

Millennium & Copthorne Hotels

Laying the foundation for hotels of the future with RUCKUS® technology

CUSTOMER

Millennium & Copthorne Hotels

LOCATION

Global

OVERVIEW

Millennium & Copthorne Hotels is a dynamic, global hotel company that owns and operates a worldwide portfolio of over 100 hotels, including six properties in Singapore. Founded on the philosophy of genuine hospitality, this hospitality group has an outstanding reputation for excellence, taking pride in exceeding the needs of its business and leisure travelers.

REQUIREMENTS

- A network architecture that leverages the latest 802.11ac Wave 2 technology to meet current and future guest demands for bandwidth and seamless connectivity
- Hotel-wide Wi-Fi coverage to support property-wide deployment of new digital services, Internet of Things (IoT) innovations, and AURA room service robots
- Strong and reliable Wi-Fi to support the use of collaboration and productivity tools to boost efficiency

SOLUTION

- Over 2900 RUCKUS access points (APs) and 135 ICX switches were deployed across five hotel properties in Singapore
- Each of the hotels are individually managed by a 2-node SmartZone Cluster

BENEFITS

- Enable the roll-out of new services and innovations



- Increased guest satisfaction regarding Wi-Fi performance, and ability to support multimedia content
- Increase productivity and improve collaboration amongst employees as well as reduce operating costs

Reliable, high-performing connectivity foundation the key to future innovations

Tech-savvy guests, evolving customer demands, and technological innovations—such as the Internet of Things (IoT)—have placed hotels in a period of significant disruption and opportunities. Hotels today need to innovate to attract and retain as many

customers as possible, or risk being displaced in the future. Therefore, customer centricity needs to be embedded in the DNA of the hotels of the future.

“For Millennium & Copthorne Hotels, genuine hospitality and leading with guest experience are guiding principles for everything we do. Every new technology we adopt and digital service we implement is aimed at providing greater personalization, reducing friction points and providing a unique experience for every guest,” Aung Kyaw Moe, Director of IT, Asia, Millennium Hotels and Resorts.

THE CHALLENGE

Before Millennium & Copthorne Hotels could roll out new digital services across its five properties in Singapore—M Hotel, Orchard Hotel, Studio M, Grand Copthorne Waterfront, and Copthorne King's hotel—it needed to first establish a reliable, high performing Wi-Fi foundation across all its hotels.

The group's previous network architecture was first deployed in 2011, and with the advent of mobile devices, IOT and new technologies, this legacy infrastructure was no longer able to keep up with both customer and corporate expectations.

One of the key obstacles the Millennium & Copthorne Hotels group faced was limited Wi-Fi coverage. This limitation was undermining the company's plan to implement innovations such as the AURA robot, which required seamless coverage throughout the premises.

The legacy Wi-Fi equipment also only utilized 802.11n technology which can lead to limited network speeds. In addition, inefficient and outdated Wi-Fi implementation design which used leaky Wi-Fi antenna cabling can also result in



“Thanks to RUCKUS solutions, we are not only able to meet and exceed our current guests’ expectations for seamless, high-speed Wi-Fi but also laying an extensive, reliable connectivity foundation that is able to support our future plans and innovations”.

Aung Kyaw Moe
Director of IT, Asia, Millennium Hotels and Resorts

significant interference and channel congestion issues. In an era when consumers are consuming copious amount of video content on their personal devices, all these challenges can create significant guest dissatisfaction and frustration.

THE SOLUTION

To address challenges in connectivity performance and coverage as well as expand their channel capacity to meet current and future usage demands, Millennium & Copthorne Hotels partnered with RUCKUS to develop their latest, future-ready network architecture for their five hotels and corporate office in Singapore.

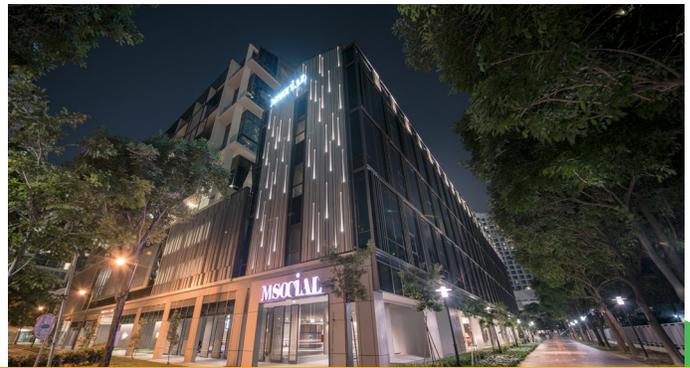
RUCKUS deployed over 2,900 access points (APs) over a short time frame of eight months, that leveraged the latest 802.11ac Wave 2 standard across the five hotels. There were four key types of APs installed, and each type of AP was selected based on the requirements of the location.

The H510 APs were deployed for in the hotel rooms as they can serve more devices simultaneously and deliver great in-room Wi-Fi.

The R510 APs were chosen for the common areas thanks to the ideal combination of performance, reliability, and coverage for medium-density indoor locations.

The R710 APs, which is known for their capability to deliver reliable connectivity in the most demanding high-density locations, were installed in the ballrooms and pre-function areas, including the 3800 sqm of convention space at Grand Copthorne WaterFront.

Lastly, the T610 APs, which are purpose-built for busy public venues, were implemented in outdoor locations, such as swimming pools and tennis courts.



RUCKUS also deployed over 135 ICX switches in this project. The versatile ICX 7250 switches provided enterprise-class features with future-proof expandability and performance to support latency-sensitive applications, such as real-time voice/video streaming. The ICX7450, which is modularly designed for scalability, provided the aggregation functions.

Each of the hotels is individually managed by a 2-node SmartZone Cluster, which helps enhanced resiliency for high availability requirements.

“We chose to work with RUCKUS to refresh the connectivity infrastructure across our hotels in Singapore because of their impressive and proven track record in the hospitality sector and the robust Wi-Fi and switching technologies that are specifically designed to meet the needs of hotels,” said Kyaw Moe. “Today, RUCKUS’ wired and wireless infrastructure supports all our hotel operations and guest connectivity needs.”

THE BENEFITS

Since the deployment of RUCKUS’ connectivity infrastructure, Millennium & Copthorne Hotels has rolled out a slew of new services and innovations aimed at enhancing the guest experience.

One of the cutting-edge initiatives launched by the hotel was the deployment of the AURA service robots at the M Social Hotel. The robots needed a wide Wi-Fi coverage area with stable and reliable connections, as well as travel-far signals to operate and find its own way around the hotel to deliver room amenities to guests. Later on, Millennium & Copthorne Hotels extended the deployment of AURA Service robots to four other hotel properties.

“Hotels staffed by robots are no longer stuff of science fiction and the future, it is happening now. And Millennium & Copthorne Hotels is the first company outside of the US to deploy the AURA service robots,” highlighted Kyaw Moe. “Our goal is not only to bring greater convenience and delight to guests but also allow our employees to focus on taking our hospitality experience to new heights.”

Another new initiative that leverage the new, enhanced network is the new in-room check-in service with on-screen signing for VIPs at select properties. This eliminates the need for VIP guests to check-in at the lobby and significantly shorten waiting time.

Besides new innovations, the new network also helped boost productivity, improve collaboration and reduced operating costs. For example, the strong and reliable Wi-Fi enables employees to make overseas calls using software phone or other communications applications. This helps the company to reduce IDD charges. At the same time, enhanced connectivity also led to improved efficiency and service quality in matters of housekeeping and service delivery.

Strong and stable connections also provide good quality of service (QoS) for video conferencing, which promotes stronger collaboration between employees. In addition, using a private WAN and Radius server, the network infrastructure by Ruckus Networks enables employees to have back-office access no matter which hotel site they are at, facilitating better interconnectedness and more seamless workflow.

Lastly, by installing an AP into every individual guest room, Millennium & Copthorne Hotels can ensure seamless connectivity and provide sufficient bandwidth for multimedia content, such as seamless streaming of movies and video on Apple TV.

“Since the new network infrastructure was implemented, guest complaints about Wi-Fi performance are nearly non-existent. This is a testament of the RUCKUS’ dedication to delivering superior end-user experience, and it closely aligns with our company’s philosophy of providing genuine hospitality and excellent service to our guests,” concluded Kyaw Moe.

Looking into the future, Millennium & Copthorne Hotels is exploring the possibility of using the RUCKUS IoT Solution suite to host solutions such as in-room automation, smart locks, and asset tracking. The hotels are currently looking into in-room Wi-Fi AP as the central communications hub for all room functions and connection to IoT devices, such as lighting, connected door locks and in-room entertainment.

By using the IoT solution suite, Millennium & Copthorne Hotels will not only improve the manageability of the connected devices but also develop new services and applications using these connected devices to redefine the future of guest experiences.

CommScope pushes the boundaries of communications technology with game-changing ideas and ground-breaking discoveries that spark profound human achievement. We collaborate with our customers and partners to design, create and build the world’s most advanced networks. It is our passion and commitment to identify the next opportunity and realize a better tomorrow. Discover more at commscope.com.



COMMSCOPE®

commscope.com

Visit our website or contact your local CommScope representative for more information.

© 2020 CommScope, Inc. All rights reserved.

Unless otherwise noted, all trademarks identified by © or ™ are registered trademarks or trademarks, respectively, of CommScope, Inc. This document is for planning purposes only and is not intended to modify or supplement any specifications or warranties relating to CommScope products or services. CommScope is committed to the highest standards of business integrity and environmental sustainability, with a number of CommScope’s facilities across the globe certified in accordance with international standards, including ISO 9001, TL 9000, and ISO 14001. Further information regarding CommScope’s commitment can be found at www.commscope.com/About-Us/Corporate-Responsibility-and-Sustainability.

CS-114556-EN (05/20)