

Environmental Protection Dust Remover Fog Cannon

I. Product Brief

The sprayer is composed of impeller, air duct, rear deflector, spray device and bracket. A new impeller, a high-performance rear deflector and a new motor support structure are adopted. The fan has high efficiency, stable fog weighing, large fog amount adjustment, uniform droplet diameter, simple operation and long service life. It is the latest equipment developed according to the requirements of national environmental protection, dust removal and disinfection.

II. Structure

The machine is mainly equipped with three cylinder plunger pump, motor (380V), air duct, distribution box, hydraulic system, etc.



III . Picture

Model 30 40 50 60





70 type axial-flow demister (vertical multistage water pump)



80 type axial-flow dust remover (vertical multistage water pump)



90 type axial-flow dust remover (vertical multistage water pump)



IV. Operation, repair and maintenance

- 1) before starting the machine, please check whether the joints are correctly butted and whether the fasteners are firm
- 2) first press the fan operation button on the control box with your fingers, (remote control operation is available) the fan is started, the fan is running normally, then press the spray start button, the pump head starts to run, and then lower the pressure regulating handle to the lowest level, adjust the pressure regulating screw to make the pressure gauge value around 25-30kg, rotate the fixed nut, release the water outlet switch connected to the fan to start spraying, then implement the work. If the air duct is required, it can rotate 360 degrees and swing up and down (it can be operated remotely).
- 3) after the operation, if it is necessary to stop the machine, first press the spray stop button on the control box, then press the fan swing stop button and fan stop button (remote control operation is available), and finally turn off the power supply.
- 4) the oil in the crankcase of the plunger pump shall be changed every 20 hours after the first use and every 50 hours after use. The proper oil change time is that when the machine cools down after operation, the oil drain bolt on the plunger pump can drain the oil and remove the impurities in the crankcase.
- 5) in case of flow reduction and insufficient pressure during operation, please check whether the belt of the plunger pump is loose, whether the suction pipe is firmly installed, whether there is air leakage, and whether the piston rubber ring of the plunger pump is worn; observe whether there is return flow after closing the return valve, if there is return flow, check whether the return valve rod or return valve seat is damaged, and replace the parts that cannot be repaired immediately.

V. Operation and maintenance instructions of plunger pump

1. Adjustment: adjust the belt pulley of the machine and the belt of the power turbine so that the triangle belt is in line. Do not slacken the V-belt to avoid falling or falling.
2. Oil filling and oil change: inject No. 30 oil from the oil filler, so that the oil level is just half of the oil detection cap. Change the oil after the first use for 20 hours, and change the oil every 50 hours after the second use. The proper oil change time is when operating the machine to cool down, take the oil drain screw to drain the oil and clean the crankcase debris.
3. Filling grease: the three oil cups on the top of the cylinder chamber often need to be filled with grease. Rotate the grease cup clockwise for two revolutions every two hours.
4. Troubleshooting:
 - (1). Unable to absorb water or unstable pressure;
 - A check if the suction pipe is blocked.
 - B turn on the switch for a while, let the remaining gas discharge and then turn it off.
 - C remove the suction chamber to see if the three suction valves are blocked.
 - D remove the drain chamber and check whether the three outlet valves are blocked.
 - E check whether the valve plug and valve seat are worn.
 - (2). Pressure drop;
 - A check whether the V-belt is loose.

B check whether the spray pipe is broken and whether the gasket of spray pipe joint is damaged.

5. Precautions;

(1). The pressure gauge shall not be adjusted at will.

(2). The water supply and quality of the water tank shall be clear, and there shall be no sand, small stones and other sundries, otherwise the plunger pump will be stuck, causing damage to the cylinder body and water leakage.

VI. Maintenance of vertical multistage pump

1. The lubricating fluid of mechanical seal shall be clean and free of solid particles;
2. It is forbidden to work with mechanical seal under dry grinding;
3. Before starting, the pump (motor) shall be turned for several turns to prevent the mechanical seal from breaking and damage due to sudden starting.
4. The water inlet pipe must be highly sealed, without water and air leakage;
5. It is forbidden to operate the vertical multistage centrifugal pump for a long time in the state of cavitation;
6. It is forbidden to operate the vertical multi-stage centrifugal pump under the condition of large flow, and the motor will run for a long time with over current;
7. Regularly check the motor current value of GDL vertical centrifugal pump in operation, and try to make the pump operate within the design working condition range;
8. Vertical multi-stage centrifugal pump shall be supervised by special personnel during operation to avoid accidents;
9. The bearing of vertical multistage centrifugal pump shall be oiled every 500 hours;
10. After long-term operation of vertical multi-stage centrifugal pump, the noise and vibration of the unit increase due to mechanical wear, so it should be stopped for inspection, and vulnerable parts and bearings can be replaced if necessary.

VII. Operation instructions

1. The equipment only uses 380V industrial power. Please check the local voltage in detail. When the three-phase voltage is lower than 380V, it can not be used normally, which will burn out the motor and AC contactor.
2. Before starting the machine, check whether the voltage is normal and whether the cable diameter is enough.
3. After starting, it is found that the motor is noisy and rotates slowly. Please stop the machine immediately to check whether the voltage is normal.