

ProSafe<sup>®</sup> 52-port 10/100 Fast Ethernet PoE Smart Switch with 4 Gigabit Uplink Ports **FS752TP** 

Data Sheet

	Advanced Performance for Power-over-Ethernet Networks
	As small and mid-sized enterprises add Voice-over-IP (VoIP) telephones, wireless access points (APs) and IP-based surveillance cameras to their networks, Power-over-Ethernet (PoE) switches are becoming the mission-critical centerpiece for advanced deployments. The NETGEAR® ProSafe® 52-port 10/100 Fast Ethernet PoE Smart Switch with 4 Gigabit Uplink Ports (FS752TP) is a reliable, affordable and simple solution for supporting 48 IEEE 802.3af PoE devices. Four of the 48 ports support PoE Plus devices for high-power needs such as video phones and 802.11n APs. The ProSafe FS752TP is a smart switch, with intuitive web-based management for quick and easy
	set up and configuration. Designed to grow with a business, the switch has a powerful feature set including Access Control Lists (ACL), static routing, 802.1x port authentication, enhanced QoS, rate limiting and IGMP snooping. Four dedicated gigabit ports support high-speed uplinks or fiber connectivity. The switch is also energy efficient, with many power-saving features, and is protected by the NETGEAR ProSafe limited lifetime warranty.
Flexible, Energy-Efficient PoE	With a generous total power budget of 384 Watts, the ProSafe FS752TP connects up 48 devices based on IEEE 802.3af – including up to four high-power IEEE 802.3at devices. PoE optimizes the installation and management of network devices such as VoIP phones, wireless APs and IP-based surveillance cameras by requiring only a standard Cat 5 UTP cable to carry both power and data – reducing installation time and cost. The ProSafe FS752TP also comes with a PoE timer to increase network security and energy efficiency by allowing IT administrators to remotely turn ports off and on.
Sophisticated Traffic Management	The ProSafe FS752TP goes beyond basic VLAN and QoS for network traffic management, with Auto Voice VLAN and Auto Video VLAN. These advanced features automatically detect IP phones and cameras on the network, put them in a designated voice or video VLAN, and then assign the proper traffic priorities and security profiles. This plug-and-play approach reduces initial set up time as well as simplifying ongoing monitoring, maintenance and changes.
Multiple Management Options	As a "smart" switch, the ProSafe FS752TP offers IT administrators flexibility in network management. Individual switches can be managed through a simple browser-based graphical user interface. The ProSafe FS752TP can also be managed through SNMP (v1, 2c and 3) for compatibility with existing SNMP-based consoles. For larger deployments, NETGEAR's Smart Control Center is a free Windows-based application for discovering, configuring and upgrading multiple smart switches across the network. For networks including other devices from NETGEAR such as switches, wireless access points and NAS, the NETGEAR Network Management System (NMS-200) can manage them all from a single console for extensive visibility, granular control and seamless automation across the entire network.



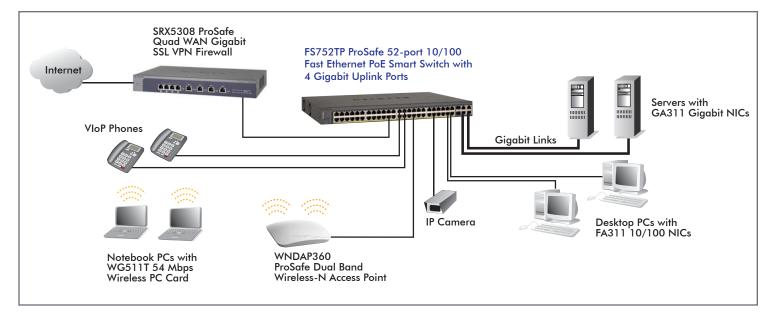
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## Features at a Glance

Hardware Main Features	Benefits
48 IEEE 802.3af PoE ports	<ul> <li>Supports advanced deployments of Voice over IP (VoIP) telephones, wireless access points (APs) and IP-based surveillance cameras that draw power through an Ethernet connectionReduces installation time and cost</li> </ul>
4 IEEE 802.3at PoE Plus ports	• Supports high-power PoE devices such as video phones and wireless N APs.
Four dedicated gigabit ports	Supports high-speed uplinks or fiber connectivity
Software Main Features	Benefits
Auto Voice and Auto Video VLAN	Fast and easy deployment for VoIP and video surveillance systems
Comprehensive QoS features: • Port-based or 802.1p-based prioritization • Layer 3-based (DSCP) prioritization • Port-based ingress and egress rate limiting	<ul> <li>Advanced controls for optimized network performance and better delivery of mission-critical traffics such as voice and video</li> </ul>
Robust security features: • 802.1x authentication • DHCP Filtering • Port-based security by locked MAC • ACL filtering to permit or deny traffic based on MAC and IP addresses	• Prevent external attacks and block malware while allowing secure access for authorized users
Static Routing	• Allows for segmentation of the network with internal routing through the switch – reserving the router for external traffic routing only, making the entire network more efficient.
PoE timer	• Allows IT administrators to increase network security and energy efficiency by remotely turning ports off and on
NETGEAR Network Management System (NMS200)	• Extensive visibility, granular control and seamless automation across the network for a range of NETGEAR products

## **Network Diagram**



## Technical Specifications

# Network Protocol and Standards Compatibility

- IEEE 802.3 10BASE-T
- IEEE 802.3u 100BASE-TX
- IEEE 802.3ab 1000BASE-T
- IEEE 802.3z 1000BASE-X
- IEEE 802.3x full-duplex flow control
- IEEE 802.3af (Power over Ethernet)
- IEEE 802.3at (Power over Ethernet Plus) for the first 4 ports

### • Power Supply

- Power consumption: 539W maximum
- 100-240VAC/50-60-Hz universal input
- PoE budget: 384W

#### Network Ports

- 48 10/100 Mbps auto sensing Fast Ethernet
- 4 10/100/1000 Mbps auto-sensing gigabit Ethernet switching ports (RJ-45)
- 2 Dual Personality SFP slots

#### • Physical Specifications

- Dimensions: (w x d x h)- 440 x 316 x 43 mm (17.3 x 12.4 x 1.7 in)
- Weight: 4.87 kg (10.74 lb)

### Electromagnetic Emissions

- CE EN 55022, EN 61000 and EN 55024
- FCC Part 15 Class A
- VCCI Class A
- C-Tick
- KC
- CCC

## ProSafe® 52-port 10/100 Fast Ethernet PoE Smart Switch with 4 Gigabit Uplink Ports

#### • Environmental Specifications

- Operating temperature:  $32^{\circ}$  to  $122^{\circ}$  F (0° to  $50^{\circ}$  C)
- Storage temperature: -4° to 158° F (-20° to 70° C)
- Operating humidity: 90% maximum relative humidity, non-condensing
- Storage humidity: 95% maximum relative humidity, non-condensing
- Operating altitude: 10,000 ft (3,000 m) maximum
- Storage altitude: 10,000 ft (3,000 m) maximum

#### • LEDs

- Per port (10/100 and Gigabit): Link/ activity, speed
- Per device: Power, Fan, PoE Max, LED Mode
- Per PoE port: PoE Power, PoE fault

#### Safety

- UL/cUL 60950-1
- CE EN 60950-1
- CCC
- CB

#### • System Requirements

- Category 5 UTP Network cables or above
- Network card for each PC
- Network software (e.g., Windows®)
- Web browser (e.g., Internet Explorer 6.0 or higher, Netscape 6.0 or higher)

#### • Administrative Switch Management

- IEEE 802.1Q static VLAN (128 groups, static)
- IEEE 802.1p Class of Service (CoS)
- Port-based QoS
- DSCP-based QoS
- DiffServ
- IEEE802.3ad link aggregation (manual or LACP)
- IEEE 802.1D Spanning Tree Protocol (STP)
- IEEE 802.1w Rapid Spanning Tree

- Protocol (RSTP)
- IEEE 802.1s Multiple Spanning Tree Protocol (MSTP)
- IEEE 802.1ab Link Layer Discovery Protocol (LLDP)
- LLDP-MED
- SNMP v1, v2c, v3
- RFC 1213 MIB II
- RFC 1643 Ethernet interface MIB
- RFC 1493 bridge MIB
- RMON group 1, 2, 3, 9
- RFC 2131 DHCP client
- Voice VLAN
- Auto-VOIP
- DHCP Filtering
- Auto denial-of-service (DoS) protection
- HTTP and HTTPS
- Ping and traceroute
- Power saving when link down
- IEEE 802.1x
- Port-based security by locked MAC addresses
- IP and MAC ACL
- Storm control for broadcast, multicast and unknown unicast packets
- IGMP snooping v1/v2/v3
- Protected Port
- PoE Timer
- Port-based ingress and egress rate limiting
- SNTP
- Port mirroring support (many to one)
- Static Routing (support for up to 10 static routes)
- Web-based configuration
- Configuration backup/restore
- Password access control
- RADIUS Support
- TACACS+ support
- Syslog
- Firmware upgradeable

\*Basic technical support provided for 90 days from date of purchase.

#### - Cable test

#### • Performance Specifications

- Forwarding modes: Store-and-forward
- Bandwidth: 17.6 Gbps
- Network latency: <20µs for 64-byte frames in store-and-forward mode for 100 Mbps to 100 Mbps transmission
- Buffer memory: 1.5 MBytes per system
- Address database size: 4,000 media access control (MAC) addresses per system
- Addressing: 48-bit MAC address
- Mean time between failures (MTBF): 230,731 hours at 25C (~26.4 years)
- Acoustic noise: 34.5 dBA

#### Modules

- AGM731F 1000BASE-SX SFP Module
- AGM732F 1000BASE-LX SFP Module
- AGM733 1000BASE-ZX SFP Module
- AFM735 100BASE--FX SFP LC Module

#### Warranty

– NETGEAR Lifetime Warranty

#### OnCall 24x7, Category 1

- PMB0331-100 (US)
- PMB0331 (non-US)

#### Package Contents

- 52-port PoE Smart Switch with 4 Gigabit Ports (FS752TP)
- Rubber footpads
- Power cord
- Rack-mount kit
- Resource CD

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- Installation guide

#### Ordering Information

- North America: FS752TP-100NAS
- Europe: FS752TP-100EUS
- Asia & Japan: FS752TP-100AJS

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