

23G RO Pressure Transducer Failures

The 23G series of RO's uses multiple 100 and 500-PSI pressure transducers to monitor various inlet and outlet pressures. Some facilities have experienced failures of the transducers without an obvious reason being detected.

Multiple failed transducers from different sites were evaluated and were found to have experienced an over-pressure or pressure pulse (water-hammer) condition that has deformed the diaphragm causing the readings to become offset. To minimize the potential of water hammer, the manufacturer has recommended a pressure snubber or restrictor be placed between the water source and the transducer. A pressure snubber contains a sintered metal disc that slows the passage of water through it, reducing or eliminating a pressure pulse condition.

Since an actual cause of the over-pressure can vary from site to site, starting in January 2007 all 23G's produced in the factory will have pressure snubbers installed, and a retro kit is available for field installation. Installation of this kit is recommended if you have had a history of transducer failures. Also, if you suspect a transducer is failing, it must be replaced at the same time as the pressure snubber kit because the transducer will not operate correctly if it has suffered any previous deformation.

RO disinfection is required after installing the pressure snubbers. Perform disinfection as usual ensuring that all testing is done thoroughly and a negative test is achieved to eliminate the possibility of patient harm.

Ordering Information

- Pressure snubber kit – P/n 3019018. The kit includes 5 pressure snubbers, which will outfit one complete 23G plus an instruction drawing detailing installation procedures.