Model HF: Pump Rebuild Instructions

Tools Required:

- *Flat-blade screwdriver
- *5/16 nut driver or socket wrench
- *7/16 wrenches (2)

Instructions:

- 1. Close inlet and discharge seacocks.
- 2. Disconnect the inlet water hose, the pump-to-bowl hose and the discharge fitting from the pump.
- 3. Remove the three screws (three round head, flat blade screws) from the pump base and remove pump.
- 4. Make note of the orientation of the flapper gasket (HE-8).
- 5. Remove the cover from the rear of the pump (six screws, 5/16 nut driver).
- 6. Remove the gasket and spring (HF-1) and check plate (HC-5).
- 7. Inspect the cam assembly (HF-20) for wear, cracks and function. Check the finger for cracks at the joint. Rotate the handle to the "dry" position. Press on the back of the finger to check for a "spongy" feel. If spongy, remove, inspect and replace as needed.
- 8. Install bridge (HF-28) into center of chamber to support the gasket. Note: Some cylinders will have this already installed and can be left in place.
- 9. Install new check plate (HC-5) in upper chamber, flush with cylinder. This part must remain in position for a good seal to the gasket.
- 10. Install the new gasket (HF-1) with the weighted part down, facing the pump cylinder. Note: Screw pattern only allows this to be installed one way.
- 11. Install the spring to the gasket flap. The small end of the spring attaches by friction to the center of the flap.
- 12. Polish the sealing surface of the cover with a fine grit emery paper to ensure a smooth surface. Clean any grit/debris from the cover before installing.
- 13. Insert and start the six screws holding the cover in place. When all six are started, snug them down to ensure a good seal. Do not over-tighten the screws as this will distort the gasket and not allow the pump to prime.
- 14. Test the unit by rotating the selector handle to the full travel several times. This will set and break-in the gasket.
- 15. Install a temporary hose to the water inlet fitting, place opposite end into a bucket of water and test the prime function. The unit should draw water after 2-3 pumps. If not, check and repeat Steps 7-12. Remove temporary hose upon test completion.
- 16. Install the joker valve (H-27-A) with the "slit" parallel to the pump cylinder (see exploded parts view of HF Service Information).
- 17. Install the discharge elbow over the joker valve and secure the two bolts. Do not over-tighten.
- 18. Place the new gasket (HE-8) onto the bask. The weight must face up. Mount the pump to the base with the three screws from Step 3. Do not over-tighten these screws or the cylinder may crack.
- 19. Re-install the pump-to-bowl hose, the water inlet hose and secure all hose clamps that may have been loosened.
- 20. Open both inlet and discharge seacocks.
- 21. Test for proper operation.