

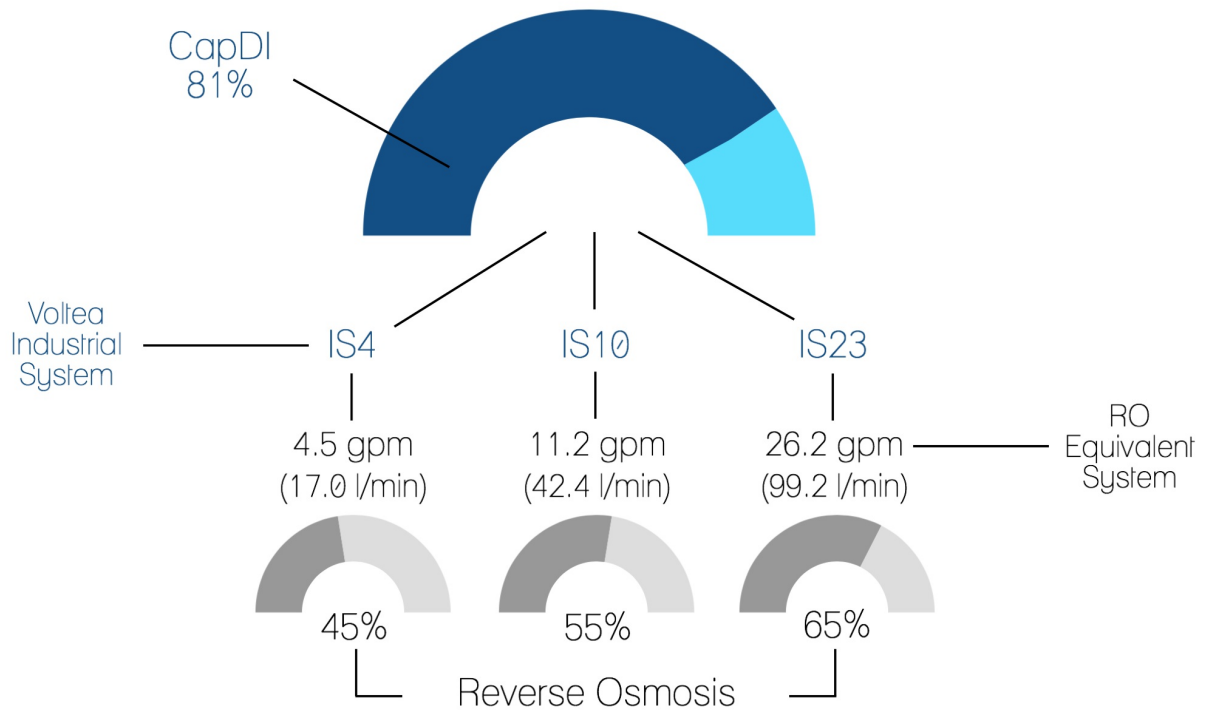


CapDI[®] vs TECHNICAL COMPARISON RO

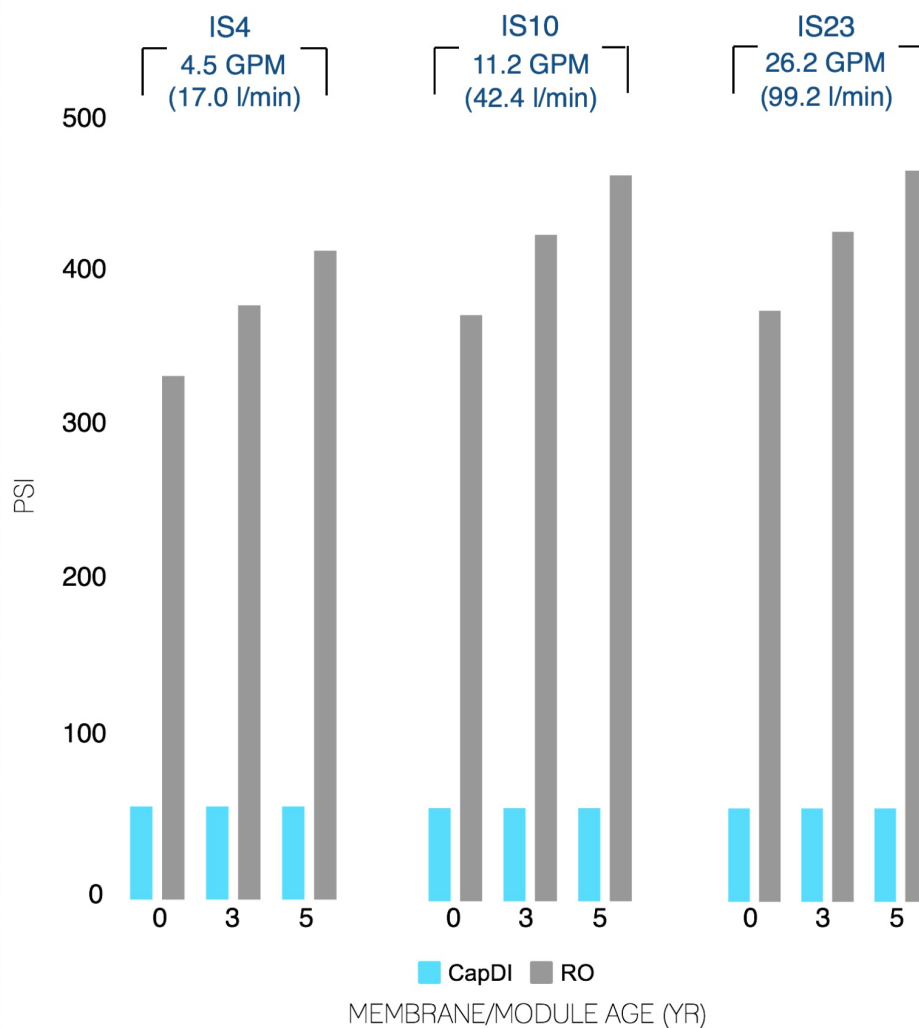
— 2,000 ppm —

This document represents the technical comparison between Voltea's CapDI technology and conventional Reverse Osmosis based on product and sales figures. Data included reflects 2,000 ppm TDS and 50°F (10°C) feed water for the study of low water temperature effects. System sizing is based on Voltea's line of Industrial Series systems IS4, IS10, and IS23, and their equivalent sized RO systems at a membrane age of 0, 3, and 5 years.

Design Water Recovery



Design water recovery for CapDI remains consistent up to 81% over all system sizes, compared to RO which varies depending on system size and configuration.

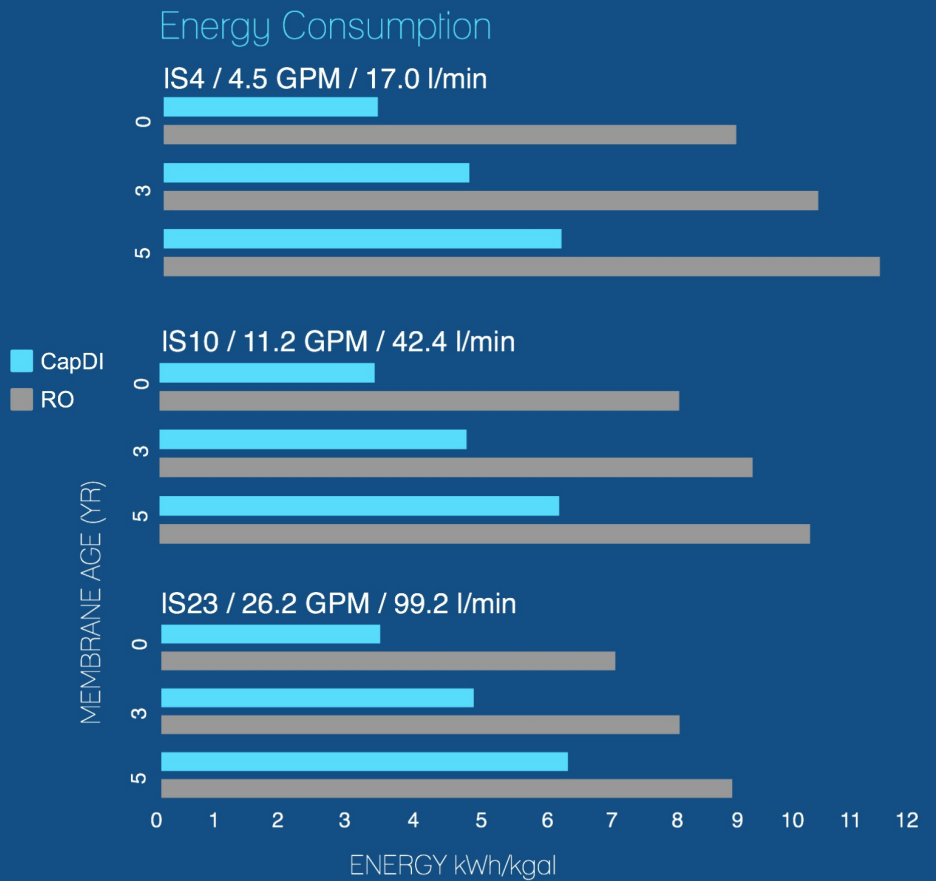


Operating Pressure

The PSI value for RO varies based on the membrane age and operating water temperature. As the membrane ages and the temperature varies throughout the seasons, the RO operating pressure increases accordingly. With CapDI, the PSI value stays consistent throughout the years irrespective of changes in water temperature. In this example, the data is produced using 50°F (10°C) water at 0, 3, and 5 year old RO systems.

Energy Consumption

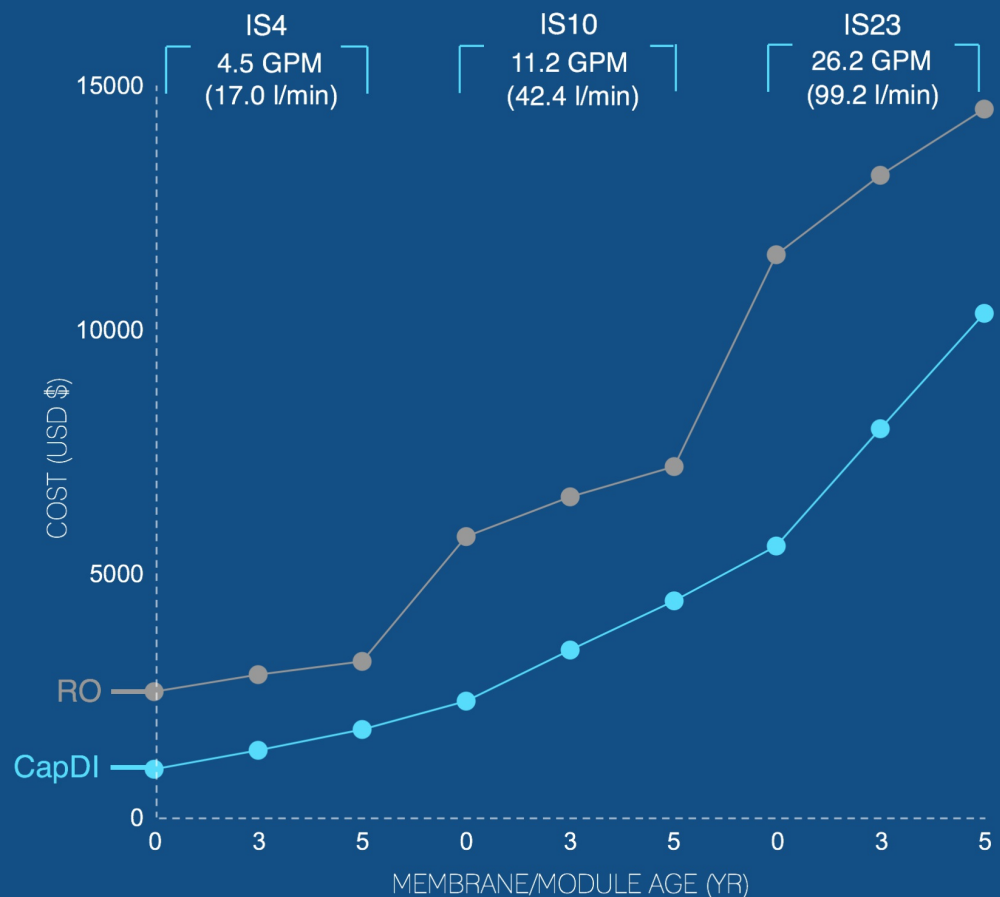
Voltea's CapDI is the industry leader in sustainable deionization as shown by these standout performance statistics on energy consumption and costs. CapDI systems require less energy for daily operations, saving your company on utilities and operational costs all while helping the environment.



Energy Consumption and Costs

Energy Costs

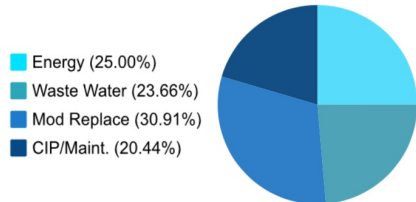
Comparatively, energy costs associated with CapDI are a fraction of that of RO, even at higher salinity levels. Sustainable deionization resources are becoming more feasible, and CapDI is leading the way to ensuring clean water at a lower economic and environmental cost.



Cost of Ownership

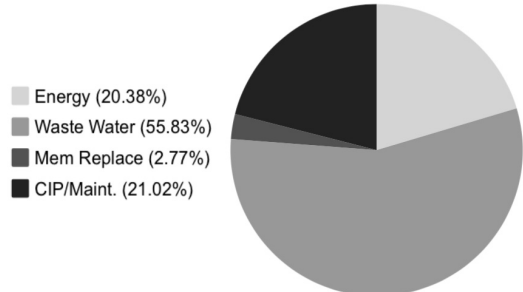
The cost of ownership for both CapDI and RO has been broken down into 4 categories; energy, waste water, module/membrane replacement, and CIP and maintenance costs. These figures represent the IS4, IS10, and IS23 CapDI systems and their equivalently sized RO systems over 5 years of ownership.

CapDI
Estimated Annual Cost of
\$7,089

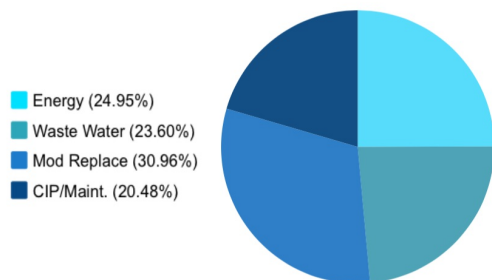


IS4
4.5 gpm
17.0 l/min

RO
Estimated Annual Cost of
\$15,650

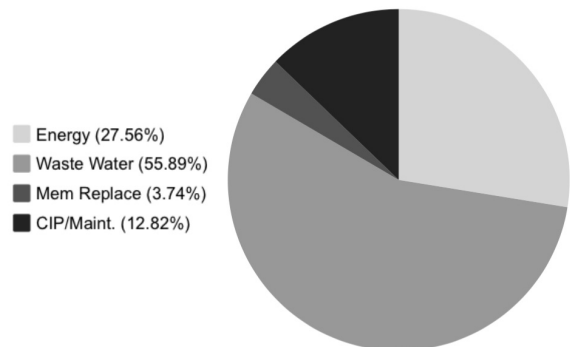


CapDI
Estimated Annual Cost of
\$17,689

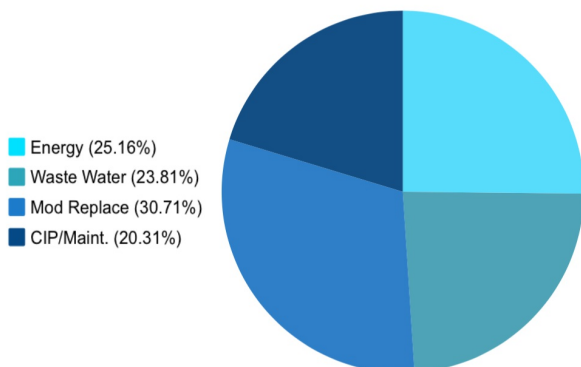


IS10
11.2 gpm
42.4 l/min

RO
Estimated Annual Cost of
\$26,060

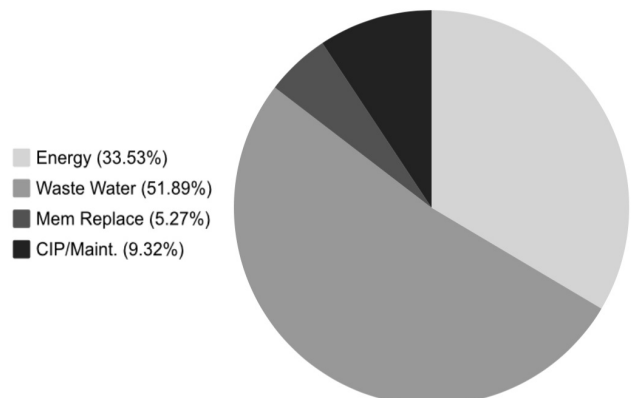


CapDI
Estimated Annual Cost of
\$41,016



IS23
26.2 gpm
99.2 l/min

RO
Estimated Annual Cost of
\$43,198



Contact a Voltea Sales Representative to discuss how we can evaluate your water quality and size a system for you!

info@voltea.com +31(0)252 200100