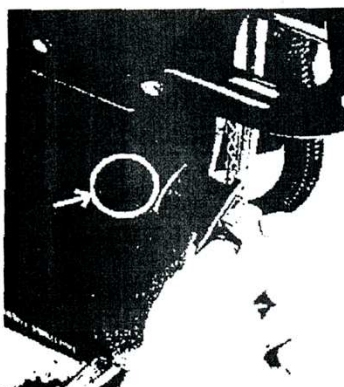


FIGURE 11



FIGURE 12



FIGURE 13

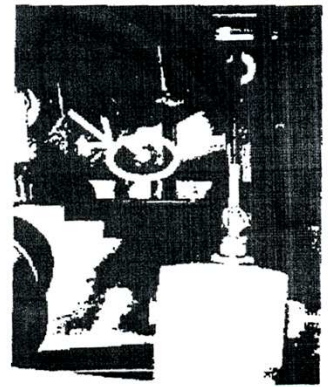


FIGURE 14

SAFETY INSTRUCTIONS

READ ALL INSTRUCTIONS BEFORE USING!

When using an electrical appliance, basic precautions should always be followed. Failure to follow these safety instructions could result in bodily injury, damage to the machine, or damage to property.

⚠ WARNING

- Fire and explosion can occur when this machine is operated in areas where flammable solids, liquids, dusts or gasses are present. Do not use this machine in these areas. Use only with nonflammable floor cleaners and floor finishing products.
- Do not leave the machine unattended when it is turned on. When not in use or before servicing, move machine to a level surface and turn off all switches.
- Do not allow to be used by untrained personnel. Close attention is necessary when used near children.
- This machine creates suction and contains revolving brushes. Keep hair, loose clothing, fingers, and all other parts of the body away from openings and moving parts. Do not insert any object into any of the openings in the machine.
- Do not pick up anything that is burning or smoking, such as cigarettes, matches, or hot ashes.
- Do not use the machine to pick up flammable or combustible liquids such as gasoline.
- Be cautious when working with batteries. Always wear protective eye and clothing items. Avoid electrical shock, remove all jewelry and do not place tools or other metal objects on or near the batteries.
- Explosive hydrogen gas is formed during battery charging. Always charge batteries in a well ventilated area, keeping battery compartment open. Avoid open flame or anything which produces an electrical spark.
- Do not use a charger with a damaged power cord. Unplug charger from electrical outlet before disconnecting from machine.
- Do not use on a floor with damaged or loose tiles.

- Do not use this machine without the brush covers installed.

⚠ CAUTION

- For commercial use only.
- If the machine is not working as it should, has been dropped, damaged, or left outdoors, return it to a service center before using.
- Use machine only as described in this manual. Do not use in ways it was not intended. Do not sit on machine while in use or stationary. Use only manufacturer's recommended attachments.
- Wet floor surfaces are dangerously slippery. Always place caution signs in the area.
- Do not transport the machine without securing it to the bed of the vehicle. Use two or more people while moving the machine on a ramp or incline.

SAVE THESE INSTRUCTIONS

UNPACKING

Carefully inspect all components to insure that there is no concealed freight damage. If such damage is discovered, file a Damage Report immediately with the delivering carrier.

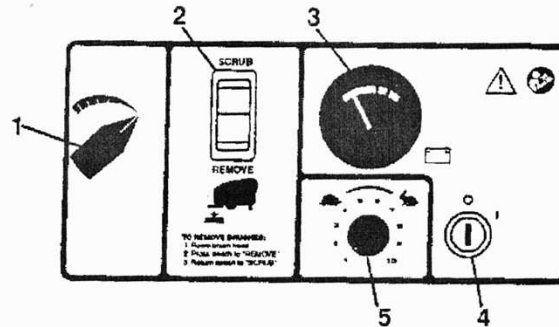
PREPARATION

⚠ WARNING: BEFORE ANY SERVICING, AVOID POSSIBLE INJURY OR ELECTRIC SHOCK BY HAVING MACHINE TURNED OFF AND THE BATTERY CHARGER DISCONNECTED.

BATTERY INSTALLATION

Once the machine is completely unpacked and inspected, install the batteries and wiring as illustrated on the diagram located inside the battery compartment.

CONTROLS



(1) SOLUTION FLOW DIAL

Turn this dial to the left to increase solution flow to the floor. Turn to the right, to decrease the amount of solution flow to the floor.

On machines with traction drive, when the Drive Squeeze Bar is released from either forward or reverse travel, the solution flow will stop automatically, and resume when the drive is engaged.

On machines without traction drive the flow must be turned off manually by turning the dial to the right.

(2) BRUSH REMOVE SWITCH

To remove the brush(es) from the machine, have the machine stationary and the brush head in the "UP" position. Press the switch to the "REMOVE" position and release.

The switch will snap to the center off position, and the brushes will drop to the floor. Return the switch to "SCRUB" otherwise the brush(es) will keep falling off when the brush head is raised.

(3) BATTERY CHARGE INDICATOR

When batteries are fully charged, the needle should be in the green or yellow zone. When in use, the needle nears the "E", batteries should be recharged.

(4) KEYLOCK SWITCH

The Keylock Switch is the master power switch.

(5) SPEED CONTROL KNOB

On machines equipped with traction drive, the Speed Control Knob is used to adjust the traveling speed in both forward or reverse.

OTHER CONTROLS

DRIVE SQUEEZE BAR (FIGURE 1)

- Traction Drive equipped machines

Located on top at the rear of the machine, the operator can make the machine go forward by pushing forward on it, or reverse by pulling backward on it. When the brush head is in the "DOWN" position, the brushes and solution will operate when the drive is engaged in either direction, but will stop after the machine is stationary for 3 seconds.

- Brush Assist equipped machines

Located on top at the rear of the machine, the operator can start the Brush Drive Motor by pushing forward on it when the brush head is in the "DOWN" position. The motor(s) will stop when the bar is released. This "dead-man" switch will not operate the Brush Drive Motor when pulled backwards.

BRUSH HEAD FOOT PEDAL

Located at the right rear corner near the floor, this pedal is used to raise or lower the brush head. There are three positions: up, down, and transport.

- UP position (Figure 2)

To lifts the brush head for moving the machine from one area to another.

- DOWN position (Figure 3)

This position is for scrubbing.

- TRANSPORT position (Figure 4-5)

This will lift the brush head higher than the "up" position for clearance on inclines, such as ramps. Remove the squeegee and brush(es) or padholder(s). Push the pedal forward under the machine, the brush head will "snap" into the transport position. Swing the pedal to the left so it is parallel to the floor.

To disengage transport position, swing the foot pedal down to the right and lift slightly on the brush head and lower.

VACUUM / SQUEEGEE LEVER

Located at the rear of the machine, this lever controls both the squeegee and vacuum motor. There are three positions: off, vacuum on, and vacuum on with the squeegee on the floor.

- Off (Figure 6)
- Vacuum ON (Figure 7)

This position lifts the squeegee slightly while leaving the vacuum turned on. This can be used for backing up during scrubbing, or supplies vacuum for cleaning remote areas using an attachment.

- Vacuum ON with the squeegee on the floor (Figure 8)

This position is for picking up solution while scrubbing.

CLEAN SOLUTION LEVEL INDICATOR (FIGURE 9)

This clear tube, located at the rear of the machine, along with the indicator marks on the tank will identify how much clean solution remains in the clean solution tank.

CIRCUIT BREAKERS

Located on the rear of the machine, they provide overload protection to machines's motors. If a breaker trips, it will pop out. To reset, wait one minute and press the button back in. If any breaker trips repeatedly, have the machine serviced.

HOUR METER (OPTIONAL)

Located on the rear of the machine, to the right of the circuit breaker panel, it will measure the time the brush drive motor(s) are "ON".

OPERATION

▲ WARNING: FIRE AND EXPLOSION CAN OCCUR WHEN THIS MACHINE IS OPERATED IN AREAS WHERE FLAMMABLE SOLIDS, LIQUIDS, DUSTS OR GASSES ARE PRESENT. DO NOT USE THIS MACHINE IN THESE AREAS. USE ONLY WITH NONFLAMMABLE FLOOR CLEANERS AND FLOOR FINISHING PRODUCTS.

▲ WARNING: EXPOSED ROTATING BRUSH. CONTACT WITH BRUSH OR RESULTANT THROWN OBJECTS, CAN CAUSE SEVERE INJURY. KEEP CLEAR OF ROTATING BRUSH. PREVENT CONTACT WITH OBJECTS.

Before scrubbing, sweep the area clean of debris. For effective long scrubbing use, begin with fully charged batteries.

ADDING SOLUTION

▲ CAUTION: Care must be taken when working with hot water. Water temperature must not exceed 120°F (49° C). Use non-foaming chemicals only.

Solution can be added from the front of machine, or the rear. Capacity: 17 gal. (64 L)

FRONT FILL (FIGURE 10)

Remove the front lid and fill the tank with solution and properly diluted cleaning chemical. Fill the tank to the metal screen.

REAR FILL (FIGURE 11)

Remove the plug and fill the tank with solution and properly diluted cleaning chemical. Use the clean solution level indicator on the tank to know when the tank is full.

SCRUBBING PROCEDURE

With proper brushes installed and the "REMOVE" switch in the "SCRUB" position, the machine is ready for scrubbing.

Lower the "Vacuum / Squeegee Lever" into the DOWN position. Lower the brush head with the foot pedal, and push on the drive squeeze bar. Adjust solution flow, and travel speed on traction drive machines as required. While scrubbing, overlap passes and reduce speed when cornering to ensure solution pickup.

EMPTYING RECOVERY TANK

Remove the drain hose from it's holder, remove the plug, and dump contents into a proper waste drain.

EMPTYING THE SOLUTION TANK

Pull the clean solution level indicator tube off the holder and use your thumb as a plug. Dump contents into a proper waste drain.

CLEAN UP AND STORAGE

▲ CAUTION: Avoid damaging electrical circuitry below control panel, clean panel with damp towel only.

Rinse both tanks daily. Leave tank's lids off to ventilate, reducing residue buildup and odor. Store the machine in a cool dry place.

Avoid prolonged exposure of machine to freezing temperatures during storage or transporting.

BATTERY CHARGING

▲ WARNING: HYDROGEN GAS FORMED DURING BATTERY CHARGING CAN EXPLODE WHEN EXPOSED TO A SPARK OR FLAME. SEVERE INJURY AND PROPERTY DAMAGE CAN RESULT. CHARGE BATTERIES IN A WELL-VENTILATED AREA. KEEP BATTERY COMPARTMENT OPEN DURING BATTERY CHARGING. UNPLUG CHARGER FROM WALL BEFORE UNPLUGGING MACHINE. REPLACE DAMAGED CHARGER POWER CORDS IMMEDIATELY.

▲ WARNING: FOR SAFE OPERATION, READ AND UNDERSTAND THE CHARGER OWNER'S MANUAL.

▲ CAUTION: The machine's master switch should be in the 'OFF' position before and during recharging.

Lift open recovery tank for proper ventilation. The machine's charger plug is located above the battery compartment, behind the recovery tank. Firmly connect

the charger's mating plug into the charger plug of the machine. Leave the tank open to allow ventilation to the battery compartment during charging operation.

TRANSPORTING

Tie down slots are located on each side of the frame. When transporting, always strap the machine to the bed of the vehicle.

MAINTENANCE

▲ WARNING: BEFORE ANY SERVICING, AVOID POSSIBLE INJURY OR ELECTRIC SHOCK BY HAVING THE MACHINE TURNED OFF AND THE BATTERY CHARGER DISCONNECTED.

BATTERY CARE

1. Keep water level in cells above the plates. Check daily - if cells need water, use only distilled or approved water.
2. Keep batteries fully charged when not in use.
3. Keep batteries and terminals clean. When necessary, clean the terminals with a baking soda solution, then coat them with grease to retard corrosion.

BATTERY ACID DRAIN (FIGURE 12)

The clear drain hose located at the rear of the machine, will remove excess liquids from the battery compartment.

▲ CAUTION: Battery acid is a hazardous material, dispose of properly.

LINT SCREEN (FIGURE 13)

The lint screen is visible through the clear lid on the recovery tank. Keeping this screen clean insures top performance of the vacuum motor.

SOLUTION FILTER (FIGURE 14)

The solution filter is located at the rear of the machine, just behind the water valve. Regular cleaning will insure proper solution flow. Simply unscrew and remove the clear lid and screen, clean and reinstall.

▲ CAUTION: Clean solution tank must be empty before removing lid, or solution will drain out.

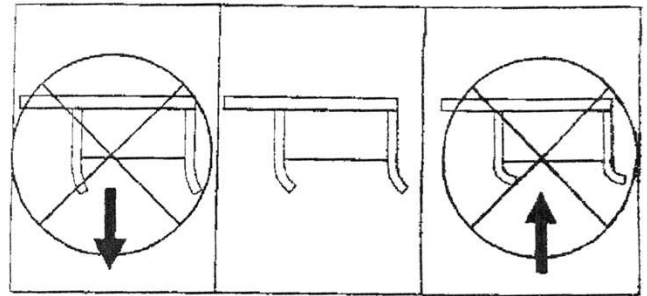
DRIVE MOTOR CHAIN TENSION

Traction Drive machines only.

Loosen the jam nut. Turn the screw clockwise to tighten the chain, counterclockwise to loosen. When properly adjusted, there should be 1/2" (1.3 cm) of slack.

▲ CAUTION: Do not overtighten. Excessive chain tension can cause damage to the bearings, sprockets, or chain.

SQUEEGEE ADJUSTMENT



HEIGHT

Height refers to the amount of contact on the floor. When traveling forward, the squeegee should flare back so the blade corner is contacting the floor.

To adjust, lower squeegee to floor and loosen the jam nut on the adjustment screw. Turn screw clockwise to raise (decrease pressure), counterclockwise to lower (increase pressure). Retighten jam nut when properly adjusted.

TILT

Tilt refers to pressure on each end of the squeegee. The front to rear tilt is correct if, as the machine is moved forward, there is an equal amount of squeegee flare at the ends as compared to the center.

To adjust, turn the tilt adjustment knob clockwise to tilt ends upward, counterclockwise to tilt ends downward.

BLADE REVERSING

Worn blades leave streaks on the floor. The squeegee is designed to be reversed so all four corner edges can be used. To reverse blades, remove the squeegee from the machine and remove the bolts that hold the squeegee assembly together. Reverse the blades, reassemble and reinstall squeegee on machine.

BLADE REPLACEMENT

If blades have been reversed and are now worn on both edges, they will have to be replaced. To replace blades, remove the squeegee from the machine and remove the bolts that hold the squeegee assembly together. Replace the blades, reassemble and reinstall squeegee on machine.

PRODUCT IDENTIFICATION

If service is required, contact the dealer from which the machine was purchased or an authorized service station. The model and serial number are on the rating plate, please write them in below. For prompt and accurate information, refer to these numbers when inquiring about service. Always refer to your limited warranty for complete service information.

MODEL#

SERIAL#

OPTIONAL ACCESSORIES

For a complete list of all available accessories and ordering

information, call 888-293-8667 or visit our website at <http://www.docudesk.com>

P. 08

TROUBLE SHOOTING GUIDE

PROBLEM	CAUSE	SOLUTION
<i>Machine will not move</i>	<ol style="list-style-type: none"> 1. Keylock is not in the "ON" position 2. Battery condition low. 3. Speed set too low. 	<ol style="list-style-type: none"> 1. Turn keylock to the "ON" position. 2. Check batteries and charge or replace. 3. Adjust speed control knob as needed.
<i>Brush drive motor will not start</i>	<ol style="list-style-type: none"> 1. Battery condition low. 2. Circuit breaker tripped. 3. Brush head not lowered. 	<ol style="list-style-type: none"> 1. Check batteries and charge or replace. 2. Reset by pushing circuit breaker button. 3. Lower the brush head.
<i>Machine streaking a cleaned floor</i>	<ol style="list-style-type: none"> 1. Debris lodged under squeegee. 2. Squeegee in need of adjustment. 3. Worn squeegee blades. 4. Insufficient water flow. 	<ol style="list-style-type: none"> 1. Raise and clean squeegee blades. 2. Adjust squeegee as needed. 3. Reverse or replace blades. 4. Clean screens, or increase flow.
<i>Poor solution recovery</i>	<ol style="list-style-type: none"> 1. Clogged pickup tube. 2. Lint filter dirty. 3. Clogged elbow entering recovery tank. 	<ol style="list-style-type: none"> 1. Remove accumulation. 2. Clean lint filter. 3. Remove and clean elbow.
<i>Short operating time</i>	<ol style="list-style-type: none"> 1. Battery charge condition very low. 2. Corroded wires or connectors. 3. Bad Battery. 	<ol style="list-style-type: none"> 1. Fully recharge batteries. 2. Clean thoroughly. 3. Replace defective battery.

ANY ELECTRICAL SERVICING MUST BE PERFORMED BY THE DEALER FROM WHICH THE MACHINE WAS PURCHASED OR AN AUTHORIZED SERVICE STATION.