# Global Data Center Provider Overcoming Design Challenges in India





# **Project Highlights**

Market: India

Segment: Data Center

## Products and Services used:

 24 X RTAG XSE Air-Cooled Screw Chillers

# Challenge

Prominent global data center operator, with presence at multiple locations in India, planned expansions in Mumbai and Chennai. Customer was designing the data centers to address challenges in power consumption, rapid restart, and footprint. On power front, they had a challenge with Transformer & DG (Distributed Generation) sizing and ESG goals. On footprint, they had an issue with length restriction.

### Solution

Trane approached their engineering team and proposed customized solution that meet their project requirements. Solutions include:

- 24 units of RTAG XSE Air-Cooled Screw Chillers.
- Low inrush current, low energy consumption, high part load efficiency and small footprint.
- Customized solutions for Thermal storage tanks, DG and Transformer sizing. PUE calculations and space planning for maximum capacity.

#### Result

- Operating on best possible PUE of 1.4, with significant annual energy savings.
- Maximum capacity with lowest footprints on terrace layout.
- Reduced thermal storage sizes, owing to Trane Rapid restart.
- Reduced CAPEX on Distributed Generation & Transformer sizing.

#### **Featured Products**



**Product name:** Air-cooled Screw Chiller Model RTAG XSF

#### At a glance:

- Capacity range: 200-600 RT
- Refrigerant: R134a / R513A
- Screw compressor
- Rapid Restart: Fast and stable control on desired chilled water temperature after a power outage to support reliable data center operations
- Operating Range: Wide range able to meet various data center conditions
- Trane smart controller with Adaptive Controls™



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