



AK275 TOTE SPRAYER OPERATING MANUAL



Congratulations on your AK275 Purchase!

You now have the most universal, easy to operate and profitable seal coating spray system.

This Asphalt Kingdom.com operating manual was created so that you can follow all of the steps to keep this system in A1 condition and allow you to get many years of use with it. Each unit is fully set up and liquid-tested at the factory before being shipped to you. This unit is ready for full operation.

The AK275 SYSTEM is designed to be a universal seal coating spray system. The system sprays “Coal Tar Emulsion driveway Sealer”, “blend of Coal Tar and Asphalt Emulsion”, “Acrylic Asphalt Sealer”.

Side Note:

If you are looking for asphalt sealer shipped to your door that works perfectly with this system please call 1-866-399-5562 for a personal quote to your door or contact your AsphaltKingdom.com advisor.

AK275 Spray System Specifications:

- Comes with a refurbished empty 275 gallon tote
- 6.5 HP Launtop gas engine. Uses 10W30 oil.
- 2" centrifugal pump, 225 gpm x 50-60 psi capacity.
- 50' of ¾" sealer hose
- Gun with a ball-valve shut-off
- Three spray tips (2 GPM, 3 GPM, 4 GPM) (GPM = US gallons per minute)

Installation:

Install the AK275 Seal coating system on the floor of your trailer or pick-up truck by using ½" bolts in each of the 4 corners. In order to get full use of the product in your tank or to empty and drain the tank, you can add a 1" plank between the 2 brackets at pump end side of the tank and the floor. This will give a slope on the tank towards the pump suction point and the drain.

The Seal Coating Spray System offers TWO modes of operation: (Agitation/Recirculation and Spraying)

To switch from one operation to another, all you have to do is turn the handle on the unit above the pump to direct the flow of sealer either back to the top of the tote or towards the spray gun. The sealer will flow in the direction that the handle is pointed in.

Starting Your AK275 for the first time:**ONLY use water when starting for the first time:**

In order to familiarize yourself with the equipment and at the beginning of each season, we strongly recommend that you use water. Fill the main tank with 30 gallons of water or 1/3 full. You can add the water through the main filling port of the tank using a garden hose. Also, pour one gallon of water into the pump through the orifice of the plug on top of the pump. Put this plug back in place, fill the engine with gas and check the oil in the engine.

Start the engine with the hand valve in the "**Agitation/Recirculation**" position. You can open the main cap on the top of the tank, look in the tank to see the agitation process. You will see movement in the tank. Now, turn the valves to the "**SPRAY**" position and familiarize yourself with the spray gun and the tips. When you feel comfortable with the equipment, stop the engine and drain the water from the tank through the base drain plug.

Running the pump:

Before starting the engine, if your system is completely drained, pour one gallon of water into the pump through the orifice of the plug on top of the pump. Put the pump plug back on the pump and start the engine with the valve in the "**Agitation**" position.

The pump is a self-priming pump and will prime once the pump housing is full of liquid. This procedure of pouring water into the pump housing must be done each time the pump has been drained or sitting for a couple of days.

IMPORTANT! Do NOT run the pump dry.... You always want liquid in the pump. If the pump runs dry for more than 5 minutes you will overheat it and BURN OUT THE SEALS in the pump and will need to order a pump rebuild kit for the pump.

Understanding of the “Agitation” cycle:

“Coal tar emulsion driveway sealer” is an emulsion, meaning the coal tar is temporarily mixed with water. The water and coal tar will separate after sitting for longer than three hours, we recommend that you agitate the product for 2 to 3 minutes in Agitation position. You can agitate the sealer for 1 to 2 minutes while you are cleaning the driveway to be sure that the sealer is fully agitated (mixed). You are really the best to judge whether the agitation cycle has been long enough or not.

DO NOT OVER AGITATE OR YOUR SEALER WILL TURN TO BUBBLY FOAM!

If the sealer has not been agitated enough, you will see that there will be chunky/muddy coal tar at the bottom of the tank. It is best to either agitate some more if this is the case OR use a broomstick through the main tank cap and stir the sealer inside your tank for 5 minutes or so. Then put your system back on agitation mode for 5 minutes. The sealer should now be fully mixed.

Please note that it is normal to always have around 2 inches of liquid remaining in the drum or tank. At the 2” level the pump will suck air and will lose the prime in the pump meaning you will lose pressure at the spray tip.

If you are using “Acrylic Sealer”, the agitation time is shortened because this is not an emulsion, so there is no product separation.

Understanding of the “Spraying” cycle:

This cycle is used after the “Agitation” cycle. Use this cycle to spray the sealer on the asphalt driveway, using the gun.

You should start at the top of the driveway, then do the edges and spray your way back down to the street.

Start out by having someone hold a thin piece of plywood or aluminum sheeting and first spray all the borders (3 to 4 feet out) except for the street edge.

Once border trimming is done, you can now go back to the top of the driveway (usually by the garage) and spray from right to left or left to right in an overlapping pattern that allows a full surface coverage. You will seal your way

down to the street and finish with the street side border edge. Then add your attention ribbon to block off the driveway.

Spray Nozzles/Tips:

This unit includes 3 Spray Tips:

- 1 x 2 GPM tip for trimming and doing borders without overspray.
- 1 x 3 GPM tip to do the asphalt borders or when it is windy.
- 1 x 4 GPM tip for the main part of the driveway or parking area.

Use Diesel fuel or Varsol and an old toothbrush to clean the spray tip.

Quality of the spray:

The water contained in the sealer in your main holding tank will eventually evaporate. Your sealer will become thicker and your spray pattern will become uneven. In this case, add water into your tank to reduce thickness of the sealer. Your sealer should be similar to the thickness of tomato soup.

You can make sure that your sealer is always at the proper dilution by checking the depth of the sealer in your tank once you're done your first day. You then re-check the depth of the sealer at the beginning of the next day. If the depth is not the same as when you shut it down the last time, you know that water has evaporated. In this case please add water to the material to bring it back to its original depth when you shut it down after the first time.

Removing the suction, return feed, and spray output hoses:

The suction, return feed and spray output hoses need to be removed using the quick-connect camlock couplers in order to prevent leaks.

Troubleshooting:

There are usually three possibilities why the pump does not prime.

1- Valves are in the wrong position: be sure to have the valves in the right position according to your desired operating mode.

Solution: put the valve handles in the desired position for your desired operation.

2- No liquid in the pump: this can happen after the pump has drained or after the pump has been running for a while without liquid.

Solution: Pour around one gallon of water into the pump through the orifice of the plug on top of the pump. Put the plug back in place and start the engine. This will re-prime the pump for suction.

3- Product is too thick in the tank. This can happen after leaving the sealer without agitation for a while or after the water in the sealer has evaporated. All water in the sealer ends up on top after sitting for a while (a day or two). The main sealer concentrate settles to the base of the tank and water is on top. The main system suction port is in the tank towards the bottom of the tank now sitting in VERY thick sealer.

Solution: Take a broomstick or metal rod and stir the sealer manually for 5 minutes or so. Now turn your system on and let the pump run in the “**Agitation**” mode to liquefy the product. You can continue to stir manually while this is taking place if you want to speed the process up. Check if you get agitation in the tank now by looking in the main lid or put your valves in the spraying mode and verify that you are getting some liquid going to the spray tip.

After 3 to 4 minutes of agitation, if you still do not get the full pressure at the spray tip in “Spraying” mode position, this may indicate that the product is still too thick. Always make sure that your sealer is diluted with the right water ratio. Contact product manufacturer for those details. Now, keeping your unit in agitation mode, add water slowly through the tank filling port without exceeding 15% of the quantity of sealer you had, until the pump is fully primed. This will give you full agitation and full pressure at spray tip (valves in the spraying mode).

B: List of Reasons and Solutions for pump seal problems.

1. Pump does not prime :
Pour half a gallon of water into the pump through the orifice of the plug on the top of the pump.
2. Liquid in the pump is too hot, this is caused by letting the pump run in the “Spraying” mode, while gun is shut off for too long. It can also be caused a blocked orifice in the two way agitation valve.
Solution: Unscrew the two way agitation ball valve and clean the ¼” hole/orifice that has been drilled into the valve to relieve pressure. Use a small metallic point like a small screwdriver.

AVOID letting the pump run without being primed. This will heat the pump up and burn out the seals.

AVOID using sand in your sealer, as it will destroy the seals and impeller in the pump. Using sand with your spray system voids the warranty.

Cleaning and draining the tank during the season:

If you want to clean or drain your tank during the season, open the drain ball-valve on the bottom of the tank, be 100% sure that this ball-valve is closed otherwise the sealer will pour out everywhere.

Winterization:

Rinse the complete system, including the barrel kit, with clean water. To do this, add water to your main drum or tank, start your engine and flush your complete system with clean water for approximately 20 minutes in the agitation position. Also, open the ball valve on the spray wand and turn your spray function on. Spray the water through the spray wand and hose until you feel you have flushed the system out. 20 minutes is usually enough. Put gas stabilizer in your full tank of gas. The stabilizer will have specific instructions to follow. Please follow.

Remove and clean all of the system spray tips. Blow out the gun and spray hose with compressed air. Insert air through the end of spray wand, keep the ball-valve open on the spray wand and blow all the liquid back to the tank. Drain the pump by removing the drain plug on the bottom.

Water Evaporation Alert

The recommended water dilution ratio for our sealer is 15-20%. However, please note that water evaporates quite quickly on extremely hot days, as well as when a unit is stored or unused for several days. We suggest doing a dip test at the end of each day to monitor your product and the water evaporation rate. By doing this you will be able to see how much water has evaporated and you will be able to top up the sealer to the proper amount.

LIMITED WARRANTY

The units sold by **ASPHALT KINGDOM.COM** are UNDER WARRANTY, to the original purchaser, to be free from defects in materials and workmanship for the periods specified below.

Normal use conditions, according to the instructions in the operator's manual, apply. This limited warranty is subject to the exclusions listed below, is calculated from the date of delivery to the original purchaser, and applies to the original components only. Parts replaced under this warranty will assume the remainder of the corresponding part's warranty period.

1 YEAR PARTS

The components, excluding accessories listed below and normal wear items listed below, are warranted for 1 year on parts.

WARRANTY PROVIDED BY OTHER MANUFACTURERS

Motors, engines, pumps or other items that are warranted by their respective manufacturers, are serviced through these manufacturer's local authorized service centers. **ASPHALTKINGDOM.COM** cannot provide warranty on these items.

EXCLUSIONS OF WARRANTY

- Routine adjustments and normal maintenance items such as lubricants, belts, hoses, O-rings, filter screens, fuses, gun seal kits.
- Repairs required as a result of collision, accident, bumping, misuse, modifications made to the equipment without authorization, incorrect installation, lack of required maintenance, use contrary to the instructions included in this manual or to the common sense.
- Repairs required as a result of freezing or exposition to corrosive products.
- Repairs required as a result of insufficient sealer supply.
- Damage to driveway or spill due to components failure and/or accident.
- Additional charge resulting from downtime and repair of the equipment.
- Transportation and/or traveling.

Sand Voids the Warranty

Although it is not recommended, our spray systems can spray sand based materials. However, sand is extremely abrasive on the pump and will wear the seals out quite quickly. Because we have no way to determine the amount of sand used in a unit, we cannot warranty a system if sand has been used in it. We do however, suggest applying the sand by hand with a grass seeding machine after applying a thin wet coat of sealer and then applying a second coat over top of the sand layer as a final coat.

EXECUTION OF REPAIRS WITHIN THE WARRANTY PERIOD

In order to obtain warranty service on items warranted by **ASPHALT KINGDOM.COM** within the warranty period, you must show a proof of purchase. If a part is defective, call **ASPHALT KINGDOM.COM**, and we will take care of the defective parts free of charge. For warranty service on components warranted by other manufacturers, consult the manufacturers' local authorized service centers.

LIMITATION OF LIABILITY

ASPHALT KINGDOM.COM's liability for special, incidental, or consequential damages is expressly disclaimed. In no event shall **ASPHALT KINGDOM.COM**'s liability exceed the purchase price of the product in question. THE WARRANTY CONTAINED HEREIN IS IN LIEU OF ALL OTHER WARRANTIES, EXPRESSED OR IMPLIED, INCLUDING ANY IMPLIED WARRANTY OF FITNESS FOR A PARTICULAR PURPOSE. **ASPHALT KINGDOM.COM** does not authorize any other party, to make any representation or promise on behalf of **ASPHALT KINGDOM.COM** or to modify the terms, conditions, or limitations in any way. It is the buyer's responsibility to ensure that the installation and use of **ASPHALT KINGDOM.COM** units are conformed to local codes. While **ASPHALT KINGDOM.COM** attempts to assure that its products meet national codes, it cannot be responsible for how the customer chooses to use or install the product.