ALE | **Where Everything Connects**

Digital Age Networking
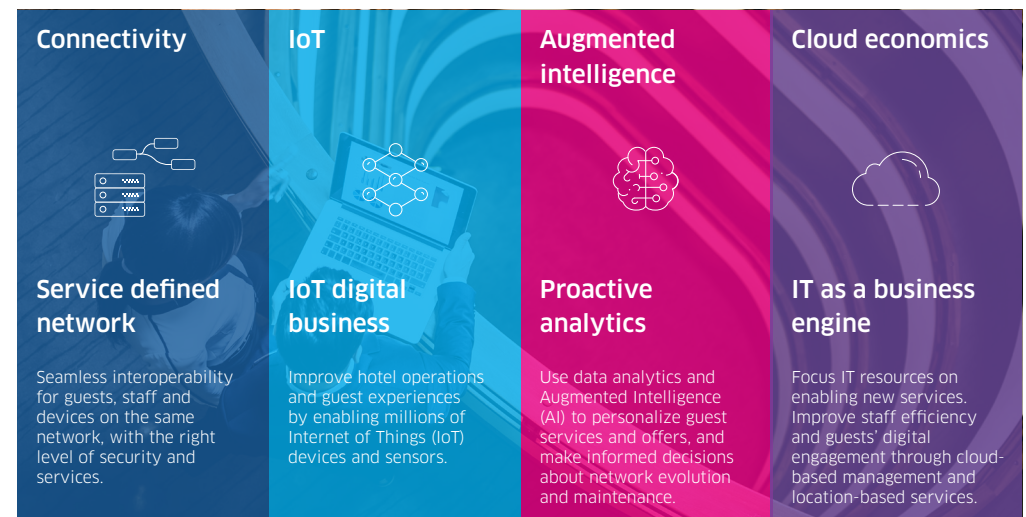in Hospitality

Alcatel·Lucent
Enterprise

Hospitality

ALE Digital Age Networking provides a network foundation to deliver comprehensive mobility, as well as the latest in-room-automation services to ensure a memorable guest experience. ALE hospitality solutions optimize staff efficiency, simplify IT operations and help management achieve maximum occupancy. In addition, they can increase revenue, and support competitive differentiation while maintaining a low total cost of ownership (TCO).

In an increasingly competitive landscape, the guest experience has become one of the top differentiators in the hospitality industry with guest Wi-Fi, CRM/loyalty and customer-facing mobile apps topping investments for digital transformation. Most guests travel with several devices, and just want to connect, relax and feel at home. In addition to the flood of guest devices, and the staff devices needed to operate the facility, the influx of IoT means hotels need to be hyper-connected, mobile and secure.

The network can no longer be just a cost center and underlying infrastructure. Our Hospitality Digital Transformation Survey shows that security, networks and analytics are top investment priorities in the coming years. To support a truly digital transformation, the network must be an active component in the delivery of guest experiences, and in enabling value-add services to provide new income to the hotelier.

ALE Digital Age Networking provides the foundation for hotel services. It eliminates the need for hoteliers to be involved in the technical complexity and lets them focus on their business.

Connectivity	IoT	Augmented intelligence	Cloud economics
Service defined network	**IoT digital business**	**Proactive analytics**	**IT as a business engine**
Seamless interoperability for guests, staff and devices on the same network, with the right level of security and services.	Improve hotel operations and guest experiences by enabling millions of Internet of Things (IoT) devices and sensors.	Use data analytics and Augmented Intelligence (AI) to personalize guest services and offers, and make informed decisions about network evolution and maintenance.	Focus IT resources on enabling new services. Improve staff efficiency and guests' digital engagement through cloud-based management and location-based services.

Connectivity

The basic principles of ALE LAN and WLAN unified access and unified management ensure seamless interoperability between users, devices and services across the hotel network. At the same time they provide appropriate security levels to prevent network bottlenecks and reduce the risk of cyber-attacks.

All of the devices (guests', staff, and IoT) are connected to the network automatically with specific profiles. This means they have different network access levels, security and QoS. Access to hotel applications is restricted to authorized individuals based on their roles. Network resource usage is monitored to proactively address any potential problems.

In addition, Alcatel-Lucent Stellar OmniAccess® WLAN provides seamless and pervasive Wi-Fi connectivity for guests and staff throughout the hotel, whether they are indoors or outdoors, anywhere on the premises. The ubiquity of Wi-Fi connectivity creates an opportunity to introduce new network services as presented in the following sections.

IoT

Digital Age Networking IoT enablement allows for easy and secure onboarding of IoT devices. This is especially important in the hospitality industry where the "hotel Internet of Things", is experiencing an increasing ecosystem of room sensors and automation devices. Superior guest room comfort is clearly an asset for hoteliers seeking differentiation. A smart room that delivers a combination of high-speed, high-quality Wi-Fi, with easy-to-use, non-intrusive in-room automation offers a winning formula to provide guests with an unforgettable experience.

One in four hoteliers plan to allocate IT budget specifically to IoT initiatives.[1]

Fingerprinting capabilities in Digital Age Networking enable automatic identification and classification of millions of IoT devices. Once identified, the devices are authorized to connect to the network in a predefined VLAN, with the appropriate level of services, to ensure network security and performance. These capabilities are enabled by leveraging the unified network management application and require minimum IT effort.

1 - Source: Hospitality Digital Transformation Survey

Augmented intelligence

In their battle to differentiate, hospitality leaders will use the power of Artificial Intelligence (AI) to distinguish and obtain guest analytics for further personalization. 45% of hotels expect to have a first AI solution in place by 2020.[2]

Smart analytics and statistics embedded within Digital Age Networking provide augmented intelligence that helps hoteliers to manage data collected by the network, and make informed decisions to optimize network usage, and grow their business. Presently, these analytics provide statistics about performance, network resource usage, applications, and anonymized guest location metrics and client behavior. Predictions about future network needs are possible based on present resource usage and inventory information. Location analytics can be used to fine tune the marketing strategy and offers aligned with the peak/valley hours associated with the hotel amenities.
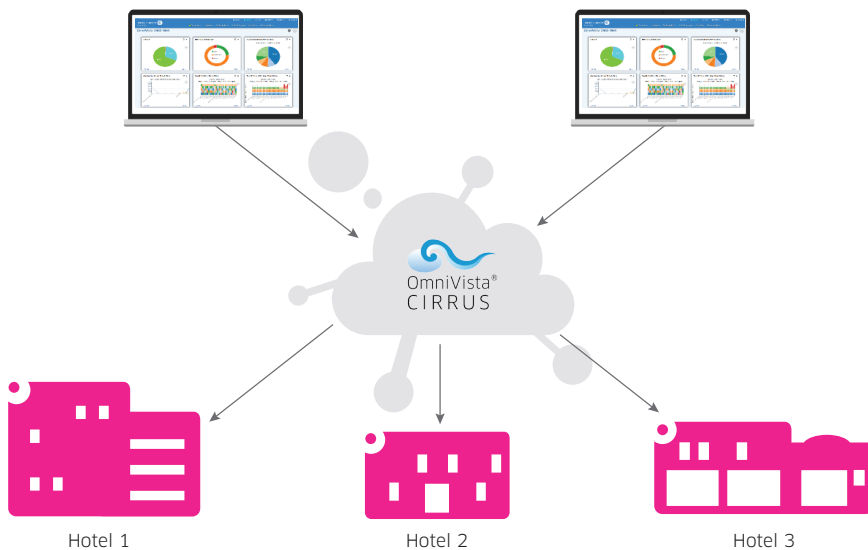
Another step toward augmented intelligence will be to combine the network statistics with guest data from other hotel applications, such as PMS and CRM systems, to deliver hyper-personalized services. For example, knowing where a guest spends most of their time, as well as their preferred services, will enable the hoteliers to create a customized offer for each guest.

2 - Source: Hospitality Digital Transformation Survey 2018

Cloud economics

With limited IT budgets and resources to manage the hotel network, cloud-based management-as-a-service from a service provider presents a practical option for hoteliers. Alcatel-Lucent OmniVista® Cirrus Network Management as a Service is the ALE network management tool, in the cloud, that hoteliers, hotel integrators and managed service providers can leverage using a "pay-as-you-go" business model. This eliminates the need for up-front investment and on-site equipment. Network on Demand (NoD) is also a good option when budgets for technology investments are limited.

Often, however, it is about more than just saving money. As hoteliers seek to increase revenues, and improve their return on investments (RoI), cloud-based services, such as location-based services, can differentiate and provide new income streams Location-based services will be an important part of marketing and guest engagement and one of the key differentiators next to deeper personalization and omni-channel experiences. (Hospitality Digital Transformation Survey).

As guests move throughout the hotel premises, smartphones are often the main connectivity and information device of choice. Hoteliers are being proactive in developing attractive mobile apps to manage on-line bookings and communicate

Location-based services in hospitality

1 • As a guest waits for the shuttle, they open the hotel loyalty app and complete the self check-in. The electronic room key is downloaded to their phone.

2 • The mobile application automatically notifies the reception staff as a VIP guest approaches the entrance. The guest receives a personalized welcome from the staff.

3 • The mobile app identifies the guest's location on a 3D map and provides directions to the room.

4 • While walking through the hotel property, promotional coupons and notifications can be sent to guests even when the app is running in the background.

5 • Guests can make a reservation at a restaurant in the hotel and are provided with directions to get there.

6 • Guests can also get directions to hotel facilities such as the pool or spa, or to meet with friends or colleagues.

7 • Heading to a meeting downtown; guests can quickly find their car in the parking garage.

8 • The app can locate personnel to provide efficient operations and quickly resolve maintenance issues.

about loyalty plans. Digital Age Networking helps in providing information about hotel services using the hotel app which is available to guests on their mobile devices during their stay.

Digital Age Networking provides the best connectivity everywhere and allows for guest services, based on location, to enrich the hotel mobile apps. Following are a few examples of services that guests can enjoy on their smartphones:

• Step-by-step directions to the guest room, or other hotel facilities
• Contextual and personalized offers or information about the venue
• Delivery of guest services on the spot
• Group location features for families and friends on premises

These network services offer a number of opportunities. First, the guest's digital engagement activity is increased, which can translate into increased guest loyalty and possible future revenue. Second, additional income can be created by dynamically stimulating the consumption of hotel services and offers in real-time. And third, hotel staff can locate guests, maintenance personnel and assets, optimizing the delivery of services throughout the hotel premises, and improving staff efficiency.

Brochure
Digital Age Networking

We are ALE.
We make everything connect by delivering
technology that works, for you. With our
global reach, and local focus, we deliver
networking and communications.
On Premises. Hybrid. Cloud.

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