SIMPLIFY NETWORK MODERNIZATION

Best practices for a seamless transition to Managed Network Edge



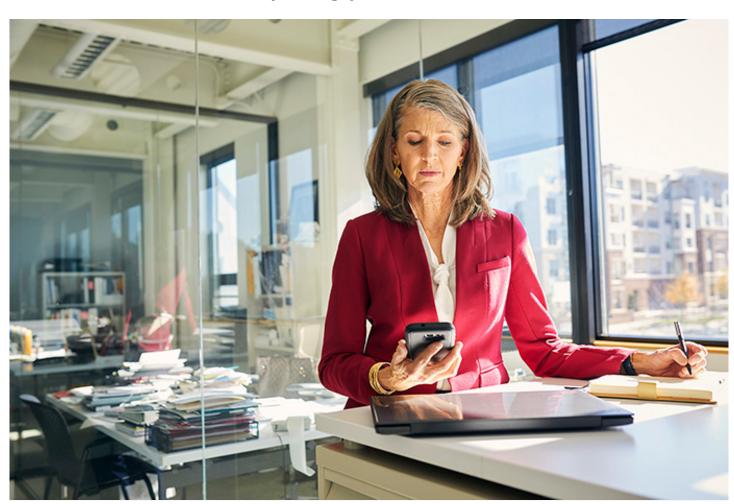
The needs of your organization change quickly. In contrast, the complexity of your current network makes it slower to evolve while trying to meet those needs. Network modernization changes that.

Network modernization makes IT leaders more productive and effective by consolidating many of the systems they manage into a single, high-performance platform. In addition, managed services cut maintenance workloads even further, freeing your technical resources for higher priority initiatives. But many organizations have concerns about potential downtime, operational disruptions and the learning curve associated with adopting a new, modern solution.

Network modernization makes IT leaders more productive and effective by consolidating many of the systems they manage in a single platform.

Managed Network Edge removes the uncertainty of replacing the networking infrastructure your organization relies on every day. Working side-by-side with your team throughout the process, experts at Spectrum Enterprise will tailor this all-in-one solution for fast deployment, configuring your network with the exact level of control you need.

This guide details how our high-touch approach with Managed Network Edge overcomes the typical challenges of deployment to deliver a more effective way to manage your network.





Why Managed Network Edge

What often starts as a simple local area network (LAN) can quickly grow complex as an organization expands its footprint to more locations and evolves its priorities. Security, routing, software-defined wide area networking (SD-WAN), switching, WiFi, cloud apps and IP cameras each add their own requirements for IT to monitor and optimize in order to maintain network performance. Solutions added at different points in time often come from different vendors, require specialized knowledge and make troubleshooting an exercise in checking different systems that may not have been designed to integrate with each other.

Managed Network Edge is modular, making it easy to add locations, services and capabilities as your needs change.

Manage Network Edge, delivered with the Cisco Meraki platform, brings the core components of your network into a single integrated solution. This immediately reduces network complexity while making settings and analytics for the entire network visible in an intuitive portal. As an intelligent platform, Managed Network Edge also reduces day-to-day network management with automated firmware and security updates.

Adjusting network policies, prioritizing traffic and resolving issues are all made easier through cloud-based dashboards that can be accessed from anywhere. The platform can also utilize Spectrum Enterprise internet services to provide a single point of accountability for networking and connectivity.

Spectrum Enterprise takes a consultative approach to network design, recommending the best solution for your unique use case. Adoption also comes with no upfront capital expense: The monthly service includes all license fees, equipment and maintenance. This approach to networking reduces the risk of buying expensive hardware that may not be able to support your needs in the future. Managed Network Edge is also modular, making it easy to add locations, services and capabilities as your needs change.

Spectrum Enterprise offers Managed Network Edge as a managed service. This provides your organization with the confidence that your network is always up-to-date, and technical support is available 24/7/365. IT managers can choose what they want to control and leave the rest to Spectrum Enterprise. Regardless of its configuration, Managed Network Edge comes backed with U.S.-based support, local project managers and the deep expertise of a nationwide facilities-based provider.





Because the entire network is managed from the cloud, it's easy to add locations on the deployment schedule you prefer or bring new sites online in the future.

Choose the right capabilities

Managed Network Edge incorporates the networking services that IT needs to streamline operations. Throughout the adoption process, a program manager will work closely with your team to find the optimal combination of services to modernize your network. These can include:



Strengthen your security posture with automated updates that make it easy to keep pace with changing networking requirements and emerging security risks. Manage Network Edge can incorporate firewall and unified threat management (UTM) features like URL content filtering and advanced malware protection (AMP). Intelligent routing gives critical applications top priority. It also creates VLANs to divide traffic based on type. This isolation adds a layer of security, making it harder for intruders to access your critical applications, so a potential breach in one part of the network will not expose the rest.



Make networking across multiple locations more efficient and secure with SD-WAN. Managed Network Edge makes SD-WAN adoption straightforward by incorporating site-to-site VPN to automatically establish secure tunnels for your traffic between branch locations and to the cloud. SD-WAN's application-aware routing feature then prioritizes network traffic for your essential applications for better performance.



Create WiFi networks for employees and guests that enhance reliability and provide security that begins at the wireless access point. Monitor WiFi performance across the entire organization through a centralized portal for simple troubleshooting and configuration changes.



Ensure efficient use of network resources and establish appropriate quality of service (QoS) levels for your traffic with integrated switching. As part of the fixed monthly service, Spectrum Enterprise will also modify or replace the switching hardware as your network needs grow.



Integrate IP cameras into your modern network. Advanced analytics capabilities provide your organization with visitor activity for valuable business insights and enhanced security at your locations.

Make your network future-ready: Choose the services that make sense for your organization now, knowing that you can enhance your capabilities later. Managed Network Edge is engineered to grow with your organization, allowing you to add services as your needs change.



Set your plan

The same way Managed Network Edge reduces complexity in your network, Spectrum Enterprise reduces the demands on resources for building a new solution. A dedicated program manager will work alongside your team from day one through completion. We will partner with you to ensure a coordinated rollout that meets your specific goals.

Planning

Our managed services design team will guide you through a discovery process to help align the Managed Network Edge configuration with your requirements. We'll examine business and network performance objectives to inform our recommendations for the most impact. Deployment plans will also consider your timing, including plans for future growth and a staged rollout across different sites if needed.

Our team begins this process with an inventory of your current connected devices, network architecture and performance. We will also assess your priorities for intelligent routing of critical applications, disaster recovery and your connectivity needs, whether through Spectrum Enterprise Fiber Internet Access or another connectivity option. All of this information will inform a plan to document your goals and deliver the results you expect.



Empower your organization with reliable connectivity on a dedicated, high-performance fiber network.

Fiber Internet Access — Achieve dedicated, symmetrical internet connectivity up to 100 Gbps with reliable solutions to keep critical applications up and running and business operating.

Design

Spectrum Enterprise will architect a solution configured to your unique use case and present it for your team's review. This process will vary based on the complexity of your network.

Our team will ask you detailed questions about your needs to ensure we design the best possible solution. For example, to integrate WiFi with Managed Network Edge you will be asked to complete a questionnaire about your users and buildings. A team of wireless experts then designs a WiFi deployment for optimal floor plan coverage and cost efficiency.

For larger buildings, technicians will survey the site to give the wireless team the information needed for a detailed proposal and cost estimate early in the process. We'll recommend a solution that meets your needs for employees, guests and other devices then shape the final design based on your feedback. Like all of our Managed Network Edge services, our WiFi solution is flexible and allows for future expansion, so you won't need to worry about over-engineering the network at first or outgrowing it in the future.



You can achieve the benefits of a modernized network without having to manage it on your own.

Prepare for installation and operation

No matter the Managed Network Edge services you choose, we will configure and test your new network software in the cloud before installation to make sure everything is working properly. This speeds up installation and ensures a smooth network transition.

Implementation

Once you've approved the detailed plans for your network, we schedule installation for minimal disruption to your operations. For added peace of mind, we can turn up Managed Network Edge while your current solution is still in place. Any new wiring is installed in the days leading up to network turnover. At that point, a technician will install the hardware, download the details of your new network design from the cloud, test the system and hand it off to your team fully operational.

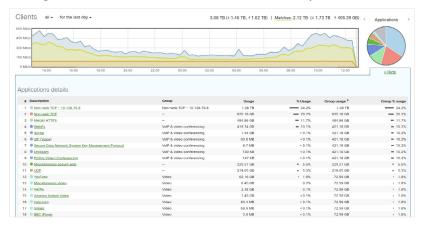
Deploying Managed Network Edge across multiple sites happens at your pace. Once the solution is configured at your main location, we can install Managed Network Edge hardware at your other locations and the solution auto-provisions to connect those sites to your main location in about 15 minutes. Because the entire network is managed from the cloud, it's easy to add locations on the deployment schedule you prefer or bring new sites online in the future.

Operation

The flexibility of Managed Network Edge extends to how you manage the network. If you're eager to offload the maintenance of your network entirely, the solution comes fully managed by Spectrum Enterprise. Should your IT leaders want more control of certain network operations, they can co-manage the network with Spectrum Enterprise through the portal. In every case, the Spectrum Enterprise team has visibility into the same dashboards and information available to you and your team. This makes it easier to resolve any issues you may have. Spectrum Enterprise offers a single support number to call and is available 24/7/365.

You can access the portal from any location through <u>spectrumenterprise.net</u> — the same place you manage all Spectrum Enterprise services. We provide ongoing support and online training modules to help you make the most of the portal, its analytics and capabilities for better IT decisions and network performance.

Manage individual network clients via the online portal.





Get support

Managed Network Edge installation comes pre-configured based on the network design we create with you. But the capabilities of Managed Network Edge are easily adaptable as your IT needs change. Spectrum Enterprise provides ongoing support to adjust the network policies and the way you manage the platform. Settings can be modified in real time to improve network performance, while Spectrum Enterprise technical support is standing by to provide guidance, resolve issues and adjust the network maintenance tasks you want fully managed as part of the service. Our goal is to work with you to reduce your IT workload and achieve your priorities.

Growth can be a persistent network challenge. That's why Managed Network Edge offers a modular approach to network design. Once we send you new equipment, our support team can rapidly provision it from the cloud. As your organization's needs change, you can add additional security solutions, WiFi, SD-WAN, cameras and other capabilities on the timetable that fits your needs and budget.

Discover an easier way to optimize your IT

Managed Network Edge gives you the power to consolidate and visualize the entire network for better performance, increased reliability and streamlined management. Spectrum Enterprise brings more than two decades of managed services experience to our collaboration with your team. We draw from that expertise as well as our national reach and multiple connectivity options as a facilities-based provider. This makes Spectrum Enterprise uniquely qualified to be your single networking partner as we can tailor a complete solution to meet your needs.

Discover the benefits of modernizing your IT with a single partner to design, operate and evolve the best networking solution for your organization — now and in the future.

Learn more

About Spectrum Enterprise

Spectrum Enterprise, a part of Charter Communications, Inc., is a national provider of scalable, fiber technology solutions serving America's largest businesses and communications service providers. The broad Spectrum Enterprise portfolio includes networking and managed services solutions: Internet access, Ethernet access and networks, Voice and TV solutions. Spectrum Enterprise's industry-leading team of experts works closely with clients to achieve greater business success by providing solutions designed to meet their evolving needs. More information about Spectrum Enterprise can be found at enterprise.spectrum.com.

