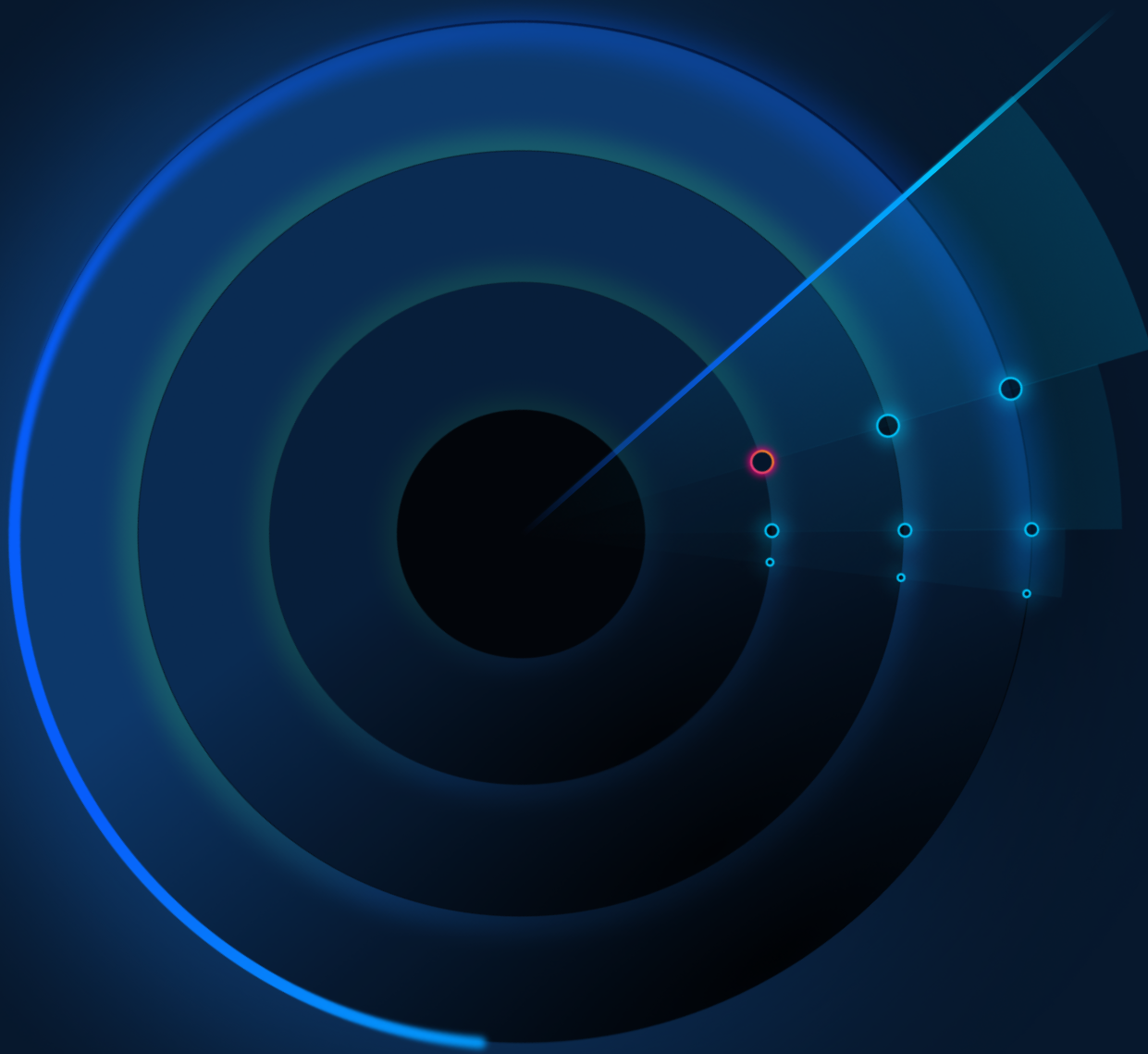




Building Infrastructure Resilience for Defense in the AI Era

The fundamentals of infrastructure resilience haven't changed, but the pace and scale have. Cisco® Resilient Infrastructure Services leverage Cisco IQ, where human expertise meets agentic intelligence, to help organizations respond to AI-accelerated threats and vulnerabilities faster.



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The Rules of Engagement Have Changed



Organizations have always faced infrastructure risk. What's changed is the pace and scale.

Advances in AI are fundamentally changing how vulnerabilities are discovered, analyzed, and exploited. In 2021, adversaries took a year to reach exploit from the time a vulnerability was disclosed; in 2026, that window has collapsed to a mere few hours¹. Using frontier models, attackers are rapidly identifying not only new weaknesses but also vulnerabilities that have existed for decades. They can chain together multiple vulnerabilities into viable attack paths and operate at a scale and speed that traditional defensive processes were never designed to match.

The result is a daunting new reality for infrastructure security and IT teams. The challenge is no longer just finding vulnerabilities or applying patches. Organizations struggle with a lack of visibility—organizations rely on manual,

slow mapping processes that cannot keep pace with the speed and scale of today's AI-driven threats needed to identify which exposures pose the greatest business risk. Teams also face complex structural hurdles, including aging infrastructure that has reached EoL (end-of-life), LDOS (last-day-of-support), or EoVSS (end of vulnerability/security support), and the need for better threat containment by implementing micro-segmentation and Zero Trust—never trust, always verify—principles. Because software upgrades are only a subset of the necessary actions, teams must move beyond manual triage to rapidly assess, prioritize, and remediate these complex gaps before attackers can exploit them.

For many organizations, the information needed to make those decisions remains disconnected, and teams are left manually correlating data across multiple systems while the window to respond continues to shrink.

1. Source: Zero Day Clock, "The Collapse"

When Time Becomes the Critical Resource to Achieve Resilience

As AI compresses the time between vulnerability discovery and exploitation, the obsolescence of existing operational models is laid bare. Organizations need to create an operating model that continuously connects visibility, prioritization, and action before attackers can exploit the gap.



That begins with visibility. Today's infrastructure—spanning campus, branch, and edge environments—is often trapped in operational silos. When inventory and asset data are fragmented across these sites, you lose the unified visibility required to defend your network. This lack of centralized intelligence creates critical blind spots, leaving your environment exposed to risks that move faster than your ability to detect and remediate them. Visibility alone, however, doesn't create resilience.

Not all vulnerabilities carry the same risk, and not all assets are equally critical to your business. You need to correlate asset inventories, lifecycle health (such as support status and EoL milestones), software versions, and security posture to distinguish urgent issues from the background noise. Prioritizing these critical gaps allows your team to focus on finite resources where they have the greatest impact.

At the same time, resilience depends on the infrastructure itself. Systems that are beyond their EoL and LDOS accumulate technical debt, slowing remediation efforts and limiting an organization's ability to respond as threats evolve. Modernizing infrastructure isn't simply an upgrade. It's a way to make sure aging assets aren't discovered only after an incident that puts the organization at risk.

Building resilience also requires a continuous operating model that brings these capabilities together. With ongoing visibility into the environment, continuous lifecycle management, exposure mapping, and security monitoring, organizations can prioritize modernization efforts and respond more quickly to evolving threats.

Introducing Cisco Resilient Infrastructure Services

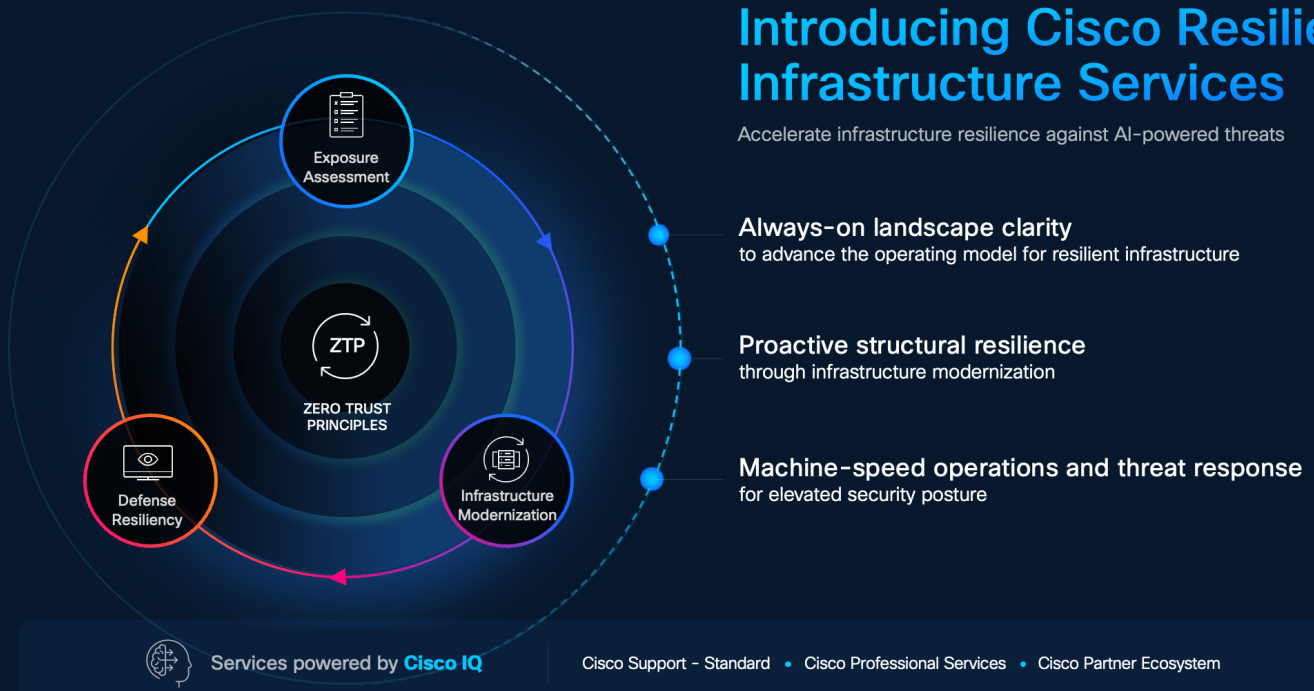
Cisco Resilient Infrastructure Services simplify, accelerate, and de-risk your infrastructure resilience journey. By combining the collective capabilities of Cisco Support and Professional Services, including Cisco IQ's agentic intelligence, it can replace fragmented, manual processes with a machine-speed operating model.

Our approach is built on three strategic pillars:

1. **Exposure Assessment:** Immediate discovery and prioritized risk mapping for always-on landscape clarity, digitizing the process with a Resilient Infrastructure playbook within Cisco IQ.
2. **Infrastructure Modernization:** Proactive structural resilience and operational agility, combining AI, automation, and specialized experts to de-risk and accelerate infrastructure modernization.
3. **Defense Resiliency:** Expert-led, continuous, autonomous protection with AI-driven enforcement for machine-speed operations and threat response.

This unified strategy can save your team from drowning in endless patching cycles, where you are reacting to every alert without knowing if your most critical assets are truly protected, to a proactive stance that swiftly outpaces frontier model threats.

This critical journey begins with **Cisco Support-Standard**, which integrates Cisco IQ AI-powered capabilities to transform data-driven insights into prioritized, guided actions that power the Cisco Resilient Infrastructure Services playbook.



A Guided Path to Infrastructure Resilience

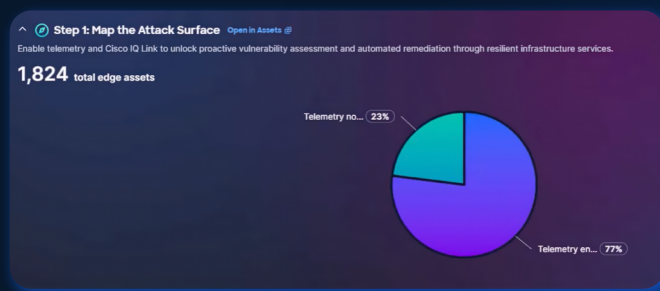
Cisco IQ serves as a defender's roadmap—delivering the clarity teams need to fully understand their environment, prioritize critical risks, and take action with greater speed and confidence.

Attack Surface Mapping

You can't protect what you can't see. Cisco IQ goes beyond basic telemetry-based views. It uses agentic intelligence—built on data from multiple sources, including telemetry, Cisco Support coverage, contracts, hardening guides, and security advisories—to map your entire attack surface by identifying vulnerable assets, assessing hardware and software lifecycle status, and pinpointing the systems that require immediate attention.

It starts by providing a centralized view and management of your Cisco devices, tracking covered and uncovered assets, and mapping them by criticality to prioritize what needs attention and which resources need to be allocated. By monitoring LDOS and overall security health, Cisco IQ enables proactive lifecycle management, helping ensure your network remains secure, compliant, and optimized for peak performance. This isn't a static snapshot; it's an always-on view of your environment.

Map the Attack Surface



Get full visibility of your assets inventory

Assets

Search Telemetry status Equipment type Filters (2) 1824 results [Reset filters](#) [Export](#) [Save filters](#)

Insights

Analysis of chassis assets across all telemetry statuses (connected and not connected)

- Of the 66 assets where Coverage Status is Not Covered, 35 (53.0%) have reached Last Date of Support. These assets no longer receive Cisco security patches or bug fixes and carry no active support contract, which may limit access to Cisco support resources. These 35 assets are available for upgrade planning and coverage review. [View](#)
- Across the 1,824-asset inventory, 840 assets (46.1%) are not covered by an active support contract. Of those uncovered assets, 519 (61.8%) are Switches. A coverage review may be conducted, with renewal options available for business-critical switching assets. [View](#)
- Among 31 assets with Coverage Status Not Covered, 16 (51.6%) have Last Date of Support as their next upcoming milestone. Once LDOS is reached, these assets will no longer qualify for Cisco security patches or support, and they already lack an active contract. Refresh or coverage planning may be initiated before these milestones arrive. [View](#)
- 11 assets (0.6%) have a Next Milestone Date falling between Jul 9, 2026 and Jan 9, 2027, with the earliest deadline on Jul 29, 2026. Reaching these milestones without action may result in assets moving to unsupported lifecycle stages. These 11 assets are available for review to confirm whether upgrade or renewal plans are in place. [View](#)
- 420 assets (23.0%) have telemetry not enabled in Cisco IQ, which affects visibility for proactive bug alerts and automated RMA. Of those, 320 (76.2%) are sourced from Cisco Commerce. Enrolling these assets in Cisco IQ telemetry is an available option to improve lifecycle and support visibility. [View](#)

[Full Analysis](#)

Name	Product ID	Product Type	Equipment Type	Serial Number	Next Milestone	Next Milestone...	Contract Number	Coverage Status	Telemetry Status	Secure Ty...
09404J88...	BE6M-M4-K9-	Unified Comm...	Chassis	TP7NF5SL8GT	—	—	2006791618	●	●	1
02WNPQF...	Q13-M9-X10G1...	CHASSIS	Chassis	IAJTB0CCP8RA	—	—	91634064	●	●	1
0831018D...	UCS-5016T8KA...	CARD	Chassis	9ALCPTTXNR8	—	—	95878937	●	●	1
090P9KUA...	CP-7965G-	CHASSIS	Chassis	7BQETR3H8BM	—	—	200406293	●	●	1
0CBPDG2J...	HX-CPU-6142	CARD	Chassis	RAJ9H0ENVRG	—	—	—	●	●	0
0D3WHRE...	PA-4T1-	CARD	Chassis	WLS2BNMEVM	—	—	203092897	●	●	1

Exposure Remediation Guidance

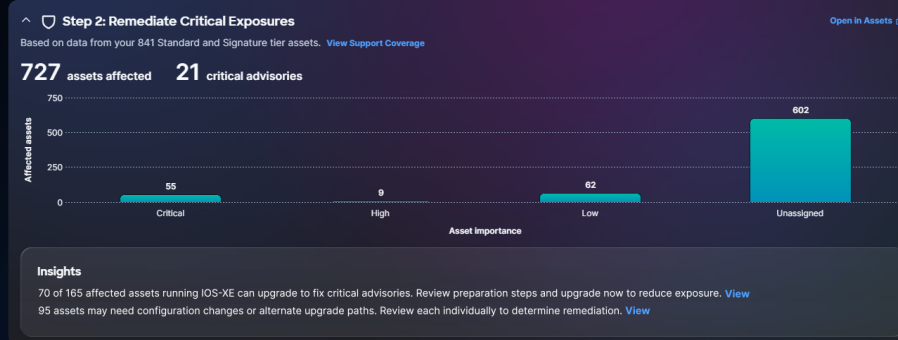
Not all vulnerabilities are equal. Cisco IQ correlates security advisories directly with your unique infrastructure, pinpointing which exposures put your most critical assets at risk and demand immediate action, drastically collapsing the discover, assess, and act loop.

What does this look like?

- Assets that can be resolved with an OS upgrade are guided through an automated or manual workflow, including planning for a targeted OS version, verifying and confirming asset readiness, choosing an upgrade method (automated or manual) to run the upgrade, and, lastly, confirming that the version update and upgrade are complete.
- For those assets requiring configuration changes, hardware upgrades, or non-automated OS upgrades, next best actions are identified.

By focusing on what matters most, you can prioritize remediation where it will have the greatest impact on protecting your business.

Remediate Critical Exposures



Identify affected assets

Execute
Choose how the upgrade runs, then complete it.

Step 1: Choose upgrade method

Step 2: Run IQ upgrade
To do
1. Ensure you are in your maintenance window before starting.

Automated upgrade
Cisco IQ performs pre-flight checks, transfer (if required), install, and monitoring. Note: This process will interrupt active traffic through the asset.
☒ I understand the asset will reload during installation, interrupting active sessions and traffic until complete.

Upgrading to IOS-XE 16.2.4...

- Running pre-flight checks
- Installing software
- Monitoring reload

[Cancel](#) [Back](#) [Next](#)

View assets prioritized by criticality and see which ones are upgradable

Upgrade IOS-XE software to resolve critical advisories
Upgrade assets to the suggested software version to resolve active critical advisories.

Upgradeable assets
8 results

Name	Software version	First fixed version	Upgrade progress	Review
Device_180.140.A	IOS-XE 16.1.2	IOS-XE 16.2.4	Not started	Review
Device_180.140.B	IOS-XE 16.1.2	IOS-XE 16.2.4	In progress	Review
Device_180.140.C	IOS-XE 16.1.2	IOS-XE 16.2.4	Upgraded	Review
Device_180.140.D	IOS-XE 16.1.2	IOS-XE 16.2.4	Not started	Review
Device_180.140.E	IOS-XE 16.1.2	IOS-XE 16.2.4	In progress	Review
Device_180.140.F	IOS-XE 16.1.2	IOS-XE 16.2.4	Not started	Review
Device_180.140.G	IOS-XE 16.1.2	IOS-XE 16.2.4	Upgraded	Review
Device_180.140.H	IOS-XE 16.1.2	IOS-XE 16.2.4	Not started	Review

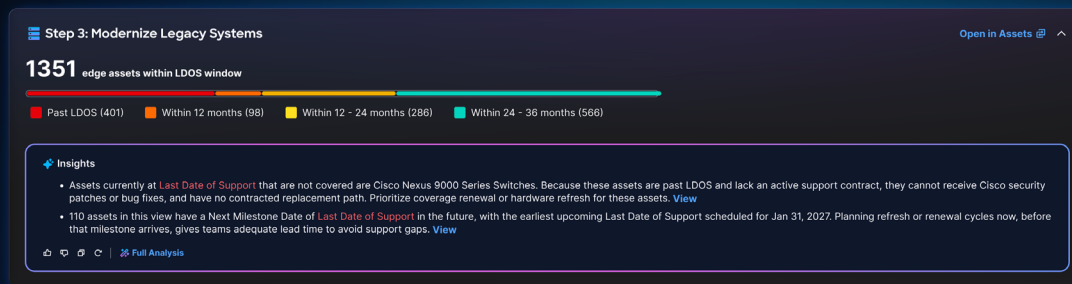
Receive a recommended upgrade path

Modernization Lifecycle Insights

Structural weaknesses—such as flat network architectures and outdated protocols—create entry points for attackers and facilitate east-west movement, transforming isolated security gaps into uncontained blast radii.

These risks are compounded by aging infrastructure, which often lacks the hardware capacity required to meet modern security standards. Cisco IQ identifies devices nearing EoL or LDOS, helping you prioritize modernization planning and engineer resilience into the foundation of your network.

Modernize Legacy Systems



Identify your lifecycle risk

View detailed metrics in the LDOS dashboard

Receive recommended refresh paths for devices near or past LDOS



At a time when the pace and threat sophistication are disrupting business as usual, Cisco IQ provides the AI-powered insights to simplify decision-making and accelerate action. For complex transformations, Cisco Professional Services turn those insights into structural resilience. Cisco de-risks and accelerates your modernization journey by planning and executing critical work—from adopting an Infrastructure as Code methodology

and automating deployment pipelines to validating upgrades and implementing dynamic segmentation that contains blast radii. Beyond modernization, Cisco helps you evolve toward an agentic SOC and conduct regular posture-drift reviews, ensuring your defenses remain continuous and hardened through Zero Trust. Move from reactive firefighting to a hardened, always-on, resilient foundation that supports your business with confidence.

Build Resilience at Machine Speed

AI has fundamentally changed the pace of cyber threats. Cisco Resilient Infrastructure Services help organizations respond in kind by combining AI-powered insights, automated workflows, and Cisco expertise to simplify decision-making, accelerate action, and reduce risk with confidence. Powered by Cisco IQ, Resilient Infrastructure Services deliver a personalized, guided experience that helps organizations move from visibility to prioritized action and remediation faster.

Whether you're taking the first step toward greater visibility or modernizing infrastructure for long-term resilience, Cisco helps you move faster from insight to action.

To learn more about Cisco Resilient Infrastructure Services, please contact a Cisco sales representative.



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