

RFS and QMC bring indoor wireless coverage to the Corcovado-Paineiras Visitor Center in Brazil

Radio Frequency Systems (RFS) partnered with QMC Telecom International (QMC) to provide indoor wireless connectivity for more than 1 million people who visit Corcovado in Rio de Janeiro, Brazil, every year. The popular tourist area boasts one of the 7 new world wonders: Christ the Redeemer.

The Challenges

The Corcovado-Paineiras Visitor Center is located in an environmentally protected area – Tijuca National Park. The building is officially recognized as a Brazilian heritage structure, and it is located in a shadow area that is not covered by Rio de Janeiro’s mobile networks.

Renato França, RFS Sales and Services Director for Latin America, describes the main challenge with the project: “We had to provide a low-visual-impact solution that also complies with strict environmental policies.”

The Visitor Center is a key stop for the more than 1 million tourists who head to the iconic Christ the Redeemer site each year. Because only 1,200 people can visit the monument at one time, the Visitor Center is used as a waiting area for tourists and offers a range of attractions.

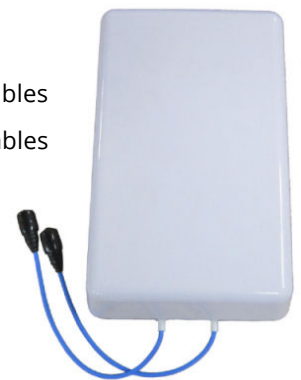
This high-profile project at a truly iconic world site is a huge vote of confidence in our wireless indoor solutions. ”

– Renato França, Sales and Services Director, RFS LATAM

The Solution

RFS implemented a wireless indoor solution that provides 2x2 MIMO coverage for 4 mobile operators and includes a wide range of RFS products:

- Low-visual-impact antennas
- CELLFLEX® foam dielectric cables
- HYBRIFLEX® hybrid feeder cables
- RF conditioning products
- Jumpers



“This project showcases our ability to provide a full turnkey solution, including project management, RF design, commissioning, installation and support,” says França.

RFS’ omnidirectional indoor antenna is designed for modern in-building broadband wireless communications systems that use MIMO technology. Incorporating the antennas in an active distributed antenna system (DAS) solution ensures signal stability.



Christ the Redeemer, an astonishing sculpture located at the peak of Corcovado Mountain (Morro do Corcovado) and one of the New Seven Wonders of the World, is the highest point in the city.



The Results

The Visitor Center has evolved from providing no wireless connectivity to providing high-quality wireless connectivity. The RFS solution provides mobile network access up to 4G speeds with high data throughput for more than 3,000 daily visitors.

Indoor coverage is now available on all 5 floors of the building. "This installation was only the first step. The system can also support future bands and frequencies," says Andre Juncioni, General Director for DAS Brazil at QMC.

Together, RFS and QMC achieved great success partnering to provide an end-to-end solution that includes:

- Project management
- A combination of products and services
- RF design
- Commissioning
- An external infrastructure to accommodate the equipment
- Local support
- Installation



The Paineiras visitor center abounds with local culture and history.

ABOUT RADIO FREQUENCY SYSTEMS

Radio Frequency Systems (RFS) is a global designer and manufacturer of cable, antenna and tower systems, as well as active and passive RF conditioning modules, providing total-package solutions for outdoor and indoor wireless infrastructure. RFS serves OEMs, distributors, system integrators, operators and installers. Its customers currently include the four largest wireless carriers, the majority of tier 2 and 3 wireless carriers in North America and many of the top wireless and microwave OEMs worldwide.

For more than 70 years, RFS has provided its customers with world-class service that is backed by a global presence of nine manufacturing facilities worldwide and sales and technical support centers in 23 countries. RFS offers advanced engineering capabilities, superior field support, and expert technical assistance and training to provide scalable, flexible, future-proof and lightweight end-to-end solutions optimized across the entire RF chain. As an ISO-compliant organization, RFS solutions offer proven longevity, premium performance and unrivalled quality.

ABOUT QMC TELECOM INTERNATIONAL

Founded in 2008, QMC Telecom International provides the wireless infrastructure needed to boost the coverage and capacity of our customers' networks. We develop, own, acquire and manage rooftops, macro sites and DAS solutions in Brazil, Colombia, Puerto Rico and Mexico (in Mexico under the name of QMC Mexico and Conex). Our goal is to provide timely development of high quality telecommunications infrastructure for our clients. Our experienced team of industry professionals combines local relationships with the expertise of having developed over 10,000 telecommunication sites in their cumulative careers.

With a fully dedicated operational team in each of the countries we serve, we have the local knowledge and resources to provide comprehensive site development services under flexible build-to-suit agreements. As owners of the infrastructure, we focus on safety, reliability and regulatory compliance through rigorous inspections and compliance processes. Our infrastructure is designed to exceed each country's federal and local codes and regulations. By applying the industry's latest standards, QMC's customers are afforded the most reliable and timely installations.