

Cisco 90 Series Unmanaged Switches Cisco Small Business

Affordable, Easy-to-Use Switches for Small Business Networks, with Zero Configuration Required

To stay on top of your business, you need to keep your office running smoothly. These days that means having a highly reliable network connecting your computers, printers, copiers, and other office equipment. But if your business is like most small companies, you don't have an IT staff to set up your network for you. Now you can have a high-performance, business-class office network that just works, right out of the box, with Cisco® 90 Series Unmanaged Switches.

Cisco 90 Series Unmanaged Switches deliver basic network connectivity and reliability for small businesses, without complexity. These switches provide all of the features, expandability, and investment protection you expect from Cisco, with no installation software and nothing to configure. Just plug it in, connect your computers and other business equipment, and get to work.

Cisco 90 Series Unmanaged Switches

Cisco 90 Series Unmanaged Switches (Figure 1), part of the Cisco Small Business networking solutions, are a line of unmanaged switches that provide wire-speed Fast Ethernet and Gigabit Ethernet connectivity to connect your small business office. Available in desktop and rack-mount models, these switches are designed to suit any office space with basic network needs and to optimize power efficiency. They use less power and provide the robust, reliable connectivity your business demands, as well as support for advanced features such as quality of service (QoS) – all in a switch that you can set up yourself, in minutes. A business-class, affordable network solution, Cisco 90 Series switches bring the proven reliability and investment protection of Cisco networking solutions to your small business.

Figure 1. Cisco 90 Series Unmanaged Switches







Features and Benefits

Cisco 90 Series switches provide an easy-to-use solution for your small business network. They offer:

- Ease of use: Cisco 90 Series switches work right out of the box, with no software to install and nothing
 to configure. Each switch port independently sets itself for the optimal speed and determines whether
 to run in half- or full-duplex mode automatically. As a standards-based Cisco solution, Cisco 90 Series
 switches are also designed to immediately accommodate all of the devices in your network, including:
 - Support for 10 megabits per second (Mbps), 100 Mbps, and up to 1 gigabit per second (1000 Mbps)
 devices in the same network
 - · Automatic cable detection, so you don't have to worry about using the wrong cable type
 - Compatibility with network devices from other vendors
- Simple setup: Designed for small office spaces, Cisco 90 Series switches are available in both
 compact desktop and rack-mount models. The desktop models offer a wall-mount option for discreet
 mounting under a desk or on the wall of an office or conference room.
- High performance: Cisco 90 Series switches deliver the performance you need to run your business applications including bandwidth-intensive video services and avoid slow and sluggish networks.
 It supports up Gigabit Ethernet speeds, unlocking a new level of capacity and performance in your business network and letting you transfer large files in seconds.
- Reduced energy costs: Cisco 90 Series switches are designed to help conserve energy by optimizing
 power use without compromising performance, which protects our environment and reduces your
 energy costs. In addition, they support the Energy Efficient Ethernet (IEEE 802.3az) standard, which
 reduces energy consumption by monitoring the amount of traffic on an active link and putting the link
 into a sleep state during quiet periods. All of the switches have no fans, so they run silently and
 unobtrusively while lowering energy costs.
- Support for advanced technologies: All switches include advanced Cisco traffic-handling features
 to keep your applications running at peak performance. Integrated QoS intelligence on all models
 automatically prioritizes delay-sensitive services such as voice or video to improve your network's
 performance. Fast store-and-forward switching identifies damaged packets and prevents them from
 being passed on through the network. All of these features run automatically, with no management
 or configuration required.
- **Peace of mind:** Cisco 90 Series switches deliver the rock-solid reliability you expect from a Cisco switch. The solution has been rigorously tested to ensure optimal uptime and performance.

Cisco Limited Lifetime Warranty

Cisco Small Business products offer a limited lifetime hardware warranty with return to factory replacement and a 1-year limited warranty for fans and power supplies. In addition, Cisco offers software application updates for bug fixes, telephone technical, and online chat support at no charge for the first 12 months following the date of purchase. To download software updates, go to: www.cisco.com/go/smallbiz.

Product warranty terms and other information applicable to Cisco products are available at www.cisco.com/go/warranty.

World-Class Service and Support

Cisco 90 Series switches are backed by the Cisco Small Business Support Service, which provides affordable peace-of-mind coverage. This subscription-based service helps you protect your investment and derive maximum value from Cisco Small Business products. Delivered by Cisco and backed by your

trusted partner, this comprehensive service includes software updates and access to the Cisco Small Business Support Center, and it extends technical service to three years.

Cisco Small Business products are supported by professionals in the Cisco Small Business Support Center, a dedicated resource for small business customers and networks, with locations worldwide that are specifically trained to understand your needs. You also have access to extensive technical and product information through the Cisco Small Business Support Community, an online forum that enables you to collaborate with your peers and reach Cisco technical experts for support information.

Product Specifications

Table 1 gives the product specifications for the Cisco 90 Series Unmanaged Switches

Table 1. Product Specifications

SF90D-05: 0.80 Gbps SF90D-16: 3.2 Gbps SF90D-16: 3.2 Gbps SG90D-05: 10 Gbps SG90D-08: 16 Gbps SG90D-08: 1.4 mpps SF90D-05: 0.74 mpps SF90D-06: 1.4 mpps SF90D-16: 1.4 mpps SF90D-16: 1.4 mpps SG90D-08: 11.9 mpps SG90D-08: 11.9 mpps SG90D-08: 8 RJ-45 connectors for 10BASE-T/100BASE-TX	Feature	Description	
SF90D-08: 1.6 Gbps SF90D-16: 3.2 Gbps SF90D-24: 4.8 Gbps SG90D-08: 16 Gbps SG90D-08: 16 Gbps SG90D-08: 16 Gbps SG92-16: 32 Gbps SG92-24: 48 Gbps Orwarding capacity Forwarding rate in million packets per second (mpps) (based on 64-byte packets): SF90D-05: 0.74 mpps SF90D-06: 1.4 mpps SF90D-06: 1.4 mpps SF90D-16: 1.4 mpps SG90D-06: 7.4mpps SG90D-06: 7.4mpps SG90D-06: 7.4mpps SG90D-06: 11.9 mpps SG92-16: 23.8 mpps SG92-16: 23.8 mpps SG92-16: 23.8 mpps SG92-16: 20.8 mpps SG92-16: 20.8 mpps SG92-16: 10.9 mpps SG92-16: 20.8 mpps SG92-16: 10.9 m	Performance		
SF90D-05: 0.74 mpps SF90D-08: 1.4. mpps SF90D-18: 1.4 mpps SF90D-24: 3.6 mpps SG90D-06: 7.4mpps SG90D-06: 7.4mpps SG90D-06: 7.4mpps SG90D-08: 11.9 mpps SG92-16: 23.8 mpps SG92-24: 35.7 mpps ayer 2 Switching lead-of-line (HOL) blocking HOL blocking prevention umbo Frame 9216 bytes tuality of Service (QoS) riority levels 4 hardware queues cheduling Priority queuing and weighted round-robin (WRR) class of service 802.1p priority based roduct Specifications orts SF90D-05: 5 RJ-45 connectors for 10BASE-T/100BASE-TX SF90D-08: 8 RJ-45 connectors for 10BASE-T/100BASE-TX SF90D-05: 5 RJ-45 connectors for 10BASE-T/100BASE-TX SF90D-06: 5 RJ-45 connectors for 10BASE-T/100BASE-TX SG90D-08: 8 RJ-45 connectors for 10BASE-T/100BASE-TX	Switching capacity	SF90D-08: 1.6 Gbps SF90D-16: 3.2 Gbps SF90-24: 4.8 Gbps SG90D-05: 10 Gbps SG90D-08: 16 Gbps SG92-16: 32 Gbps	
lead-of-line (HOL) blocking HOL blocking prevention 9216 bytes Ruality of Service (QoS) Priority levels	Forwarding capacity	SF90D-05: 0.74 mpps SF90D-08: 1.4. mpps SF90D-16: 1.4 mpps SF90-24: 3.6 mpps SG90D-05: 7.4mpps SG90D-08: 11.9 mpps SG92-16: 23.8 mpps	
umbo Frame 9216 bytes quality of Service (QoS) priority levels 4 hardware queues priority queuing and weighted round-robin (WRR) plass of service 802.1p priority based product Specifications ports SF90D-05: 5 RJ-45 connectors for 10BASE-T/100BASE-TX SF90D-08: 8 RJ-45 connectors for 10BASE-T/100BASE-TX SF90D-16: 16 RJ-45 connectors for 10BASE-T/100BASE-TX SF90D-24: 24 RJ-45 connectors for 10BASE-T/100BASE-TX SG90D-05: 5 RJ-45 connectors for 10BASE-T/100BASE-TX SG90D-05: 5 RJ-45 connectors for 10BASE-T/100BASE-TX SG90D-08: 8 RJ-45 connectors for 10BASE-T/100BASE-TX All units: Automatic medium dependent interface (MDI) and MDI crossover	Layer 2 Switching		
A hardware queues Priority levels 4 hardware queues Priority queuing and weighted round-robin (WRR) Plass of service 802.1p priority based Product Specifications Product Specifications SF90D-05: 5 RJ-45 connectors for 10BASE-T/100BASE-TX SF90D-08: 8 RJ-45 connectors for 10BASE-T/100BASE-TX SF90D-16: 16 RJ-45 connectors for 10BASE-T/100BASE-TX SF90-24: 24 RJ-45 connectors for 10BASE-T/100BASE-TX SG90D-05: 5 RJ-45 connectors for 10BASE-T/100BASE-TX SG90D-08: 8 RJ-45 connectors for 10BASE-T/100BASE-TX	Head-of-line (HOL) blocking	HOL blocking prevention	
rriority levels 4 hardware queues Priority queuing and weighted round-robin (WRR) Product Specifications Product Specifications Product Specifications SF90D-05: 5 RJ-45 connectors for 10BASE-T/100BASE-TX SF90D-08: 8 RJ-45 connectors for 10BASE-T/100BASE-TX SF90D-16: 16 RJ-45 connectors for 10BASE-T/100BASE-TX SF90-24: 24 RJ-45 connectors for 10BASE-T/100BASE-TX SG90D-05: 5 RJ-45 connectors for 10BASE-T/100BASE-TX SG90D-08: 8 RJ-45 connectors for 10BASE-T/100BASE-TX/100BASE-T ports SG90D-08: 8 RJ-45 connectors for 10BASE-T/100BASE-TX/100BASE-T ports All units: Automatic medium dependent interface (MDI) and MDI crossover	Jumbo Frame	9216 bytes	
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Class of service 802.1p priority based Product Specifications SF90D-05: 5 RJ-45 connectors for 10BASE-T/100BASE-TX SF90D-08: 8 RJ-45 connectors for 10BASE-T/100BASE-TX SF90D-16: 16 RJ-45 connectors for 10BASE-T/100BASE-TX SF90-24: 24 RJ-45 connectors for 10BASE-T/100BASE-TX SG90D-05: 5 RJ-45 connectors for 10BASE-T/100BASE-TX/100BASE-T ports SG90D-08: 8 RJ-45 connectors for 10BASE-T/100BASE-TX/1000BASE-T ports All units: Automatic medium dependent interface (MDI) and MDI crossover	Priority levels	4 hardware queues	
SF90D-05: 5 RJ-45 connectors for 10BASE-T/100BASE-TX SF90D-08: 8 RJ-45 connectors for 10BASE-T/100BASE-TX SF90D-16: 16 RJ-45 connectors for 10BASE-T/100BASE-TX SF90-24: 24 RJ-45 connectors for 10BASE-T/100BASE-TX SG90D-05: 5 RJ-45 connectors for 10BASE-T/100BASE-TX/100BASE-T ports SG90D-08: 8 RJ-45 connectors for 10BASE-T/100BASE-TX/1000BASE-T ports All units: Automatic medium dependent interface (MDI) and MDI crossover	Scheduling	Priority queuing and weighted round-robin (WRR)	
SF90D-05: 5 RJ-45 connectors for 10BASE-T/100BASE-TX SF90D-08: 8 RJ-45 connectors for 10BASE-T/100BASE-TX SF90D-16: 16 RJ-45 connectors for 10BASE-T/100BASE-TX SF90-24: 24 RJ-45 connectors for 10BASE-T/100BASE-TX SG90D-05: 5 RJ-45 connectors for 10BASE-T/100BASE-TX/1000BASE-T ports SG90D-08: 8 RJ-45 connectors for 10BASE-T/100BASE-TX/1000BASE-T ports All units: Automatic medium dependent interface (MDI) and MDI crossover	Class of service	802.1p priority based	
SF90D-08: 8 RJ-45 connectors for 10BASE-T/100BASE-TX SF90D-16: 16 RJ-45 connectors for 10BASE-T/100BASE-TX SF90-24: 24 RJ-45 connectors for 10BASE-T/100BASE-TX SG90D-05: 5 RJ-45 connectors for 10BASE-T/100BASE-TX/1000BASE-T ports SG90D-08: 8 RJ-45 connectors for 10BASE-T/100BASE-TX/1000BASE-T ports All units: Automatic medium dependent interface (MDI) and MDI crossover	Product Specifications		
(MDI-X); auto negotiated port for connecting 10-, 100-, 1000- Mbps devices	Ports	SF90D-08: 8 RJ-45 connectors for 10BASE-T/100BASE-TX SF90D-16: 16 RJ-45 connectors for 10BASE-T/100BASE-TX SF90-24: 24 RJ-45 connectors for 10BASE-T/100BASE-TX SG90D-05: 5 RJ-45 connectors for 10BASE-T/100BASE-TX/1000BASE-T ports SG90D-08: 8 RJ-45 connectors for 10BASE-T/100BASE-TX/1000BASE-T ports All units: Automatic medium dependent interface (MDI) and MDI crossover	
Unshielded twisted pair (UTP) Category 5 or better for 10BASE-T/100BASE-TX; 1000BASE-T recommended	Cabling type		
EDs System/PWR, Link/Activity, 100M,* Gigabit,*	LEDs	System/PWR, Link/Activity, 100M,* Gigabit,*	

Feature	Description	
Standards	802.3 10BASE-T Ethernet 802.3u 100BASE-TX Fast Ethernet 802.3ab 1000BASE-T Gigabit Ethernet 802.3z Gigabit Ethernet 802.3x flow control 802.1p priority 802.3az, Energy Efficient Ethernet	
Environmental		
Dimensions W x H x D	SF90D-05: 4.33 x 1.8 x 2.95 inches (110 x 30 x 75 mm) SF90D-08: 6.2 x 1.18 x 3.5 inches (160 x 30 x 90 mm) SF90D-16: 6.2 x 1.71 x 3.5 inches (160 x 43.5 x 90 mm) SF90D-24: 11 x 1.75 x 6.7 inches (279.4 x 44.5 x 170 mm) SG90D-05: 4.33 x 1.18 x 3.93 inches (110 x 30 x 100mm) SG90D-08: 6.2 x 1.18 x 5.05 inches (160 x 30 x 128.5 mm) SG92-16: 11x 4.33x 1.02 inches (279.4 x 110 x 26 mm) SG92-24: 11x 4.33x 1.02 inches (279.4 x 110 x 26 mm)	
Unit weight	SF90D-05: 0.53 lb. (0.24kg) SF90D-08: 1.4 lb. (0.625kg) SF90D-16: 0.99 lb. (0.45kg) SF90-24: 2.8 lb. (1.27 kg) SG90D-05: 0.35 lb. (0.16 kg) SG90D-08: 0.46 lb. (0.21 kg) SG92-16: 1.71 lb. (0.78 kg) SG92-24: 3.14 lb. (1.425 kg)	
Power	SF90D-05: DC 12V, 500mA SF90D-08: DC 12V, 500mA SF90D-16, SG90D-08, SG90D-05: DC 12V, 1.0A SF90-24: 100–240VAC, 50–60 Hz, internal, universal SG92-16: 100–240VAC, 50–60 Hz, internal, universal SG92-24: 100–240VAC, 50–60 Hz, internal, universal	
Certifications	UL (UL 60950), CSA (CSA 22.2), CE mark, FCC Part 15 (CFR 47) Class A	
Operating temperature	32° to 104°F (0° to 40°C)	
Storage temperature	-4° to 158°F (-20° to 70°C)	
Operating humidity	10% to 90%, relative, non-condensing	
Storage humidity	10% to 90%, relative, non-condensing	
Package Contents		

Package Contents

- Cisco 90 Series Switch
- Power cord/power adapter
- Mounting hardware
- Quick-start guide

Minimum Requirements

- Category 5 Ethernet network cable
- TCP/IP, network adapter, and network operating system (such as Microsoft Windows, Linux, or Mac OS X) installed on each computer in the network

^{*}If present.

Ordering Information

Table 2 provides ordering information for the Cisco 90 Series Switches.

Table 2. Ordering Information

Product Order ID Number	Description
SF90D-05	5 10/100 ports
	Unmanaged desktop switch
SF90D-08	8 10/100 ports
	Unmanaged desktop switch
SF90D-16	16 10/100 ports
	Unmanaged desktop switch
SF90-24	24 10/100 ports
	Unmanaged rack-mount switch
SG90D-05	5 10/100/1000 ports
	Unmanaged Gigabit desktop switch
SG90D-08	8 10/100/1000 ports
	Unmanaged Gigabit desktop switch
SG92-16	16 Port Gigabit Desktop Switch
SG92-24	24-port Compact Gigabit Switch with 2 Combo Mini-GBIC Ports

High-Performance, Trouble-Free Switches for Your Business Network

Don't compromise on the performance and reliability of your computers, printers, and other vital network-connected resources. With Cisco 90 Series switches you can have the quality, peace of mind, and investment protection that comes with business-class Cisco networking, in a small business solution that works right out of the box.

For More Information

To find out more about Cisco 90 Series Unmanaged Switches, visit: www.cisco.com/go/90switches.



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