

# INSTRUCTION MANUAL

## E46 AGM - E46 LI-ION - E46 CABLE



EN

Instruction manual  
(Original instruction)



Attention: Read the instruction before use  
the machine





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# PRESENTATION

*Our company, a leader in the production of industrial cleaning machines, is delighted to have you among the owners of this scrubber and is sure you will be fully satisfied with it. We are sure that during its use, you will see the quality, robustness and possibilities of use it has to offer. This scrubber is suitable for private, industrial or public use. This manual describes the various installation operations, controls and maintenance interventions necessary to maintain perfect efficiency of your scrubber. These are normal maintenance operations that any operator can carry out using devices normally available in a company. For particular works, please contact specialist staff.*

OUR COMPANY AIMS TO CONSTANTLY IMPROVE ITS PRODUCTS AND RESERVES THE RIGHT TO MAKE CHANGES AND IMPROVEMENTS WHEN NECESSARY WITHOUT ANY OBLIGATION TO UPGRADE PREVIOUSLY SOLD MACHINES.

## ATTENTION!

### **THE MACHINE IS NOT CERTIFIED FOR ON-ROAD USE.**

BEFORE USING THE MACHINE OR CARRYING OUT ANY OPERATION ON IT, ALL THE PROCEDURES AND WARNINGS DESCRIBED IN THIS MANUAL MUST BE READ AND UNDERSTOOD. STRICT COMPLIANCE WITH THE REGULATIONS AND THE INSTRUCTIONS CONTAINED IN THIS MANUAL, COMBINED WITH THE OPERATOR'S ATTENTION AND CAUTION, WILL BE THE BEST GUARANTEE AGAINST ACCIDENTS THAT CAN OCCUR IN THE WORKPLACE. SCRUBBERS ARE DESIGNED TO PROVIDE UTMOST SAFETY IF USED ACCORDING TO INSTRUCTIONS. THIS MACHINE IS INTENDED FOR COMMERCIAL USE, FOR EXAMPLE IN HOTELS, IN SCHOOLS, IN HOSPITALS, IN FACTORIES, IN SHOPS, IN OFFICES AND IN BUSINESSES.

THIS MACHINE IS NOT INTENDED FOR USE BY PEOPLE (INCLUDING CHILDREN) WITH REDUCED PHYSICAL, SENSORY OR PSYCHOLOGICAL CAPACITY, OR WITH LACK OF EXPERIENCE AND KNOW-HOW. CHILDREN SHOULD BE MONITORED TO ENSURE THEY DO NOT USE THE EQUIPMENT TO PLAY ON.

THE USER MANUAL IS AN INTEGRAL PART OF THE SCRUBBER AND MUST ACCOMPANY IT UP TO ITS DEMOLITION.

PURSUANT TO DIRECTIVE 2006/42 EC, AND DPR 459 ON 24/07/1996 AND SUBSEQUENT UPDATES, IT IS MADE KNOWN THAT: OPERATOR IS INTENDED AS THE PERSON OR PEOPLE RESPONSIBLE FOR INSTALLING, OPERATING, ADJUSTING, CARRYING OUT ROUTINE MAINTENANCE, CLEANING, REPAIRING AND TRANSPORTING THE MACHINE.

THIS COMPANY CANNOT BE HELD LIABLE FOR PROBLEMS, BREAKAGES, ACCIDENTS OR OTHER ISSUES DUE TO LACK OF KNOW-HOW OR NON-APPLICATION OF THE PROCEDURES CONTAINED IN THIS MANUAL, OR DUE TO IMPROPER USE OF THE MACHINE.

THIS COMPANY ALSO CANNOT BE HELD LIABLE FOR CHANGES, INSTALLATION OF PARTS AND/OR ACCESSORIES WITHOUT PRIOR AUTHORISATION.

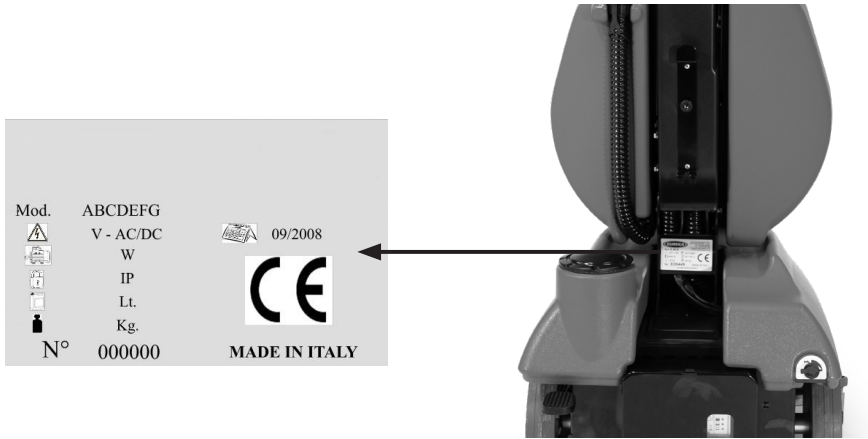


### **EMERGENCY SITUATIONS**

**IN THE EVENT OF FIRE, ONLY USE POWDER EXTINGUISHERS  
IF OCCURS ANY ABNORMAL BEHAVIOR (UNCONTROLLED SPEED INCREASE,  
OVERHEATING, ...) TURN OFF THE MACHINE IMMEDIATELY**

# MACHINE IDENTIFICATION

The machine and manufacturer are identified through the plate on the rear of the frame.



REFER TO THESE DETAILS TO ORDER SPARE PARTS OR WHEN SENDING ANY REQUEST TO THE MANUFACTURER.

The sweepers comply with EEC directives and display the CE logo.

## GENERAL WARNINGS AND ADVICE

### DANGER - ATTENTION SIGNS



THIS SYMBOL HIGHLIGHTS ALL THE OPERATIONS THAT REPRESENT A SITUATION OF POTENTIAL DANGER FOR THE OPERATOR. THEREFORE, PROCEED IN COMPLIANCE WITH THE CONDITIONS HIGHLIGHTED BY THIS SYMBOL



USE OF GLOVES COMPULSORY



USE OF GOGGLES COMPULSORY



ATTENTION: MOVING PARTS, RISK OF TRAPPING HANDS



ATTENTION: DO NOT WET  
THE DEVICES MARKED WITH THIS INDICATION MUST NOT GET WET (THEY ARE NORMALLY ELECTRICAL COMPONENTS)

### IMPORTANT COMMUNICATION

DURING THE LAST FEW YEARS, A NEW AGGRESSIVE SOLVENT-BASED DETERGENT TYPE WAS MADE AND DISTRIBUTED IN THE MARKET. THIS DETERGENT IS CURRENTLY NAMED AS "DETER-SOLVENT". EVEN IF THE SOLVENT CONTAINED IN THE DETERGENT IS OBTAINED FROM THE FRUITS, IT STILL HAS TO BE CONSIDERED AS "SOLVENT". THE POLIETHYLENE MATERIAL USED IN THE SCRUBBER TANKS IS MIXED WITH A % OF RUBBER. THE "DETER-SOLVENT" PRODUCT, IF LEFT IN THE SCRUBBER'S TANKS FOR A LONG PERIOD OF TIME COULD ATTACK THE RUBBER'S MOLECULAS, CAUSING THE TANK TO SWELL AND CRACK. IF THE "DETER-SOLVENT" PRODUCT IS USED, IT'S MANDATORY TO RINSE THE TANKS PROPERLY WHEN THE MACHINE STOPS WORKING.

## CLEANING AND MAINTENANCE ⚠

Machine cleaning must be carried out by staff correctly trained for the purpose, who know the controls to bypass energy sources and are familiar with the characteristics of the machine to avoid dangerous situations.

Clean the coverings of the machine, the panels and the controls with a cloth soaked in water or detergent solution.

No solvents must be used such as petrol, alcohol, etc.

Have specialist staff clean the electrical components who should use non-corrosive products, suitable for electrical circuits.

Maintenance of the machine must be carried out by specialist staff with in-depth knowledge of the machine and its components.

Any maintenance and cleaning must be carried out with the machine off, with all the mechanisms stopped, the hot parts cooled and the battery disconnected.

When using compressed air guns for cleaning, protect eyes and ears.

## STORAGE OF THE MACHINE

If the machine is unused for long periods of time, it is essential to:

- Charge the batteries to avoid storing the machine with empty batteries because they could get damaged
- Store the machine in a protected location
- Clean the machine inside and out
- Keep the brushes raised to avoid the bristles getting damaged
- Keep the dirt container lowered
- Remove the key
- Disconnect the battery clamps

## SAFETY PRECAUTIONS FOR OPERATORS AND TECHNICIANS ⚠

- The use of the machine is forbidden by staff who are unauthorised and untrained in operation and people who are under the influence of substances that can alter reflexes (alcohol, medicine, drugs, etc.).
- **To avoid unpermitted use of the machine, the power supply must be interrupted, to do this remove the ignition key;**
- Do not use the machine in flammable areas or where there is danger of explosion;
- Do not collect burning material or other material that could cause a fire;
- Do not remove the safety devices and the guards when the machine is running;
- Start the machine from the driver's seat;
- Do not use the machine to clean objects;
- During the maintenance phase, avoid wearing loose or unbuttoned clothing;
- Do not proceed with maintenance phases when parts are in motion;
- Protect eyes and ears when using compressed air or water guns to clean the machine;
- To lift the machine, use devices suitable for the weight of the machine;
- Do not generate flames or sparks near the machine;
- Disconnect the battery cables before intervening on the electrical circuit;
- Avoid contact with battery acid, pay attention to hot parts, wait for them to cool before intervening;
- Unguarded machines must be protected from unintentional movements;
- **Do not exceed gradients of 2 %**

## RESPONSIBILITIES OF THE OPERATOR ⚠

- The operator is responsible for the day-to-day servicing of the machine;
- The operator must care for the machine and keep it in good operating condition;
- The operator must inform his or her superior or the technical department when scheduled maintenance is requested in the case of damage or breakage;
- The operator must not carry people, animals or objects on the machine;
- When moving the machine, observe the safety measures for circulation;
- The machine cannot be used for toxic-harmful materials;
- Never let people get close to the machine's sphere of action;
- Never leave the scrubber with the key and the emergency switch inserted;
- If the machine malfunctions, have a look at the procedures shown in the various chapters;
- Never collect pieces of string, wire or anything else that could damage the brushes by winding around them;
- This machine must be used only in closed places;
- Don't use the machine to clean surfaces with gradients over indicated on it;
- Promptly charge the lithium battery when discharged. Allowing the battery to run out will cause serious damages!

## UPDATING OF THE USER'S MANUAL

When large-scale modifications are made to the machine or new parts are installed, the updated documentation must be sent to the Dealer along with the purchased part or as an update of the manual.

## OBLIGATIONS OF THE EMPLOYER OR OWNER OF THE MACHINE

The employer or owner of the machine is responsible for giving the User's Manual to all the personnel who are going to have to use the machine.

The employer or owner of the machine also undertakes to update the manual with the documentation that the Manufacturer will send if modifications are made to the machine.

## DISPOSAL



All packaging is recyclable. The packaging should not be thrown away with domestic waste, but sent to the relevant collection centres.



### EXHAUSTED BATTERIES

Exhausted batteries are considered harmful toxic waste and therefore should be exclusively given to collection companies with specific authorisation (ascertain on hand-over).

### MATERIAL COLLECTED FROM THE MACHINE

The material collected by the machine must be given to the relevant urban cleaning company since it is considered urban waste or similar.

The machine cannot be used to collect toxic-harmful materials.

### SCRAPPING THE MACHINE

On scrapping, proceed with the correct disposal of the materials that make up the machine. It is compulsory to give the machine to authorised collection companies which will correctly dispose of oil, filters, plastic, metal, electric motors, electric boards, etc. in compliance with legislation in force. Decommissioned equipment contains precious recyclable materials and therefore should be given to the relevant collection centres. Please dispose of decommissioned equipment through differentiated collection systems.



### DISPOSAL OF ELECTRICAL EQUIPMENT AND ELECTRONICS

## TRANSPORT

The machine must be fixed to a pallet to make it easier to transport and more secure.

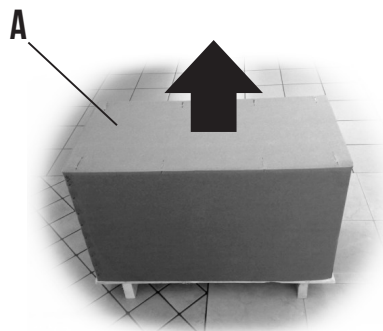
At the reception of the machine, check that the packaging is in good condition –in case of damage, inform the forwarder.

PAY ATTENTION WHILE TRANSPORTING THE MACHINE AT TEMPERATURES BELOW 0°C TO PREVENT THE WATER INSIDE THE TANKS AND THE PIPES FROM BECOMING FROZEN. DRAIN THE TANKS, REMOVE THE SCREEN OF THE CLEAN SOLUTION FILTER AND LET THE WATER FLOW AWAY COMPLETELY OUT OF THE PIPES.

Follow the instructions below to unpack the machine:

- Unpack it on top [A]
- Remove the machine from the pallet
- Unpack the recovery tank

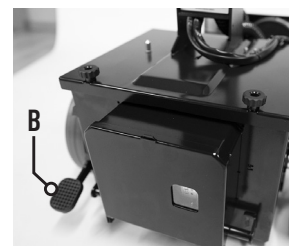
**DO NOT USE A FORKLIFT TO REMOVE THE MACHINE FROM THE PALLET AS IT MAY CAUSE DAMAGE TO THE MACHINE.**



## TRANSPORT- HANDLING

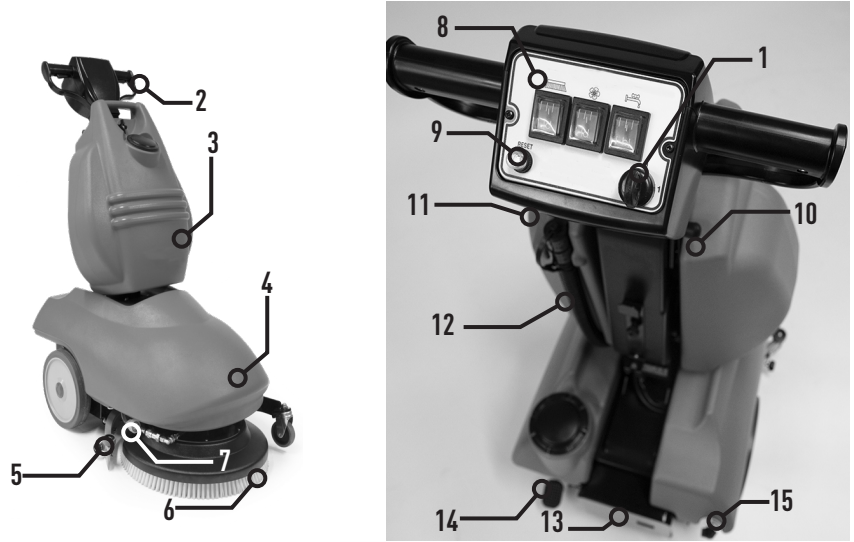
To move the machine from one place of use to another, it is recommended to:

- Do not load it on the vehicle using a forklift truck in order not to damage it;
- Secure it well to the means of transport using straps, ropes, chains.
- The machine is equipped with a front swivel wheel that facilitates its movement during the movement phase, lifting the brush from the floor. To raise or lower the aforementioned wheel, act on the pedal [B].



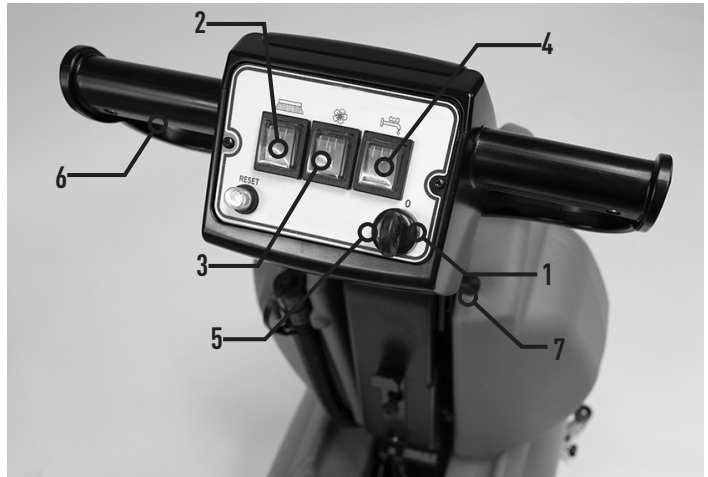
## MACHINE DESCRIPTION



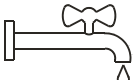
1. KEY-OPERATED SWITCH
2. BRUSH AND TRACTION BUTTON
3. RECOVERY TANK
4. SOLUTION TANK
5. SQUEEGEE
6. BRUSH
7. WATER FILTER
8. CONTROL BOARD
9. LIMITER
10. SQUEEGEE KNOB
11. RUDDER RELEASE KNOB
12. SOLUTION PIPE
13. BATTERY CHARGER
14. BRUSH LIFTING PEDAL
15. SOLUTION TAP



## MAIN FUNCTIONS AND CONTROLS

1. KEY SWITCH
2. BRUSH POWER BUTTON
3. VACUUM SWITCH
4. SOLUTION DETERGENT SOLUTION BUTTON
5. GREEN LIGHT (CABLE MACHINE ONLY)
6. BRUSHES/TRACTION CONTROL
7. SQUEEGEE KNOB



- |  |   |  |
|--|---|--|
| 1  | -----   | <p><b>KEY-OPERATED SWITCH</b><br/>Turn it clockwise (pos.1) to turn on the machine.</p>  |
| <hr style="border-top: 1px dashed #000;"/> |   |  |
| 2  |  | <p><b>BRUSH DRIVE BUTTON</b><br/>Push this switch to position 1 to activate the brush function.</p>  |
| <hr style="border-top: 1px dashed #000;"/> |   |  |
| 3  |  | <p><b>VACUUM BUTTON</b><br/>Push the switch to position 1 to turn on the vacuum.<br/>Push the switch to position 0 to turn off the vacuum.</p>   |
| <hr style="border-top: 1px dashed #000;"/> |   |  |
| 4  |  | <p><b>SOLUTION DETERGENT SOLUTION BUTTON</b><br/>The solenoid valve of the solution opens with the button in pos. 1<br/>With the button in pos. 0, the solution solenoid valve is closed</p> |
| <hr style="border-top: 1px dashed #000;"/> |   |  |
| 5  | -----   | <p><b>GREEN LIGHT (WIRED VERSION ONLY)</b><br/>The indicator lights up when the plug is connected to the power socket</p>  |
| <hr style="border-top: 1px dashed #000;"/> |   |  |
| 6  | -----   | <p><b>BRUSHES ACTIVATION / FEED CONTROL</b><br/>By pressing the control, the brush starts to rotate and the machine moves forward</p>  |
| <hr style="border-top: 1px dashed #000;"/> |   |  |
| 7  | -----   | <p><b>SQUEEGEE KNOB</b><br/>By lowering the knob, the squeegee is brought into the working position.</p>   |

# PREPARATION OF THE MACHINE

## BATTERIES INSTALLATION

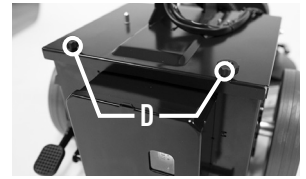
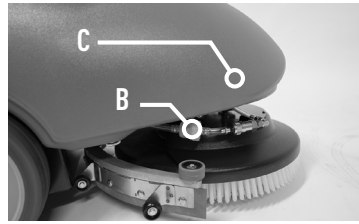
The machine already comes with on-board battery charger and sealed batteries.

If you prefer to install different batteries than those supplied with the machine, use only 12V (80Ah Max) AGM or GEL.

Batteries must be put in the compartment under the solution tank.

To insert the batteries, it is necessary to:

- Turn off the solution tap [A] under the tank, on the front left part of the machine
- Remove the solution pipe [B].
- Remove the solution tank [C].
- Open the closing hinges of the battery compartment [D].
- Rotate the handlebar by pulling the release lever
- Place battery inside the compartment
- Connect the cables to the battery terminals
- In the case of a lithium battery, use the switch to turn the battery on
- Connect the battery plug to the machine connector



**WARNING:** This operation must be performed by qualified personnel only.

A wrong or faulty connection may cause severe injury to people or property damage.

## BATTERY CHARGE

Do first a complete charge cycle of the battery before using the machine. When replacing the battery make sure you use suitable batteries to the charger installed.

Ensure the machine has been turned off, then insert the charger plug into the mains socket.

Follow the instructions of the attached manual for the correct use of the charger.

- The machine is designed with automatic security system that cuts off power when battery is under charge.
- To avoid permanent damage to the batteries, it is essential to avoid complete discharge of the same, even if the machine is not used. The recharge must begin within a few minutes at the beginning of the flashing warning light for low battery.
- Never leave the battery completely discharged, even if the machine is not in use
- For the battery daily recharge, it is necessary to follow strictly the instructions provided by the manufacturer or its dealer. All installations and maintenance must be performed by qualified personnel.
- Danger of leaking gas, fumes and corrosive liquids.
- Risk of fire: do not approach with open flames.
- It's essential to complete the charging cycle UP TO FULL CHARGE (> 8 h). A premature termination of the life cycle itself compromise life and the autonomy of the batteries
- Partial charges are permitted for LITIO batteries.

## RECOVERY TANK

The rudder comes folded up for reasons of packaging -it must be put in position before operating. To do this, follow these steps:

- Lift the rudder by pulling up the lever [E].
- Place the machine in working position.
- Apply the recovery tank at the helm and secure it with the hook [F].

**WARNING:** Verify the correct positioning of the recovery tank and check that the cap is closed properly.



## SOLUTION TANK

Fill the solution tank with clean water at a temperature not exceeding 50°C (Pic. 2); and add the liquid detergent in concentration and according to the manufacturer's instructions. To prevent an excessive amount of foam that would damage the vacuum motor, use the smallest percentage of low foam detergent and small amount of anti-foaming agent.

**WARNING:** Make sure that the cap is properly inserted in its seat and that the feeding solution tube is properly inserted [G].

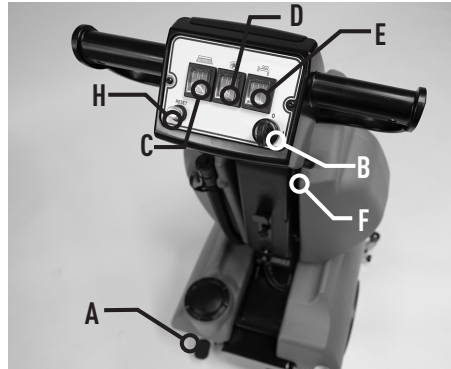


# USING THE MACHINE

## OPERATION

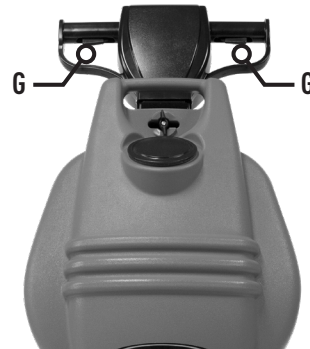
### BATTERY MACHINE:

- Release the front wheel lift lever [A] to proceed to work
- Lower the squeegee lever [F].
- Rotate the general switch [B] and check that the green led has turned on.
- Press the brush switch [C].
- Press the vacuum switch [D].
- Adjust the desired amount of cleaning solution by acting through the appropriate tap.
- Press the electro valve switch [E].



### CABLE MACHINE:

- Release the front wheel lift lever [A] to proceed to work
- Lower the squeegee control lever [F]
- Connect the plug to the power socket and check that the green light is on [B]
- Press the brush switch [C].
- Press the inlet power control [D].
- Adjust the desired amount of cleaning solution by acting through the appropriate tap.
- Press the electro valve switch [E].



Now the machine can operate at full efficiency until all the detergent solution is out by turning the operating lever that drives all controls [G].

**WARNING:** The limiter [H] comes into operation when the brush motor makes a greater effort than that required in the project. To reset wait a minute, then push the button again; the machine is ready for re-use.

## TRACTION

The traction is achieved thanks to the slight angle at which the brush operates, causing the dragging of the wheels forward.

**WARNING:** doing even short backward shifting movements, make sure that the squeegee is raised.

## MACHINE END WORK

### BATTERY MACHINE:

- Switch off the electro valve switch [E].
- Turn off the tap of the regulation of the detergent solution.
- Lift the rear handle to lift the squeegee [A].
- Switch off the vacuum switch [D].
- Switch off the brush switch [E].
- Turn the key switch [B].
- Keep the machine to the place for discharging dirty water.
- Hold the tube on the back of the machine [L].
- Open the drain plug and empty the recovery tank.

### CABLE MACHINE:

- Turn off the electrical valve switch [E].
- Close the tap of the regulation of the detergent solution
- Lift the back handle to lift the squeegee [A].
- Turn off the vacuum switch [D].
- Turn off the brushes switch [E].
- Disconnect the electrical supply.
- Keep the machine to the place for discharging dirty water.
- Hold the tube on the back of the machine [L].
- Open the drain plug and empty the recovery tank.

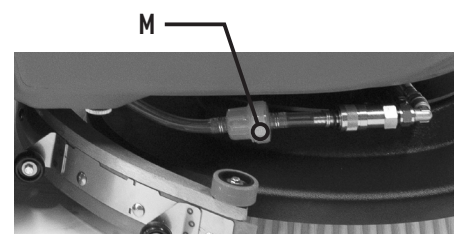
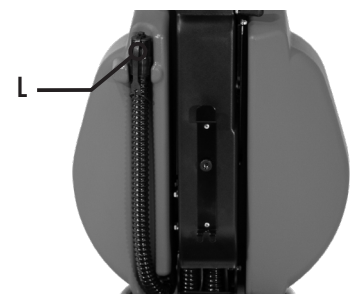
# PERIODIC MAINTENANCE

## RECOVERY TANK CLEANING

- Remove the recovery tank by the rudder hook.
- Hold the tube on the back of the machine.
- Open the drain plug [B] and empty the recovery tank.
- Remove the cap to access the tank.
- Rinse the tank and clean it with water jet.

## SOLUTION TANK CLEANING

- Remove the recovery tank by opening the rudder hook.
- Close the control valve of the cleaning solution.
- Remove the solution pipe.
- Remove the cleaning solution tank.
- Unscrew the cap on the detergent solution tank.
- Remove the filter [A] and clean.
- Replace filter and cap.
- Remount all the above in reverse order.



## SQUEEGEE CLEANING

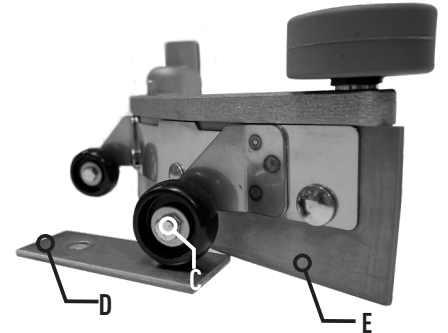
Check that the squeegee rubbers are always clean, in order to obtain a better floor drying. For the cleaning, it is necessary:

- Raise the machine relying on the rudder.
- Clean the inside carefully.
- Clean the wheels carefully.

## SQUEEGEE WHEELS ADJUSTEMENT

For correct adjustment of the squeegee support wheels, follow these points:

- Place the squeegee on a flat surface with the blade perpendicular to the plane;
- Unscrew the screw that blocks the rear wheel (C);
- Insert a 4 mm plate under the wheel (D);
- Fasten the screw (C) taking care not to tilt the wiper;
- Repeat the operations for all the squeegee wheels.



## SQUEEGEE RUBBERS REPLACEMENT

Check the wear of the squeegee rubbers and in case change them.

To replace them, it is necessary:

- Remove the recovery tank by opening the rudder hook.
- Close the control valve of the cleaning solution.
- Remove the solution pipe.
- Remove the cleaning solution tank.
- Unscrew the squeegee fixing screws.
- Remove the squeegee from the support.
- Unscrew the fixing screws on the squeegee that block the blades and remove them.
- Remove the rubber blades.
- Replace the rubber [E].
- Remount all the above in reverse order

## BRUSH REPLACEMENT

Set in the appropriate slots of the rotation system the bristled brush. Inserted in the same way the pad holder, where any commercial type of abrasive pad holders can also be put. This can be especially done for the hard cleaning of first laying floors. To remove the brush rotate the brush in counterclockwise sense.

## OVERFLOW DEVICE

The machine is equipped with a ball filter that gets activated when the recovery tank is full, causing the aspiration pipe closure. In this case it is necessary to turn off the machine and empty the recovery tank.

## NE286 BATTERY CHARGER

The machine is equipped with on-board battery charger model NE286 with the following technical specifications:

- Advanced technology High Frequency System.
- Charging process entirely under microprocessor control.
- Universal Input from 100V to 240V.
- "Soft Start" operating mode.
- Automatic reset when mounted a new battery and start the automatic charging cycle.
- Output relay protection against polarity reverse, short circuits, overvoltage or any anomaly.
- Charger connection without sparks risks at the output terminals, with obvious advantages in terms of active safety, thanks to the recognition of the battery tensions by the relay output, normally open.
- Visual indication of any anomalies by RED/ YELLOW FLASHING LEDS.
- Charging parameters independent from voltage changes up to  $\pm 10\%$
- Efficiency  $> 85\%$ .
- Output ripple less than 100mV at maximum load.
- Charge cycle still starting at only 2V battery charge.



## NE286 OPERATING PRINCIPLES

When turning on the new NE286 series, the charger performs a test on battery voltage to determine whether or not to start charging routine.

By unconnected battery, the red LED starts flashing.

By successful test, the battery charging starts within one second and red led will be steady lit. The output relay closes and the first phase of the current slowly rises to the set nominal value. If during the process the battery is disconnected, after a few seconds, the charger resets and prepares starting a new charging process.

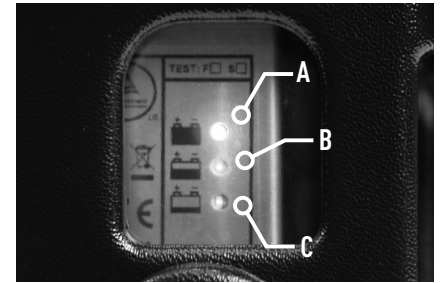
The charging progress is shown by three LED's : RED, YELLOW and GREEN, as in the whole range of the battery chargers. The GREEN led shows the end of the charging or the last phase in case of deep charging process; in the former case, the relay is opened to disconnect galvanically the battery from the battery charger.

NORMAL	
Red led ON	First phase of charge in progress
Yellow led ON	Second phase of charge in progress
Green led ON	End of charge or maintenance phase
ANOMALIES	
Yellow led flashing 1 time	Battery disconnected or polarity inversion or short circuit at the output
Yellow led flashing 2 times	Defective battery or battery capacity too high
Yellow led flashing 3 times	Defective charger
Yellow led flashing 4 times	Overtemperature

## NE286 BATTERY CHARGER REPLACEMENT

To replace the battery charger in case of failure or malfunction, please proceed as follows:

- Remove both tanks of the machine.
- Remove the four fixing screws of the charger.
- Open the battery compartment.
- Disconnect the battery charger connectors.
- Remove the battery charger.
- Replace the battery charger.
- Tighten the fixing screws of the battery charger.
- Plug in the battery charger.
- Close the battery compartment.
- Replace both tanks on the machine.



## CHARGE CONTROLLER

The charge controller is on the battery charger which is on back of the machine and it is divided in three colored LEDs, which indicate the level of power:

- Green: full charged battery
- Yellow: low battery
- Red: recharge

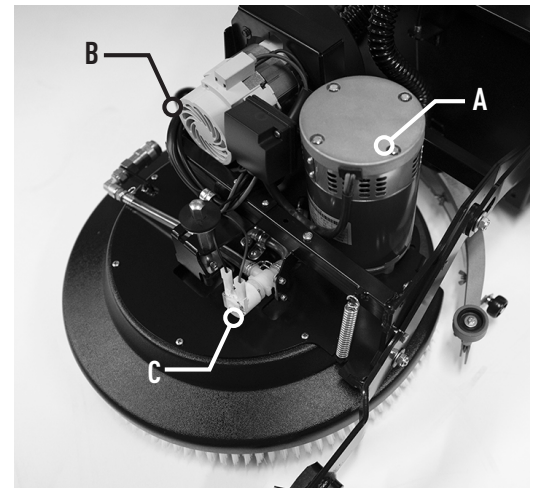
These phases are associated to warning flashing lights, after which the control system will cut power to the brush motor, allowing the vacuum motor to run for a further minute to complete the recovery of remains on the floor, before the recharge.

**Switching the key off and on again resets the flashing red light and the brush starts working again. This operation must not be performed as it compromises battery life. When the red LED starts flashing and the brush stops, complete the drying phase as soon as possible and recharged immediately the batteries.**

## EXTRAORDINARY MAINTENANCE

### BRUSHES MOTOR/VACUUM MOTOR/ELECTRO VALVE

- Remove the recovery tank from the stem by the hook.
- Turn off the tap of the regulation of the detergent solution.
- Disconnect the detergent solution pipe.
- Remove the solution tank.
- Operate on the brush motor [A], on the vacuum motor [B] or on the electrical valve [C].



### BRUSHES TRANSMISSION

- Remove the recovery tank from the stem by the hook.
- Turn off the tap of the regulation of the detergent solution.
- Disconnect the detergent solution pipe.
- Remove the detergent solution tank.
- Remove the brush guard.
- Operate on the transmission parts.

### CONTROL PANEL

- Unscrew the fixing screws of the control panel [E].
- Extract the control panel, paying attention to the connections.
- Operate on the electrical components.



### FUSE REPLACEMENT

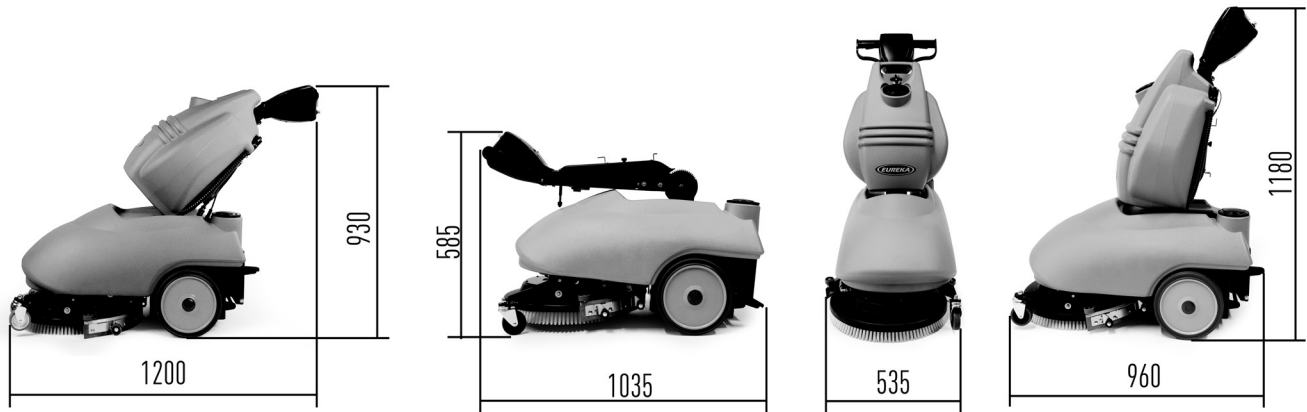
- Unscrew the screws securing the rear door [D].
- Remove fuse box cover
- Replace fuses

### SYSTEM ELECTRICAL PLAN

- Remove the recovery tank from the stem by the hook.
- Unscrew the fixing screws from the back stem case [D].
- Remove the back frame from the stem.
- Operate on the electrical parts



## DIMENSIONAL DRAWINGS



## TECHNICAL CHART

	<b>E46 BATTERY</b>	<b>E46 CABLE</b>
Clean area	1600 m <sup>2</sup> /h	1600 m <sup>2</sup> /h
Vacuum motor	250 W	300 W
Brush motor	350 W	800 W
Brush diameter	450 mm	450 mm
Brush rotation	140 RPM	140 RPM
Power supply	24 VDC	230/50-60 V/Hz
Squeegee	540 mm	540 mm
Brush pressure	35 kg	35 kg
Solution tank	28 L	28 L
Recovery tank	30 L	30 L
Depression	800 mm/H <sub>2</sub> O	800 mm/H <sub>2</sub> O
Weight	50 kg	50 kg
Dimensions	830 x 540 x 1000 mm	830 x 540 x 1000 mm

## TROUBLE-SHOOTING CHART

### WARNING!

ANY TYPE OF SERVICE OPERATION OR TEST, WITH THE EXCEPTION OF THOSE SHOWN IN THE ENGINE'S MANUAL OR THE BATTERY'S MANUAL, MUST BE CARRIED OUT BY AUTHORIZED SERVICE CENTRES ONLY.

FAULT	CAUSE	SOLUTION
No cleaning solution flowing out	The solution-carrying pipes are clogged	Remove obstructions
	Filters are clogged	Clean or replace the filter
	Solution tank is empty	Fill the tank
	Regulation tap has been closed	Open the tap
The squeegee does not suck dirt	Vacuum hose clogged	Clean the pipe
	Vacuum hose perforated	Change the pipe
The squeegee leaves dirt remains	The edge of the rubber blade scraping the floor is worn out	Replace the rubber blades
The machine does not clean properly	Brushes worn out	Change the brushes
Brush motor does not work (AC-powered machine)	The RESET button went off	Press RESET
	The fuse is blown	Replace the fuse
Brush motor does not work (Battery-powered machine)	Batteries low or exhausted	Recharge or replace batteries
	The RESET button went off	Press RESET
	The fuse is blown	Replace the fuse
Machine doesn't switch on (LITIO vers.)	Battery off or in stand-by	Switch on the battery with the switch

## EU DECLARATION OF CONFORMITY

according to Annex II A of the Machinery Directive 2006/42/CE

The manufacturer that places this product on the market:

**EUREKA S.p.A. Unipersonale**  
VIALE DELL'ARTIGIANATO 30/32, 35013 CITTADELLA (PD) - ITALY

formally declares that the product:

**Scrubber E46 AGM**  
**Scrubber E46 LI-ION**  
**Scrubber E46 CABLE**

complies with the following EU Directives:

**2006 / 42 / CE**  
**2014 / 30 / UE**  
**2014 / 35 / UE**  
**2011/ 65 / UE + 2015 / 863**  
**2009 / 125 / CE**

Machinery Directive, Annex 1  
Electromagnetic Compatibility (EMC) Directive  
Low Voltage Directive  
RoHS 3 Directive  
Energy-Related Products (ErP) Directive

The following harmonised and technical standards have been applied:

<b>EN ISO 12100:2010</b>	Safety of machinery - General principles for design - Risk assessment and risk reduction.
<b>EN 60335-1:2013</b>	Household and similar electrical appliances - Safety - Part 1: General requirements.
<b>EN 60335-2-72:2016</b>	Household and similar electrical appliances - Safety - Part 2: Particular requirements for floor treatment machines with or without traction drive, for commercial use.
<b>EN 55014-1:2019</b>	Electromagnetic compatibility - Requirements for household appliances - electric tools and similar apparatus - Part 1: Emission.
<b>EN 55014-2:2015</b>	Electromagnetic compatibility - Requirements for household appliances, electric tools and similar apparatus - Part 2: Immunity - Product family standard.
<b>EN 61000-6-2:2016</b>	Electromagnetic compatibility (EMC) - Part 6-2: Generic standards - Immunity standard for industrial environments.
<b>EN 61000-6-4:2018</b>	Electromagnetic compatibility (EMC) - Part 6-4: Generic standards - Emission standard for industrial environments.
<b>EN 62233:2008</b>	Measurement methods for electromagnetic fields of household appliances and similar apparatus with regard to human exposure.

Legal representative and person authorized to compile the technical file: Antonio Barile

Cittadella, 15/12/2023

EUREKA S.p.A  
(Legal representative)

