



# TRANSFORMING FROM THE GROUND UP

The scale and operating structure of large utility companies often put enormous pressure on their execution. IT is a huge challenge for these companies, which in most cases, ends up stifling their digital transformation ambitions. Some of the infrastructure at these companies is decades old. What makes it harder is also the fact that many of these utility companies are highly regulated and have to demonstrate responsiveness, responsibility as well as adherence to compliance. All these make modernization of IT infrastructure not a choice, but an imperative for these companies.

## A COMPLETE OVERHAUL

As per a study by Greyhound Research, a leading global analyst firm, energy and utilities sectors continue to lag in digital initiatives. As high as 82% of surveyed respondents from the industry cited legacy IT infrastructure as the most significant bottleneck in embracing digital initiatives. What's concerning is that while they recognize these issues, only 54% respondents confirmed that they have active plans in place to address them.

A regulated, not-for-profit utility company wanted to modernize their rigid and cumbersome infrastructure that was becoming increasingly difficult to manage. The increasing demands for cost-effectiveness, operational efficiency, and compliance also made such a transformation exercise almost an imperative. The company decided to completely overhaul their IT infrastructure, including modernization of their telecom network. The company chose Infosys as a strategic partner.

Infosys first faced the challenge of lack of documentation of the client's existing IT landscape, which made understanding the myriad technology components the most challenging aspect of the migration. The team overcame that by inventorying all the technologies and their respective tasks. Since the client's business involved the distribution of an essential utility, the migration required a low-risk, low-impact transition roadmap, with minimal downtime or performance issues during the migration. Infosys prepared a thorough and granularly detailed migration plan and governance for decision making that accounted for all foreseeable risks over the duration of the migration that spanned over a year.

## LOWER 'TECHNICAL DEBT OF IT'

Infosys drastically reduced the number of data center racks used by the client from 51 to 18, running from two data centers with industry-leading power efficiency levels. The team followed Converged Infrastructure best practices and optimization of computing to accomplish this. Infosys also updated the client's telecom network, migrating it to new generation multi-protocol label switching technology, thereby improving its resilience and capacity, and deploying fiber to the last mile. The team also undertook IP address replacement, securing the network against cyber-attacks in the form of Distributed Denial of Service (DDoS). The client's legacy corporate telephony system, based out of 19 private automatic branch exchanges (PABXs), was replaced with new generation IP telephony, setting the base for fixed mobile convergence that resulted in significant savings.

Thorough planning and execution, backed by Infosys' decades of experience in large-scale legacy modernization globally, enabled the company to gain IT infrastructure that was reliable, consistent, and scalable, with significantly lower 'technical debt of IT'.

The company's IT infrastructure got a complete revamp, which is expected to help them save over US\$25 million over the span of three years. Infosys delivered infrastructure that drastically reduced downtimes and significantly improved internal customer satisfaction (with the client's IT department ratings) from 30% to 66%. Importantly, the new infrastructure greatly enhanced cybersecurity capabilities at both IT and physical infrastructure in the stack.

# MODERNIZING FROM THE GROUND UP: THE FIVE TAKEAWAYS

- 1 Create** a thorough plan of execution and document the activities, responsibilities, dependencies, and risk mitigation steps in granular detail.
- 2 Use** a low-risk, low-impact transition approach, when dealing with sensitive/critical services. Define governance structure and escalation matrix to fix accountability and decision making.
- 3 Follow** Converged Infrastructure best practices and optimization techniques of computing to arrive at power-efficient, reliable, and scalable infrastructure.
- 4 Undertake** IP address replacement and take steps to secure the network against cyber-attacks in the form of distributed denial of service.
- 5 Leverage** deep expertise and experience from similar projects that help in developing a consistent and reliable migration strategy.



# BIG LEARNING:

Overhauling of IT infrastructure is a complex and high-impact program. A well-devised and carefully executed migration is critical for long-term success without transitional impact on business-as-usual. Decades of legacy and lack of documentation and knowledge base make it challenging to take up large-scale infrastructure migration. In the end, enterprises must remember while legacy modernization is an obvious one, it is also the most complex and demands attention and involvement, not just investment.

**WE DID THIS FOR THEM. WE CAN DO IT FOR YOU.**

Learn how to modernize your legacy systems without disruption by reaching out to us at [askus@infosys.com](mailto:askus@infosys.com)