



High Purity Water for Pharmaceutical Application

Location: India
FEDI Model: FEDI® Rx
No. of Streams: 1 x 3.3 gpm (1 x 0.75 m3/hr)
Conductivity: 0.06 µS/cm

Project Background

The customer is a global group of companies that provides an extensive array of scientific instruments and systems for applications ranging in R&D processes, environmental monitoring, in-vitro medical diagnostics, and semiconductor manufacturing. Proven quality and trustworthy performance have established a widespread confidence in the customer's brand.

Being a pharmaceutical application, the customer required consistently high purity, pharmaceutical grade water. The existing system established to produce this water quality consisted of a softener, reverse osmosis system and electrodeionization (EDI).

The customer required an EDI system that could tolerate **variable water conditions** effectively and produce consistently high quality water. Additionally, **service** became a key issue as the customer was not satisfied with the existing EDI manufacturer's support, and expected their new EDI partner to understand the problem and work closely to resolve quality concerns as soon as possible.

The customer's EDI system was not able to produce water below 1 µS/cm. The EDI system issues were caused by feed quality, with water conductivity that was at times above 40 µS/cm due to the presence of CO₂ in the water.

QUA Solution

Production had shut down because the client's existing EDI could not meet the water quality requirement. QUA worked swiftly with the OEM to supply FEDI® Rx in **two days**, enabling them to resume production immediately. QUA was able to do this due to its high quality product and dedicated technical support team.

Softener ► Reverse Osmosis ► **FEDI®**

FEDI® Rx is a flexible solution that allows for more tolerance to feed water fluctuations, thus reducing cleaning requirements.

QUA's representatives were available at the client's site throughout commissioning of FEDI® Rx, and worked closely with the client engineers to ensure that high quality pharmaceutical grade water quality was delivered. **The product water conductivity is consistently 0.06 µS/cm which exceeded the client's expectations.**

QUA's FEDI® Rx provided the client with a reliable, long-term solution for their application.

FEDI® Rx Electrodeionization

QUA's FEDI® Rx is specifically designed to meet the high purity water requirements of the pharmaceutical manufacturing industry.

FEDI® Rx features:

- High product water quality up to 18 MΩ.cm (0.06 µS/cm)
- FDA compliant wetted component and CE certified product
- High recovery and low power consumption
- Hot water sanitization at 80-85oC
- Tri-clover compatible connections
- Reduced cleaning frequency
- Exhaustion and regeneration not required before/after sanitation

About QUA

QUA is an innovator of advanced membrane technologies that manufactures and provides filtration products to address the most demanding water challenges.



Q-SEP®
HOLLOW FIBER
ULTRAFILTRATION



FEDI®
FRACTIONAL
ELECTRODEIONIZATION



CeraQ™
CERAMIC
MEMBRANES



EnviQ™
MEMBRANE
BIOREACTOR