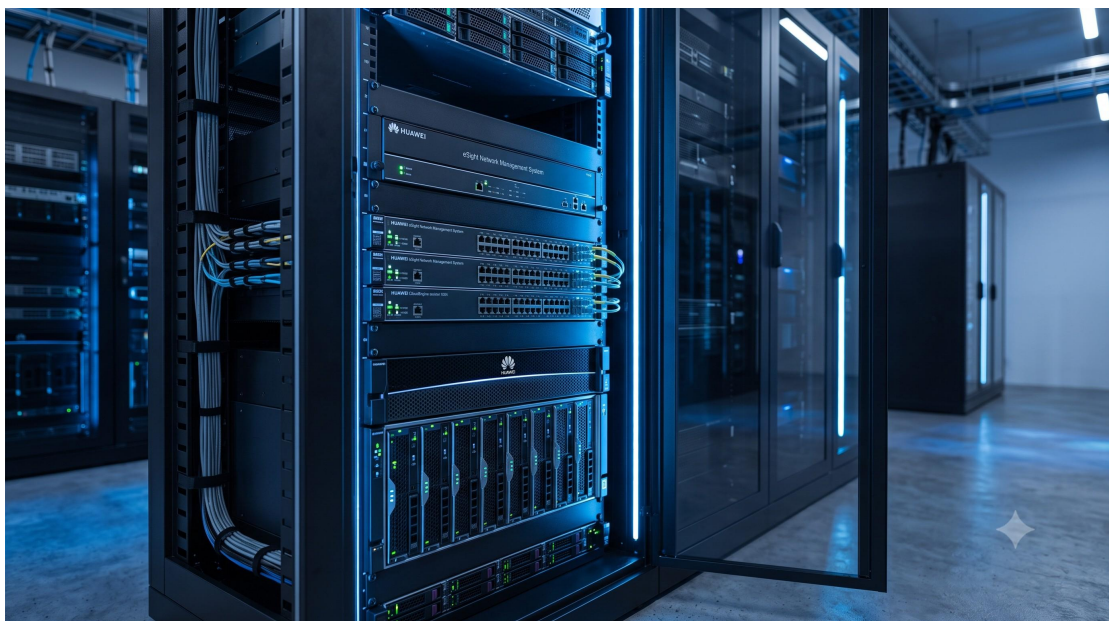


Huawei eSight Network Management System - Official Technical Overview & Hardware Datasheet

PRODUCT IDENTIFICATION

The Huawei eSight Network Management System is a next-generation, carrier-grade unified operations and maintenance (O&M) platform engineered for enterprise agile campus networks and distributed branch infrastructures . eSight transcends traditional network management tools by delivering intelligent, centralized management of enterprise resources, services, and users. This system provides a comprehensive solution for monitoring, managing, and optimizing network performance across heterogeneous environments, encompassing both Huawei and third-party network devices .



SYSTEM HARDWARE TOPOLOGY & INTEGRATION ARCHITECTURE

Huawei eSight is architected to enable seamless discovery and management of network elements through standardized protocols. The platform establishes robust communication with managed devices using SNMP for detection and monitoring, and SSH (STelnet) or Telnet for secure configuration and command delivery . Link Layer Discovery Protocol (LLDP) is utilized to automatically generate and maintain dynamic physical network topologies, allowing O&M personnel to visualize the entire network infrastructure and assess the real-time operational status of all interconnected devices . The system topology management function supports physical devices monitored by eSight, automatically creating links based on traffic analysis between network nodes .

DATA & CONTROL PLANE CAPABILITIES

The Huawei eSight platform integrates robust data and control plane management capabilities to deliver comprehensive network oversight. The control plane is equipped with advanced configuration management tools, including a Command Configuration Tool that allows administrators to create and deliver templates for batch service configuration on connected devices . Additionally, eSight's Zero-Touch Access service provides a simplified and reliable deployment solution, managing network devices throughout their entire lifecycle . The platform's data plane capabilities are enhanced through

SLA Management, which allows for meticulous monitoring of network status and quality, ensuring service performance and reliability align with predetermined agreements .

COMPONENT BREAKDOWN: NETWORK DEVICE MANAGEMENT

Network device management is a core component of the eSight platform, enabling centralized resource control. This service allows O&M personnel to connect devices—including switches, routers, firewalls, and WLAN equipment—to eSight for unified monitoring and visualization . The platform provides a comprehensive network resource list, allowing users to view information about subracks, boards, subcards, ports, and electronic labels . The integrated NE Manager centrally displays device details, alarm statistics, and key performance indicators (KPIs), facilitating rapid fault analysis. Proactive alarm monitoring and performance collection provide health trend analysis, enabling detection of network problems before they impact service delivery .

COMPONENT BREAKDOWN: TERMINAL AND WLAN MANAGEMENT

Terminal Resource Management enhances network security and O&M efficiency by automatically discovering and monitoring endpoint devices . Administrators can identify unauthorized terminals through MAC address

whitelisting and view historical access records for auditing purposes. The WLAN Management service provides focused oversight of wireless networks, which is critical given their vulnerability and operational expense. This component provides regional monitoring, RF planning capabilities, and comprehensive views of wireless user experience, including peak hours, hotspot areas, and user traffic patterns .

TECHNICAL SPECIFICATIONS

The technical specifications of the Huawei eSight platform are defined by its support for industry-standard protocols, ensuring interoperability across a diverse network ecosystem.

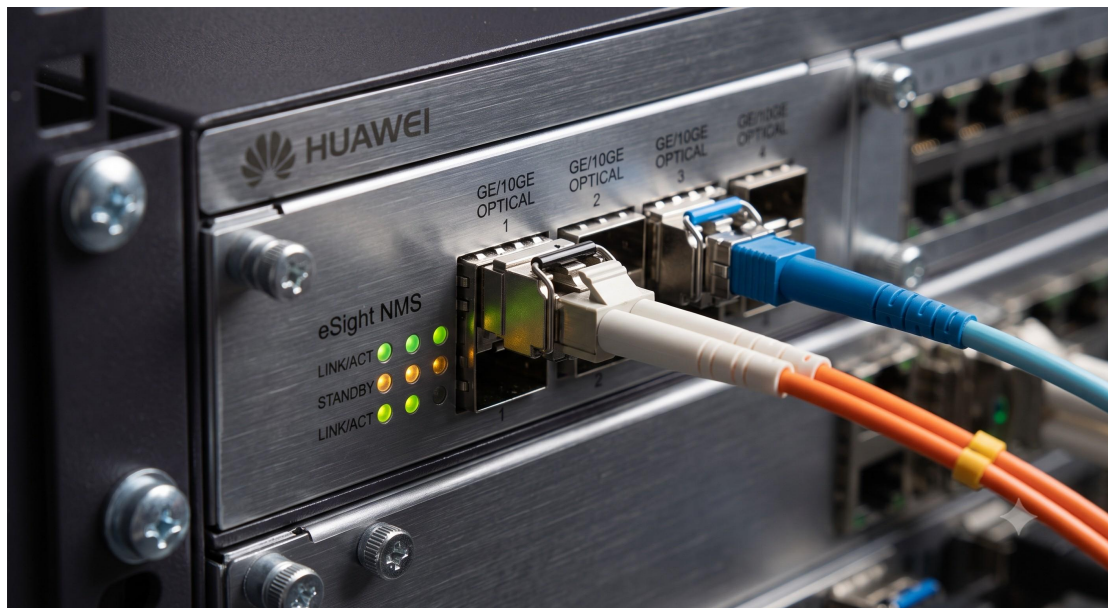
Parameter	Specification
System Role	Unified O&M and Network Management for Enterprise & Branch Networks
Discovery & Monitoring Protocol	SNMP v1/v2c/v3 (SNMPv3 recommended)
Configuration & Control Protocol	Telnet, STelnet (SSH) [SSH recommended]
Topology Discovery Protocol	LLDP

Supported Device Types	Switches, Routers, Firewalls, WLAN Devices, Servers, Storage
Supported Huawei Device Series	CE Series (e.g., 16800, 12800, 9800, 8800, 7800, 6800, 5800)
Key Management Features	Network Device Management, WLAN Management, Terminal Resource Management, Configuration File Management, Network Traffic Analysis
Security Features	SNMPv3 Authentication (SHA) & Encryption (AES128/192/256), STelnet (SSH)

REGULATORY COMPLIANCE & SECURITY FRAMEWORK

The Huawei eSight platform adheres to stringent global regulatory standards for network management and security. The system enforces secure access by supporting SNMPv3, which incorporates authentication and encryption mechanisms such as HMAC-SHA and AES-128/AES-256 to safeguard against unauthorized access . For command-line interface access and configuration management, eSight utilizes SSH (STelnet) and Telnet protocols, with SSH being the recommended option for robust security . The platform's security

framework is further reinforced by custom third-party device management, which ensures that even unadapted devices are managed securely and their KPIs accurately monitored .



LIFECYCLE ASSURANCE & TARGET NETWORK TOPOLOGIES

The eSight platform is designed for long-term lifecycle management and high network reliability. It is a critical component for target network topologies, including enterprise branch networks and agile campus networks. The system supports rapid software upgrade management for network devices and offers robust configuration file management for backing up, restoring, and auditing device configurations . By integrating Network Traffic Analysis, eSight provides a reliable solution for monitoring traffic in real-time, facilitating network planning, and optimizing capacity across the entire infrastructure .