

## Intelligent ZLD: Optimizing cost and performance of Zero Liquid Discharge Systems

Zero Liquid Discharge (ZLD) is usually seen as being capital intensive with upfront investment. In reality, ZLD is about optimizing long term operating cost.

iZLD is a service from cKinetics that helps arrive at the optimal mix between upfront investment and ongoing expenses.

It evaluates a manufacturing facility on a 7 point framework listed below.



Water efficient technology for production

Process optimization and Innovation

Proposed ZLD technology

Existing water discharge quality

Existing boiler capacity and utilization

Space availability

Existing and future price of make-up water

Highlights of i- ZLD		What is covered under i-ZLD	
✓	Helps optimize Levelized Cost of Water	>	Pre-feasibility study
	(LCoW)	>	Water balancing and reconciliation
✓	Helps reduce fresh water demand	>	Detailed plant economics study
✓	Helps in process optimization	>	Mapping system impact of process and
✓	Helps identify ways for improving effluent		technology modifications
	quality	>	Value added water mapping in the plant
✓	Helps Identify technology for water	>	Process and recipe optimization scope
	conservation	>	Benchmarking process wise resource
✓	Helps identify appropriate ZLD technology		consumption
✓	Helps optimize utility expansion		
	requirements		

**i-ZLD** is applicable for Industries seeking water optimization and ZLD implementation:

- 1. Textile (wet processing)
- 2. Paper and Pulp
- 3. Pharmaceuticals
- 4. and Distilleries

For getting a pre-feasibility done which takes approximately 2 weeks, please write to us at:

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