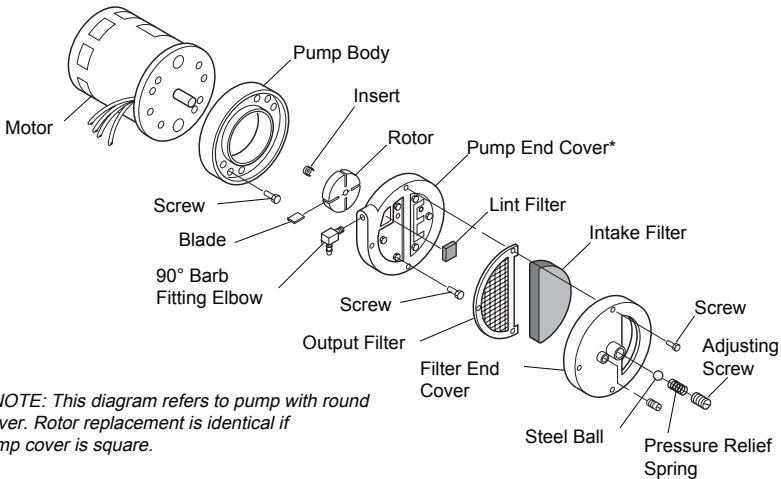


ROTOR REPLACEMENT INSTRUCTIONS

WARNING: Never service heater while it is plugged in, operating, or hot. Severe burns and electrical shock can occur.



**NOTE: This diagram refers to pump with round cover. Rotor replacement is identical if pump cover is square.*

1. **Unplug heater.**
2. **Remove upper shell and plastic fan grill from heater.**
3. **Disconnect the air supply line from the rear metal pump end cover.**
4. **Remove plastic air filter end cover and air filters.** Inspect plastic cover for cracks or any damage that would allow air to escape. If the cover is cracked or damaged replace the plastic air filter end cover.
5. **Remove metal pump end cover.**
Make sure to clean the pump side of the metal pump end cover with some steel wool or similar surface cleaner to allow for clean metal to metal surface contact when the unit is reassembled.
6. **Remove the pump ring from the motor by removing the 2 Phillips head screws.** Remove the carbon rotor, blades and plastic insert from the motor shaft. Make sure to clean the pump ring and the back of the motor with some steel wool or similar surface cleaner to allow for a clean metal to metal surface when the unit is reassembled. It is very important to make sure all metal surfaces have been thoroughly cleaned and prepped for reassembly. All surfaces are metal to metal contact and must be free from any corrosion, dirt or debris before reassembly.
Do not oil or lubricate the carbon rotor or blades! You may use *Brake Cleaner* only to clean the rotor, blades and pump housing of any dust or debris before reassembly.
7. **Now install new rotor with the plastic insert facing the motor. Do not use any type of sealant when reassembling the air pump assembly.**
8. **Install the pump ring body and 2 Phillips head screws.** Adjust the gap between the top of the rotor and the pump ring body to .003" to .004" and tighten pump body. Turn the motor over by hand to make sure the motor and rotor turn freely.

ROTOR REPLACEMENT INSTRUCTIONS

Continued -

WARNING: Never service heater while it is plugged in, operating, or hot. Severe burns and electrical shock can occur.

9. **Install the four new carbon rotor blades carefully into the rotor.** Make sure the blades are in correctly and are the same width as your carbon rotor. The M22456-2 "PP205" and the M22456-3 rotor blades are wider than they are tall and must be installed correctly or the pump will not operate properly.
10. **Install metal pump end cover and evenly tighten all 6 screws in a staggered pattern.** Make sure to once again turn the motor over by hand to make sure there are no obstructions and that the rotor has been serviced properly.
11. **Install air filters and plastic end cover.**
12. **Re-connect air supply line.**
13. **Install plastic fan grill and upper shell.**
14. **Start unit and adjust pump pressure.** It is not required to have the HA1180 Air Pressure Gauge to set your heater to the proper running pressure, this can be done by increasing the air pump pressure until the nose cone of the heater is a nice glowing orange color and no harsh fumes are being presented by the heater.