

CASE STUDY



CHENNAI BREWERIES PRIVATE LIMITED



Difficulty:

Chennai Breweries has an existing Effluent treatment plant of Capacity 1200 KLD and Effluent recycle plant of capacity 600 KLD to recycle their treated Effluent to use it back to their process. Due to Stringent rules and regulation of local PCB they could not let out single drop of Treated Effluent. They are also purchasing a Raw water for their Utilities at high price from outside due to poor raw water quality in factory premises.

Solutions:

Zion Enviro offered a solution for recycling the Entire Treated effluent of Quantity 1200 KLD (**1.2 MLD**) to use it back to their process to fulfill the ZLD concept as well as to reduce the Raw water consumption. Zion Enviro was also operated and maintained the above plant with supply of Chemicals and Spares for 2 years.

Scheme:

Clariflocculator → DMF → U.F → R.O. 1 → R.O. 2 → R.O. 3 → Multiple Effect Evaporator.

Scope of work:

Design, Engineering, Procurement, Supply, Erection & Commissioning. (A separate P.O. for O & M of ETP & ERP for 2 years)

Quality of Treated Water: pH - 6.5 – 7.5, TDS - < 200 ppm.

Advantage:

1. Huge reduction of Raw water consumption
2. Reused Recycled Treated Effluent into Cooling tower, Boiler, etc...
3. ZLD concept is fulfilled.