

# Case Study

High N/w availability for Pilgrims in snow clad mountains,  
at Shri Mata Vaishno Devi



**GLOBAL** Group Enterprise

[www.gtlinfra.com](http://www.gtlinfra.com)

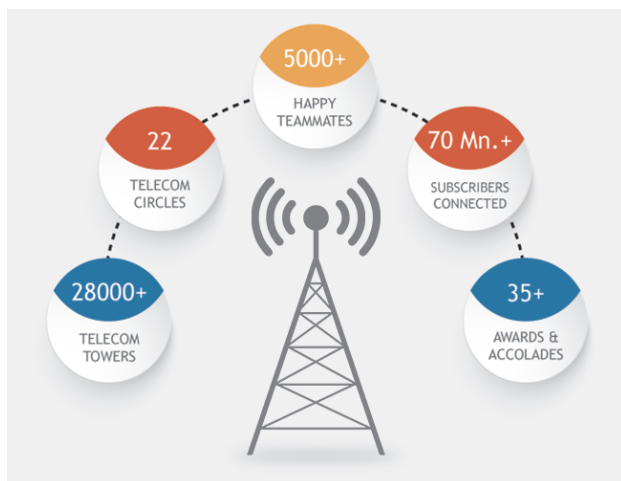
## Case Study

### Company profile

GTL Infrastructure Ltd. (GTL Infra) is part of the Global Group that has a Revenue of USD 600 Mn. and Asset base of USD 2.5 Bn.

GTL Infra is a pioneer in the Shared Passive Telecom Infrastructure in India. It deploys, owns and manages telecom towers and communication structures that are shared by the Wireless Telecom Operators.

With a portfolio of about 28,000 Towers located across all the 22 Telecom Circles in India, GTL Infra has emerged as **India's largest independent and neutral Telecom Tower company.**



### Business Situation

The shrine of Shri Mata Vaishno Devi is considered as one of the holiest places in India. The deity, it is believed resides in a holy cave located in the folds of three peaked mountains named Trikuta, situated at an altitude of 5,200 feet. The terrain and temperature at the holy place which varies from sub zero degree centigrade at times in winter to 32 degrees centigrade in the summer further make the operations more difficult.

About 10 Mn Pilgrims from India and abroad, visit the holy shrine every year. A majority of the pilgrims take a trek of about 12 Kms starting from the base camp in Katra to reach the holy shrine. Pilgrims usually stay for 2 days to complete their visit.

Availability of Mobile Communications enables the pilgrims to stay connected with their near and dear ones, make and receive electronic payments, have access to information and reach out to the support services.

GTL Infrastructure owns nine Telecom Tower sites located in the base town Katra and enroute the Shri Mata Vaishno Devi Shrine. These Telecom Towers are used by Telecom Service Providers to provide mobile communications.

### Challenges

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In the period between December 2016 and February 2017, the Shrine areas witnessed unusually high snow fall. Five Telecom Tower sites of GTL Infra, in between Katra and the Shri Mata Vaishno Devi Shrine, came under a cover of thick snow. weather conditions led to intermittent electric power outages posing unprecedented challenges for the Operations and Maintenance teams. To keep the sites up

and running electricity was to be provided from the back up diesel generators sets, additional operations and maintenance tasks were pressed in to ensure network availability for Telecom Services. However reaching the Telecom Tower sites by the GTL Engineers itself was a challenge. The Tower site located between Om view and Bhairav Ghati was most difficult to reach due to its steepness and snowy path.

## Case Study

Challenges



Engineers at work in snow clad mountain

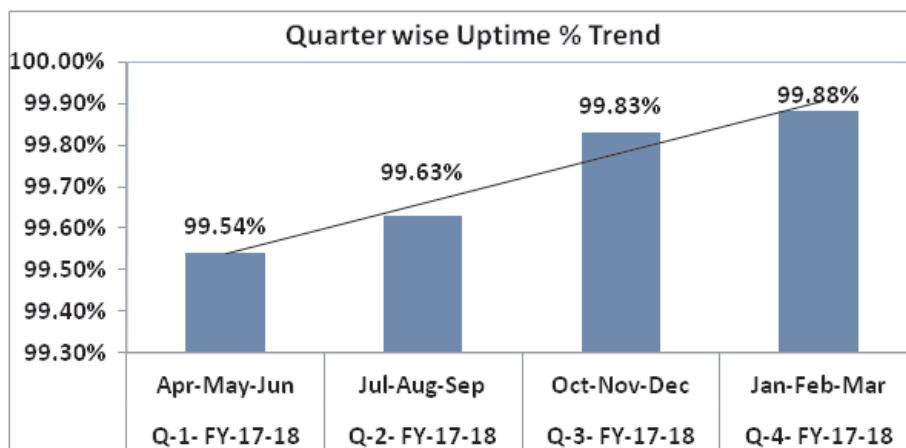


The Path to tower covered in thick snow

Challenges

### Our Approach

GTL Infra and its Operations and Maintenance Teams organized themselves to brave the weather and commit themselves for Network Availability to Operators and the end users. Rapid arrangements for regular refill of diesel on contracted ponies were organized. The GTL Network Operations Center backed up by the field operations with Predictive Analysis and by Remote Monitoring helped in visualize and resume the Energy Management of site that ensured nearly 100% uptime of network despite intermittent electric power cuts and challenges to each site.



All efforts yielded in maintaining the network uptime in the range of 99.83% to 99.89%, thereby ensuring that pilgrims were not isolated or devoid of the connectivity.