

Today, organizations of all sizes are under intense pressure to reinvent and streamline their operations. To achieve gains, organizations are looking for new and novel uses of technology to solve traditional problems. For many organizations, this digital transformation is falling to the CIO and IT managers to address. In fact, IDC reports that in 2019, 66% of all firms have deployed IT initiatives in support of digital transformation. Yet, as IDC points out, challenges remain in three key areas: importance of edge environments, device growth and device communication, and greater use of hybrid and multi-cloud.

## IMPORTANCE OF THE EDGE

The edge environment is, perhaps, the most demanding and difficult domain for CIOs and IT managers today. In less than a decade, the edge network has morphed from a hardwired-only domain to a blended wired-wireless domain. With new mobile devices seeming to appear every week and increasing pressure for flexibility in the location of wired connection points, CIOs and IT managers face never-ending pressure to provide flexibility in how and where users connect to the network.

## SHIFTING TO THE CLOUD

As organizations undergo a digital transformation, they are moving more applications from traditional, on-site servers and data centers, to cloud and multi-cloud environments. This shift to the cloud is allowing organizations to gain further efficiencies of operations while placing additional pressure on IT to ensure latency or delay is held to a minimum. This requires consistency in provisioning of switches and Wi-Fi access points (AP) as devices are added to the network, and timely updates to all devices when applications move from one cloud to another.

## DEVICE GROWTH AND COMMUNICATION

Then, of course, there is the challenge of dealing with the user community. New devices—tablets, phones, laptops and sensors—are appearing every few weeks. As Internet-of-things (IoT)-enabled sensors and devices grow, IT will need to ensure that IoT traffic is routed quickly and efficiently. In addition, users will want to connect to social applications like Facebook and Instagram, as well as streaming services. Ensuring that these applications do not adversely impact mission-critical organizational applications requires a uniformity and consistency of policy and routing across the entire edge network.

## MANAGING THE CONVERGED EDGE NETWORK

SmartZone from Ruckus Networks is designed specifically for managing the converged edge network. Ensuring standardization and consistency in provisioning and deploying edge switches and APs, SmartZone saves time and money through a single-pane-of-glass visibility to the entire edge network and workflow automation.

## UNIFIED MANAGEMENT

The SmartZone Network Controller (Figure 1) is designed to manage both Ruckus ICX switches and Wi-Fi APs from a single-pane-of-glass management system. As such, it eliminates management system clutter, reduces IT staff training time, and supports the automation of routine provisioning and maintenance functions.

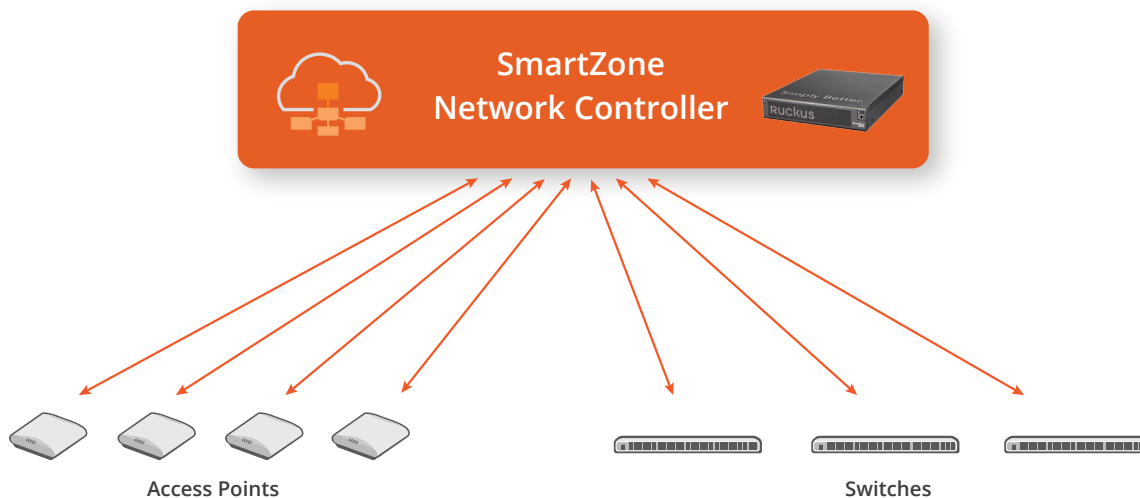


Figure 1. SmartZone Network Controller

## WORKFLOW AUTOMATION

As the edge network expands, it is desirable to maintain consistency in the provisioning of switches and APs. With SmartZone's Zero Touch provisioning, it is possible to ensure provisioning consistency as well as automate the workflow associated with switch and AP provisioning.

To understand SmartZone's workflow automation capabilities, it is important to keep in mind that SmartZone allows IT to identify "groups" of aggregation and access switches. All switches within a group can be automatically provisioned with the same profile. This allows installation teams to proceed with installation and once powered up, the device will attach to SmartZone and Zero Touch provisioning will push the standard group profile to the switch. This allows the switch or AP to join the network and become active quickly. It is also possible for IT to override the standard provisioning profiles on devices, if needed, to create custom configurations.

SmartZone's Zero Touch provisioning allows IT to define a rich array of parameters that can be automatically pushed to all new switches. These include:

### PROVISIONING AUTOMATION

#### Layer 2 parameters

At layer 2, SmartZone supports the pre-provisioning of VLANs including provisioning of ports, DHCP snooping, DAI, IPSG and STP/RSTP. In addition, SmartZone supports pre-configuration of link aggregation groups (LAG).

#### Routing

With SmartZone, it is possible to pre-provision static IP routes, basic open shortest path first (OSPF) and IP interfaces, including VEs.

#### Management

From a management perspective, it is possible to define and provision AAA, RADIUS/TACACs hostname, local user and DHCP servers.

#### Security

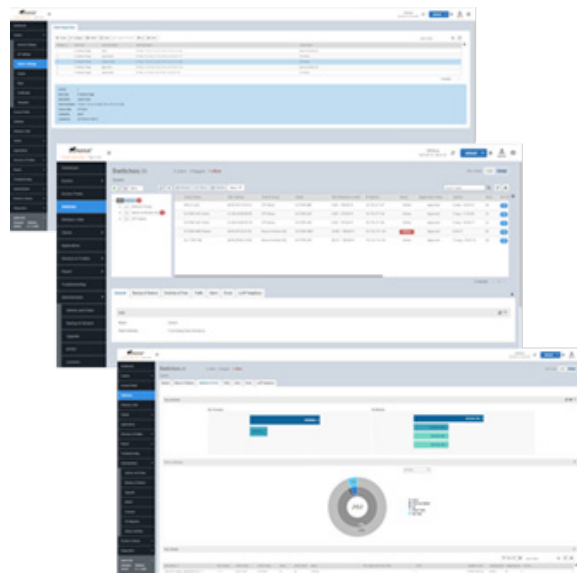
SmartZone Zero Touch provisioning supports access control lists, which ensure security and consistency across the entire edge network.

#### Port settings

SmartZone Zero Touch provisioning saves time and money by allowing port speeds, VLAN membership, PoE settings, LLDP settings, admin on/off, root guard and BPU guard to be automatically provisioned to all new switches as they join the network or to be automatically reconfigured if the switch is moved to a new group.

#### Scheduled availability

SmartZone allows IT to set broadcast times for SSIDs on APs, allowing Wi-Fi access to be scheduled in advance and turned up and down automatically.



### BUILDING A BETTER EDGE NETWORK

IT departments are stretched thin these days. CIOs are under intense pressure to help drive organizational transformation with new technology and the cloud. This is making the edge more complex. SmartZone from Ruckus is designed to give IT the upper hand. Purpose built to manage the converged wired-wireless edge network, SmartZone provides advanced converged management features and workflow automation and is built upon the industry's leading Ruckus switches and APs. SmartZone delivers best-of-breed converged edge network management capabilities from a single pane of glass with an easy-to-use GUI interface.

SmartZone eliminates management system clutter, reduces training time and provides valuable workflow automation. Ruckus is redefining connectivity.