

# **UG-2001**

## Ultrafiltration System

TST Water's Ultrafiltration system is a low-pressure membrane process, capable of removing colloidal materials, fine suspensions, bacteria, virus, cyst, suspended solids and organic materials down to 0.02 micron.

Engineered for convenience, the UltraGuard® line allows for simple installation utilizing industry recognized sump and housing configuration. Verifiable membrane efficacy allows the installer to provide a true tested protective barrier on every installation as well as during service calls. High surface area of the UF membrane requires normal line pressure to operate, low backflush waste while delivering high flow with low pressure drop. WQA Certified against the US EPA Guide Standard and Protocol for Testing Microbiological Water Purifiers providing a certified bacteria, virus and cyst barrier.



Stage two is our Made in USA Ultrafiltration double skinned hollow fiber element which are made from polyethersulfone (PES). PES is a hydrophilic, chemically stable polymer capable of operating in aggressive environments while providing high flow rates and sub micron filtration. TST Water's Ultrafiltration hollow fibers have separation layers on both sides of the fiber (double skinned), providing superior separation filtration and high recovery during back flush.

#### **UG-2001 Membrane Features**

- ✓ WQA Certified to the USEPA Guide Standard and Protocol for Microbiological Water Purifiers
- ✓ 25 micron sediment pre filter for the reduction of sand, silt, sediment and rust
- ✓ UF Membrane for bacteria, virus and cyst removal
- ✓ High flow rate with low pressure drop
- ✓ Tolerant of oxidants, chlorine, ozone
- ✓ Back-flushable; extending membrane efficiency and flow
- √ 98% efficient utilizing back flush
- ✓ Low operating pressure









### **Applications**

- ✓ Well Water
- ✓ POE Potable Water
- ✓ Light Commercial and Industrial
- Reduce Turbidity (Determined by Independent Laboratory Tests)
  \*Dual Barrier

#### **Features**

- ✓ Verifiable element integrity
- ✓ Extended element life utilizing controllable backflush sequence\*
- ✓ Easy elements replacement and system sanitization
- ✓ Ease of installation
- ✓ Wall or floor installation
- ✓ Simple access of piping, controls and element integrity testing
- ✓ Ease of backflush settings/override
- ✓ Addition of Bladder tank to increase surge capacity
- ✓ Dealer supported (Maintenance contract)
- ✓ Low operating costs
- Extended Warrantee: Parts and workmanship
  \*Dependent on Water Quality and Operating Pressure.

## **Specifications**

Membrane Characteristics	PES - Hydrophilic Double-Skin type
Pure water permeability	>180 GFD @ 20 PSI @ 21 0C
Nominal Molecular Weight	100,000 NMW < 0.02 microns
Fiber ID	0.8mm - 1.4 mm
Outside-In Flow Pattern	
Operating Feed Pressure Max.	60 PSI
Backflush Pressure Max.	Up to 30 PSI
Inside-Out Flow Pattern	
Operating Feed Pressure Max.	60 PSI
Backflush Pressure Max.	Up to 30 PSI
Tolerance	
Chlorine Tolerance, Max.	200 ppm @ 11 pH
pH Tolerance	2 – 13
Operating Temp. Max.	120°F
Backflush Chlorine Max.	10 ppm
CIP Pressure, Max.	30 PSI

Note: Max Pressure 60 PSI, requires pressure regulator







