

Technical Support and E-Warranty Certificate www.vevor.com/support

# POWDER COATING MACHINE

We continue to be committed to provide you tools with competitive price.

"Save Half", "Half Price" or any other similar expressions used by us only represents an estimate of savings you might benefit from buying certain tools with us compared to the major top brands and does not necessarily mean to cover all categories of tools offered by us. You are kindly reminded to verify carefully when you are placing an order with us if you are actually saving half in comparison with the top major brands.



# POWDER COATING MACHINE

MODEL:ZP-808



### **NEED HELP? CONTACT US!**

Have product questions? Need technical support? Please feel free to contact us:

Technical Support and E-Warranty Certificate www.vevor.com/support

This is the original instruction, please read all manual instructions carefully before operating. VEVOR reserves a clear interpretation of our user manual. The appearance of the product shall be subject to the product you received. Please forgive us that we won't inform you again if there are any technology or software updates on our product.

# 1. IMPORTANT SAFEGUARDS

# **SYMBOLOGY**

R	Warning - To reduce the risk of injury, the user must read the
	instructions manual carefully.
$\sim$	Alternating current (Volts)
Α	Amperes
^	This symbol, placed before a safety comment, indicates a kind of
AL	precaution, warning, or danger. Ignoring this warning may lead to
	an accident. To reduce the risk of injury, fire, or electrocution,
	please always follow the recommendation shown below.
$\wedge$	Danger!
77	Risk of personal injury or environmental damage! Risk of electric
	shock! Risk of personal injury by electric shock!
	Warning- Be sure to wear ear protectors when using this product.
	Warning- Be sure to wear eye protectors when using this product.
9	Warning- Be sure to wear dust masks when using this product.
	Warning- Be sure to wear gloves when using this product.
	CORRECT DISPOSAL
X	This product is subject to the provision of European Directive
	2012/19/EC. The symbol showing a wheelie bin crossed through
	indicates that the product requires separate refuse collection in the
	European Union. This applies to the product and all accessories
	marked with this symbol. Products marked as such may not be
	collection point for recycling electrical and electronic devices.
	Warning- Be sure to wear dust masks when using this product.  Warning- Be sure to wear gloves when using this product.  CORRECT DISPOSAL  This product is subject to the provision of European Directive 2012/19/EC. The symbol showing a wheelie bin crossed through indicates that the product requires separate refuse collection in the European Union. This applies to the product and all accessories marked with this symbol. Products marked as such may not be discarded with normal domestic waste, but must be taken to a

### **WARNING**

**READ AND UNDERSTAND ALL INSTRUCTIONS.** Failure to follow all instructions listed below may result in electric shock, fire, and/or serious injury. **SAVE THESE INSTRUCTIONS** for future reference.

### **Work Area**

- 1.Keep your work area clean and well lit. Cluttered benches and dark areas invite accidents.
- 2.Do not operate power tools in explosive atmospheres, such as in the presence of flammable liquids, gases, or dust. Power tools create sparks which may ignite the dust or fumes.
- 3.Keep bystanders, children, and visitors away while operating a power tool.

Distractions can cause you to lose control. Protect others in the work area from debris such as chips and sparks. Provide barriers or shields as needed.

4.Use the tool in a well-ventilated area. Spray dust can cause injury or explosion hazard.

### **Electrical Safety**

- 5. Avoid body contact with grounded surfaces such as pipes, radiators, ranges, and refrigerators. There is an increased risk of electric shock if your body is grounded.
- 6.Do not expose power tools to rain or wet conditions. Water entering a power tool will increase the risk of electric shock.
- 7.Grounded tools must be plugged into an outlet properly installed and grounded in accordance with all codes and ordinances. Never remove the grounding prong or modify the plug in any way. Do not use any adapter plugs. Check with a qualified electrician if you are in doubt as to whether the outlet is properly grounded. If the tools should electrically malfunction or break down, grounding provides a low resistance path to carry electricity away from the user.
- 8.Do not abuse the Power Cord. Never use the Power Cord to carry the

tools or pull the Plug from an outlet. Keep the Power Cord away from heat, oil, sharp edges, or moving parts. Replace damaged Power Cords immediately. Damaged Power Cords increase the risk of electric shock.

9.When operating a power tool outside, use an outdoor extension cord marked "W-A"" or "W"These extension cords are rated for outdoor use, and reduce the risk of electric shock.

### Personal Safety

- 10.Stay alert.Watch what you are doing, and use common sense when operating a power tool. Do not use a power tool while tired or under the influence of drugs, alcohol, or medication. A moment of inattention while operating power tools may result in serious personal injury.
- 11.Dress properly. Do not wear loose clothing or jewelry. Contain long hair. Keep Your hair, clothing, and gloves away from moving parts. Loose clothes, jewelry, or long hair can be caught in moving parts.
- 12.Avoid accidental starting. Be sure the Power Switch is off before plugging in. Carrying power tools with your finger on the Power Switch, or plugging in power tools with the Power Switch on, invites accidents.
- 13.Remove adjusting keys or wrenches before turning the power tool on. A wrench or a key that is left attached to a rotating part of the power tool may result in personal injury.
- 14.Do not overreach. Keep proper footing and balance at all times. Proper footing and balance enables better control of the power tool in unexpected situations.
- 15.Use safety equipment. Always wear eye, face, and breathing protection. Dust mask, non-skid safety shoes, hard hat, or hearing protection must be used for appropriate conditions.

### **Tool Use and Care**

- 16 Use clamps (not included) or other practical ways to secure and support the workpiece to a stable platform. Holding the work by hand or against your body is unstable and may lead to loss of control.
- 17. Do not force the tool. Use the correct tool for your application. The correct tool will do the job better and safer at the rate for which it is

designed.

- 18.Do not use the power tool if the Power Switch does not turn it on or off. Any tool that cannot be controlled with the Power Switch is dangerous and must be replaced.
- 19.Disconnect the Power Cord Plug from the power source before making any adjustments, changing accessories, or storing the tool. Such preventive safety measures reduce the risk of starting the tool accidentally. 20.Store idle tools out of reach of children and other untrained persons. Tools are dangerous in the hands of untrained users.
- 21. Maintain tools with care. Properly maintained tools are less likely to clog and are easier to control. Do not use a damaged tool. Tag damaged tools "Do not use" until repaired.
- 22. Check for misalignment or binding of moving parts, breakage of parts, and any other condition that may affect the tool's operation. If damaged, have the tool serviced before using. Many accidents are caused by poorly maintained tools.
- 23.Use only accessories that are recommended by the manufacturer for your model. Accessories that may be suitable for one tool may become hazardous when used on another tool.

### SPECIFIC SAFETY RULES FOR THIS PRODUCT

- 1. Maintain labels and nameplates on the Powder Coating System. These carry Important information.
- 2.Always wear ANSI approved safety impact eye goggles, respirator, and heavy work gloves when using the Powder Coating System. Using personal safety devices reduces the risk of injury.
- 3.Maintain a safe working environment. Keep the work area well lit. Make sure there is adequate surrounding workspace. Always keep the work area free of obstructions, grease, oil, trash, and other debris. Do not use a power tool in areas near flammable chemicals, dust, and vapors. Do not use this product in a damp or wet location.
- 4. Avoid unintentional starting. Make sure you are prepared to begin work before turning on the Powder Coating System.

- 5.Do not force the Powder Coating Machine. This tool will do the work better and safer at the speed and capacity for which it was designed.
- 6.Always unplug the Powder Coating System from its electrical outlet before performing any inspection, maintenance, or cleaning procedures.
- 7. Never leave the Powder Coating System unattended while running. Turn the power off if you have to leave the Powder Coating System.
- 8.Before each use, check all nuts, bolts, and screws for tightness. Vibration during mixing may cause these to loosen.
- 9. Keep the extension cord off the ground and away from water.
- 10. Always connect the Power Cord to a grounded electrical outlet.
- 11. The powder dust is flammable when floating in the air.
- -Ventilate the area well.
- -Verify that there are no flames or ignition source nearby.
- -Control excess dust by cleaning up after each use.
- -Never vacuum up the dust using a non-explosion proof vacuum cleaner.
- -Never cure coated object in a gas oven as the fumes recreated can be flammable; only use an electric oven.
- -Never smoke while using the Powder Coating System.
- 12. Avoid electrical shock!
- -Never touch the emitter (metal tip) of the Spray Gun. After use (and turned OFF), touch the emitter to the Ground Clip to discharge it.
- -Do not use the Spray Gun if you carry and use any electronic medical devices.
- -Never touch the metal object during coating.
- 13. Avoid powder contamination.
- -Protect your lungs by using an approved dust mask.
- -Never cure objects in an electric oven that is used for food also.
- -Ventilate the area well.
- -Wear an activated charcoal respirator when oven curing the coated object.
- 14.People with pacemakers should consult their physician(s) before using this product. Electromagnetic fields in close proximity to a heart pacemaker could cause interference to or failure of the pacemaker.

### **GROUNDING**

### **WARNING!**

Improperly connecting the grounding wire can result in the risk of electric shock. Check with a qualified electrician if you are in doubt as to whether the outlet is properly grounded. Do not modify the power cord plug provided with the tool or product. Never remove the grounding prong from the plug. Do not use the tool if the power cord or plug is damaged. If damaged, have it repaired by a service facility before use. If the plug will not fit the outlet, have a proper outlet installed by a qualified electrician.

### **Grounded Tools with Three Prong Plugs**

The Powder Coating System comes with a 3-prong grounded plug.

- 1. Tools marked with "Grounding Required" have a three-wire cord and three-prong grounding plug. The plug must be connected to a properly grounded outlet. If the tool should electrically malfunction or break down, grounding provides a low resistance path to carry electricity away from the user, reducing the risk of electric shock. (See Figure A on the next page.) The grounding prong in the plug is connected through the green wire inside 2. The cord to the grounding system in the tool. The green wire in the cord must be the only wire connected to the tool's grounding system and must
- 3. Your tool must be plugged into an appropriate outlet, properly installed and grounded in accordance with all codes and ordinances. The plug and outlet should look like those in the following illustration.

never be attached to an electrically "live" terminal. (See Figure A.)



Figure A

4. Tools with a polarized plug (one blade is wider than the other) serve as a feature to reduce the risk of electric shock. This plug will fit in a polarized outlet only one way. If the plug does not fit fully in the outlet, reverse the plug. If it still does not fit, contact a qualified electrician. Never use with an extension cord unless the plug can be fully Inserted. Do not alter the plug. 5. Tools marked "Double Insulated" do not require grounding. They have a special double insulation system which satisfies OSHA requirements and complies with the applicable standards of Underwriters Laboratories, Inc., the Canadian Standard Association, and the National Electrical Code. (See Figure B above.)

### **EXTENSION CORDS**

- 1.Grounded tools require a three-wire extension cord. Double Insulated tools can use either a two or three-wire extension cord.
- 2.As the distance from the supply outlet increases, you must use a heavier gauge extension cord. Using extension cords with inadequately sized wire causes a serious voltage drop, resulting in power loss and possible tool damage. (See Table A.)
- 3. The smaller the gauge number of the wire, the greater the capacity of the cord. For example, a 14 gauge cord can carry a higher current than a 16 gauge cord. (See Table A.)
- 4. When using more than one extension cord to make up the total length, ensure each cord contains at least the minimum required wire size. (See Table A.)
- 5.If you are using one extension cord for more than one tool, add the nameplate amperes and use the sum to determine the required minimum cord size. (See Table A.)
- 6.If you are using an extension cord outdoors, make sure it is marked with the suffix "w-A" ("W" in Canada) to indicate it is acceptable for outdoor use.
- 7.Make sure your extension cord is properly wired and in good electrical condition. Always replace a damaged extension cord or have it repaired by a qualified electrician Before using it.
- 8. Protect your extension cords from sharp objects, excessive heat, and damp or wet areas.

Table A

		(220 V	OLT)		
NAMEPLATE	EXTENSION CORD LENGTH				
AMPERES					
(At Full Load)					
90	25	50	75	100	150
	Feet	Feet	Feet	Feet	Feet
0 - 2.0	18	18	18	18	16
2.1 - 3.4	18	18	18	16	14
3.5-5.0	18	18	16	14	12
5.1 - 7.0	18	16	14	12	12
7.1 - 12.0	16	14	12	10	-
12.1 - 16.0	14	12	10	2	
16.1 - 20.0	12	10	•	; <u>-</u>	-

<sup>\*</sup> Based on limiting the line voltage drop to five volts at 150% of the rated amperes.

- 9. Warnings must be followed carefully to avoid body injury. Improper use may result in electric shock, fire, personal injury and other damage:
- 10. Keep unplugging when moving the machine.
- 11.Keep unplugging when installing accessories
- 12.Place on a flat and stable platform and operate under ventilated conditions
- 13. Wear special protective equipment when operating the machine
- 14.Do not use this machine in a hazardous location.
- 15.Do not use it when the machine is not working properly.
- 16.Do not disassemble and repair this machine.
- 17.Do not use an unsuitable AC Outlet.
- 18.Do not touch the heating plate when the machine is heating.
- 19.Do not use in a humid environment or contact with water. Do not infiltrate liquid in the machine to prevent fire or electric shock caused by short circuit.
- 20.Do not use the power supply that does not meet the rated voltage .The power supply that does not meet the specified voltage may cause fire or electric shock.
- 21. Ensure that the machine is grounded so as not to cause harm to body.
- 22.Do not touch the rotating rod or bearing part with your fingers during

use in case of injuries.

- 23.If the machine is not in use for a long time, please unplug the power cord from the socket.
- 24.Do not use the machine during thunderstorms or lighting to avoid damage to the machine.
- 25.Place the machine smoothly on the flame-retardant table and keep away from flammable and explosive items.
- 26.Please stop using it if the machine smokes, emits a peculiar smell, or becomes noisy and in other abnormal conditions.
- 27. This appliance can be used by children aged from 8 years and above and persons with reduced physical, sensory or mental capabilities or lack of experience and knowledge if they have been given supervision or instruction concerning use of the appliance in a safe way and understand the hazards involved. Children shall not play with the appliance. Cleaning and user maintenance shall not be made by children without supervision 28. Type X attachment: If The supply cord cannot be replaced. If the cord is damaged the appliance should be scrapped
- 29.In order to avoid a hazard due to inadvertent resetting of the thermal cutout, this appliance must not be supplied through an external switching device, such as a timer, or connected to a circuit that is regularly switched on and off by the utility.

### **FCC INFORMATION**

**CAUTION:** Changes or modifications not expressly approved by the party responsible for compliance could void the user's authority to operate the equipment!

This device complies with Part 15 of the FCC Rules. Operation is subject to the following two conditions:

- 1) This product may cause harmful interference.
- 2)This product must accept any interference received, including interference that may cause undesired operation.

**WARNING:** Changes or modifications to this product not expressly approved by the party responsible for compliance could void the user's authority to operate the product.

**Note:** This product has been tested and found to comply with the limits for a Class B digital device pursuant to Part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation.

This product generates, uses and can radiate radio frequency energy, and if not installed and used in accordance with the instructions, may cause harmful interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation. If this product does cause harmful interference to radio or television reception, which can be determined by turning the product off and on, the user is encouraged to try to correct the interference by one or more of the following measures.

- · Reorient or relocate the receiving antenna.
- · Increase the distance between the product and receiver.
- Connect the product to an outlet on a circuit different from that to which the receiver is connected.
- · Consult the dealer or an experienced radio/TV technician for assistance.

#### 1. Product Main Parameter

1.Power supply voltage: AC230V 50HZ (for Europe user)

2.Power supply voltage: AC120V 60HZ (for US user)

3.Max Input power: 50W

4.Output voltage: 0~100KV

5.Maximum output current: 200uA

6. Solenoid valve voltage: DC24V

### 2. Schematic diagram of front structure



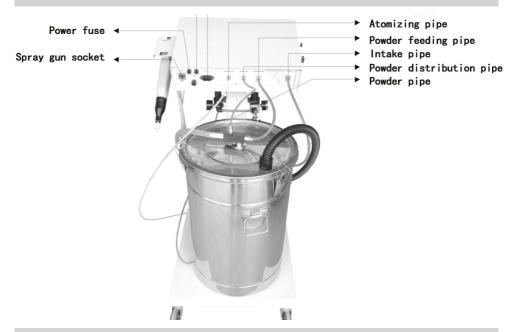
#### Explain:

- 1. The voltage regulation knob increases clockwise.
- 2. Voltage indication up to 100KV.
- 3. Maximum current indication 200uA.
- 4. Powder feeding knob: pull out (release the lock) and increase the powder

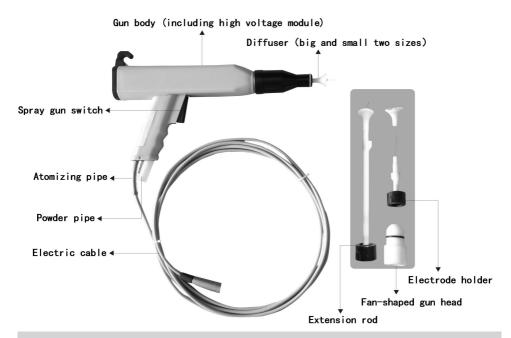
amount clockwise. The normal air pressure indication is 3-4kgf/cm<sup>2</sup>.

- 5. Powder distribution knob: when pulling out (releasing the lock), the powder output of the needle decreases, and the normal barometer indicates about 0.3KG.
- 6. Atomization knob: pull out (release the lock) and adjust it clockwise to atomize. The normal indication is 0.1kg.

### 3. Schematic diagram of back structure



### 4. Schematic diagram of spray gun



### 5. Operating instructions

- 1. Connect all connecting lines and gas circuits according to the above picture.
- 2. Turn on the power switch (light on).
- 3. Adjust the required voltage according to the gun switch (it depends on the individual, 60kV ~ 80kV is recommended).
- 4. The powder is loaded into the powder supply barrel.
- 5. Press the gun switch again, and the high-pressure powder can be sprayed out to work.

#### 6. Matters needing attention

### 1. Good grounding

The grounding wire is attached, which must be connected with the spraying room during installation. The spraying room is best connected with a special grounding

pile. The working, pendant and support shall also be connected with the ground wire of the spraying room to prevent discharge noise due to poor grounding.

### 2. Air source cleaning

All compressed air shall be kept clean, dry and free of oil and water. It is best to use the air source after freeze-drying treatment. If using the general oil-water separator, the oil and water shall be discharged frequently to avoid ponding in the powder barrel air chamber, solenoid valve, gas pipe, etc. or excessive powder humidity affecting the powder loading rate.

### 3. Prevent powder spitting

If the new machine spits powder (the powder output is large and small), it is generally that the air pressure of powder feeding and powder distribution is not adjusted well. When the powder feeding gas increases, the powder output is large. At the same time, increase the appropriate amount of powder distribution gas to make the powder output uniform.

### 4. Clean the powder in time

After using for a period of time, the powder pump and spray gun shall be purged with compressed air once.

# 5. Correct adjustment

The pressure regulating valve is equipped with a locking device, which can be locked when pushed and opened when pulled. The knob of each pressure regulating valve is in the appropriate position (subject to the satisfaction of powder discharge). If it is found that the pressure adjustment is not large, it shall be checked in time:

- 1) Whether the air pressure of the compressor is above 6kg
- 2) Whether the air circuit leaks
- 3) Whether the pressure regulating valve is normal. Under normal conditions, the adjustment of the pressure regulating valve should be relatively easy. Do not use too much force to adjust the regulator to the bottom (off) counterclockwise or clockwise (at the maximum). If the pressure adjustment is not large, find out the cause and remove the fault before using it.

## 7. Common faults

Fault	Causes and inspection	Explain	
phenomenon	parts		
The power indicator is not	AC power is abnormal or not connected to	Generally, there will be no	
on	high voltage controller.A. whether the	problem with the power cord	
	power on the power socket B. whether the	and the power transformer itself	
	power cord openC. Whether the 1A is the		
	fuse damaged D. whether the connection		
	between flat wire and transformer is well		
	connected		
The light is on, but there	A. gun switch B. electric cable and plug C.	Generally, the high pressure in	
is no high voltage when	whether the two wires on the high voltage	the gun and the control panel in	
shooting	in the gun are firmly connected D. whether	the machine shall not be	
	the control board is normal	disassembled or adjusted. If	
		there is a problem, please	
		contact the manufacturer first	
		and then determine the solution	
High voltage regulation is	Potentiometer damaged	Replace a potentiometer with a	
not low		similar shape with a resistance	
		of 4.7K	
Weak high pressure, the	If the gun is in the suspended position, do		
current indication is large	not approach any object, and the current	Normally, the high-voltage	
	indication is large (more than half of the	module will not be damaged,	
	light column), it indicates that A. Breakdown	but it is necessary to prevent	
	and discharge at the front end of gun shell	falling, collision and fracture,	
	B. Ponding in the gun or on the surface of	prevent ponding on the damp	
	high-pressure module C. The high voltage	surface, and can not be	
	module is broken	connected to other instruments	
		at will	

Have high pressure but	A. The solenoid valve is broken B. Blocked	A. Always hear the sound of
no powder or very small	powder Road C. The powder pump is	solenoid valve coil energization
powder	broken D. Reverse injection of powder	without powder, indicating that
	feeding gas and powder distribution gas E.	there is a problem with the
	No powder or little powder F. Powder	mechanical action of solenoid
	suction pipe falling off G. Non vulcanization	valve B. Normal resistance of
	H. Air leak	solenoid valve 53
Hemp hand	There are two cases A. AC Leakage shall	
	be prevented from AC Leakage on the	
	spray room or machine room shell B. High	
	voltage leakage (feel it when shooting) be	
	sure to connect the grounding wire on the	
	high voltage control cabinet and the spray	
	room together and fully grounded	

#### 8. PLEASE READ THE FOLLOWING CAREFULLY

THE MANUFACTURER AND/OR DISTRIBUTOR HAS PROVIDED THE PARTS DIAGRAM IN THIS MANUAL AS A REFERENCE TOOL ONLY. NEITHER THE MANUFACTURER NOR DISTRIBUTOR MAKES ANY REPRESENTATION OR WARRANTY OF ANY KIND TOTHE BUYER THAT HE OR SHE IS QUALIFIED TO MAKE ANY REPAIRS TO THE PRODUCT OR THAT HE OR SHE IS QUALIFIED TO REPLACE ANY PARTS OF THE PRODUCT. IN FACT, THE MANUFACTURER AND/OR DISTRIBUTOR EXPRESSLY STATES THAT ALL REPAIRS AND PARTS REPLACEMENTS SHOULD BE UNDERTAKEN BY CERTIFIED AND LICENSED TECHNICIANS AND NOT BY THE BUYER. THE BUYER ASSUMES ALL RISK AND LIABILITY ARISING OUT OF HIS OR HER REPAIRS TO THE ORIGINAL PRODUCT OR REPLACEMENT PARTS THERETO, OR ARISING OUT OF HIS OR HER INSTALLATION OF REPLACEMENT PARTS THERETO.



**Technical Support and E-Warranty Certificate** www.vevor.com/support