Huawei Quidway S5700 - Official Technical Overview & Hardware Datasheet

PRODUCT IDENTIFICATION

The Huawei Quidway S5700 series represents a legacy portfolio of high-performance, energy-efficient, and highly reliable Layer 2/Layer 3 gigabit Ethernet switches. Engineered as a robust access and aggregation solution for enterprise campus networks, the S5700 was designed to deliver carrier-class reliability, multi-service support, and simplified network management within a compact form factor.

This document serves as the official technical datasheet for the EOL (End-of-Life) announcement of the Quidway S5700 Series. It provides a comprehensive overview of the hardware specifications, architectural capabilities, and compliance frameworks that defined this platform, while formally outlining the product's lifecycle status. The product series entered its End-of-Marketing (EOM) and End-of-Sale (EOS) phases, concluding in 2023, with the final software support and security patch updates ceasing in 2026 .

SYSTEM HARDWARE TOPOLOGY

CHASSIS AND FORWARDING ARCHITECTURE

The Huawei Quidway S5700 series is built upon a high-performance, non-blocking switching architecture, utilizing advanced ASIC (Application-Specific Integrated Circuit) technology to deliver wire-speed forwarding across all ports. The system architecture separates the data plane, control plane, and management plane, ensuring that forwarding performance remains consistent even under heavy network loads. Models such as the S5700-28C-HI-24S-AC incorporated a sophisticated backplane design to support high-density fiber connectivity and uplink modules .

KEY HARDWARE FEATURES

- Non-Blocking Switching Fabric: Dedicated hardware forwarding engine

ensuring full wire-speed performance on all Gigabit Ethernet ports .

- Modular Uplink Slots: Select models feature modular interface slots supporting a variety of high-speed uplink modules, including 10GE SFP+ and 40GE QSFP+ interfaces, allowing for flexible network design .

- Redundant Power Supplies: Support for AC or DC power inputs with 1+1 hot-swappable redundancy options to ensure maximum system uptime and resilience.

- Energy-Efficient Design: Implementation of power-saving technologies, such as Intelligent Power Management and dynamic port power adjustment, to significantly reduce operational costs.

DATA & CONTROL PLANE CAPABILITIES

INTELLIGENT SERVICE PROCESSING

The Quidway S5700 platform is not merely a switching appliance but an intelligent service node. It integrates sophisticated traffic management capabilities, including deep packet inspection (DPI), sophisticated Quality of Service (QoS) queuing mechanisms, and comprehensive security features like ACLs (Access Control Lists) and MAC address filtering. The platform supports a comprehensive suite of routing protocols, including static routing, RIPv2, OSPF, and BGP, enabling its deployment as a resilient Layer 3 edge device.

COMPONENT BREAKDOWN

PHYSICAL HARDWARE SPECIFICATIONS

The S5700 series includes models such as the S5700-24TP-SI-AC and the S5700-28C-HI-24S-AC. These switches offer a fixed configuration of 24 to 48 10/100/1000BASE-T ports, often supplemented by 4 Gigabit SFP combo ports or fixed 1000BASE-X SFP ports . The hardware design supports front-to-back or back-to-front airflow configurations to adapt to various data center and wiring closet environments. The platform is a 1RU (Rack Unit) high device, supporting standard 19-inch EIA rack mounting.

OPERATIONAL SPECS MATRIX

Parameter	**Specification**

Form Factor	1RU (Rack Unit) / 2RU Chassis
Switching Capacity	Up to 1.6 Tbps (depending on specific model configuration)
Power Supply	1+1 Redundant AC/DC (Hot-swappable)
Operating Temperature	0 ° C to 45 ° C (standard operating range)
MTBF	> 500,000 hours (calculated via Bellcore reliability prediction)

REGULATORY COMPLIANCE

CERTIFICATIONS AND STANDARDS

The Huawei Quidway S5700 series was designed in strict compliance with global industry and regulatory standards. It holds certifications including CE, UL, and FCC, confirming adherence to safety, electromagnetic compatibility (EMC), and environmental regulations .

LIFECYCLE AND MIGRATION PATHWAY

END-OF-LIFE MILESTONES

Per Huawei's standard product lifecycle management policy, the Quidway S5700 series has reached its End-of-Life (EOL) milestone. The End-of-Sale (EOS) was announced in 2023, and the product is now in the extended support phase, with no further hardware or software support available after 2026 .

SUCCESSOR AND MIGRATION STRATEGY

Huawei recommends transitioning to the next-generation CloudEngine (CE) series switches, such as the CloudEngine 6800 series or CloudEngine 8850 series, to ensure continued technological advancement, higher throughput (up to 25.6Tbps), and sustained software support . A phased migration strategy is advisable, leveraging VRF-lite to isolate legacy traffic and maintain operational continuity during the upgrade .

[TABLE_1]