

Customer type: Hotel and Resort
Country/Region: Johannesburg, South Africa
Application: Managed Internet Access

Affordable Wi-Fi Coverage in a Challenging Environment



Highlights

The customer

Misty Hills Country Hotel, Conference Centre & Spa, Johannesburg.

The integrator

Q-KON SA, integrating Wavion Wi-Fi solution and que-Vi VSAT broadband satellite service and providing a high performance wireless broadband access system.

The challenge

Providing affordable Wi-Fi coverage to stone-walled rooms and public facilities scattered in a large area with tall trees and dense foliage.

The solution

A Wi-Fi access network using just 12 Wavion WBS-2400 base stations providing extended range and unmatched performance in Non-Line-of-Sight (NLOS) environments.

The result

Full coverage of all rooms and public areas with a minimum throughput of 2 Mbps (with an average of 8-10 Mbps).

The customer

The Misty Hills Country Hotel Johannesburg is a stone-built hotel complex. Set inside a jungle in the heart of the Kromdraai, the property offers 215 rooms for hotel guests, 22 meeting rooms, a 1000 m² exhibition center, restaurants and other public facilities in 8 separate villages.

The hotel's management looked for a Wi-Fi solution that will provide online access in all rooms and public facilities in the complex, with minimal cabling and disruption to open and closed areas, as well as to guests and ongoing operation of the property.



The challenge

In a jungle environment interspersed with tall trees and dense foliage, providing affordable, high-quality Wi-Fi in open spaces and to scattered buildings built with thick stone walls is an extremely challenging mission. This presents an exceptionally difficult set of requirements such as high performance in Non-Line-of-Sight (NLOS), deep indoor penetration and extended range in a jungle environment with tall trees.

The solution

With the unique benefits of the Wavion Beamforming technology, all rooms and common public areas were covered with a minimum throughput of 2 Mbps (with an average in excess of 8 Mbps), using only 12 Wavion WBS-2400 base stations. A dedicated virtual network over the existing fiber backbone routes guest and delegates' internet traffic via Q-KON SA's que-Vi VSAT solution, providing uncapped internet connectivity.



The solution includes facilities to control user access to the "Hot Spot" facility as well as manage the bandwidth allocated to guests and conference delegates depending on their user profiles, including an option of pre-paid access vouchers for a specified period.

Future expansion

The WBS-2400 based Wi-Fi access network at Misty Hills with its self-backhaul capability provides a robust platform that enables numerous future value-added wireless services such as VoIP over Wi-Fi telephony services, CCTV surveillance backhaul, asset and sensor monitoring, mobile panic alarms and limited video-on-demand services.

Why Wavion

"11 site surveys of the property were done by various Wi-Fi specialists. Some left without wanting to quote, others just disappeared. But one company, Q-KON SA, felt confident that with Wavion's Beamforming technology it would be able to "make it work". This is now working and we have great feedback from our guests on the ease of use and functionality. 99% of the property is covered, and if you don't know the Misty Hills property, it is a jungle with tall trees, shrubs, stone buildings and many meandering paths to the guests' rooms."

Pierre Goffinet

Group IT Manager, Recreation Africa Leisure Industries, Misty Hills



For additional information about Q-KON www.qkon.com