

Intelligent Network Management Aggregation Switch



AI Overview

Intelligent network management aggregation switches combine high-speed Layer 2/3 switching, advanced security, and centralized management for scalable, resilient enterprise networks. Overview Intelligent aggregation switches serve as a central point in enterprise or campus networks, connecting multiple access switches and providing high-speed uplinks to the core network. They are designed to handle large volumes of traffic, support advanced routing protocols, and enable centralized management for simplified network operations. Key Features 1. High-Performance Switching Support for 10G, 40G, and 100G uplinks for high-density environments. Non-blocking, line-rate architecture ensures low latency and high throughput. Layer 2 and Layer 3 capabilities, including VLAN, OSPF, BGP, and multicast. 2. Intelligent Management Centralized management via cloud platforms, on-premise controllers, or CLI/Web interfaces. Zero-Touch Provisioning (ZTP) allows automatic deployment of aggregation and access switches without manual configuration. Policy-based automation, device profiling, and segmentation simplify network administration. 3. Security and QoS Advanced ACLs, MACsec, and VLAN-based security protect against unauthorized access and eavesdropping. Quality of Service (QoS) ensures traffic prioritization for critical applications. Support for RADIUS/AAA authentication and dynamic/static user binding enhances access control. 4. Redundancy and Reliability Dual power supplies, modular fan trays, and stacking capabilities provide high availability and failover. Features like ERPS, STP, and CRPS/RPS ensure minimal downtime and fast recovery. In-Service Software Upgrade (ISSU) allows updates without interrupting network operations. 5. Deployment Flexibility Supports fiber, copper, and PoE interfaces for diverse network environments. Scalable for medium...

Article Content

Configuring Aggregation and Access Switches to Be Managed by the ...

Context A large number of aggregation and access switches need to be deployed on a large or midsize non-virtualized campus network. Therefore, during the initial batch deployment of

cnMatrix EX3024F Fiber Aggregation Switch

The EX3024F Intelligent Ethernet Fiber Aggregation Switch offers zero-touch deployments, policy-based automation, auto device profiling and segmentation, and a non-blocking line-rate architecture with

Latest Press Releases

Passive Capital Management Welcomes Alex Rohtla as a Financial Advisor
PHILADELPHIA, Tue, Jul 7 2026 5:40 PM Alex Rohtla, CFP®, CSLP® is joining the finance team at Passive Capital

HPE Aruba Networking CX switches

Experience complete lifecycle management of your CX switches—from zero-touch configuration to day-to-day operations—brought together seamlessly in HPE

Vacancies

A postdoctoral researcher on optimizing synchromodal transport networks for construction logistics
Personal type: Scientific staff
Field of expertise: Postdoctorate
Organisation: Department of Industrial

TL-SG3428XF | JetStream 24-Port SFP L2+ Managed

JetStream 24-Port SFP L2+ Managed Switch with 4 10GE SFP+ Slots. As a 10G switch that seamlessly integrates into the Omada Software Defined Networking

The Network DNA: Networking, Cloud, and Security

Master networking, cloud, and security with in-depth analysis, tutorials, and research. Stay ahead of the curve with our expert tech blog.

Aggregation Switches | Managed Core Network

High-performance aggregation switches designed for industrial and FTTH networks. Support Layer 2/3 management, Gigabit and 10G uplinks, redundant power,

Gartner | Delivering Actionable, Objective Insight to

Gartner provides actionable insights, guidance, and tools that enable faster, smarter decisions and stronger performance on an organization's mission-critical priorities.

14 Best Managed Network Switches for Seamless

Discover the top managed network switches of 2026. Find the best overall, value, beginner-friendly options, and more in this detailed roundup. For

SMART AGGREGATION SWITCH

The Smart Aggregation Switch (ONS-S8) works with the Network Controller (ONS-NC600) to quickly configure the network from Optigo OneView™. Configuring each switch for management, assigning

Cisco N9300 Series Smart Switches

Where security meets the network Cisco N9300 Series Smart Switches with Cisco Hypershield Get unprecedented protection, optimal performance, and

Network switch

Smart switches (aka intelligent switches) are managed switches with a limited set of management features. Likewise, web-managed switches are switches that fall

What is an Aggregate Switch?

An aggregate switch is a high-capacity network switch that consolidates connections from multiple access switches, acting as a central point for managing network traffic and providing

Streamline & Secure with Data Aggregation | Yodlee

Learn how Yodlee can help you access aggregated financial data to accelerate user onboarding, customize offerings and streamline applications across personal

Cisco Data Center Networking Licensing

Cisco Data Center Networking Subscriptions Transform data center networks with Cisco tiered licensing Simplify Cisco Nexus One operations with flexible data

Actelis Managed Hardened Ethernet Aggregation Switch Portfolio ...

Actelis" Ethernet aggregation switches are the perfect Ethernet In The First Mile solution for networks consisting of fiber and copper.

Ciena products

Our products and solutions optimize data transmission and network management. Explore how our hardware, software, and services can help you.

Wiley Online Library

Hier sollte eine Beschreibung angezeigt werden, diese Seite lässt dies jedoch nicht zu.

Smart Network Switches Built for SMB Needs

Built for SMBs, NETGEAR smart network switches deliver PoE power, low noise, and high performance for VoIP, IP cameras, and access points. Find your fit now.

Aggregation Network Switches | Grandstream Networks

Layer 3 aggregation switches that allow enterprises to build scalable, secure, high performance and smart business networks that are fully manageable and

Routers and SD-WAN appliances

Cisco SD-WAN Routers and WAN Appliances provide end-to-end management and flexibility for your WAN and cloud network.

H3C S6530X Series Advanced Aggregation 10GE Switches

Combined with H3C AD Campus Platform, it can easily implement a two-layer network architecture and quickly add functions in existing network in order to drastically reduce network management

cnMatrix EX3024F Fiber Aggregation Switch

The cnMatrix series of fully managed switches delivers full Layer 2 and Layer 3 capabilities with enhanced access security. The EX3024F Intelligent Ethernet Fiber Aggregation Switch offers zero

What is a smart switch?

Working together, smart switches create a distributed system, connected through a cloud-delivered management plane, able to enforce policy at any point across the network. The first use cases for

Arista adds intelligent switch stacking, management for

Arista Networks is adding new features to its campus networking portfolio to help enterprise customers more easily group and manage switches.

Sage Journals: Your gateway to world-class journal research

Hier sollte eine Beschreibung angezeigt werden, diese Seite lässt dies jedoch nicht zu.

What Is an Aggregation Switch and How to Choose?

Discover the role of aggregation switches. Explore differences between aggregation, access, and core switches, and choose the right model for your network.

Core, Aggregation, or Access Switches? Choose the Perfect Fits

Discover the crucial differences between core, aggregation, and access switches. Find out which type can best transform your network's performance in 2025.

H3C S6526XE-HI Series Advanced Aggregation 10GE Switches

Using the switch in conjunction with H3C IMC, you can manage and monitor online users in real time and take prompt action on illegitimate behaviors. H3C S6526XE-HI series switches offer significant

Contact Us

For more information, pricing, or custom solutions, please contact us:

Website: <https://www.sky-connect.co.za>

Email: info@sky-connect.co.za

Phone: +44 20 7946 0958

Address: 1 Cornhill, London EC3V 3ND, United Kingdom

This document is for informational purposes only. Specifications subject to change without notice.

