



Safety Guidelines and Warnings

Before you perform any task in this publication, you must review the safety guidelines in this section to avoid injuring yourself or damaging the equipment. Note that this section contains guidelines, and does not include every potentially hazardous situation. During any installation procedure, always use caution and common sense.

Review the complete list of safety warnings available at *Regulatory Compliance and Safety Information - Cisco Network Convergence System 1010*.

- [Standard Warning Statements, on page 1](#)
- [General Safety Guidelines for Personal Safety and Equipment Protection, on page 4](#)
- [Safety Precaution for Module Installation and Removal, on page 4](#)
- [Safety with Electricity, on page 4](#)
- [Power Connection Guidelines , on page 5](#)
- [Safety Precaution for Energy Hazard, on page 5](#)
- [Safety Precaution for Laser Radiation, on page 6](#)
- [Prevent Electrostatic Discharge Damage , on page 7](#)
- [NEBS Regulatory Compliance Statements, on page 7](#)

Standard Warning Statements



Warning IMPORTANT SAFETY INSTRUCTIONS

Before you work on any equipment, be aware of the hazards involved with electrical circuitry and be familiar with standard practices for preventing accidents. Read the installation instructions before using, installing, or connecting the system to the power source. Use the statement number provided at the end of each warning statement to locate its translation in the translated safety warnings for this device. Statement 1071

SAVE THESE INSTRUCTIONS





Warning When installing the product, use the provided or designated connection cables, power cables, AC adapters, and batteries. Using any other cables or adapters could cause a malfunction or a fire. Electrical Appliance and Material Safety Law prohibits the use of UL-certified cables (that have the "UL" or "CSA" shown on the cord), not regulated with the subject law by showing "PSE" on the cord, for any other electrical devices than products designated by Cisco. Statement 371



Warning You are strongly advised to read the safety instruction before using the product.

<https://www.cisco.com/web/JP/techdoc/pldoc/pldoc.html>

When installing the product, use the provided or designated connection cables/power cables/AC adapters.

〈製品仕様における安全上の注意〉
www.cisco.com/web/JP/techdoc/index.html

接続ケーブル、電源コードセット、ACアダプタ、バッテリーなどの部品は、必ず添付品または指定品をご使用ください。添付品・指定品以外をご使用になると故障や動作不良、火災の原因となります。また、電源コードセットは弊社が指定する製品以外の電気機器には使用できないためご注意ください。

Statement 407



Warning Read the installation instructions before using, installing, or connecting the system to the power source. Statement 1004



Warning Battery Handling:

To reduce risk of fire, explosion, or leakage of flammable liquid or gas:

- Replace the battery only with the same or equivalent type recommended by the manufacturer.
- Do not dismantle, crush, puncture, use a sharp tool to remove, short the external contacts, or dispose of the battery in fire.
- Do not use if battery is warped or swollen.
- Do not store or use battery in a temperature > 70° Celsius.
- Do not store or use battery in low air pressure environment < 10.1 PSIA.

Statement 1015



Warning Blank faceplates and cover panels serve three important functions: they reduce the risk of electric shock and fire, they contain electromagnetic interference (EMI) that might disrupt other equipment, and they direct the flow of cooling air through the chassis. Do not operate the system unless all cards, faceplates, front covers, and rear covers are in place. Statement 1029



Warning Only trained and qualified personnel should be allowed to install, replace, or service this equipment. Statement 1030



Warning Ultimate disposal of this product should be handled according to all national laws and regulations. Statement 1040



Warning There are no serviceable parts inside. To avoid risk of electric shock, do not open. Statement 1073



Warning To reduce risk of electric shock or fire, installation of the equipment must comply with local and national electrical codes. Statement 1074



Warning An instructed person is someone who has been instructed and trained by a skilled person and takes the necessary precautions when working with equipment. Statement 1089

A skilled person or qualified personnel is someone who has training or experience in the equipment technology and understands potential hazards when working with equipment. Statement 1089



Warning Only a skilled person should be allowed to install, replace, or service this equipment. See statement 1089 for the definition of a skilled person. Statement 1090



Warning Only an instructed person or skilled person should be allowed to install, replace, or service this equipment. See statement 1089 for the definition of an instructed or skilled person. Statement 1091



Note For more information on all the applicable statements and their translations, see *Regulatory Compliance and Safety Information - Cisco Network Convergence System 1010*.

General Safety Guidelines for Personal Safety and Equipment Protection

- To prevent bodily injury when mounting or servicing this unit in a rack, you must take special precautions to ensure that the system remains stable. The following guidelines are provided to ensure your safety:
 - This unit should be mounted at the bottom of the rack if it is the only unit in the rack.
 - When mounting this unit in a partially filled rack, load the rack from the bottom to the top with the heaviest component at the bottom of the rack.
 - If the rack is provided with stabilizing devices, install the stabilizers before mounting or servicing the unit in the rack.
- To reduce risk of electric shock and fire, take care when connecting units to the supply circuit so that wiring is not overloaded.
- Two persons are required to lift the heavy parts of the product. To prevent injury, keep your back straight and lift with your legs, not your back.
- To reduce the risk of fire or bodily injury, do not operate the unit in an area that exceeds the maximum recommended ambient temperature of 104F or 40C.
- The rack stabilizing mechanism must be in place, or the rack must be bolted to the floor before installation or servicing. Failure to stabilize the rack can cause bodily injury.
- To reduce the risk of bodily injury, the chassis should be mounted on a rack that is permanently affixed to the building.

Safety Precaution for Module Installation and Removal

Ensure to observe the following safety precautions when you are working with the chassis modules.



Warning Invisible laser radiations present. Statement 1016



Warning Invisible laser radiation may be emitted from disconnected fibers or connectors. Do not stare into beams or view directly with optical instruments. Statement 1051

Safety with Electricity



Warning To reduce risk of electric shock or fire, installation of the equipment must comply with local and national electrical codes. Statement 1074

**Warning**

To reduce risk of fire, explosion, or leakage of flammable liquid or gas:

- Replace the battery only with the same or equivalent type recommended by the manufacturer.
- Do not dismantle, crush, puncture, use a sharp tool to remove, short the external contacts, or dispose of the battery in fire.
- Do not use if battery is warped or swollen.
- Do not store or use battery in a temperature > 70° Celsius.
- Do not store or use battery in low air pressure environment < 10.1 PSIA.

Statement 1015.

Power Connection Guidelines

Check the power at your site to ensure you are receiving clean power (free of spikes and noise).

Ensure to observe the following safety guidelines while connecting the device power supplies.

**Warning**

Never defeat the ground conductor or operate the equipment in the absence of a suitably installed ground conductor. Contact the appropriate electrical inspection authority or an electrician if you are uncertain that suitable grounding is available. Statement 1024

**Warning**

Use copper conductors only. Statement 1025

**Warning**

This product requires short-circuit (overcurrent) protection, to be provided as part of the building installation. Install only in accordance with national and local wiring regulations. Statement 1045

Safety Precaution for Energy Hazard

**Warning**

Do not reach into a vacant slot when installing or removing a module. Exposed circuitry is an energy hazard. Statement 206

Cisco NCS 1010 can be configured for a DC power source. Do not touch terminals with body parts or conductive objects while they are energized.

Safety Precaution for Laser Radiation

Cisco NCS 1010 is classified as Hazard Level 1M as per IEC 60825-2 and Laser Class 1/1M as per IEC 60825-1, since it may include Class 1 or Class 1M Laser sources.

Figure 1: Class 1M Laser Product Label



Figure 2: Class 1M Laser Product Label



Warning

Complies with 21 CFR 1040.10 and 1040.11 except for conformance with IEC 60825-1 Ed. 3., as described in Laser Notice No. 56, dated May 8, 2019.

Conforme à la norme 21 CFR 1040.10 et 1040.11, sauf conformité avec la norme IEC 60825-1 Ed. 3., comme décrit dans l'avis relatif au laser no. 56, daté du 8 Mai 2019.

3618295

Statement 291



Warning

Invisible laser radiations present. Statement 1016



Warning

Invisible laser radiation may be emitted from disconnected fibers or connectors. Do not stare into beams or view directly with optical instruments. Statement 1051

Prevent Electrostatic Discharge Damage

Electrostatic discharge (ESD) can damage equipment and impair electrical circuitry. ESD may occur when electronic printed circuit cards are improperly handled and can cause complete or intermittent failures. When removing and replacing modules, always follow these ESD prevention procedures:

- Ensure that the device chassis is electrically connected to earth ground.
- Wear an ESD-preventive wrist strap, ensuring that it makes good skin contact.
- Handle components by only their handles or edges; do not touch the printed circuit boards or connectors.
- Avoid contact between the printed circuit boards and clothing. The wrist strap only protects components from ESD voltages on the body; ESD voltages on clothing can still cause damage.

NEBS Regulatory Compliance Statements

The NEBS-GR-1089-CORE regulatory compliance statements and requirements are discussed in this section.



Warning

The intra-building port(s) (Management Ethernet Ports) of the equipment or subassembly must use shielded intra-building cabling/wiring that is grounded at both ends. Statement 7003



Warning

The intra-building port(s) (Management Ethernet Ports) of the equipment or subassembly is suitable for connection to intra-building or unexposed wiring or cabling only. The intra-building port(s) of the equipment or subassembly must not be metallically connected to interfaces that connect to the OSP or its wiring for more than 6 meters (approximately 20 feet). These interfaces are designed for use as intra-building interfaces only (Type 2, 4, or 4a ports as described in GR-1089) and require isolation from the exposed OSP cabling. The addition of Primary Protectors is not sufficient protection in order to connect these interfaces metallically to an OSP wiring system. Statement 7005



Warning Surge Protection Device Requirements for GR-1089 Antenna Ports

Protect equipment antenna ports, that are classified as Type 6 according to GR-1089-CORE, with lightning surge protectors that are rated at a minimum of 600 V peak surge of 1.2/50 uS duration. Statement 7011

Connecting a Cable to the GNSS Antenna Interface

- GNSS modules have built-in ESD protections on all pins, including the RF-input pin. However, additional surge protection is required if an outdoor antenna is being connected. The Lightning Protector must be able to provide a low clamping voltage (less than 600V).
- A lightning protection must be mounted at the place where the antenna cable enters the building. The primary lightning protection must be capable of conducting all potentially dangerous electrical energy to PE (Protective Earth).
- Surge arrestors should support DC-pass and suitable for the GPS frequency range (1.575GHz) with low attenuation.

Products that have AC power ports that are intended for deployments where an external Surge Protective Device (SPD) is utilized at the AC power service equipment (see definition in National Electric Code). Statement 7012

This product is designed for a Common Bonding Network (CBN) installation. Statement 7013

This product can be installed in network telecommunication facilities or locations where the National Electric Code applies. Statement 8015 and 8016

The DC return connection to this system should remain isolated from the system frame and chassis (DC-I). Statement 7016



Note These equipments are designed to boot up in less than 30 minutes based on their neighbouring devices that are fully up and running.
