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Cisco 110 Series Unmanaged Switches

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

Highlights

- Affordable 10/100/1000-Mbps speeds for even the most bandwidth-hungry applications
- 5 to 24-port models that are desktop or rack mountable
- · Power over Ethernet models to provide power to IP phones, Access points, and other devices
- · Works right out of the box-plug-and-play and no set up

Product Overview

Give your office network a boost of speed and performance at a low price that takes almost no time to set up. Easily build a highly reliable network to connect your computers, printers, copiers, and other office equipment. 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 the Cisco 110 Series Unmanaged Switches. Users, workgroups, labs, departments, or growing offices can now deliver large amounts of multimedia, image, and video information across the network in no time at all.

Cisco 110 Series Unmanaged switches deliver basic network connectivity and reliability for small businesses that's easy on the budget and without all the 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 110 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), Loop Detection, and Cable Diagnostics—all in a switch that you can set up yourself, in minutes. A business-class, affordable network solution, Cisco 110 Series switches bring the proven reliability and investment protection of Cisco networking solutions to your small business.

Figure 1. Cisco 110 Series Unmanaged Switches



Features

Cisco 110 Series switches provide an easy-to-use solution for your small business network. They offer:

 Ease of use: Cisco 110 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 110 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 110 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 110 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 110 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. Most of the switches have no fans, so they run silently and unobtrusively while
 lowering energy costs.
- **Power-over-Ethernet:** Cisco 110 Series switches are available with PoE ports on both Fast Ethernet and Gigabit Ethernet models. This capability simplifies the deployment of IP telephony, wireless, video surveillance, and other solutions by allowing you to connect and power network endpoints over a single

Ethernet cable. With no need to install separate power supplies for IP phones or wireless access points, you can take advantage of advanced communications technologies more quickly, and at a lower cost.

- 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. Loop Detection helps discover loops in the network that you may have accidently created, thus avoiding broadcast storms that will bring your network to a stall. Cable Diagnostics help to quickly identify and troubleshoot network cabling faults and issues. 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 110 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. In addition, Limited Lifetime hardware warranty provides peace of mind.

Specifications

Table 1 lists the specifications, package contents, and minimum requirements for the Cisco 110 Series

Specifications	Description	
Standards	IEEE 802.3 10BASE-T Ethernet, IEEE 802.3u 100BASE-TX Fast Ethernet, IEEE 802.3ab 1000BASE-T Gigabit Ethernet, IEEE 802.3z Gigabit Ethernet, IEEE 802.3x Flow Control, 802.1p priority, Energy Efficient Ethernet, 802.3af , Power Over Ethernet	
Cabling type	Category 5e or better	
LED indicators	System/PWR, Link/Activity, 100M,* PoE, *Max PoE, Cable Diagnostics, Loop Detection, Gigabit,* mini- GBIC*	
	*if present	
Physical Interfaces		
Ports	10/100/1000 Ethernet, with support for 802.3af PoE, Power Port for AC adapter or Power cord	
Power Supply	SF110D-05, SF110D-08: DC 12V, 500mA	
	SF110D-16, SG110D-08, SG110D-05: DC 12V, 1.0A	
	SF110D-08HP, SG110D-8HP: DC 48V. 1.25A	
	SF110-16, SF110D-16HP, SF110-24, SF112-24, SG110-16, SG110-16HP, SG110-24, SG110-24HP, SG112-24: 110-240VAC, 50-60 Hz, internal, universal	
Lock slot	Slot for Kensington lock	
Physical Specifications		
Physical dimensions (W x D x H)	SF110D-05: 3.65 x 1.06 x 3.57 inches (92.6 x 27 x 90.6 mm)	
	SF110D-08: 5.12 x 1.06 x 5.12 inches (130 x 27 x 130 mm	
	SF110D-08HP: 6.29 x 1.18 x 5.05 inches (160 x 30 x 128.5 mm)	
	SF110D-16: 5.12 x 1.52 x 5.12 inches (130 x 38.5 x 130 mm)	
	SF110-16: 11 x 1.75 x 6.7 inches (279.4 x 44.5 x 170 mm)	
	SF110D-16HP: 6.29 x 3.54 x 1.69 inches (160 x 90 x 43 mm)	
	SF110-24: 11 x 1.75 x 6.7 inches (279.4 x 44.5 x 170 mm)	
	SF112-24: 17.35 x 1.74 x 7.99 inches (440.6 x 202.82 x 44.32 mm)	
	SG110D-05: 4.33 x 1.18 x 3.93 inches (110 x 30 x 110 mm)	
	SG110D-08: 5.51 x 1.31 x 5.51 inches (140 x 33.35 x 140 mm)	
	SG110D-08HP: 6.29 x 1.18 x 5.05 inches (160 x 30 x 128.5 mm)	
	SG110-16: 11 x 1.75 x 6.7 inches (279.4 x 44.5 x 170 mm)	
	SG110-16HP: 11 x 1.75 x 6.7 inches (279.4 x 44.5 x 170 mm)	

 Table 1.
 Specifications for the Cisco 110 Series Switches.

Specifications	Description			
	SG110-24: 17.35 x 1.74 x 7.99	inches (440.6 x 202.82 x 44.32 mm)	
	SG110-24HP: 17.35 x 1.74 x 7.99 inches (440.6 x 202.82 x 44.32 mm)			
	SG112-24: 11 x 1.75 x 6.7 inches (279.4 x 44.5 x 170 mm)			
Weight	SF110D-05: 0.47 lb. (0.22 kg)			
vveigiit	SF110D-08: 0.83 lb. (0.38 kg)			
	SF110D-08HP: 1.2 lb. (0.545 kg)			
	SF110D-16: 1.03 lb. (0.46 kg)			
	SF110-16: 2.79 lb. (1.25 kg)			
	SF110D-16HP: 0.99 lb. (0.45 kg)			
	SF110-24: 2.91 lb. (1.32 kg)			
	SF112-24: 4.93 lb. (2.00 kg)			
	SG110D-05: 0.70 lb. (0.32 kg)			
	SG110D-08: 0.94 lb. (0.43 kg)			
	SG110D-08HP: 1.2 lb. (0.55 kg)			
		SG110-16: 3.15 lb. (2.13 kg)		
	SG110-16HP: 4.15 lb. (1.43 kg)			
	SG110-24HP: 4.59 lb. (2.43 kg)	SG110-24: 3.59 lb. (1.63 kg)		
	SG112-24: 5.05 lb. (2.3 kg)			
- .	SF110D-05: 5 RJ-45 connector	s for 10BASE-T/100BASE-TX		
Ports	SF110D-08: 8 RJ-45 connector			
		SF110D-08HP: 8 RJ-45 connectors for 10BASE-T/100BASE-TX; SF110D-16: 16 RJ-45 connectors for 10BASE-T/100BASE-TX		
	SF110D-16HP: 16 RJ-45 connectors for 10BASE-T/100BASE-TX			
		SF110-16: 16 RJ-45 connectors for 10BASE-T/100BASE-TX		
	SF110-24: 24 RJ-45 connectors for 10BASE-T/100BASE-TX			
	SF112-24: 24 RJ-45 connectors for 10BASE-T/100BASE-TX; with 2 combo mini-GBIC slots			
	SG110D-08: 8 RJ-45 connectors for 10BASE-T/100BASE-TX/1000BASE-T ports			
	SG110D-08HP: 8 RJ-45 connectors for 10BASE-T/100BASE-TX/100BASE-T ports			
		SG110-16: 16 RJ-45 connectors for 10BASE-T/100BASE-TX/1000BASE-T ports		
	SG110-16HP: 16 RJ-45 connectors for 10BASE-T/100BASE-TX/1000BASE-T ports			
	SG110-24: 24 RJ-45 connectors for 10BASE-T/100BASE-TX/1000BASE-T ports with 2 combo mini-GBIC slots			
	SG110-24HP: 24 RJ-45 connectors for 10BASE-T/100BASE-TX/1000BASE-T ports with 2 combo mini- GBIC slots			
	SG112-24: 24 RJ-45 connectors for 10BASE-T/100BASE-TX/1000BASE-T ports with 2 combo mini-GBIC slots			
	All units: Automatic medium dep connecting 10-, 100-, 1000- Mbp		ossover (MDI-X); auto negotiated port for	
Power over Ethernet (PoE)	Model Name	Power Dedicated to PoE	Number of PoE Ports	
	SF110D-08HP	32 Watts	4	
	SF110D-16HP	64 Watts	8	
	SG110D-08HP	32 Watts	4	
	SG110-16HP	64 Watts	8	
	SG110-24HP	100 Watts	12	
Fan/Fan-less Models	All models have no fans and are	e fan-less, except for SG100-24HP		
Performance				
Switching capacity	SF110D-05: 1 Gbps			
	SF110D-08: 1.6 Gbps			
	SF110D-08HP: 1.6 Gbps			
	SF110D-16: 3.2 Gbps			
	SF110-16: 3.2 Gbps			
	SF110D-16HP: 3.2 Gbps			

Specifications	Description	
	SF110-24: 4.8 Gbps	
	SF112-24: 8.8 Gbps	
	SG110D-05: 10 Gbps	
	SG110D-08: 16 Gbps	
	SG110D-08HP: 16 Gbps	
	SG110-16: 32 Gbps	
	SG110-16HP: 32 Gbps	
	SG110-24: 48 Gbps	
	SG110-24HP: 48 Gbps	
	SG112-24: 48 Gbps	
Forwarding capacity	Forwarding rate in million packets per second (mpps) (based on 64-byte packets):	
	SF110D-05: 0.74 mpps	
	SF110D-08: 1.4. mpps	
	S110D-08HP: 1.2 mpps	
	SF110D-16: 1.4 mpps	
	SF110-16: 1.4 mpps	
	SF110D-16HP: 1.4 mpps	
	SF110-24: 3.6 mpps	
	SF112-24: 6.5 mpps	
	SG110D-05: 7.4 mpps	
	SG110D-08: 11.9 mpps	
	SG110D-08HP: 11.9 mpps SG110-16: 23.8 mpps	
	SG110-16HP: 23.8 mpps SG110-24: 35.7 mpps	
	SG110-24HP: 35.7 mpps	
	SG112-24: 35.7 mpps	
Capabilities		
Head-of-line (HOL) blocking	HOL blocking prevention	
Jumbo Frame		
	9216 bytes	
Quality of Service (QoS)	802.1p priority based, 4 hardware queues, priority queuing and weighted round-robin (WRR)	
Loop Detection	Helps discover loops in the network to avoid broadcast storms	
Cable Diagnostics	Quickly identify and troubleshoot network cable faults and/or shorts	
Mounting and Physical Security		
Mounting options	Desktop or rack mount	
Physical security lock	Kensington lock slot	
Environmental		
Compliance/Certifications	UL (UL 60950), CSA (CSA 22.2), CE mark, FCC Part 15 (CFR 47) Class A, FCC Class B* *select models	
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	5% to 90%, relative, non-condensing	
System memory	128-MB RAM 128-MB Flash	
Package Contents		
Cisco 110 Series Switch		
 Cisco 110 Series Switch Power cord/power adapter 		

Specifications	Description	
Quick-start guide		
Mounting hardware		
Minimum Requirements		
 Devices Supporting 802.3 Ethernet, 802.u Faster Ethernet, or 802.3ab Gigabit Ethernet Cat5 or better Ethernet Cable Network Interface Card for each computer 		
Warranty		
Cisco 110 Series Switch	Limited lifetime	

Ordering Information

Table 2 gives ordering information for the Cisco 110 Series Unmanaged Switches

Part Number	Description
SF110D-05	Cisco SF110D-05 - 5-Port 10/100 Desktop Switch
SF110D-08	Cisco SF110D-08 8-port 10/100 Desktop Switch
SF110D-08HP	Cisco SF110D-08P 8-port 10/100 PoE Desktop Switch
SF110D-16	Cisco SF110D-16 16-port 10/100 Desktop Switch
SF110D-16HP	Cisco SF110D-16P 16-port 10/100 PoE Desktop Switch
SF110-16	Cisco SF110-16 16-Port 10/100 Switch
SF110-24	Cisco SF110-24 24-Port 10/100 Switch
SF112-24	Cisco SF112-24 24-port 10/100 + 2 Mini-GBIC & 2 GE Uplink
SG110D-05	Cisco SG110D-05 5-port Gigabit Desktop Switch
SG110D-08	Cisco SG110D-08 8-Port Gigabit Switch
SG110D-08HP	Cisco SG110D-08P 8-Port Gigabit PoE Switch
SG110-16	Cisco SG110-16 16-Port Gigabit Switch
SG110-16HP	Cisco SG110-16HP 16-Port PoE Gigabit Switch
SG112-24	Cisco SG112-24 COMPACT 24-port Gig Switch-2 Mini-GBIC Ports
SG110-24	Cisco SG110-24 24-port Gigabit Switch + 2 Mini GBIC Ports 1U
SG110-24HP	Cisco SG110-24HP 24-Port PoE Gigabit Switch

Table 2. Ordering Information for Cisco 110 Series Unmanaged Switches

Cisco Limited Lifetime Warranty for Cisco Small Business Products

This Cisco Small Business product comes with a limited lifetime hardware warranty. Product warranty terms and other information applicable to Cisco products are available at <u>http://www.cisco.com/go/warranty</u>.

Services for Small Business

Reduce downtime with fast, expert technical support and flexible hardware coverage. Cisco Services improve network availability and help you get the most value from your Cisco products. Service plans for your Cisco Small Business products provide more support than a product warranty. A warranty protects you against product defects,

and a majority of support calls are unrelated to faulty materials or manufacturing. Most callers ask about product features, technical problems, or how to expand their network.

Cisco offers an unlimited number of calls and no restrictions on call duration, so you can get the help you need, and the most from your Cisco product.

For more information on Cisco Services, see http://www.cisco.com/go/sbs.

For More Information

For more information on Cisco Small Business products and solutions, visit <u>http://www.cisco.com/smallbusiness</u> or <u>http://www.cisco.com/go/110Switches</u>



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Printed in USA