ENDEAVOR

QUICK GUIDE 90001-HSH





BEFORE OPERATING THE MACHINE:

Read the manual carefully and completely before attempting to operate the unit. This manual has important information for the use and safe operation of the machine. Keep this manual handy at all times. This machine will ensure years of satisfactory service if operated and maintained according to recommendations in this manual. If additional information is needed, please contact your local distributor or contact EDIC:

EDIC Technical department: 800-338-3342 xt 109

EDIC EMAIL: info@edic-usa.com

WARNING

- The machine was designed for use on hard surfaces, carpet, floor and upholstery extraction applications as per instructions and recommendations written in this manual. Any deviation from its proper use or purpose and the consequential damage that may occur is the sole responsibility of the end user.
- Disconnect the power cord from the outlet before servicing. Do not leave machine connected to an electrical outlet when unattended.
- Do not immerse or use this machine in standing water. Such use may cause electric shock.
- When using an extension cord, use only a 3-prong conductor grounding cord-12 gauge wire or heavier.
- To avoid electric shock, do not expose the unit to rain or snow. Store it indoors in a heated location only.
- Do not use the machine for dry vacuuming.
- Never use without pre-filter bag.
- Use defoamer at all times to prevent damage to the vacuum motor.
- Do not use water in excess of $130^{\circ}F(54^{\circ}C)$ in the solution tank
- To prevent seal damage and chemical build-up to the pump system, run clean water through the solution lines after each day's use.
- Use only commercially available carpet cleaning solutions and defoamer intended for use with machines of this type. Do not use dyes, bleaches, ammonia, or other additives. The use of powdered cleaning solution if not diluted properly may result in damage to the pump. POWDERED CHEMICALS ARE NOT RECOMMENDED. If powdered chemicals are used, premix in a separate container before placing in the solution tank.
- Always read and understand your chemical's MSDS (Material Safety Data Sheet) before use.
- This equipment is not designed to handle or use combustible/volatile substances such as gasoline or kerosene, in, on, or near the machine. The use of such materials will cause extreme hazardous condition.
- Do not expose machine to freezing temperatures.
- All repairs must be done by an authorized EDIC repair station.
- Do not use replacement parts other than original EDIC parts.
- Do not allow your spray stream to remain in one fixed location as surface damage may occur.
- Check that all spray nozzles are securely fastened. Loose nozzles could be ejected from equipment at high speeds.
- Prevent burns by wearing gloves or using a barrier to remove hot quick disconnects.
- This is not a toy. Keep away from children.
- Do not pull by the power or use power cord as a handle. Always unplug by grabbing the plug and pulling, do not unplug by pulling the power cord.
- Inspect cord for damage. Do not use damaged cords. Connect only to properly grounded outlets.
- Keep hair, fingers, loose clothing, and body parts away from moving parts and openings.
- Turn off all controls before disconnecting machine
- Use caution with ejected liquid or chemicals. High pressures and temperatures could be hazardous to nearby people or surroundings.

INITIAL INSPECTION:

Every machine that EDIC builds has been meticulously tested and inspected by multiple personnel before being packed and shipped. This machine has left the factory in good condition and free of defects or damage. Any damage has happened after leaving the factory and is the responsibility of the carrier. The carrier must be notified immediately if there is any damage.

CHEMICAL CLEANING SOLUTIONS:

A proper pre-spray needs to be selected and applied to the surface being cleaned. A rinse or detergent of neutral pH (6 to 10pH) needs to be used with your ENDEAVOR to prevent premature wear of pump seals and related components. Damage caused by the use of improper chemicals is not covered under warranty. Please consult with your local distributor for recommended chemicals.

MAINTENANCE OF THE ENDEAVOR:

To ensure a long lasting life and optimum performance, certain maintenance procedures must be performed on a regular basis.

DAILY:

- Flush the plumbing system with clean fresh water at the end of the day.
- Run the vacuum motor for 30 seconds before putting away the ENDEAVOR.
- Rinse out the Recovery tank and clean filters after every use.

MONTHLY:

- Use a flushing agent through the machine's plumbing to dissolve mineral and chemical build up.

GENERAL:

- The exterior may be cleaned with any standard all-purpose detergent. You may protect it with auto interior polish designed for vinyl or plastic.
- Quick disconnects, wheels, casters, and regulators can be lubricated with an all-purpose silicone lubricant spray.

ENDEAVOR 9000I-HSH CONTROL PANEL



- 1. POWER SWITCH TO VACUUM MOTOR.
- 2. POWER SWITCH TO PUMP MOTOR.
- 3. POWER SWITCH TO HEATER. LIGHT INDICATES HEAT ELEMENT IS ON.
- 4. SWITCH CONTROLS AUTO DUMP PUMP. LIGHT CONFIRMS POWER.
- 5. POWER PRIME/PRESSURE RELIEF VALVE. SET TO "P" TO RELIEVE PRESSURE OR PRIME THE PUMP. DO NOT LEAVE UNATTENDED IN THE "P" POSITION.
- 6. CIRCUIT LOCATOR. THE GREEN LIGHT WILL TURN ON WHEN THE TWO POWER CORDS ARE CONNECTED TO TWO SEPARATE CIRCUITS.
- 7. PRESSURE GAUGE USED TO MONITOR PRESSURE. DO NOT EXCEED 1100PSI.
- 8. QUICK DISCONNECT FOR SOLUTION LINE. CONNECTS TO OPTIONAL 990RS CHEMICAL FEED SYSTEM.
- 9. PRESSURE REGULATOR. TURN CLOCKWISE TO INCREASE PRESSURE AND COUNTER-CLOCKWISE TO REDUCE PRESURE. DO NOT EXCEED 1100PSI
- 10.VACUUM HOSE CONNECTOR. CONNECT YOUR 1.5" VACUUM HOSE TO THIS BARB.

ELECTRICAL:

The ENDEAVOR is equipped with two female PowerCON chassis connectors. The chassis connectors are located on the bottom rear right of the machine.



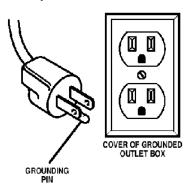
CONNECTING POWERCON CONNECTOR:

- 1. The connector can only be inserted when the chuck and keyway are matched properly; do not force.
- 2. Line the end of each male power cord into the keyway of the female chassis connector and turn clockwise. You will hear a "click" sound when the connector has engaged and is locked into place.
- 3. To unplug, pull back on the thumb lock slider, turn counter-clockwise and pull back.
- 4. Both cords must be used simultaneously to ensure full functionality of the Endeavor.



GROUNDING INSTRUCTIONS:

The ENDEAVOR has been outfitted with the appropriate grounded connectors. Make sure the machine is connected to a grounded outlet having the same configuration as the grounded plug. No adapter should be used with this machine. Any modification to the connectors will void the warranty.



GFCI FUNCTION:

Each power cord is equipped with a GFCI (Ground Fault Circuit Interruptor) box. The GFCI is designed to trip and cut off power in the event of an unsafe electrical condition. Any time the power cord is plugged in or unplugged, you must reset the GFCI box by pressing the red button on the GFCI box.



CIRCUIT LOCATOR:

The ENDEAVOR has a built in circuit locator that is designed to detect the availability of two circuits. Do not connect both of the power cords to the same wall outlet. If the green light on the front panel (marked CT) turns on, then you are on two separate circuits. If it fails to turn on, you must locate another outlet on another circuit until it comes on. Although the ENDEAVOR's functions may operate normally, do not ignore the circuit locator as doing so may overload a single circuit and blow the wall breaker.



VACUUM AND SOLUTION HOSE:



- 1. Connect your 1.5 inch vacuum hose to the black hose barb on the front panel.
- 2. Connect your blue high pressure solution line to the brass quick connect. If you have an optional 990RS chemical feed system, it connects to this quick disconnect first.
- 3. Connect the opposite ends of the hoses to your working tool.

MANUAL FILL AND DUMP:

The EDIC ENDEAVOR can be filled and dumped in the same manner as a traditional portable machine using buckets or hoses whenever your surroundings do not allow for auto fill or auto dump.

TO FILL:

Lift the lid in the front of the tank and fill with a garden hose or bucket. The solution tank has a 13 gallon capacity.



TO DUMP:

Locate the dump valve on the rear of the machine. Place a bucket under the valve or direct the valve to an appropriate waste receptacle, lift up on the handle to allow emptying of the waste water. A removable elbow has been provided with the machine to change the direction of waste water flow.



NOTE: Remove the elbow if you will be loading the machine into a vehicle to prevent damage to the elbow and to the drain valve.

AUTO FILL AND AUTO DUMP:

The 9000I-HSH ENDEAVOR is equipped with Auto-fill/Auto-Dump capabilities. To use this feature, locate the two hose ports that are located on the bottom left rear of the machine. The female fitting is the "in" and the male fitting is the "out".



AUTO FILL:

- Securely connect a garden hose to a faucet or water source.
- Securely connect a 3/4" garden hose to the female "IN" port of the ENDEAVOR and turn on the water source to fill your machine. Simply turn the water on, it is not necessary to turn the water on at high pressure.
- The ENDEAVOR has been outfitted with an automated fill valve that will maintain the appropriate water level. Make sure the float on the fill valve is free and unobstructed.
- It is advisable to monitor the machine periodically to prevent flooding or running dry. Inspect garden hoses for kinks, leaking and damage to the threads.

AUTO DUMP:

- Securely connect a 3/4" garden hose to the "out" port of the ENDEAVOR.
- Secure the open end of the garden hose to a drain.
- Locate the switch marked "**pump out**" on the front panel and place it into the on position. This will turn the dump pump on. The dump pump can be run continuously and experience periods of running dry without any negative effects.
- Daily cleaning of the intake filter bag and the pump intake filter located in the recovery tank are essential to preserving the proper function of the pump out feature. It is up to the operator to determine a proper cleaning schedule as workloads differ from job to job. It is advisable to inspect the filters periodically to gauge what an appropriate cleaning schedule would be.

VACUUM:

Before Using the Vacuum, first connect your vacuum hose to the hose barb connector on the machine as well as your floor tool (carpet wand, REVOLUTION, upholstery tool). Then turn on the vacuum motor by placing the vacuum (VAC) switch, located on the front panel, in the ON position.

PUMP:

Before turning on the pump, make sure your solution line and working tool are connected to allow spraying. To turn the ENDEAVOR's pump on, locate the pump switch on the front panel and place it in the ON position. If your pump needs to be primed, please see priming and pressure relief section. Never leave the machine unattended in the "P" position to prevent flooding or loss of solution.

REGULATING PRESSURE:

To regulate pressure, locate the regulator on the front of the machine and turn the pump switch into the on position. Turn the regulator counter-clockwise to reduce pressure and turn clockwise to increase pressure.

Do not regulate above 1100PSI. Do not regulate while spraying.



Make sure you have set the pressure appropriate for the particular job you are performing.

HEATER:

The Endeavor model 9000I-HSH has been outfitted with an internal in-line 2000 watt dual element heater that will provide consistent heat at 500PSI and below. The heater is controlled by a sensor that prevents it from being turned on while the pump is spraying at high pressure. When the pressure is dropped to 500PSI and below, the sensor will allow the heater to turn on.

Before turning the heater on, turn on your pump and make sure to spray for a few seconds to evacuate any air from the system. Do not run the heater while dry.

TO USE THE HEATER:

- 1. Turn the heater switch to the ON position. The green light on the heater switch will light up if you are at 500PSI or below. If it lights up, skip steps 2 and 3 and move on to step 4.
- 2. If you have been using the machine at any PSI above 500PSI, you must first drop the pressure to below 500PSI before you can use the heater.
- 3. Turn on the pump and turn the regulator counter-clockwise. Drop the pressure to 400 PSI or until the green pump switch light turns on. If you want to use the heater at a lower PSI, keep dropping the pressure to the desired PSI. If you want to use it at 500PSI, raise the pressure to 500PSI. Once you go over 500PSI the heater will automatically turn off.
- 4. Allow the heat element up to 3 minutes to preheat cold tap water before beginning your job. When the heater has reached full temperature, the light on the switch will turn off. Once you start working, the light will turn on and off as the heater's temperature monitoring system maintains proper temperature. Using warm water will yield the hottest results in less time.

WARNING:

- Do not store the ENDEAVOR at freezing temperatures. Do not expose to freezing temperatures for extended periods of time. This could cause a rupture of the heater tank as well as the pump and plumbing.
- Read and understand this HEATER portion of the owner's manual before using the HEATER on your ENDEAVOR Extractor.
- Do not run heater dry.
- Make sure water is flowing through the heater anytime the heater is on. Failure to do so may cause internal component damage and will void warranty
- Turn off the switch when not in use.
- Do not use heater at more than 500 PSI
- To avoid explosion and/or fire, do not use solvents or any flammable liquid in heater.

PRIMING AND PRESSURE RELIEF:



TO RELIEVE PRESSURE:

Turn the lever to the "P" and it will relieve the pressure.

TO PRIME:

Simply turn the pump on and the lever to "P". Wait 10-20 seconds, turn lever away from "P" and check for functioning spray.

TO POWER PRIME:

Remove your Vacuum hose, turn the lever to "P", turn the pump and vacuum switches to the on position. Place your hand over the vacuum hose connector barb and wait 10-20 seconds. Your machine should be primed. Reconnect hoses and check for functioning spray.

NOTE: You must put the valve back to its original position before using the machine or you will experience a loss in pressure. To avoid accidental flooding, never leave the machine unattended while the priming/pressure relief lever is in the "P" position.

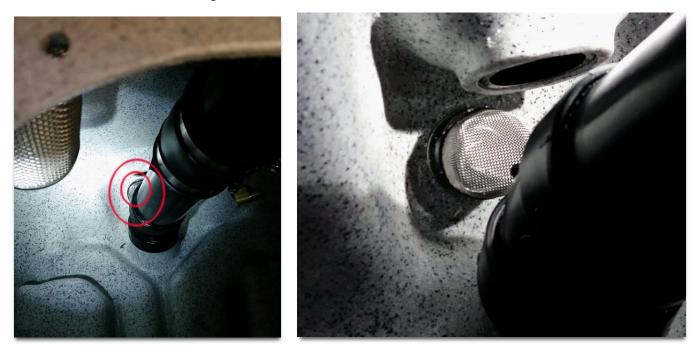
ACCESSING THE WASTE WATER TANK:



- 1. Locate the waste tank lid on the top of the machine and pull the locking lever out.
- 2. Turn the locking lever 45 degrees in either direction and pull the lid OFF. Place the lid in a safe location.

INTAKE FILTER FOR WASTE WATER/DUMP PUMP:

The dump pump filter is located behind the vacuum intake stand pipe in the center of the waste water tank. The filter base is made of a flexible rubber material that will engage the threading on the tank base. Turn counter-clockwise to remove and clean. Turn Clockwise to re-tighten.



INTAKE FILTER BAG:

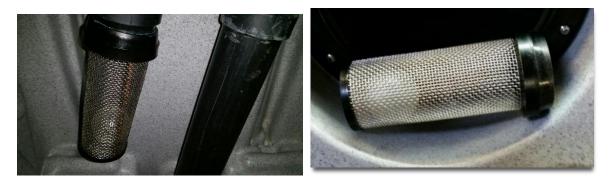
The intake filter bag has been designed to catch larger debris before it enters the open area of the waste tank. This keeps the dump pump intake filter from clogging too fast, allowing un-interrupted flow to the dump pump.

Locate the filter bag in the waste tank, press the cord release and pull back to loosen the drawstrings. Rinse the bag out and place back into the tank. Tighten the cord release. Always remove the bag by loosening the cord, do not pull the elbow out.



VACUUM INTAKE FILTER AND VACUUM SHUT OFF:

The vacuum intake filter houses the float ball which is in place to shut off airflow to the vacuum motor by floating and, eventually, blocking the vacuum intake in the event that the recovery tank over-fills. This function keeps the vacuum motor from taking in fluids and getting damaged. Although the filter will probably not get dirty quickly, there may be a need to remove it and clean it if you notice debris building up. Pull down on the filter to remove it and clean as needed. Firmly press it back into place. If it is minor build up you may use a towel to wipe off the surface of the filter.



NOTE: Daily cleaning of the intake filter bag and the pump intake filter located in the recovery tank are essential to preserving the proper function of the pump out feature. It is up to the operator to determine a proper cleaning schedule as workloads differ from job to job. It is advisable to inspect the filters after the completion of each job to gauge what an appropriate cleaning schedule would be.

If you have purchased a 990RS chemical feed system please refer to the manual in the chemical feed box.



1-800-338-3342

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