

# ENGINEERING SUSTAINABLE REMOTE MOBILE INFRASTRUCTURE FOR A LARGE AUSTRALIAN TELCO

## Project Overview

As the telecom and wireless industry grows, mobile network operators, tower companies, and wireless internet service providers are expanding infrastructure in remote areas with unreliable grid power or no grid power at all. The status quo solution for bad-grid and off-grid telecom infrastructure continues to be diesel generators, which come with high fuel and maintenance costs and carbon emissions. Solar cell tower micro-grids provides a clean, reliable, affordable alternative to diesel generators for the telecom industry.

A leading Australian telco decided to engage Cyient for a Solar Project for Remote Sites. Cyient's renowned expertise in plan, design, construct, and managed services, and our agile, can-do approach played a pivotal role in securing this project.

Aligned with the telco's commitment to renewable energy and reducing carbon footprint, our mission was to deliver intelligent solutions for a sustainable world.

## Services Provided

The project involved designing, procuring, installing, commissioning, and managing tailored solar energy systems for the telco's remote sites, crucial for meeting 3G closure targets and advancing sustainability goals.

Cyient's comprehensive services adeptly addressed the telco major's urgent needs in remote areas. Leveraging our expertise in project management, construction, and assurance, we mobilized resources to provide reliable and renewable solar energy alternatives

## Project Highlights

- **Project Management:** Cyient's proven expertise in plan, design, build, and managed services, and our agile, can-do approach played a pivotal role in meeting the tight timeline, ensuring a timely completion of the project.
- **Agile Execution:** Despite challenges, Cyient's agile approach optimized resource utilization and provided proactive care, improving overall delivery time.
- **Reliable Solutions:** Cyient's solutions provided the telco major with reliable and renewable energy alternatives, crucial for meeting sustainability goals and 3G closure targets.

## Number Of Sites

The project encompasses several remote sites strategically located across Western Australia and the Northern Territory. With our agile approach, Cyient expedited the completion of each site, overcoming challenges that hindered other vendors. Our unwavering commitment to excellence ensured that each site was optimized for maximum coverage and efficiency in remote regions.

## Challenges Addressed

**Extreme conditions:** The project was operated in areas prone to heatwaves and cyclones. These factors required constant consideration and proactive measures to ensure project success.

## Value Realized

### Timely completion:

Cyient's renowned expertise in Plan, Design & Construct and our agile, can-do approach played a pivotal role in completing the project on time and cost.

### Cost efficiency:

By leveraging Cyient's agile approach, the telco achieved cost savings through efficient resource utilization and on-time delivery.



### Environmental sustainability:

The telco's decision to engage Cyient demonstrates a shared commitment to environmental stewardship. By embracing renewable energy sources, the telco sets a precedent for sustainability in the telecommunications industry.

## Assurance Services

As part of the overall site rollout and reducing the carbon footprint, it is important to reduce the footfall and truck rolls to the site and manage these sites remotely. With its IoT Hub portal capability, Cyient can remotely manage solar panels, detect issues, ensure optimal operations, and maintain efficiency.

IoT Hub portal provides various KPI dashboards covering parameters like ambient and panel temperature, AC/DC voltage & current, power output, energy yield, battery status, grid frequency and voltage, and system uptime. Also, with the support of AI/ML, we can identify anomalies that can impact the performance of the solar panels and their ability to generate power.



## Conclusion

Cyient's partnership with the Australian telco on the Solar Project for Remote Sites exemplifies our commitment to innovation and agility. The customer's confidence in our capabilities reinforces our position as leaders in design and construct, complimented by our agile project management. Together, we pave the way for a greener and more resilient future, demonstrating the power of collaboration in driving positive change.

Contact for more details on  
Cyient's sustainable initiatives in APAC



**Joe Komadina**

+61 417 049 612

josip.komadina@cyient.com

© 2024 Cyient. Cyient believes the information in this publication is accurate as of its publication date; such information is subject to change without notice. Cyient acknowledges the proprietary rights of the trademarks and product names of other companies mentioned in this document.

**North America  
Headquarters**

USA

T: +1 860 528 5430

**Europe, Middle East, and  
Africa Headquarters**

UK

T: +44 118 3043720

**Asia Pacific  
Headquarters**

Australia

T: +61 3 8605 4815

**Global Headquarters**

Hyderabad

T: +91 40 6764 1000