

SAFETY RECOMMENDATIONS



Gheen Irrigation Works, Inc. (Gheen) manufactures quality parts and components. Like any products, however, they must be used properly. Otherwise, injury and damage can occur.

We created these *Safety Recommendations* to protect our customers and those working with or around our products. Remember, no list of safety recommendations can cover all safety issues. Always be alert, pay attention, look out for risks, use good common sense and be careful.

Design

- **Your irrigation system should be designed by a qualified irrigation design engineer.** Proper design depends on a number of factors unique to your specific application. Without detailed knowledge of your specific application, no manufacturer of irrigation fittings will be able to tell you what is required. A faulty design could jeopardize safety and invalidate your warranty.
- **Only use those Gheen parts & components specified by your system designer.**
- **Only use Gheen parts & components.** Any incompatible fittings can create system failures that can damage your system and cause serious injury. Use only Gheen parts and components to ensure compatibility.

Pressure Rating

- **Make sure system design control pressure does not exceed the pressure ratings for each part & component.** Pressures exceeding maximum ratings can cause system failures, component failures and serious injury. Most Gheen fittings are rated for a maximum pressure of 130 psi. Some products are rated at lower pressures.

Pre-Use Activities

- **Complete the checklist below each time before using your irrigation system.**
 - ◇ Inspect irrigation connectors and gaskets for wear and damage.
 - ◇ Inspect irrigation valves and valve openers for worn or broken parts.
 - ◇ Determine whether valve openers are seated properly on irrigation valves.
 - ◇ Make sure valve opener clamps are fully engaged.
 - ◇ Replace damaged or worn parts.

General Operating Precautions

- **Make sure all people are clear of valves and the end of irrigation lines when turning on the pump until system pressure is stabilized.**
- **Do not use a tool, handle or device to open or close a lever or handle.** Known as “leverage bars” or “cheater bars,” the extra leverage can overstress system components and weaken steel parts. System components can fail and serious injury can result.

Ringband / Eccentric Lock Clamps

Many irrigation system designs for above ground components use a clamp to hold a male and female coupling together. This clamp may be called a ringband lock, circle lock or eccentric lock clamp. They all have the same purpose, to hold the line pressure between the two fittings. These clamps are used with ringlock components, valve openers, end plugs, surge plugs and some risers (*continued on back of page*).



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Ringband / Eccentric Lock Clamps *(continued from front of page)*

- **Make sure male & female clamp components are compatible.** This is imperative.
- **Release pressure from the system before releasing a clamp.** DO NOT release clamps while under pressure. Serious injury can result.
- **Relieve internal pressures before releasing clamps.** Some systems pump sludge or substances other than irrigation water. These systems can have internal pressures due to internal gas build-up. Failure to relieve this internal pressure before releasing clamps can result in serious injury. Your system design should accommodate these internal pressures.

Valves & Valve Openers

- **Never stand directly over an irrigation valve when opening or closing the valve.**
- **Open & close irrigation valves properly.** Open and close slowly while maintaining contact with the handle to direct the valve away from your body in the event the valve should fail.
- **Do not install or use a damaged irrigation valve or valve opener.**

Surge Plug

- Surge plugs are used to relieve surge pressures in your system. Excessive pressure in the system can cause failures and serious injury.
- **Set surge plugs' variable pressure settings correctly.** Surge plugs have variable pressure settings. Set the plugs' pressure in the field slightly higher than your system's designed working pressure.
- **Do not over tighten surge plugs.** If the surge plug spring can not move, the plug becomes a regular end plug and can not relieve system pressure.

Wheel Line Movers

- A wheel line mover is a power unit for moving wheel irrigation lines.
- **Read, understand & obey safety rules & operating instructions before operating.** Read both the Wheel Line Manual and the Engine Manual before operating the machine.
- **DO NOT ride on wheel line movers.**
- **DO NOT remove muffler deflectors located on wheel line movers' engines.** The muffler deflector deflects exhaust away from the mover hood.

Personal Safety

- **Use safe lifting practices when handling or moving large fittings & components.**
- **Use eye protection when opening or closing irrigation valves.**

Gheen's *Safety Recommendations* can also be found at www.gheenirrigation.com/safety.