

RUCKUS AI™

AI-Driven Service Assurance and Business Intelligence for RUCKUS enterprise networks



BENEFITS

- AI powered network incident identification, prioritization, and resolution AI Operations.
- AI powered RRM to optimize network by reducing interference links
- AI driven AppInsights for visibility into wired, wireless and application server performance over time.
- Accelerates network and client troubleshooting
- Helps IT teams improve the user experience
- Service Assurance works with your RUCKUS network to automatically validate service levels

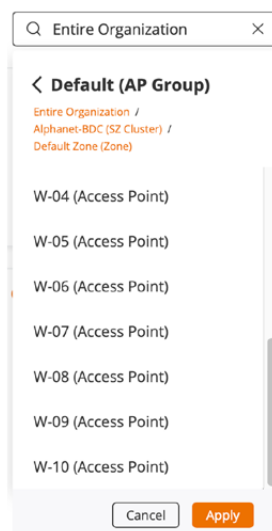
IT teams often lack the tools to ensure required network service levels in an environment of ever-increasing user connectivity demands and network complexity. Helpdesk tickets from user connectivity issues pile up while IT struggles to glean insight from network data. When service issues affect user experience, IT often lacks a way to identify root causes and define a course of action to fix the problem.

RUCKUS AI™ from CommScope is a cloud service for network intelligence and service assurance. Powered by machine learning (ML) and artificial intelligence (AI), it helps you get the most from your RUCKUS® network. The service gives IT comprehensive visibility into network operations. It accelerates troubleshooting and helps IT teams meet their network service level agreements (SLAs).

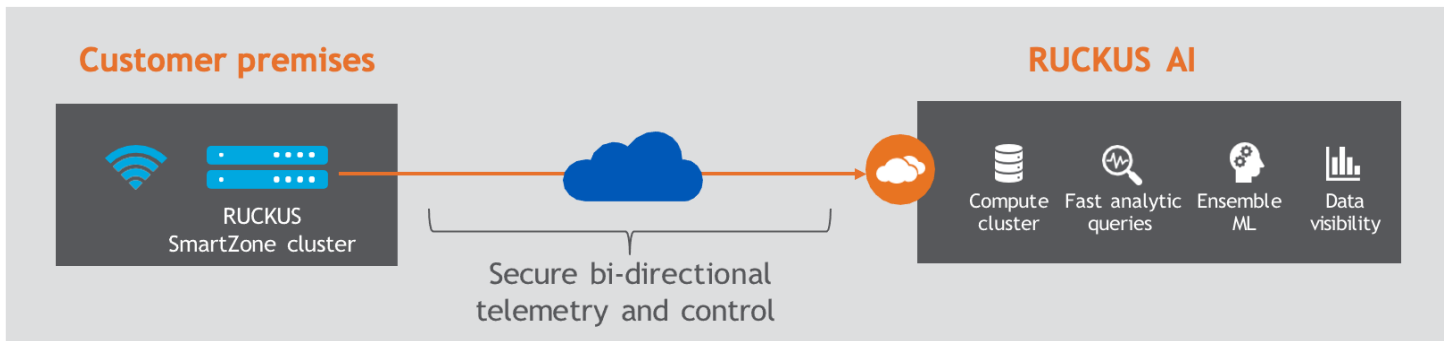
The service identifies network assurance incidents, classifies them by severity, traces root causes and makes specific AI recommendations for remediation. It automatically monitors network health relative to configurable thresholds.

Advanced client troubleshooting and AI incident intelligence give IT teams the power to address service issues for individual users and devices. RUCKUS AI works with your RUCKUS network to allow it to self-validate—without the need for overlay sensors. You can identify and address many service issues before they even affect users.

The service also delivers robust reporting and informative dashboards. Create custom dashboards and data visualizations with the Data Studio tool—and flexibly explore your network data warehouse with drag-and-drop ease.



This network navigation widget present in the dashboard and other pages enables you to browse across your entire network organization. It enables you to drilldown and filter parts of the network hierarchy. Levels to browse include overall network, domain, zone, AP group, AP. You can also search for a specific network element in the search box above the navigation.



RUCKUS AI aggregates raw data and automatically transforms it into deep insight into network operations. This ML- and AI-powered service frees you from a wide variety of manual tasks associated with network assurance. Comprehensive network intelligence helps you deliver on network SLAs in support of users, devices and applications.

RUCKUS AI automatically measures the impact of the RUCKUS SmartZone™ software configuration changes on network performance. You can observe the effects of each change on a portion of the network before rolling it out more broadly. This helps to avoid fully rolling out changes that might have an adverse effect on network performance.

It scales to support the largest deployments—expanding capacity transparently to meet your requirements. RUCKUS AI supports two control and management architectures: RUCKUS SmartZone software* for on-premises and private cloud/data center deployments, and RUCKUS Cloud™ for cloud-managed deployments.

RUCKUS AI has an industry-unique combination of attributes:

- Automated data baselining and insights driven by ML and AI
- Health and SLA monitoring
- Powerful, holistic troubleshooting
- Automatic classification of incident severity
- Service validation without the need for an on-site data collector or overlay sensors
- Granular access to raw data with deep exploration and custom dashboards
- 12 months of storage with flexible data reporting

* RUCKUS SmartZone 5.1.2 or higher is required.

Streaming telemetry with a modern data stack for advanced service assurance

RUCKUS AI is designed for the unique data profile generated by network devices. On-premises controllers securely connect to the cloud and stream lightweight health KPIs and telemetry. The high-performance data stack ingests and processes the data to serve as the basis for queries, reports and baseline metrics.

Comprehensive visibility into network operations

“Health” page provides users visibility to monitor network health,, with an overview tab that provides a high-level summary view. Select other health monitoring tabs to view metrics in specific health categories: connection, performance, and infrastructure. Network health monitoring gives you instant visibility into metrics like AP service uptime, time to connect, connection success rate, client throughput and more. You define the service levels you want to measure against. For example, you might want to set the “time to connect” goal at five seconds—RUCKUS AI will tell you what percentage of the time the network meets that goal. The service lets you readily demonstrate to others in your organization performance to SLAs. You can also setup custom SLA and measure compliance of network values with custom thresholds.

Network Incident creation powered by machine learning and artificial intelligence.

RUCKUS AI enables machine-assisted proactive networking for your RUCKUS deployment. It automatically establishes a normal range of behavior for each network element, without requiring any input from IT. Then it uses machine learning to automatically identify service incidents related to connectivity, performance and infrastructure that affect user experience.

It uses artificial intelligence to classify service incidents by severity—so you can address the highest-priority issues first.

The system provides details for each incident, including:

- Root cause and recommended action
- Affected areas (client operating system types, access point models, firmware versions, WLANs and more)
- Other impact details, including severity, client impact and duration.
- List of impacted clients
- Presentation of the underlying data that drives the incident.

RUCKUS AI dramatically reduces mean time to resolution for service incidents. It can eliminate some helpdesk tickets by letting you address issues before they affect users. By addressing the root cause for one incident, you can avoid other incidents that might arise from that cause. Service providers can realize instant business value when level 1/2 helpdesk personnel can remediate complex network problems using RUCKUS AI.

AI driven Cloud RRM

With compute intensive AI capabilities such as RRM, RUCKUS AI can drive optimization to each zone of your network by recommending ideal channel plan and channel bandwidth along with changes to AP transmit power to reduce interfering links and bring about improved speed throughput for your users. You will visually be presented with a prediction of this optimization and reduction of interference. RUCKUS AI runs simulations every 24 hours to get the best possible solution of driving down to zero interference. You also have an ability to schedule applying the recommended setting and to revert if the need arises.

AI Operations

RUCKUS AI also helps automate solutions and task sequences to the customer by simplifying action as a single click and taking away manual search, operations management and helps remove chances of manual error. Like AI driven Cloud RRM, the user can view the prediction, schedule the recommendation and revert if the need arises.

AppInsights – Application Quality of Experience

RUCKUS AI also provides the user insights linked to application outcomes by scoring an application quality of experience.

This is especially useful to monitor collaboration application traffic over the network and drive to administrators - incident notifications and corrective action steps within their network infrastructure in order to improve the end user experience with various applications.

Powerful client troubleshooting

With simple and flexible search and a holistic client troubleshooting page, RUCKUS AI gives you a complete picture of client experience for easy connectivity and user experience diagnostics, including:

- Successful, slow, and failed connections
- Disconnect events.
- Roaming events and failed roams
- Connection quality (RSSI, MCS, client throughput)
- Network incidents affecting users, with links to see incident details.
- Network pcap download for all failure events for detailed packet analysis.

Client troubleshooting is a powerful tool that helps you understand and address issues affecting specific clients on the network.

Automatic service validation

RUCKUS AI works with your RUCKUS network to automatically validate service levels without the need for overlay sensors. Access points act as virtual clients to identify possible service disruptions, often before they affect users. The system can perform a variety of tests, including:

- WLAN, LAN and WAN connectivity
- EAP, RADIUS, DHCP and DNS
- Ping, traceroute and speed test (upload/download)

Melissa™ Virtual Assistant infused with chatGPT—your own AI-powered virtual network assistant.

RUCKUS AI includes a powerful AI-powered virtual network assistant called Melissa™ which has also been infused with chatGPT capabilities. Combining an intuitive interface with advanced natural language processing, Melissa determines the administrator's intent in posing a wide variety of inquiries and delivers highly insightful responses. IT teams save valuable time with ready access to information that helps them manage network operations—without the need for any coding.

Health

RUCKUS AI includes a feature to view 15 metrics over time categorized amongst Connection, Performance, Infrastructure, Application such as connection success ratio, time to connect, client throughput, AP capacity, and many more. You can also setup custom SLA and measure compliance of network values with custom thresholds.

Config change

RUCKUS AI includes a feature as a method to quantify impact of making config changes to network and these can be measured across 15 different SLA points.

AI Driven Probe suppression

RUCKUS AI can intelligently help reduce channel congestion linked to excessive probes in high density venues with transient devices or large number of Wi-Fi clients and ultimately improve network performance.

Occupancy Analytics

The Occupancy page provides insights into space utilization within a facility, such as the most heavily used area or the predominantly least used area within the facility along with network metrics. It includes Utilization rate, total In-Site visitors, average dwell time for each site along with the set of clients.

IT service management integration

RUCKUS AI integrates closely with leading IT service management (ITSM) products from ServiceNow and Salesforce

to initiate helpdesk tickets automatically and let IT get a head start in resolving them. This ensures that, when a service issue occurs, it is flagged for the helpdesk to address. Without such a system in place many issues that affect user experience go unreported.

Business Insights

RUCKUS AI also delivers valuable insights for business decisions with features such as Brand 360 that enables hospitality properties to monitor brand compliance scores. They can share the scores with ecosystem partners to help identify issues and make improvements quickly. With custom service level agreements, hotel operators can ensure that networks are available, reliable, and performing at their best for the end customer guests.

Prepackaged reports and dashboards

A wide variety of standardized reports provides visibility into network performance, traffic patterns, application usage and more. Summary views provide high-level information, and you can drill down to the level of individual network components and devices. Examples of standardized reports include:

- **Network**—traffic and client trends, top devices, top SSIDs, traffic distribution and more
- **Client**—reports by OS and device manufacturer, top clients by usage, client trends, session details and more
- **Inventory**—AP, switch and controller count, models, firmware, status and more
- **Application**—top apps and their usage trends, top app groups and usage, top ports and more
- **Device-specific reports**—complete visibility and usage reports for clients, APs, and switches

The service lets you download reports as raw data, a PDF file, or a CSV file. Forward the results to stakeholders inside or outside the organization.

Data Studio—custom dashboards, data visualizations and more

The RUCKUS AI Data Studio tool lets you create custom dashboards with multiple charts to dissect and analyze data

from your network ecosystem. Drag-and-drop dashboard creation makes it easy to design views tailored to your needs. You can easily position and reposition dashboard tiles, edit tiles at will and toggle between different views.

Analyze and filter data by dozens of data sets (AP Hardware, AP, Applications, Client, Client Connection, Client Sessions, Controller and Switch Inventory). Data Studio puts your full network data warehouse at your fingertips so you can answer any number of network questions.

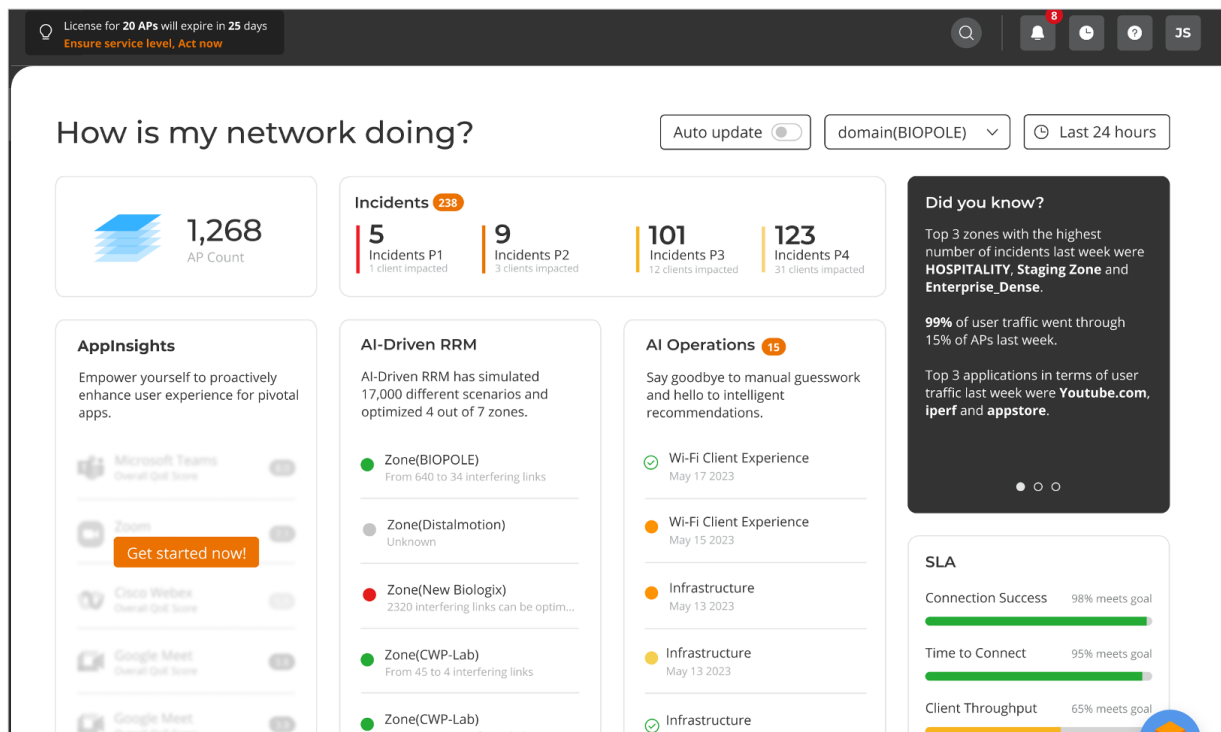
Cloud deployment for scalability and expandability

As a completely hosted service, without the need for any on-site data collectors, RUCKUS AI relieves you of the burden of managing an in-house network intelligence platform. Leveraging on the latest software technologies in scalable cloud microservices, databases and real-time data pipelines, RUCKUS AI constantly learns and improves its AI models to provide maximum insights and optimization for your network.

Customers can designate a third party—such as a RUCKUS networking solution provider—to administer their account. Managed service providers (MSPs) can manage multiple end- customer RUCKUS AI accounts from within their own account.

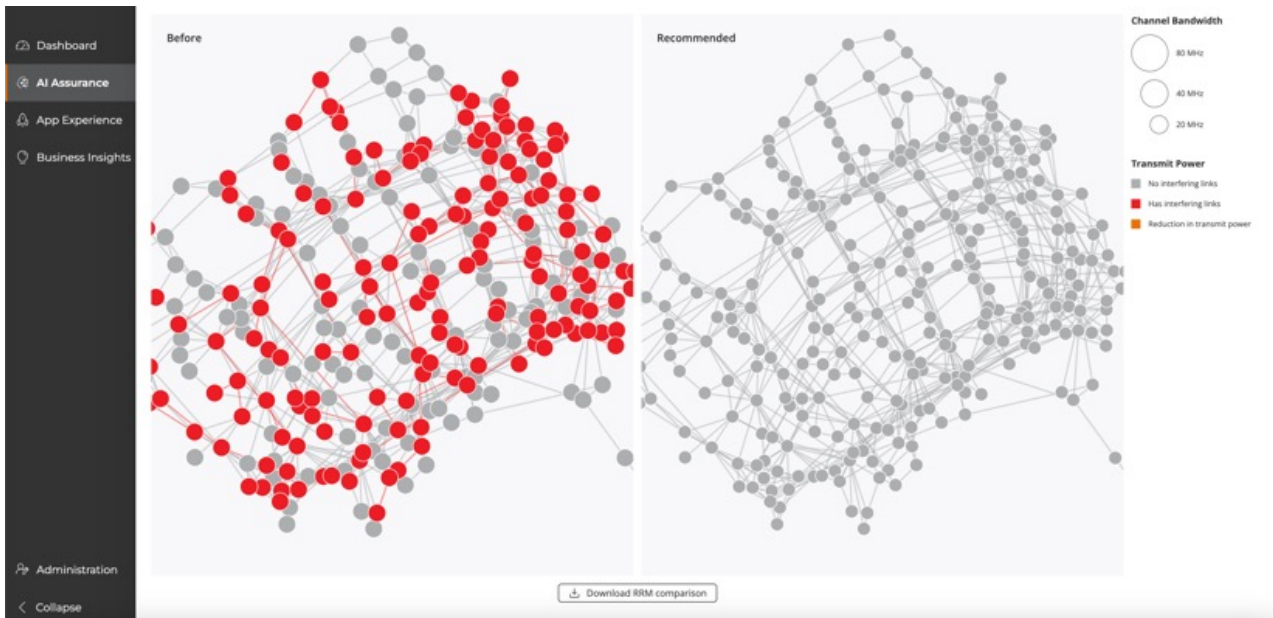
New Dashboard

New Dashboard | RUCKUS AI includes a dashboard with all your network summarized for AI Incidents, AI Operations, AI driven RRM, AppInsights and Melissa infused with chatGPT capabilities.



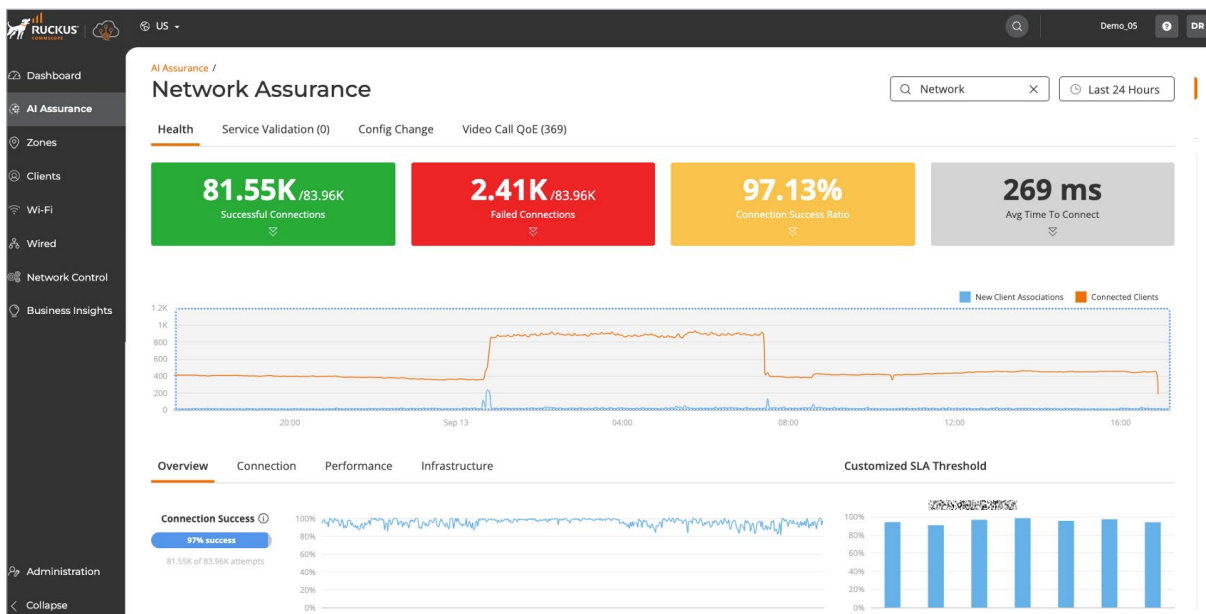
AI Driven Cloud RRM

AI-Driven RRM | RUCKUS AI drives network optimizations in reduction in co channel interference links by adjusting channel plan, bandwidth and AP transmit power through large number of simulations and linking with a single click apply



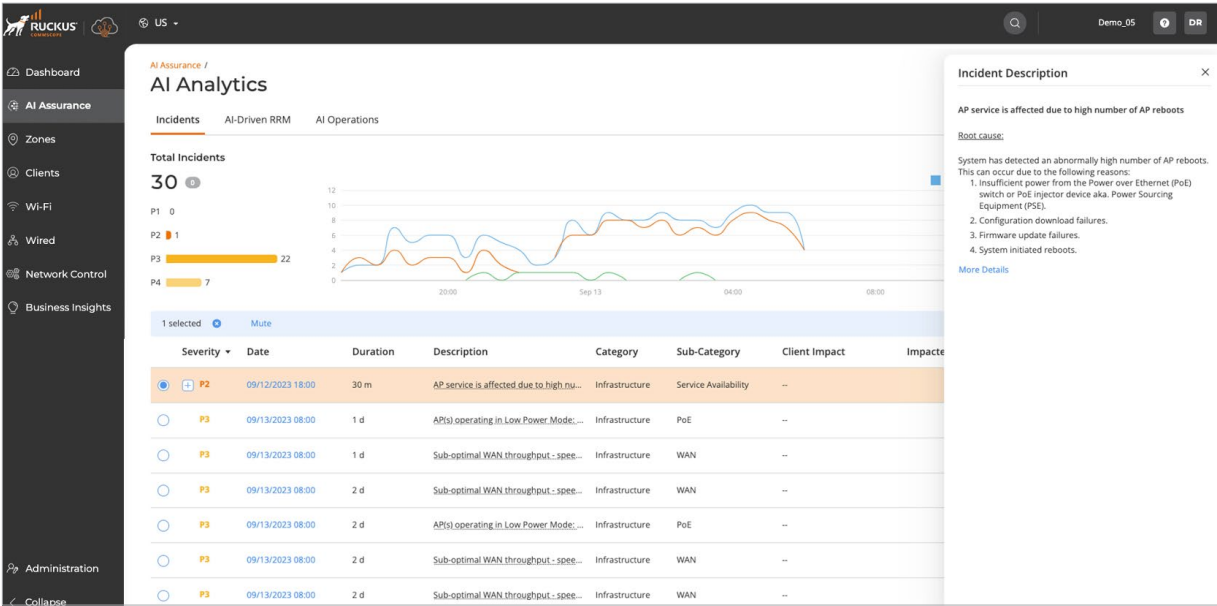
Network Assurance

Network Assurance | Health | RUCKUS AI automatically monitors network health across a variety of metrics in three areas: connection, performance, and infrastructure.



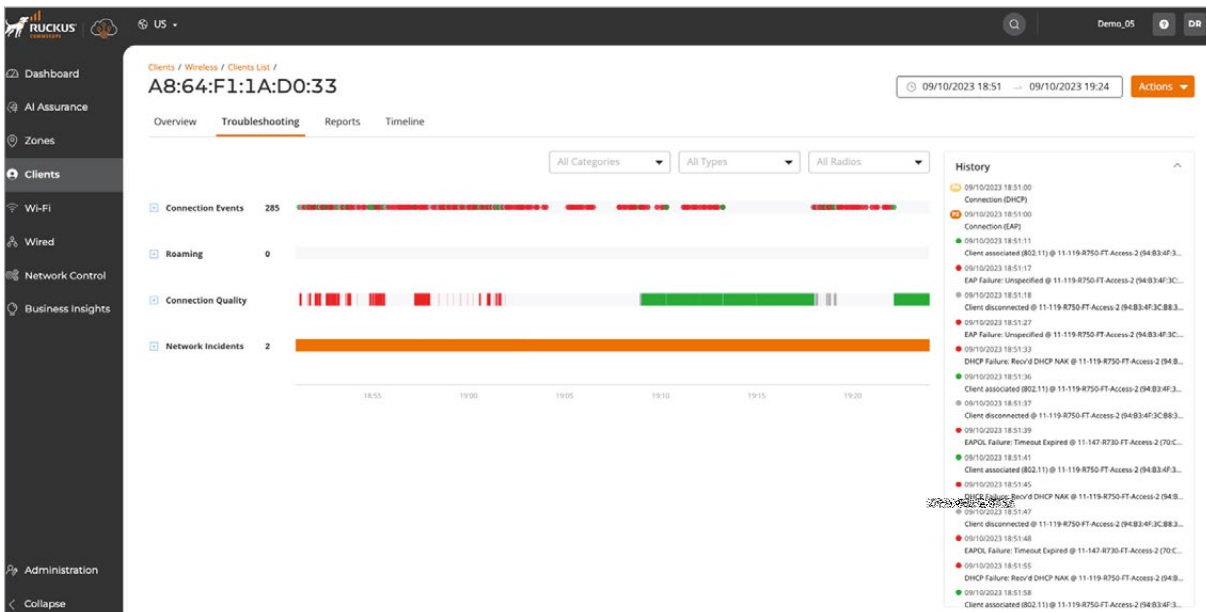
AI Incidents

AI Incidents | RUCKUS AI provides a root cause analysis of each service incident with specific recommendations for how to resolve the issue.



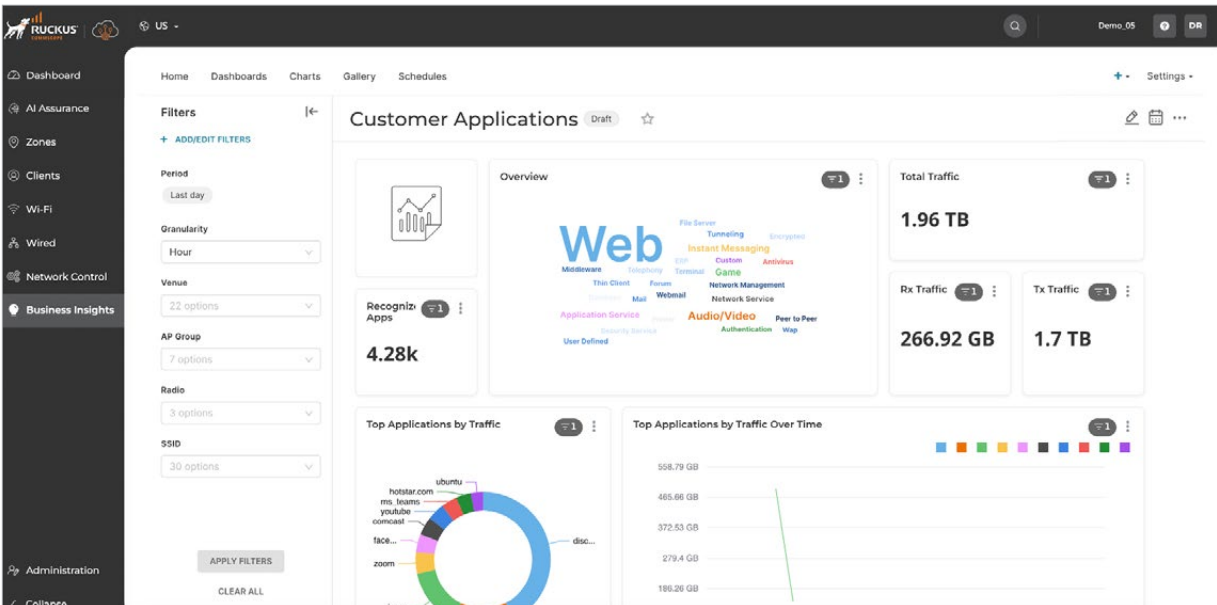
Advanced Client Troubleshooting

Advanced Client Troubleshooting | Lets you investigate and resolve issues that have impacted a specific client on the network.



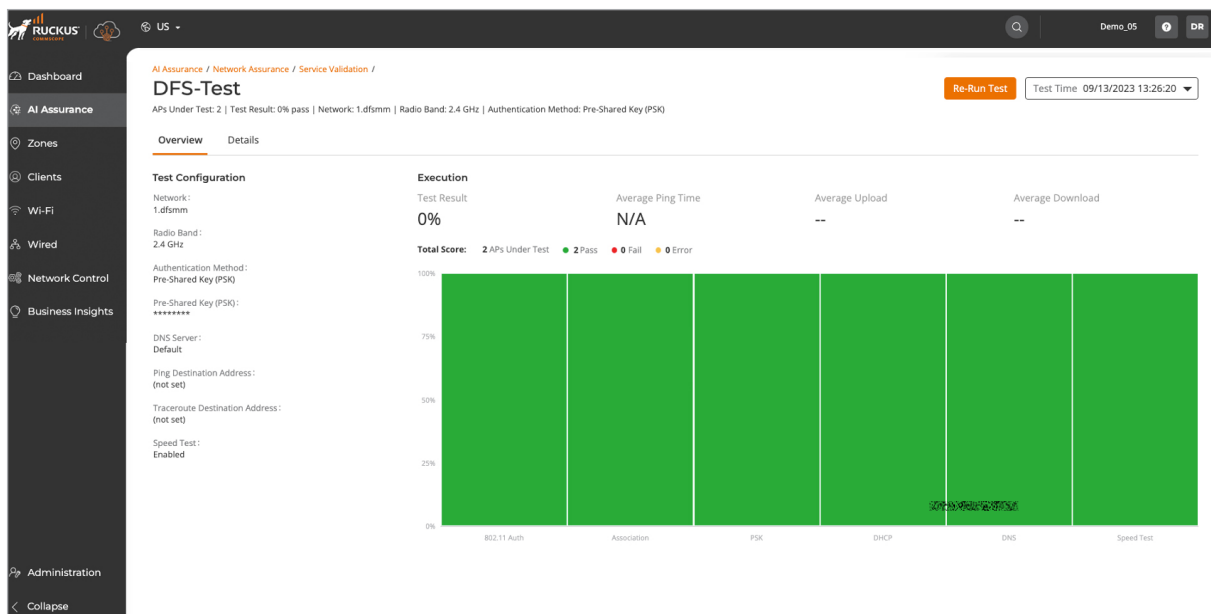
Data Studio

Data Studio | The Data Studio tool in RUCKUS AI lets you create custom dashboards with drag-and-drop ease.



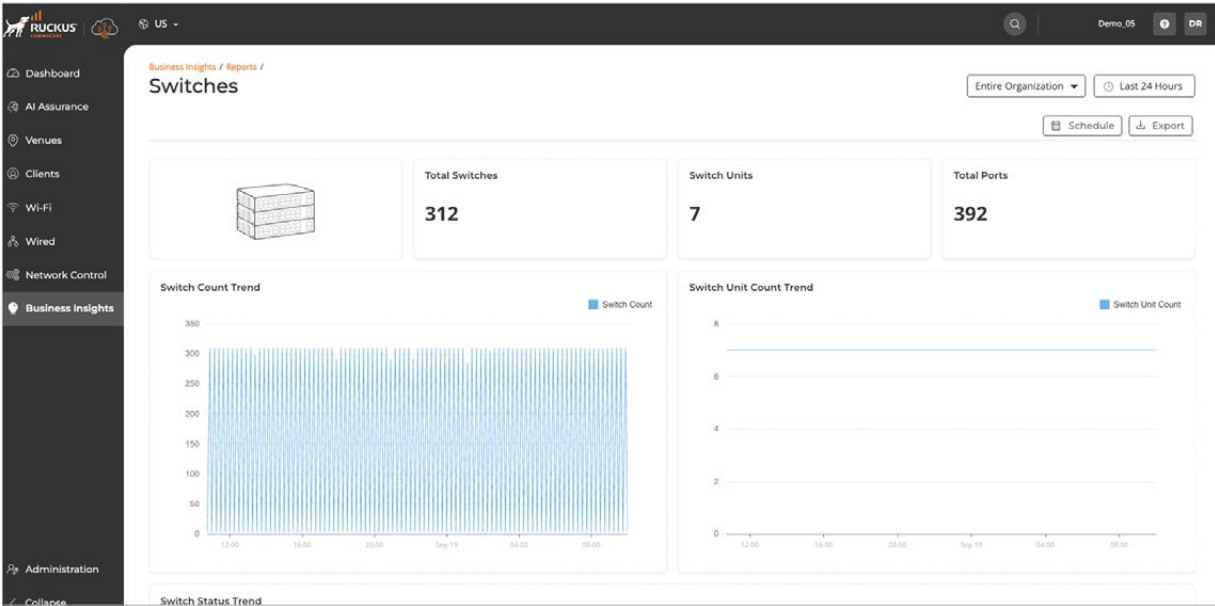
AI Assurance

AI Assurance | Service Validation | RUCKUS AI works with your RUCKUS network to allow the network to automatically validate network service levels.



Reporting

Reporting | RUCKUS AI includes a wide variety of pre-packaged reports. This report shows metrics related to the RUCKUS switches in the network.



Specifications

<p>Security, privacy and data protection</p>	<ul style="list-style-type: none"> • All traffic to and from the cloud is encrypted. • Only AP, switch, and client management traffic are sent to the cloud. • Client data traffic stays local (broken out to local LAN and sent through existing firewall) • All data stored in RUCKUS AI is encrypted at rest. • RUCKUS offers EU-located data centers for European customers. • Latest security patches are automatically updated. • Role-based access control is provided for administrative privileges 	<p>Admin can grant and revoke access to partners and RUCKUS support</p> <p>View RUCKUS Cloud privacy policy</p>
<p>Cloud data center</p>	<ul style="list-style-type: none"> • Hosted in USA, Europe and Asia on world-class IAAS provider with: <ul style="list-style-type: none"> – ISO 27001 information security certification – SSAE-16, SOC 1, SOC 2 and SOC 3 certifications – Stringent physical, data access and data disposal security measures – Per-tenant migration capabilities – Green carbon-neutral facilities – Dedicated inter-DC fiber connectivity 	<p>Ability to choose the hosting region for your service (USA, EU or Asia)</p>
<p>SLA</p>	<ul style="list-style-type: none"> • 99.9 percent network availability (does not include planned maintenance, including periodic software upgrades and other pre-announced activities) 	

Support	<ul style="list-style-type: none"> • 24x7 chat/web/phone support included for the term of the subscription 	
Part numbers	<ul style="list-style-type: none"> • CLD-ANAP-1001 <ul style="list-style-type: none"> – RUCKUS AI one-year subscription for RUCKUS Cloud or AP managed by SmartZone controllers or ICX® switch • CLD-ANAP-3001 <ul style="list-style-type: none"> – RUCKUS AI three-year subscription for RUCKUS Cloud or AP managed by SmartZone controller or ICX® switch • CLD-ANAP-5001 <ul style="list-style-type: none"> – RUCKUS AI five-year subscription for RUCKUS Cloud or AP managed by SmartZone controller or ICX® switch • CLR-ANAP-1001 <ul style="list-style-type: none"> – RUCKUS AI one-year renewal for RUCKUS Cloud or AP managed by SmartZone controller or ICX® switch • CLR-ANAP-3001 <ul style="list-style-type: none"> – RUCKUS AI three-year renewal for RUCKUS Cloud or AP managed by SmartZone controller or ICX® switch • CLR-ANAP-5001 <ul style="list-style-type: none"> – RUCKUS AI five-year renewal for RUCKUS Cloud or AP managed by SmartZone controller or ICX® switch 	

About Ruckus Networks

Ruckus Networks builds and delivers purpose-driven networks that perform in the demanding environments of the industries we serve. Together with our network of trusted go-to-market partners, we empower our customers to deliver exceptional experiences to the guests, students, residents, citizens and employees who count on them.

www.ruckusnetworks.com

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

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