

RICE HYDRO, INC.  
MANUFACTURER'S OPERATING INSTRUCTIONS  
DE & RP SERIES MODEL TEST PUMPS

**FOR WARRANTY REGISTRATION CALL: 1-800-245-4777**

 **WARNING:** Operating, servicing and maintaining this equipment can expose you to chemicals including engine exhaust, carbon monoxide and lead, which are known to the State of California to cause cancer and birth defects or other reproductive harm. To minimize exposure, avoid breathing exhaust, do not idle the engine except as necessary, operate and service your equipment in a well-ventilated area and wear gloves or wash your hands frequently when servicing your equipment. For more information go to: [www.p65warnings.ca.gov](http://www.p65warnings.ca.gov)

**REMEMBER THESE CAUTIONS:**

1. Check **ALL** fluid levels prior to operating pump.
2. Use a sound 3/4" or larger supply hose.
3. DO NOT run dry or pump chlorine thru unit.
4. Protect the pump from freezing, FLUSH with anti-freeze.

**CONNECTING THE PUMP:**

1. Check oil level in engine, use 10W30. Unleaded gasoline.
2. Check oil level in the gear reduction, use (90W). Oil should be level with the side drain plug.
3. Connect pressurized water source to the inlet of the pump. It is recommended that the unit be pressure fed. For suction or gravity feed locate water within 8 feet, you may need to prime the pump.
4. Connect the supplied high-pressure outlet hose to the pump and your test environment.

**OPERATING THE PUMP:**

1. Turn the outlet ballvalve to the open position, and start the engine. The engine RPM is preset at the factory, **DO NOT ADJUST**.
2. The pressure regulator has been preset at the factory. **To change this setting you must make this adjustment while the water is flowing freely, and under NO pressure.** To adjust the pressure, first loosen the locknut. Turn the T-handle/Knob clockwise to increase and counterclockwise to decrease the pressure. Place a ballvalve or similar open and close valve at the end of the outlet hose, open and close this valve multiple times as needed, to check pressure setting and re-adjust as necessary. It is also recommended that you open and close the hosebib located under the gauge to bleed excess air from piping and ensure accurate pressure gauge readings. Upon reaching desired pressure setting, tighten locknut and prepare to begin test.
3. With the ballvalve open begin building pressure in the test environment. Be sure to bleed the air from hosebib under gauge at least once during this process. Once test pressure has been reached, **close the ballvalve and shut-off engine.**
4. Once the outlet ballvalve is closed and your test begins, you have now isolated the test pump from the test environment, any loss of pressure is due to leaks or trapped air being compressed in the test environment.

**RECOMMENDED PERIODIC MAINTENANCE PROCEDURE**

1. Change engine(10W30) and gear reduction (90W) after the first 5 hours of operation thereafter every 80 hours of use or every season.
2. **PISTON PUMPS ONLY** -Lubricate cam bearing with grease (wheel bearing grease) every 100 hours of operation or monthly. Use hand operated grease gun to prevent damage to the bearing seal. Grease fitting assembly is located behind the safety cover on the pump.