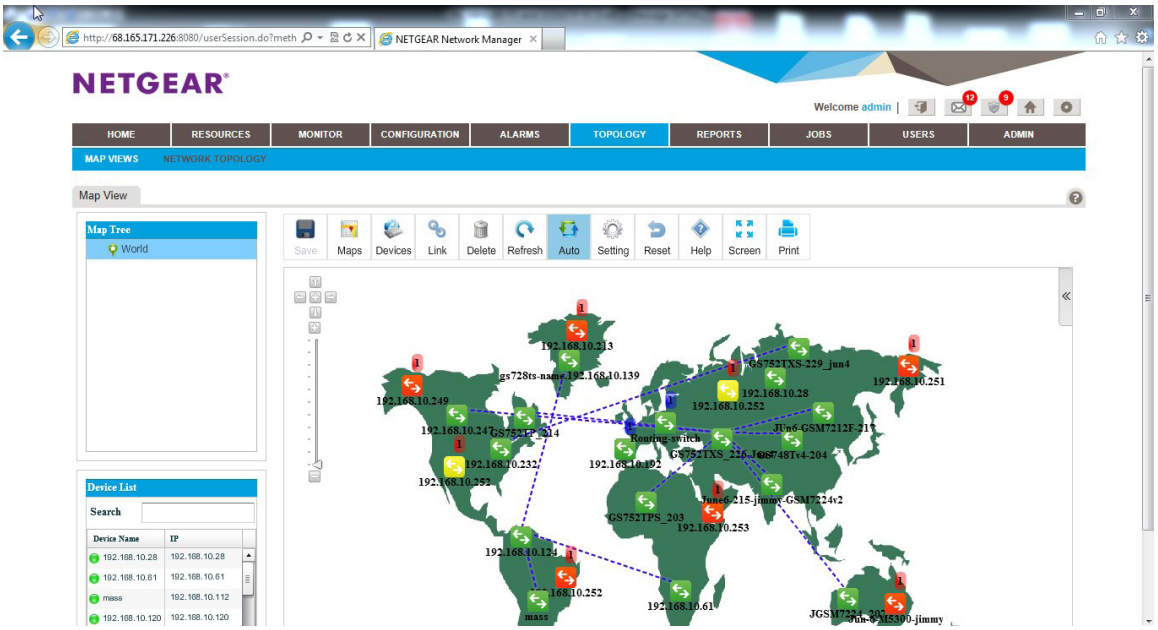
NETGEAR®

ProSAFE® Network Management System

Data Sheet

NMS300



The NETGEAR® Management System NMS300 delivers insight into network elements, including third-party devices.

With NMS300, registering all your managed NETGEAR products, at once, is just one click away! Download NMS300 today.

Highlights

When you need insight into your infrastructure to control and optimize network operation, the NETGEAR ProSAFE® Network Management System NMS300 provides the solution. ProSAFE NMS300 helps you configure, manage, and diagnose your network, ensuring it delivers data and services in a timely, reliable and cost effective manner. Easy to use, proactive, and secure, ProSAFE NMS300 facilitates the network administration tasks required to monitor and control sophisticated heterogeneous data networks.

Download a fully functional version of NMS300 software here: www.netgear.com/nms300

Comes with a complimentary 200-device license pack license and no expiration date.

ProSAFE NMS300 works with any managed device that uses industry-standard Simple Network Management Protocol (SNMP), such as Layer 2 switches, Layer 3 switches from any brand, wireless access points, traditional routers, servers and printers. It automatically discovers and maps up to 200 devices on your heterogeneous network without associated cost: NMS300 is free of charge up to 200 devices – and Managed access points under a Wireless Controller don't even count. Affordable additional 200-device license packs are available for campus networks.

Network statistics can be graphed in real time, or stored as historical data for trend analysis. Proactive thresholds and alerts, including Email notification, detect bottlenecks and other network problems and inform you of trouble before users start to call.

An easy-to-use Web graphical interface enables you to monitor everything from network elements to users and groups of devices – from anywhere in the network.

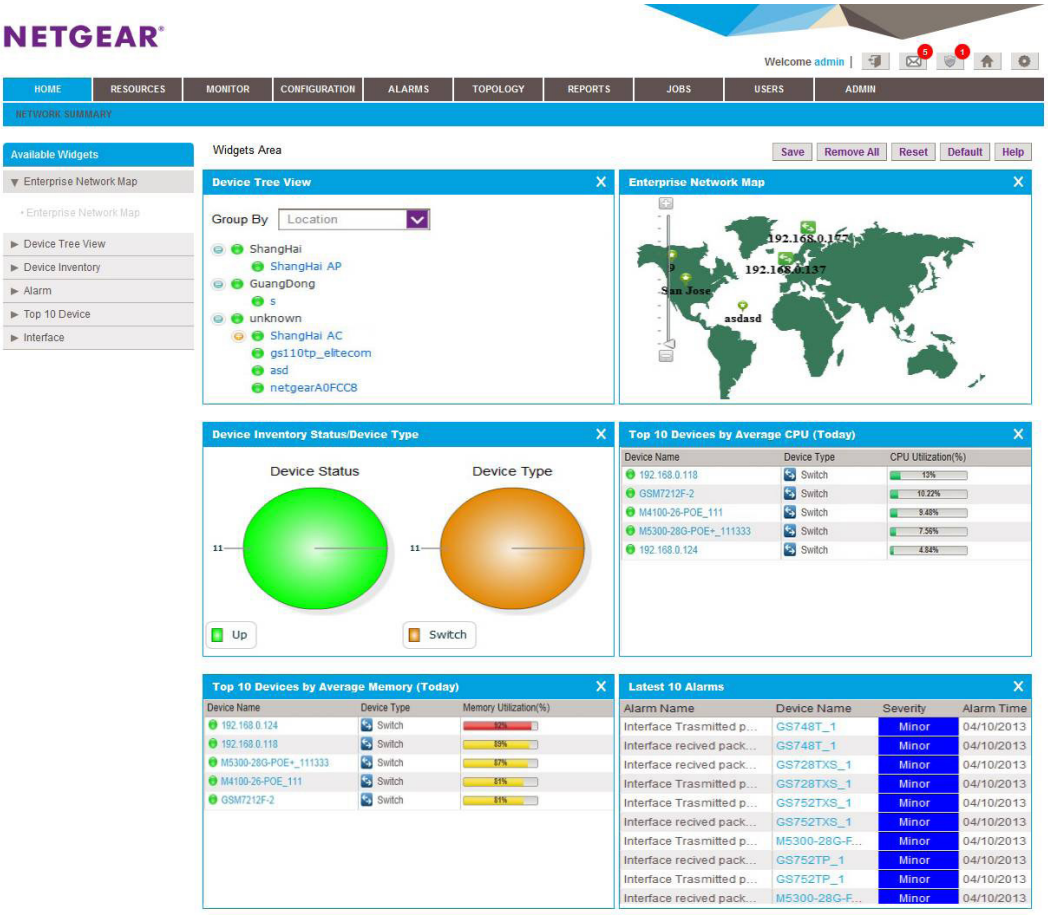
Optimized for NETGEAR managed network products, you can view NETGEAR-specific information, and benefit from the following exclusive features:

- Centralized firmware upgrades
- Configuration files backup, management and restore
- For select product categories, local master configuration files editing and mass-config deployment

New features include sFlow Collection Server, topology map alerts when traffic or packet loss exceed threshold, and comprehensive MIB browser with SNMP-set configuration.

Screen Shots

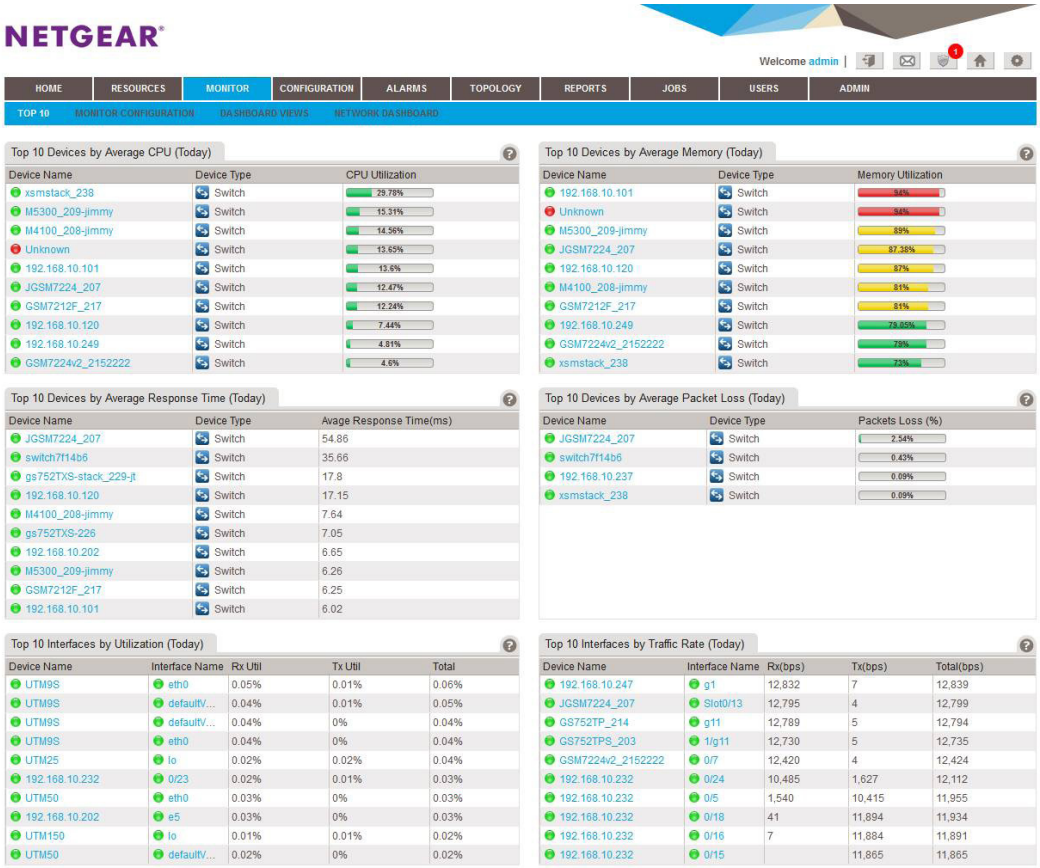
Home view



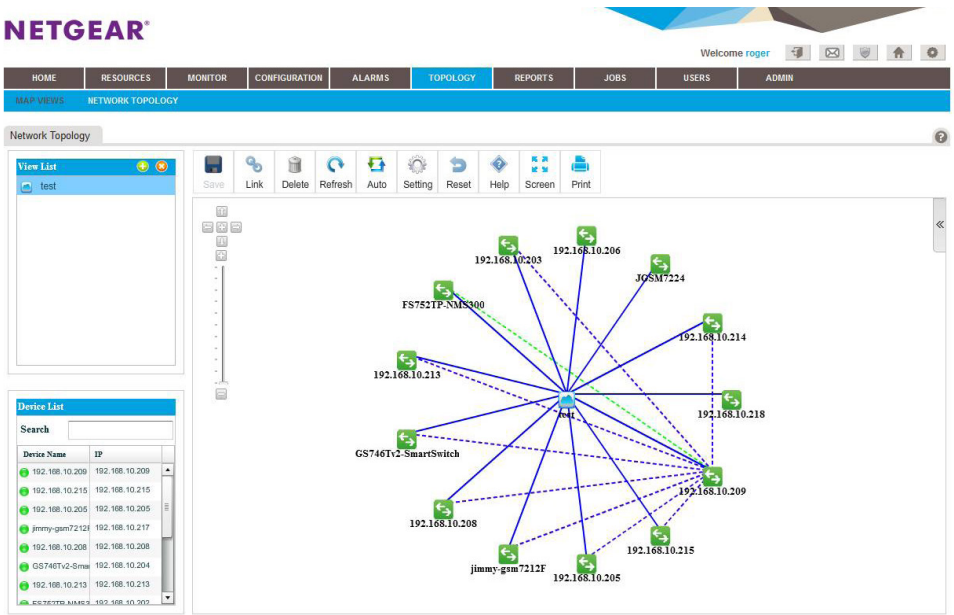
Inventory view

Screen Shots

Top 10s view



Topology Mapviews



Technical Specifications

HARDWARE AND SOFTWARE REQUIREMENTS	
System Architecture	• B/S-based multi-tiered system
Standard Server Requirement (for 200 devices)	• 2.8 GHz dual-core CPU • 4GB RAM (32-bit OS) or 8GB RAM (64-bit OS) • 20GB HD (free space) • Static IP
OS Support	• Microsoft Windows XP (Professional) 32-bit and 64-bit with SP3 or later • Windows Server 2003 (Standard, Enterprise, and Web), 32-bit and 64-bit • Windows Server 2008 (Enterprise), 32-bit and 64-bit • Microsoft Windows 7 (Professional, Enterprise, and Ultimate), 32-bit and 64-bit • Microsoft Windows 8 (Enterprise), 64-bit • Microsoft Windows Server 2012 (Standard), 64-bit • Microsoft Windows 10 (Home, Pro, Enterprise) 32-bit and 64-bit
VM Support	• Support hypervisors include VMWare and other major ones such as Hyper-V and XenServer
Installation	• Server is installed through an automated GUI-based installer • Single server deployment • Client is web based and no installation required
TCP Port Number For Web Access	• Any unused TCP port number can be selected during NMS300 installation • Make sure no other service is running on selected TCP port • For instance, if IIS server is running (port 8080) on the same server where NMS300 is installed
Backup and Restore	• Application system settings backup jobs can be triggered manually, or scheduled on a recurring basis • The application saves the system settings backup file on a specified external CIFS file server • The system settings backup file can be used to restore the system settings on the same server, or a new server
Standard Client Requirement	• 2 GHz CPU • 2GB RAM • 3GB HD (free space)
Security Profiles	• Admin: A user who can perform all functions of the application, including management of users and security profiles • Operator: A user who can manage the network functions, but cannot manage users or security profiles, or perform administrative tasks • Observer: A user who can only monitor and view network functions
Browser Support (HTTP and HTTPS)	• Internet Explorer 9 or a later version • Firefox 15.0 or a later version • Chrome 10.0 or a later version
Language Support	• English • Chinese
Management Interface Support	• SNMP (v1, v2c, v3) • TFTP • Telnet/HTTP/HTTPS • Web GUI

DISCOVERY AND REGISTRATION	
Automated Device Discovery	• Includes top-level, subcomponents and interfaces/ports as applicable
Automated Link Discovery	• Ethernet link discovery with LLDP protocol
Discovery Scheduling	• Ability to schedule discovery tasks to be executed at specified time/date(s)
Device Resynchronization	• System resynchronization with device inventory
Device Resynchronization Scheduling	• Ability to schedule device resynchronization to be executed at a specified time
Device Registration	• NETGEAR managed products can be registered from NMS300 • The registration tool lets you register one, several, or all devices that the application manages • Registration occurs with the NETGEAR registration server • Before you can use the registration tool that the application provides, you must create a customer account at the NETGEAR product registration website • After you create a customer account, you can set up the account profile in NMS300
MONITORING	
Topology Mapping	• Topology views displaying discovered and manually created links, including filtering
Topological Management Alerts	For discovered and manually added links in Topological View, different color and flashing style are used when: - Monitor data on the links are above User-defined interface Utilization for TX and for RX - Monitor data on the links are above User-defined Packet Loss for TX and for RX
Event Monitoring	• SNMP trap reception with defined trap attribution, severity and descriptions
Alarm Escalation	• Alarm generation based on pre-defined event definitions
Alarm/Event Actions	• Pre-defined and user defined actions triggered by events and alarms • Support for alerts via email with SMTP configuration
Monitor Data	• Device details • Port details
Real-time Key Performance Metrics collection	Temperature, Memory utilization, CPU Utilization, Total Inbound SNMP Traps, TCP Connection Attempt Failures, UDP Inbound Errors, Outbound IP Discards, Disk Temperature, Inbound IP Discards, Inbound TCP Errors, Disk Space Used, Inbound IP Address Errors, Disk Space Utilization, Total Disk Space, Inbound IP Header Errors, Total IP Discards, Fan Speed, Outbound IP No Route Discards, Uptime, Inbound ICMP Errors, Inbound ICMP Echo Requests, Total Outbound SNMP Traps, Outbound ICMP Echo Replies, Inbound UDP No Port, Established TCP Connections, Total SNMP Traps
Active Monitoring with Trending	• Device, port, interface monitoring, historical data persistence, thresholding & graphing (30 days max)
sFlow Collection Server	• Using packet sampling, sampled flow (sFlow) lets you monitor managed switches in high-speed switched networks
Reports	• Device inventory, device availability, port status, interface status reports, firmware
CONFIGURATION (SUPPORTED NETGEAR DEVICES ONLY)	
Configuration File Backup	• Device configuration file backup for applicable devices • 1:1 and 1:Many based on static or dynamic device groups • Immediately or scheduled
Mass-configuration	• Text-based configuration files can be edited and promoted as “Master” configuration files • Master configuration files are available for mass deployment • This is a useful way to make a “pattern” configuration file to deploy to several devices at once • Variables such as IP address or other identifiers can be excluded from mass-configuration

Configuration File Restoration	• Device configuration file restoration for applicable devices • 1:1 and 1:Many based on static or dynamic device groups • Immediately or scheduled
Device Firmware Update	• Automated deployment of selected version of firmware, immediately or scheduled
Firmware Pre-load Configuration	• Firmware versions may be pre-loaded into the application
File Comparison	• Color-coded, line-adjusted text comparison of two selected devices or stored files
Device configuration	• Direct access/cut-through (HTTP/Telnet)
Built-in File Server	• Support TFTP protocol
CONFIGURATION (ALL SNMP DEVICES)	
MIB Browser	• The SNMP MIB browser lets you retrieve information about SNMP-enabled devices directly • The application supports SNMPv1, SNMPv2c, and SNMPv3 and all supported standard and private MIBs • The SNMP MIB browser lets you select one of several MIB databases (such as RFC Standard MIBs or NETGEAR Private MIBs) and navigate a MIB tree to select a specific MIB object • You can also search for a MIB object, upload MIBs to the MIB browser, and delete MIBs from the MIB browser • The application displays the data that the MIB object collects, information about the selected MIB object, and information about the SNMP credentials
SNMP Commands	• Get: Collects data based on the selected MIB object • Get Next: Collects data based on the next MIB object (relative to the selected MIB object) in the MIB tree • Set: Changes the value of the selected MIB object • Table View: Collects table data based on the selected MIB object (available only for table-related MIB objects)
SUPPORTED NETGEAR DEVICES	(All other products: support of discovery and node status SNMP monitoring only)
Managed Switches – M4100 series	• M4100-D10-POE Managed Switch Layer 2+ With Static L3 Routing (FSM5210P v1h1) • M4100-26-POE Managed Switch Layer 2+ With Static L3 Routing (FSM7226P v1h1) • M4100-50-POE Managed Switch Layer 2+ With Static L3 Routing (FSM7250P v1h1) • M4100-D12G Managed Switch Layer 2+ With Static L3 Routing (GSM5212 v1h1) • M4100-D12G-POE+ Managed Switch Layer 2+ With Static L3 Routing (GSM5212P v1h2) • M4100-12GF Managed Switch Layer 2+ With Static L3 Routing (GSM7212F v1h2) • M4100-12G-POE+ Managed Switch Layer 2+ With Static L3 Routing (GSM7212P v1h2) • M4100-26G Managed Switch Layer 2+ With Static L3 Routing (GSM7224 v2h2) • M4100-50G Managed Switch Layer 2+ With Static L3 Routing (GSM7248 v2h2) • M4100-26G-POE Managed Switch Layer 2+ With Static L3 Routing (GSM7226LP v1h1) • M4100-24G-POE+ Managed Switch Layer 2+ With Static L3 Routing (GSM7224P v1h2) • M4100-50G-POE+ Managed Switch Layer 2+ With Static L3 Routing (GSM7248P v1h1)
Managed Switches – M5300 series	• M5300-28G Managed Switch Layer 2+ With Static L3 Routing (GSM7228S v1h1) • M5300-52G Managed Switch Layer 2+ With Static L3 Routing (GSM7252S v1h1) • M5300-28G-POE+ Managed Switch Layer 2+ With Static L3 Routing (GSM7228PS v1h2) • M5300-52G-POE+ Managed Switch Layer 2+ With Static L3 Routing (GSM7252PS v1h2) • M5300-28GF3 Managed Switch Layer 3 With Dynamic Routing (GSM7328FS v2h1) • M5300-28G3 Managed Switch Layer 3 With Dynamic Routing (GSM7328S v2h2) • M5300-52G3 Managed Switch Layer 3 With Dynamic Routing (GSM7352S v2h2)

Managed Switches – M6100 series	• M6100-44GF3 Chassis Switch Starter Kit (XCM8903SF) • M6100-44G3-POE+ Chassis Switch Starter Kit (XCM8903SK) • M6100-24X3 Chassis Starter Kit (XCM8903SX) • XCM8924X 24-port RJ45 10GBASE-T 16-port shared SFP+ 1G/10G Blade • XCM8944 40-port RJ45 10/100/1000 2-port RJ45 10GBASE-T 2-port SFP+ 1G/10G Blade • XCM8944F 40-port SFP 100/1000 2-port RJ45 10GBASE-T 2-port SFP+ 1G/10G Blade • XCM8948 48-port RJ45 10/100/1000 Blade • XCM89P Daughter Card PoE+ 802.3at for XCM8948 and XCM8944 blades • XCM89UP Daughter Card UPOE for XCM8948 and XCM8944 blades
Managed Switches – M7100 series	• M7100-24X Managed Switch Layer 2+ With Static L3 Routing (XSM7224 v1h1)
Managed Switches – M7300 series	• M7300-24XF XSM7224S Managed Switch Layer 2+ With Static L3 Routing (XSM7224S v1h1)
Managed Switches – legacy	• JGSM7224 Managed Switch Layer 2 (JGSM7224 v2h1) • FSM726 Managed Switch Layer 2 (FSM726 v3) • GSM7224 Managed Switch Layer 2+ With Static L3 Routing (GSM7224 v2h1) • GSM7248 Managed Switch Layer 2+ With Static L3 Routing (GSM7248 v2h1) • GSM5212P Managed Switch Layer 2+ With Static L3 Routing (GSM5212P v1h1) • GSM7212F Managed Switch Layer 2+ With Static L3 Routing (GSM7212F v1h1) • GSM7212P Managed Switch Layer 2+ With Static L3 Routing (GSM7212P v1h1) • GSM7224P Managed Switch Layer 2+ With Static L3 Routing (GSM7224P v1h1) • GSM7228PS Managed Switch Layer 2+ With Static L3 Routing (GSM7228PS v1h2) • GSM7252PS Managed Switch Layer 2+ With Static L3 Routing (GSM7252PS v1h2) • GSM7328FS Managed Switch Layer 3 With Dynamic Routing (GSM7328FS v1h1) • GSM7328S Managed Switch Layer 3 With Dynamic Routing (GSM7328S v2h1) • GSM7352S Managed Switch Layer 3 With Dynamic Routing (GSM7352S v2h1)
Smart Switches - standalone	• FS526Tv2 Smart Switch • FS726Tv2 Smart Switch • FS728TLP Smart Switch • FS728TPv2 Smart Switch • FS728TP-200 Smart Switch • GS108T-200 Smart Switch • GS110TP Smart Switch • GS510TP Smart Switch • GS516TP Smart Switch • GS724T-400 Smart Switch • GS716T-300 Smart Switch • GS748T-500 Smart Switch • GS728TP Smart Switch • GS728TPP Smart Switch • GS748T-400 Smart Switch • GS752TP Smart Switch • XS712T Smart Switch • XS728T Smart Switch

Smart Switches - stackable	• GS728TPS Smart Switch • GS728TS Smart Switch • GS752TPS Smart Switch • GS752TS Smart Switch • GS728TXS Smart Switch • GS752TXS Smart Switch • S3300-28X Smart Switch (GS728TX) • S3300-28X-PoE+ Smart Switch (GS728TXP) • S3300-52X Smart Switch (GS752TX) • S3300-52X-PoE+ Smart Switch (GS752TXP)
Wireless Products	• WC7520 Wireless Controller • WC7600 Wireless Controller • WC9500 Wireless Controller • WMS5316 Wireless Management System • WAC720 Access Point • WAC730 Access Point • WG103 Access Point • WN203 Access Point • WN203-200 Access Point • WN370 Access Point • WNAP210 Access Point • WNAP320 Access Point • WNAP370 Access Point • WND930 Access Point • WNDAP350 Access Point • WNDAP360 Access Point • WNDAP380R Access Point • WNDAP380Rv2 Access Point • WNDAP620 Access Point • WNDAP660 Access Point
Security Products	• FVS318G ProSAFE Firewall • FVS318N ProSAFE Firewall • FVS336Gv2 ProSAFE Firewall • FVS336Gv3 ProSAFE Firewall • SRX5308 ProSAFE Firewall
Storage Products	• RD5200 ReadyDATA • RDD516 ReadyDATA • RN716X ReadyNAS • RN2120 ReadyNAS • RN3130 ReadyNAS (all models) • RN3220 ReadyNAS • RN4220 ReadyNAS • RN31200 ReadyNAS (all models) • RN31400 ReadyNAS (all models) • RN31600 ReadyNAS (all models) • RN51600 ReadyNAS (all models)

SUPPORT ENTITLEMENT	
Warranty	• NETGEAR 90-day Warranty
Technical Support	• Basic technical support within 90 days from the date of NMS300 License purchase • Basic technical support within 90 days from the date of supported NETGEAR devices purchase • Basic and Advanced technical support when NETGEAR Managed devices are covered by the ProSupport OnCall 24x7 service contract (PMB) • Basic and Advanced technical support when NETGEAR Managed devices are NETGEAR Managed switches covered by Lifetime Technical Support
ORDERING INFORMATION	
Current NMS300 version	• NETGEAR PROSAFE NETWORK MANAGEMENT SYSTEM NMS300 V1.5.0.11
Procurement	• Download fully functional version of NMS300 software here: www.netgear.com/nms300 • Comes with complimentary 200-device license pack • Managed Access Points under NETGEAR Wireless Controllers don't count as "devices"
Upgrades	• Free NMS300 v1.x minor upgrades included • www.netgear.com/nms300
Additional Device License Packs	• NMS300L2-10000S (200-additional device license pack) • Electronic license: key is delivered by email • License key is registered in ADMIN\LICENSE MANAGEMENT section of NMS300 Web GUI • First NMS300L2-10000S license key will add 200 devices to NMS300 counter (new maximum allowed: 400 devices) • Each new NMS300L2-10000S license key will increment NMS300 counter by 200 devices