



**Location:** United States

AMI system elevates water quality for boiler applications, improving operational reliability and efficiency

Boiler wastewater requires efficient water treatment for optimal boiler performance and longevity.

## Challenge

A customer in the aerospace and defense industry needed a solution to treat city water for its boiler process.

Applied Membranes was selected to build an RO system capable of removing impurities and improving operational efficiency.

The goal was to optimize recovery rates and produce 40 GPM of high-quality permeate for boiler water applications.

Pretreatment was provided by others, including water softener and carbon filters to address elevated total organic carbon (TOC) levels prior to the AMI RO system.

## Solution

Applied Membranes engineered and manufactured a **40 GPM (9 m<sup>3</sup>/h) Double Pass Reverse Osmosis (RO) system** based on the customer's existing setup and water analysis.

The AMI system seamlessly integrated into the process, enhancing boiler performance and reliability.

### Key Features:

- Antiscalant
- Clean-in-place system with heater
- Tank level float tree
- Programmable Logic Controller (PLC)

## Results

Applied Membranes built a cost-effective solution within a specified timeline for a customer. AMI system meets stringent requirements and elevates quality of boiler water.

The project highlights Applied Membranes' ability to integrate RO technology with other applications.

- **Timely delivery:** Applied Membranes was able to meet the customer's project timelines.
- **Quality:** AMI system produces high-quality water for boiler applications.
- **Engineering expertise:** With over 40 years of experience, Applied Membranes understands diverse water technology, and integrates with specialty applications to solve complex challenges.

AMI systems effectively treat water to improve boiler performance and longevity.

