

# Quick Start Guide

S2700, S3700, S5700, and S6700 Series Switches

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# **1 About This Guide**

Thank you for purchasing a Huawei S series switch. This quide describes how to install S2700, S3700, S5700, and S6700 series switches. It also explains how to log in to your switch for the first time.

- The installation, cable connection, and login methods for most S series switches are similar. This guide uses the S5700-24TP-SI-AC as an example.
- Figures in the document are for reference only and may be different from actual devices.
- Any procedural differences between models are specified at the start of each section.

For more information, see the Hardware Installation and Maintenance Guide for your switch on the Huawei support website.

## 2 Packing List

- Chassis (with the product model on the nameplate) Installation accessory package:
- Power cable (Power cables are delivered with the switch if the switch is equipped with built-in power supply or pluggable power modules, and are delivered with power modules in other cases.)
- - Ouick Start Guide
  - Rubber pads

- Dust plugs

- Chassis ground cable
- Screws

#### NOTE

- The numbers and types of items in the installation accessory package differ for different product models.
- Some switches have dust plugs delivered with them. Keep the dust plugs properly and use them to protect idle optical ports.

# **3 Safety Guidelines**

- To ensure personal and equipment safety, observe all the safety precautions on the equipment and in this document. WARNING and CAUTION items do not cover all the safety precautions and are only supplementary to the safety precautions.
- Follow all the safety precautions and instructions provided by Huawei. The safety precautions outlined in this document are only requirements of Huawei and do not include general safety requirements. Huawei is not liable for any consequence that results from violation of regulations pertaining to safe operations or safety codes pertaining to design, production, and equipment use.

## A WARNING

- Laser beams will cause eye damage. Do not look into bores of optical modules or optical fibers without eye protection.
- Do not install power cables while the power is on.
- Do not turn on the power until you have finished installing the chassis and connecting cables.

#### CAUTION

- This is a class A product. In a domestic environment this product may cause radio interference in which case the user may be required to take adequate measures.
- Take ESD protection measures during equipment installation and maintenance. For example, wear ESD gloves or an ESD wrist strap.
- Do not place other objects on the chassis.

- Warranty Card
- Mounting brackets

## **4 Site Environment**

- Do not place this product in an environment with flammable or explosive gases, or smoke.
- The installation site must be free from leaking or dripping water, heavy dew, and humidity. If the relative humidity is high, use dehumidifiers or dehumidifying air conditioners.
- The installation site must be well ventilated. Ensure that air vents on the equipment are not blocked.
- Do not install the equipment in a dusty environment.
- Grounding the switch helps protect it from lightning, electromagnetic interference, and electrostatic discharge, and is the prerequisite for a PoE switch to provide power for a PD.For switch models with the ground point at the left or right side of the chassis, connect the ground cable before mounting the switch in the cabinet or rack.
- Leave at least 50 mm clearance at the rear and both sides of the chassis for heat dissipation.
- S series switches use forced, intelligent, or natural heat dissipation mode. If multiple switches are installed in a cabinet/rack, leave at least 1 U (44.45 mm) distance between each two switches. This distance is recommended for switches using forced or intelligent heat dissipation, and is required for switches using natural heat dissipation.
- Ensure that the temperature and humidity at the installation site meet the switch operation requirements. For the specific requirements, see the *Hardware Description* for your switch on the Huawei support website.
- Ethernet cables used outdoors must be buried underground or routed through steel pipes to protect the switch from lightening. Do not route Ethernet cables overhead.
- To protect network ports from lightning, use 8-line surge protectors or Huawei certified 4-line surge protectors. When installing a network port surge protector, connect the IN ports to network devices and connect the OUT ports to network ports of the switch.

# 5 Installing the Chassis

#### Scenario 1: Desk Mounting

#### Before You Start

- S5710-HI, S6700-EI and S6720-HI series switches cannot be desk mounted.
- Do not stack fanless switches on top of or closely next to each other.
- Some switch models provide a security slot ( ) near the panel on a side of the chassis. You can install a security lock (separately purchased) in this slot to protect the switch against theft.

#### Installation Procedure

- Step 1 Attach four rubber pads to the bottom.
- Step 2 Place the chassis on a desk.
- Step 3 (Optional) Install a security lock.
- Step 4 Connect the ground cable to the ground point.

#### Scenario 2: Wall Mounting

## Before You Start

Before drilling holes in a wall, make sure there are no power cables in the wall to avoid electric shock.

- For a wall-mounted switch, take water-proofing and dust-proofing measures to protect the switch from damage caused by water and dust.
- The S5720-16X-PWH-LI-AC, S6720S-S, and S6730 (220-mm deep models) need to be installed with the port side facing up.
- Ensure that there are no flammable or explosive materials near the switch and no obstructions within 100 mm around the switch.
- S3700-HI, S5700-HI, S6720S-EI, and other 420 mm or deeper switches cannot be wall mounted.
- The expansion bolts need to be purchased separately.

#### Installation Procedure

Step 1 Use M4 screws to fix the mounting brackets on both sides close to the port side.



- Step 2 Use a hammer drill with  $\phi 8$  drill bit to drill holes on the wall, and fix the switch on the wall with expansion bolts.
- Step 3 Connect the ground cable to the ground point.



#### Scenario 3: Top Wall Mounting

#### Before You Start

- Before drilling holes in a wall, make sure there are no power cables in the wall to avoid electric shock.
- Only the S5720-16X-PWH-LI-AC can be installed on the top wall.
- Expansion bolts and top-mounting brackets must be self-provided. Installation Procedure
- Step 1 Mark the positions to drill holes according to the switch's size and positions of top-mounting brackets.
- Step 2 Use M4 screws to attach two top-mounting brackets to the switch.
- **Step 3** Use a hammer drill (with φ8 drill bit) to drill holes, and use expansion bolts to secure the switch on the top wall.
- Step 4 Connect the ground cable to the ground point.



#### Scenario 4: Cabinet/Rack Mounting

#### Before You Start

- S series Ethernet switches can be installed in a 19-inch standard cabinet/rack. Cabinets purchased from other vendors must have enough space for equipment installation.
- If the distance between front and rear mounting rails is not within the required range, install guide rails or a tray in the cabinet/rack to support the chassis. Guide rails or trays are not delivered with the product and must be purchased separately.
- When a chassis uses Category-6 or higher Ethernet cables, the distance between the port side and interior side of the cabinet door must be larger than or equal to 120 mm.
- Switches cannot be installed in a 600 mm deep cabinet when they are equipped with 1150 W PoE power modules.
- To install a 250 mm wide switch in a 19-inch cabinet, purchase long mounting brackets.
- For the 220 mm deep models of the S2700 and S3700 series, and the S5700-24TP-SI-AC/DC, each mounting bracket needs to be fixed on the chassis with only two screws.
- The floating nuts and M6 screws are not delivered with the switch and need to be separately purchased if needed.
- S6700-EI chassis is heavy, so it is recommended that you install guide rails (separately purchased) in the cabinet to support the chassis.

#### Installation Procedure

Step 1 Connect the ground cable to the switch.

Step 2 Use M4 screws to attach a mounting bracket delivered with the switch to each side of the switch. Determine the mounting method according to the brackets delivered with your switch.



#### S5710-HI

- Ensure a distance of 418–528 mm or 545–655 mm between the front and rear mounting rails.
- Cable management frames are recommended when many cables are used.
- Leave 2 U between the floating nuts on each front mounting rail, and 1 U between those on the rear rails. Ensure the lower floating nut on each mounting rail is level with those on the other mounting rails.



S5710-EI S5720-C-EI S5720-PC-EI S5720-SI (420 mm depth) S5720-HI S5730-HI S5730-SI S5730S-EI S6720-SI S6720-SI S6720-EI S6735-S

• Ensure a distance of 335-442 mm or 460-570 mm between the front and rear mounting rails.

• Leave 1 U between the floating nuts on each front mounting rail, and 1 U between those on the rear rails. Ensure the lower floating nut on each mounting rail is level with those on the other mounting rails.



S5731-H S5731-S(420 mm depth) S5731S-S(420 mm depth) S5731S-H S5732-H S5735-L (420 mm depth) S5735S-L (420 mm depth) S5735-S S5735S-H S5736-S (420 mm depth) S6720-HI S6730-H (420 mm depth) S6730S-H S6730-S S6730S-S S6730-H-V2

- Ensure a distance of 310-351 mm, 369-410 mm, 438-479 mm, or 497-538 mm between the front and rear mounting rails.
- Leave 1 U between the floating nuts on each front mounting rail, and 1 U between those on the rear rails.

Ensure the lower floating nut on each mounting rail is level with those on the other mounting rails.



Step 3 Install four floating nuts on the front mounting rails, two on each side.

Step 4 Hold bottom of the chassis and push the chassis into the cabinet.

Step 5 Use M6 screws to secure the chassis onto the cabinet/rack.

Step 6 Connect the ground cable to the ground point on the cabinet.



# 6 Installing a Power Module

- The installation methods for different power modules are the same.
- For information about the power module supported by your model, see *Power Module* in the *Hardware Description* of your switch on the Huawei support website.
- All the power modules are hot swappable (except the 870 W PoE power module).
- When installing a power module, slowly push it into the slot. If you feel resistance or find the module inclined, pull the module out and push it into the slot again. Do not push the module with force; otherwise, the connectors on the module and backplane may be damaged.
- If only one power module is installed, install a power module filler panel in the empty power module slot.
- It is recommended that you install two power modules in a switch to enhance power reliability if the switch supports double power modules.

# 7 Installing Cards

#### Before You Start

- The installation methods for different pluggable cards are the same.
- For information about the cards supported by your model, see *Cards* in the *Hardware Description* of your switch on the Huawei support website.
- Only switch models S5700-SI, S5710-LI, and S5700-EI do not support hot swappable cards.
- Cards that do not support hot swappable cannot be installed when the switch is running. You must power off the switch, install the cards, and then power on the switch to activate the cards.
- To use a front 4xGE or 4x10GE optical interface card on the S5700-SI, S5710-LI and S5700-EI, you must also install an extended rear card ES5D00ETPB00. Otherwise, only two ports instead of four ports on this optical interface card are available.
- When installing a card, slowly push it into the slot. If you feel resistance or find the card inclined, pull the card out and push it into the slot again. Do not push the card with force; otherwise, the connectors on the card and backplane may be damaged.
- Install filler panels in vacant slots.

#### Installation Procedure

- Step 1 Use a Phillips screwdriver to loosen the captive screw on the filler panel.
- Step 2 Pull the filler panel out by the captive screw. Keep the filler panel for future use.
- Step 3 Turn the ejector lever of the card 45 degrees outward. Push the card into the chassis with your thumbs (below the captive screws), until the screw on the front panel is completely in the chassis. Front cards for the S3700-HI, S5700-HI, and S5710-HI have no screws, but the installation method is the same.

**Step 4** Rotate the ejector lever inward to lock the card after the screw is completely in the chassis. **Step 5** Use the Phillips screwdriver to fasten the captive screws.



# 8 Connecting Cables

#### Before You Start

Ethernet cable

#### CAUTION

Choose an Ethernet cable for an electrical port depending on the port speed required:

- 2.5 Gbit/s: Ethernet cable of Cat5e or higher category
- 5 Gbit/s: shielded cable of Cat5e or higher category (unshielded cable not recommended)
- 10 Gbit/s: shielded cable of Cat6a or higher category
- Ground cable
- The switch must be reliably grounded.
- Attach the M4 lug to the switch and the M6 lug to the ground point.
- Optical fiber
- Optical fibers must be used with optical modules.
- The bend radius of optical fibers must be larger than 40 mm.
- Power cable
- Power cables must be more than 10 cm away from signal cables.
- If your switch uses AC power supply, use AC power cables in compliance with local standards.
- If your switch uses DC power supply, ensure that the positive and negative cables are connected to the positive and negative poles correctly.
- Some models provide a Mini USB port to connect to a console for onsite configuration. The Mini USB port and console port cannot be used together. Select either of them according to your needs. When both the two ports are connected, only the Mini USB port is active.

#### **Connecting Cables**



No.	ltem	Connect To	No.	ltem	Connect To
1	Ground cable	Protection ground	4	Optical fiber	Upstream network device
2	AC power cable	External power source	5	Console cable	Operation terminal (usually a PC)
3	Ethernet cable	Switch or PC	6	Ethernet cable	Operation terminal (usually a PC)
4	Ethernet cable	Upstream network device	7	USB port	USB flash drive

## 9 Logging In to the Switch for the First Time

## 9.1 Using the Web System for the First Login

#### Before You Start

- You can directly connect the PC to the ETH management interface or press and hold down the MODE button to log in to the device through the web system for the first time:
- For a device with the ETH management interface, you can directly connect the PC to the ETH management interface to log in to the device through the web system for the first time.
- For a device with the MODE button, you can press and hold down the MODE button to log in to the device through the web system for the first time.
- The following series switches (running V200R012C00 or a later version) support first login through the web system by directly connecting the PC to the ETH management interface: S5700S-X-LI, S5710-X-LI, S5720-SI, S5720S-SI, S5720-EI (only the models with the ETH interface), S5720-HI, S5730, S5730S, S5731, S5731S, S5732, S5735 (only the models with the ETH interface), S5735S (only the models with the ETH interface), S5736, S6720, S6720S, S6730 except (S6730-H-V2), and S6730S.
- The following series switches support first login through the web system by pressing and holding down the MODE button:

S2720, S2750, S2730S, S5700-LI, S5700S-LI, S5720-LI, S5720S-LI, S5710-X-LI, S5720-SI, S5720S-SI, S5720-EI (only the models with the MODE button), S5720-HI, S5730, S5730S, S5731 (only the models with the MODE button), S5731S (only the models with the MODE button), S5735, S57356, S6720 (only the models with the MODE button), S6720S (only the models with the MODE button), and S6730 (only the models with the MODE button).

- To support this function, the S2750, S5700-LI, S5700S-LI, and S5720-HI must run V200R007C00 or a later version.
- The following series switches do not support first login using the web system: S2700-SI, S2700-EI, S2710-SI, S3700, S5710-C-LI, S5700-SI, S5700-EI, S5710-EI, S5700-HI, S6700-EI, S6730-H-V2, and S5720-EI that does not provide a MODE button (S5720-50X-EI-AC, S5720-50X-EI-DC, S5720-50X-EI-46S-AC, S5720-50X-EI-46S-DC)
- You can use console ports to log in to the switches that do not support first login using the web system for the first time. For details, see 9.2 Using the Console Port for the First Login.
- If the web pages cannot be displayed normally, your web browser may need an upgrade. For details about the web browser requirements, see the Web-based Configuration Guide of the switch. The login page may differ slightly in different versions.

#### Login Procedure

Step 1 Connect a PC to the device and the device enters the initial configuration mode.

(Mode 1) Directly connect the PC to the ETH management interface to log in to the device for the first time. The default IP address of the ETH management interface on a device is 192.168.1.253/24. Directly connect the PC to the ETH management interface on the device using network cables. (Mode 2) Hold down the MODE button to log in to the device for the first time.

- If all interfaces on the device are optical interfaces, you need to connect the PC to the management interface using network cables. Press and hold down the MODE button for 6 seconds or longer. When all indicators on the device are steady green, the device enters the initial configuration mode, and the default IP address configured for the ETH management interface of the device is 192.168.1.253/24.
- If the device has Ethernet interfaces, connect the PC to any Ethernet interface excluding the ETH management interface using network cables. Press and hold down the MODE button for 6 seconds or longer. When all indicators on the device are steady green, the device enters the initial configuration mode, and the default IP address configured for Vlanif1 of the device is 192.168.1.253/24.

## 

- Users can log in to a device for the first time using the web system only when the device is in factory default state. In this case, do not log in to the device through the console interface, because any operation on the console interface leads to the failure of the first login using the web system.
- If you do not save the configuration in 10 minutes after entering the initial configuration mode, the system will exit from this mode and restore the factory settings.
- If the device in the factory settings has just started or has been configured through the console interface when users press and hold down the MODE button for 6 seconds, the device may fail to enter the initial configuration state. When all indicators blink fast for 10s, the device restores to the factory default state.
- If you have logged in to the device for the first time by holding down the MODE button for 6 seconds or longer
  and saved the configuration, default configurations of the ETH management interface are cleared and you cannot
  log in to the device for the first time through the ETH management interface. You are advised to preferentially log
  in to the device for the first time through the ETH management interface.
- Step 2 Configure an IP address for the computer, which is in the same network segment as the default IP address of the switch.
- Step 3 Start the web browser on the computer, enter https://192.168.1.253 in the address box, and press
   Enter to display the initial login page. The default username and password are available in S Series
   Switches Default Usernames and Passwords. If you have not obtained the access permission of the document, see Help on the website to find out how to obtain it.



## NOTE

In V200R020C00 and later versions, the switch does not have a default web login password. You need to create a user name and set a password when logging in to the web system for the first time.

Step 4 Configure the switch. The web-based configuration page provides basic and optional configuration items. The basic configuration enables you to log in to the switch using the web system, and the optional configuration enables you to log in to the switch using Telnet or STelnet. Only parameters for the basic configuration are described below. For details about the optional configuration and more information about the product, see the *Configuration Guide* for your switch on the Huawei support website.

Configuration Item	Description			
Management IP Address	Mandatory. Enter the management IP address of the switch, in dotted decimal notation.			
Mask	Mandatory. Select a subnet mask from the drop-down list box.			
Old Password	Mandatory. Enter the old password for the default web user.			
WEB User Password	Mandatory. Enter a new password for the default web user.			
	To ensure password strength, the password must contain at least two types of the following:			
	lowercase letters, uppercase letters, digits, and special characters (such as ! \$ # %), and			
	cannot contain any space or single quotation mark.			
Confirm Password	Mandatory. Enter the new password again.			
WEB User Level	Optional. Select a user level from the drop-down list box. The user of level 3 or higher			
	has management rights.			

- **Step 5** Click **Apply** to save the configuration. When you exit from the initial login page, either of the following situations will occur depending on the management IP address you configured:
  - If the management IP address is in the same network segment as 192.168.1.253/24, the system jumps to the web login page directly.
  - If the management IP address is not in the same network segment as 192.168.1.253/24, you cannot log in to the switch again using the web system. You need to configure another IP address for your computer to make the computer and switch reachable from each other.

The Quick Config function has been added to the web EasyOperation edition since V200R010. You can quickly finish the configurations of VLAN isolation and interconnection by selecting the Switching and Routing options.



Now, you can log in to the switch using the web system, Telnet, or STelnet to maintain the switch.

#### 9.2 Using the Console Port for the First Login

## Before You Start

- The S5700-LI, S5700S-LI, S5710-EI, S5720-EI and S5720-HI series switches also support login through the Mini USB port. For details about this login method, see the *Configuration Guide* of the product. This document describes how to log in to the switch through the console port.
- In the S5720-EI series, the S5720-50X-EI-AC, S5720-50X-EI-DC, S5720-50X-EI-46S-AC and S5720-50X-EI-46S-DC models do not have a Mini USB port.
- The console cable is not delivered with the switch and needs to be separately purchased if needed.
- The display information may differ on different product models.
- Install third-party terminal simulation software on the PC by referring to user manual or online help.

## Login Procedure

- Step 1 Use a console cable to connect the switch to a PC.
- Step 2 Start the terminal simulation software, create a connection, select a serial port, and set communication parameters in consistent with the default configuration of the switch's console port, as listed below:
  - Transmission rate: 9600
  - Data bit (B): 8

- Parity bit: None
- Stop bit (S): 1
- Flow control mode: None
- Step 3 Press Enter in subsequent steps until the following information is displayed on the terminal simulation software, and then enter a password. The default username and password are available in S Series Switches Default Usernames and Passwords. If you have not obtained the access permission of the document, see Help on the website to find out how to obtain it. Login authentication

Username:admin Password Warning: The default password poses security risks. The password needs to be changed. Change now? [Y/N]: y Please enter old password: Please enter new password: Please confirm new password: The password has been changed successfully <HUAWEI>

## NOTE

In V200R020C00 and later versions, the switch does not have a default console port login password. You need to set a password when you log in to the switch through the console port for the first time.

- The password entered in interactive mode is not displayed on the screen.
- If you do not change the authentication mode and password after entering the user view, the authentication password used for next login is the one configured during the first login.

You can run commands to configure the device. Enter a guestion mark (?) whenever you need help. For more information, see the *Configuration Guide* for your switch on the Huawei support website.

# 10 Obtaining Product Documentation and Technical Support

- Log in to Huawei enterprise technical support website (https://support.huawei.com/enterprise), and select a specific product model and version to find its documentation.
  - (https://forum.huawei.com/enterprise/en/index.html) and post your questions in the

Huawei Enterprise Technical Support

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Supplier's Declaration of Conformity (SDoC) Unique Identifier: trade name: HUAWEI: product name: Switch: model number: S2700&3700&5700&6700 series switches

Responsible Party- U.S. Contact Information Huawei Technologies USA Inc. 5700 Tennyson Parkway, Suite 500 Plano, Texas 75024 Main: 214-919-6000 / TAC Hotline: 877-448-2934

FCC Compliance Statement ( for products subject to Part 15)

This device complies with part 15 of the FCC Rules. Operation is subject to the following two conditions: (1) This device may not cause harmful interference, and (2) this device must accept any interference received, including interference that may cause undesired operation.

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