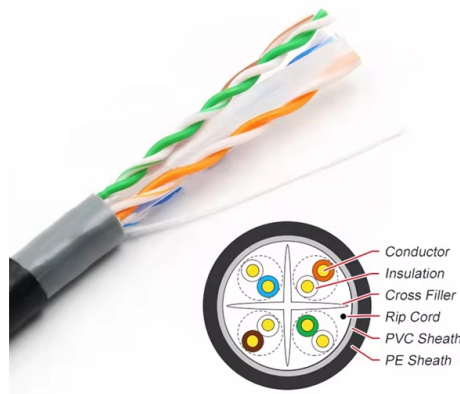


Enterprise Core Routers and Switches



AI Overview

Enterprise core routers and switches are high-performance networking devices designed to handle large-scale traffic, ensure high availability, and provide advanced security and management features for enterprise networks. Core switches serve as the backbone of enterprise networks, connecting aggregation and access layers while providing high-speed, low-latency switching. Leading options include:

- Cisco Catalyst 9300L:** Offers 24 Gigabit PoE+ ports with a 740W budget, four 10Gbps SFP+ uplinks, and StackWise Virtual support for unified management across up to eight units. It supports Layer 2/3 features, VLANs, QoS, and advanced security like MACsec and TrustSec.
- Cisco C9500-16X-A:** Features 16 10Gb SFP+ ports, 480 Gbps switching capacity, dual hot-swappable power supplies, and programmable automation via IOS XE, ideal for core or aggregation layers.
- HPE Comware 5960 Series:** High-density, low-latency switches with 1/10/40/100/400GbE connectivity, supporting EVPN, VXLAN, and MACsec encryption. Managed via HPE Intelligent Management Center (IMC) for multi-vendor environments.
- Extreme Networks EXOS switches:** Provide flexible virtualization, automation, and multi-vendor interoperability, suitable for high-traffic enterprise networks.

Core switches are selected based on throughput, latency, PoE support, stacking capabilities, and virtualization features, ensuring scalability and reliability for data centers and campus networks.

Core Routers Enterprise core routers manage WAN connectivity, interconnect multiple sites, and handle high-volume traffic with advanced routing and security:

- Cisco Enterprise Routers:** Offer integrated routing, switching, security, and wireless functions. Models like the ISR and ASR series support high throughput, SD-WAN, and AI-driven network management.
- Huawei NetEngine AR Series:** Includes AR8000 for enterprise WAN core, AR6700 for SD-WAN, and AR6100/AR650 for small to medium enterprises. These routers provide multi-core processors, non-blocking a...

Article Content

Cisco Enterprise Router Selector

Enterprise virtual Router deployed in the cloud, data center, colo, and branch. Use this tool to find the router that fits your needs.

Achieving Line-Rate Forwarding: Buffer Allocation and QoS

Core Architecture & Switching Logic: The Hardware Foundation for Line-Rate Forwarding The Huawei AR series is engineered to achieve high-throughput and low-latency performance through a purpose

Data Center Design: Basic 3 Layers, Core, Aggregation, and Access

Nowadays, building a data center to provide services for enterprise or providers is more and more important. However, it cost much to build an available data center, that is, it needs many

Extreme vs Cisco: Enterprise Core Switch Comparison 2025

Compare Extreme Networks and Cisco Catalyst enterprise core switches in 2025. Explore performance, scalability, PoE, virtualization, and deployment scenarios with technical guidance and Router-switch

Network Ethernet Switches | Alcatel-Lucent Enterprise

Enhance office, campus, and data center connectivity with faster speeds and PoE through network ethernet and enterprise switches.

Enterprise-Multi-Branch-Network-OSPF/README.md at main

Designed and implemented a multi-branch enterprise network using Cisco Packet Tracer with VLANs, Router-on-a-Stick, DHCP, OSPF, Layer 3 Core Switching, and Wireless Access Points.

Compare Nexus 9000 Series Switches

This table compares features of the Cisco Nexus 9504, 9508, and 9516 Switches.

Enterprise Routers | Huawei Enterprise

Next-generation, full-service, intelligent routers designed to serve as enterprise WAN core, large enterprise network access nodes, DCI nodes, and campus or large-scal IDC network egress.

Layer 2 vs Layer 3 Switch: Key Differences and Use Cases

In enterprise environments, switching platforms such as the Cisco Catalyst series may also include VLAN support, ACLs, QoS features, and routing

Network Switches | Huawei Enterprise

Designed for scenarios such as data centers, enterprise campuses, and enterprise private lines, making networks more simple, smart, open, and secure, as well as

All Routers Products

Cisco routers can help you create a more intelligent, responsive, and integrated network, based on adaptive and agile technologies.

UniFi Enterprise Switching

Power distribution unit designed to support large, rack-mounted UniFi hardware deployments. Core switching powerhouses with speeds up to 100 Gbps and high

Cisco IOS XE Upgrade Guide: Best Practices and Step

Cisco IOS XE is a modular, Linux-based, programmable network operating system used across Cisco's enterprise and service provider product

All Products and Solutions

Directory of Huawei enterprise IT infrastructure products, solutions, and services.

The 12 best network switch vendors & alternatives for 2025

We compare network switch vendors with our fully managed network service. Our guide shows why Meter is the top pick for enterprises in 2025.

[crisstophergonza/cisco-multi-vlan-architecture](#)

This deployment engineers a scalable, secure, and production-ready Local Area Network (LAN) architecture for a multi-floor corporate office environment using Cisco Packet Tracer. The design

32-Port 100Gb Core Network Switch Enterprise SONiC

SONiC NOS-based 32x100Gb QSFP28, L3 ToR/spine/aggregation/core switch for enterprise and data center.

Cisco Networking Academy

Join Cisco Networking Academy and become a global problem solver, think entrepreneurially, and drive social change.

Cisco Data Center Networking Licensing

Transform your data center networks with Cisco tiered licensing. Licensing is available for Nexus Dashboard, ACI, MDS, and NX-OS.

Network Switches

Cisco network switches deliver performance, flexibility, and security. Cisco switches are scalable and cost-efficient and meet the demands of hybrid work.

Cisco 8500 Series Secure Routers Data Sheet

Cisco 8500 Series Secure Routers offer simplified secure networking with QFP ASIC, SD-WAN, robust security, and flexible management to enable

List of networking hardware manufacturers

List of networking hardware manufacturers Networking hardware typically refers to equipment facilitating the use of a computer network. Typically, this includes routers, switches, access points, network

7 Best Enterprise Core Switches for 2026 That Power

Stay ahead in network infrastructure with the top enterprise core switches for 2026 that promise unmatched performance and future-proofing.

Best Enterprise Switches 2025: Top 5 Network Switches

This is not another surface-level review. This is a technical deep dive into the premier enterprise network switches defining 2025. We move beyond

MikroTik · Products

MikroTik makes networking hardware and software, which is used in nearly all countries of the world. Our mission is to make existing Internet technologies

Networking Products and Solutions

Smart Switches Next-generation switching powered by advanced silicon to deliver deterministic performance, deep telemetry, and secure, scalable connectivity

Router (computing)

In enterprises, a core router may provide a collapsed backbone interconnecting the distribution tier routers from multiple buildings of a campus, or large enterprise

Contact Us

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