

Reliable Private Network Improves Government Connectivity



Overview

Moreton Bay Regional Council (MBRC) provides a range of local government services including waste management, animal control, local road management, maintenance of parks and community facilities.

Challenge

With numerous council resources and facilities spread over an area of more than 2000 square km, effective communication systems are vital. In the past, as communications were needed, technology was deployed to meet specific single-purpose needs.

With communication demands becoming more complex and new facilities and services requiring connection to council systems new flexible options were required.

Requirements

Local government today is accessing and processing information more frequently, often using various corporate applications to transfer data between facilities, and storing information in centralised electronic environments.

MBRC decided to design and implement a standalone network to improve uplink speeds for the council facilities.



CUSTOMER PROFILE:

Moreton Bay Regional Council, Queensland, Australia

CHALLENGE

Establish a standalone communication network to improve speed.

SOLUTION

- Network of eleven Point-to-Point (PTP) links including:
- PTP 800 licensed microwave
- PTP 250 unlicensed microwave

APPLICATION

State and Local Government

BENEFITS

- Reduced cost from leasing lines
- Increased system uptime and end user satisfaction
- Higher reliability and lower maintenance costs
- Centralized monitoring and reporting system across the entire network
- Low latency to support sensitive video applications
- Expandable to add new locations

Solution

CBO Pty Ltd, a Cambium Networks partner in Queensland, Australia helped council design a high capacity network that would meet current and future needs.

To optimize performance, the network was designed with the following parameters:

- Microwave links that would use both the licensed and unlicensed spectrum
- Manage and operate the entire network from one central location on one common application
- High overall reliability to minimize network down time for users and also ongoing maintenance costs
- The network needed to be scalable to grow gracefully as more video surveillance cameras were added, and more locations were connected to the network

To connect the different locations, MBRC needed eleven separate links. Where unlicensed spectrum was available, a Cambium Networks PTP 250 and PTP 600 was selected. Where licensed microwave was required, PTP 800 links were deployed.

Results

The network is performing completely as expected. Each of the eleven links were designed using the Cambium Networks LINKPlanner tool, which enabled MBRC to understand completely what performance would be provided in each location.

