**Figure 3-9 Mounting the Device** 

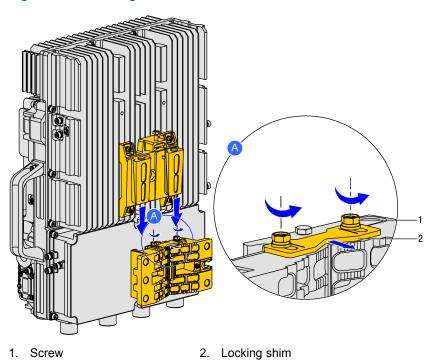
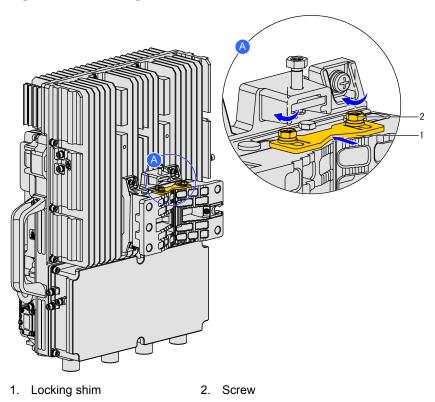


Figure 3-10 Securing the Device



- End of Steps -

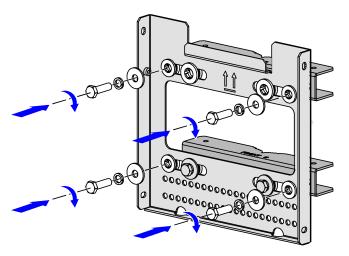
### 3.4 Pole-Mounted Installation

## 3.4.1 Using Mounting Kit 1 to Mount the Device on a Pole

### **Steps**

1. Secure the installation assemblies (wall mounting assembly and pole mounting piece): Attach the wall mounting assembly to the pole mounting piece with four M10×35 hexagon bolts, as shown in Figure 3-11.

Figure 3-11 Attaching the Wall Mounting Assembly to the Pole Mounting Piece



2. Secure the pole mounting piece and installation assembly (in a single-unit scenario): Secure the pole mounting piece and installation assembly on the pole with four M10×180 long bolts, as shown in Figure 3-12.

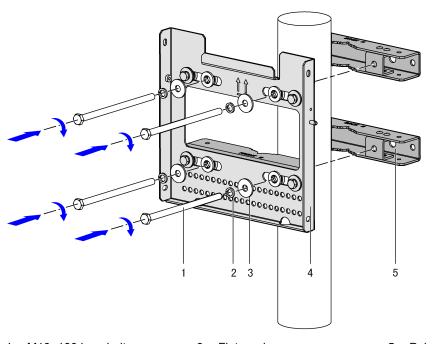
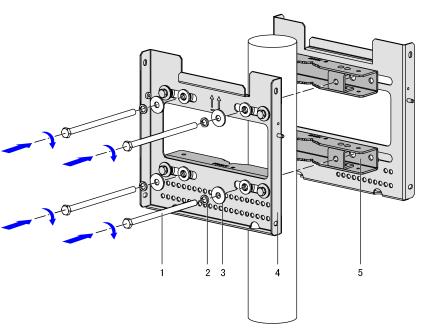


Figure 3-12 Securing the Pole Mounting Piece

- M10×180 long bolts
   Spring washer
- 3. Flat washer4. Installation assembly
- 5. Pole mounting piece
- 3. Secure two sets of installation assemblies back to back (in double-unit and triple-unit scenarios): Secure two sets of installation assemblies back to back on the pole with four M10×180 long bolts, as shown in Figure 3-13.

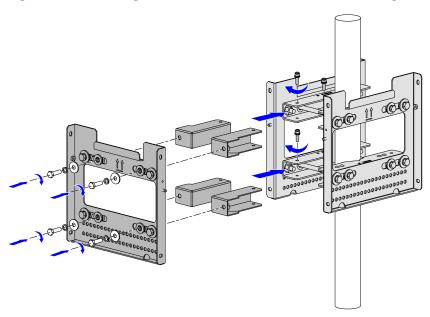
Figure 3-13 Securing Two Sets of Installation Assemblies Back to Back



- 1. M10×180 long bolts
- 2. Spring washer
- 3. Flat washer
- 4. Front installation assembly
- 5. Back installation assembly

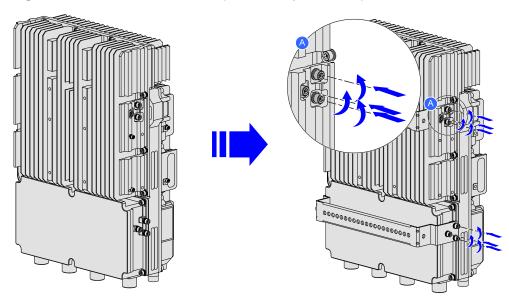
4. Install the extension pieces and wall mounting assembly (in a triple-unit scenario): Attach the extension pieces and wall mounting assembly to the side of the pole mounting assemblies with four M6×60 Allen screws, as shown in Figure 3-14.

Figure 3-14 Installing the Extension Pieces and Wall Mounting Assembly



 Install device hooks (two U-shaped hooks): Use the 12 M16 bolts disassembled from the ZXSDR R8882 to secure the two U-shaped hooks to the back of the device. See Figure 3-15.

Figure 3-15 Install Device Hooks (Two U-shaped Hooks)



6. Mount and secure the device: Hang ZXSDR R8882 on the hook on the wall mounting assembly and secure ZXSDR R8882 with four M6×20 Allen screws, as shown in Figure 3-16.

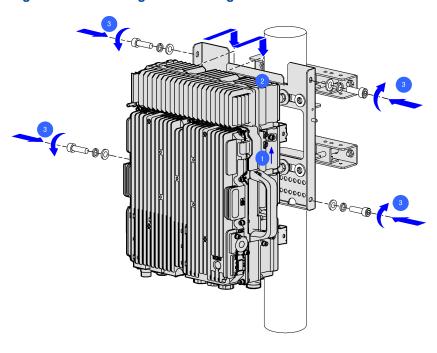


Figure 3-16 Mounting and Securing the Device

NOTE **✓** Note:

This figure shows the method of mounting and securing the device in a single-unit scenario. Use the same method to mount and secure devices in a double-unit or triple-unit scenario.

- End of Steps -

## 3.4.2 Using Mounting Kit 2 to Mount the Device on a Pole

### **Steps**

1. Install the RRU mounting base: Attach the RRU mounting base to the back of the device with four M6 screws, as shown in Figure 3-17; attach the RRU mounting base to the side of the device with four M6 screws, as shown in Figure 3-18.



The RRU mounting base can be installed on the back or side of the device.

- In a single-unit scenario, installation personnel need to install one RRU mounting base on the back of the device.
- In a double-unit scenario, installation personnel need to install one RRU mounting base on the back of each device.
- In a triple-unit scenario, installation personnel need to install one RRU mounting base on the back of one device and two RRU mounting bases on the sides of the other two devices.
- In a quadro-unit scenario, installation personnel need to install four RRU mounting bases on the sides of the device.

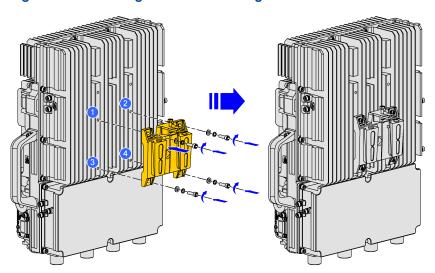
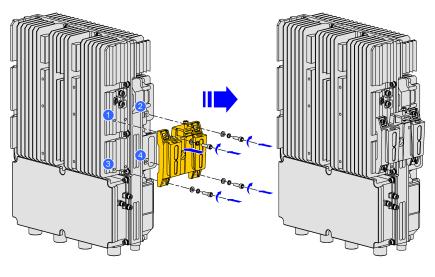


Figure 3-17 Installing the RRU Mounting Base on the Back of the Device

Figure 3-18 Mounting the RRU Mounting Base on the Side of the Device



3-18

2. Install the pole mounting assemblies and parallel mounting base: Attach two pole mounting assemblies on a pole and tighten the two fastening bolts, as shown in Figure 3-19; hang the parallel mounting base on one of the pole mounting assemblies, push the locking shim on the pole mounting assembly until it locks the parallel mounting base, and then tighten the two screws on the locking shim, as shown in Figure 3-20.



In a single-unit or double-unit scenario, only the pole mounting assemblies need to be installed. In a triple-unit or quadro-unit scenario, the pole mounting assemblies and one or two parallel mounting bases need to be installed.

Figure 3-19 Securing the Pole Mounting Assembly

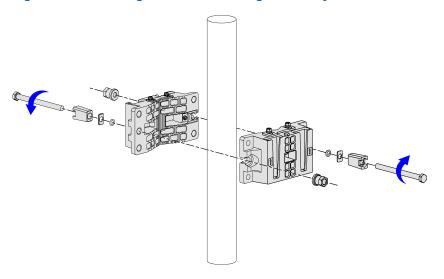
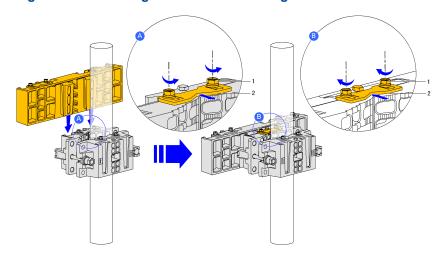


Figure 3-20 Installing the Parallel Mounting Base



Screw

2. Locking shim

3-19

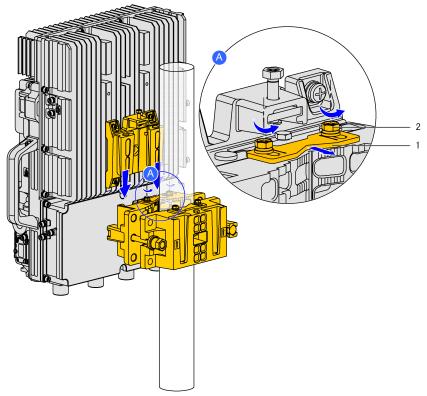
Mount the RRU: Mount the device with a back-mounted RRU base on the pole
mounting assembly, as shown in Figure 3-21 and Figure 3-22; mount the device with
a side-mounted RRU base on the parallel mounting base, as shown in Figure 3-23.



The RRU can be front-mounted and side-mounted.

- In a single-unit or double-unit scenario, the device is front-mounted to the pole mounting assembly.
- In a triple-unit scenario, one device is front-mounted to the pole mounting assembly and the other two devices are side-mounted to the parallel mounting base.
- In a quadro-unit scenario, the devices are side-mounted to the parallel mounting base.





1. Locking shim

2. Screw

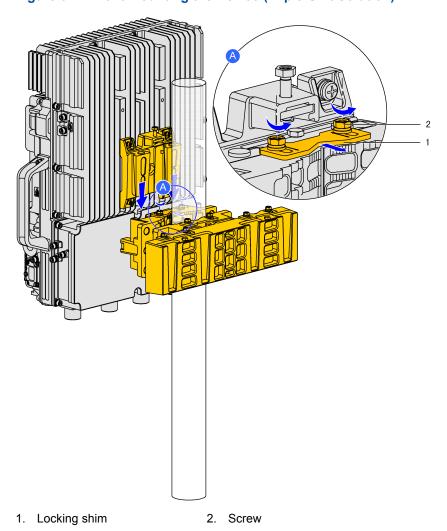


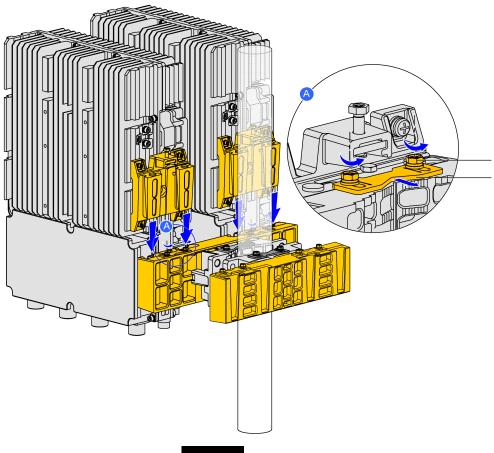
Figure 3-22 Front-Mounting the Device (Triple-Unit Solution)

1. Locking shim

Figure 3-23 Side-Mounting the Device (Triple-Unit Solution)



2. Screw

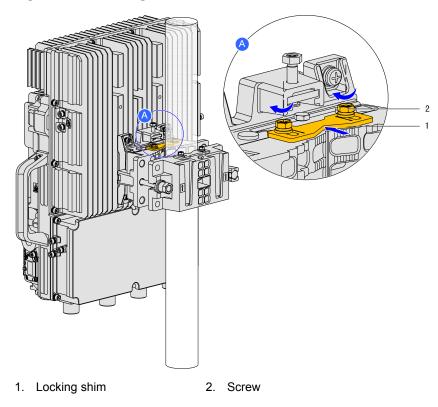


4. Secure the device: Push the locking shim to lock the RRU mounting base and tighten the two screws on the locking shim, as shown in Figure 3-25.



In any scenario, the method of securing the device is the same.

Figure 3-25 Securing the Device



- End of Steps -

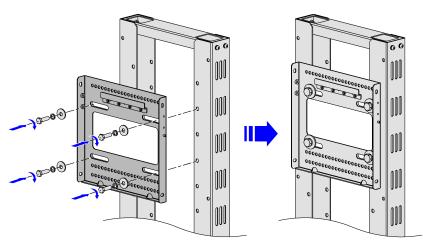
## 3.5 Portal Frame-Mounted Installation

## 3.5.1 Using Mounting Kit 1 to Mount the Device on a Portal Frame

### **Steps**

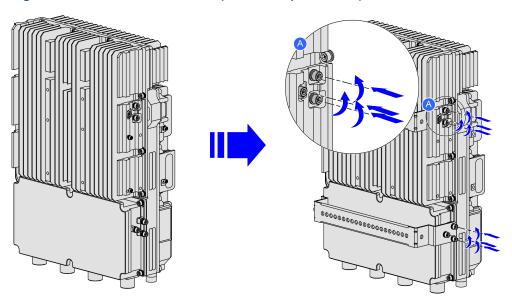
1. *Install the mounting panel:* Secure the wall mounting assembly at an appropriate position on the portal frame with four M8 bolt and nut assemblies, as shown in Figure 3-26.

Figure 3-26 Installing the Universal Sheet-Metal Kit



2. Install device hooks (two U-shaped hooks): Use the 12 M16 bolts disassembled from the ZXSDR R8882 to secure the two U-shaped hooks to the back of the device. See Figure 3-27.

Figure 3-27 Install Device Hooks (Two U-shaped Hooks)



3. *Mount and secure the device:* Hang the device on the hook on the wall mounting assembly and secure the device with four M6 Allen bolts, as shown in Figure 3-28 and Figure 3-29.

Figure 3-28 Mounting the Device

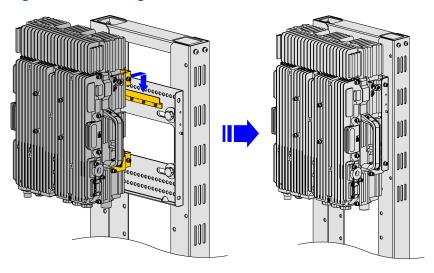
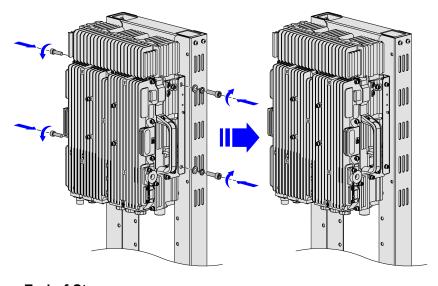


Figure 3-29 Securing the Device



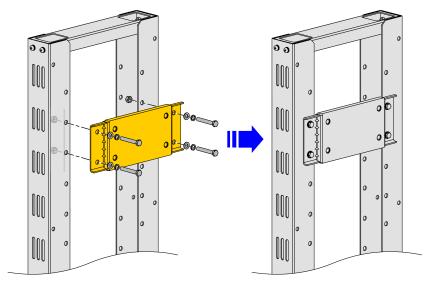
- End of Steps -

## 3.5.2 Using Mounting Kit 2 to Mount the Device on a Portal Frame

### **Steps**

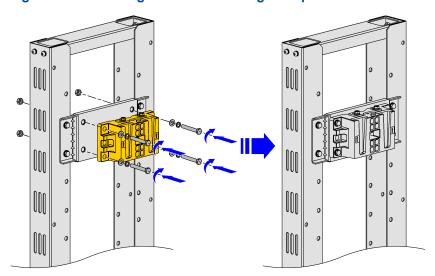
- 1. Install the adaptor plate and pole mounting clamp:
  - a. Attach the adaptor plate to the portal frame and secure it with four M8 bolt and nut assemblies, as shown in Figure 3-30.

Figure 3-30 Mounting the Adaptor Plate



b. Attach the pole mounting clamp to the adaptor plate and secure it with four M12 bolt and nut assemblies, as shown in Figure 3-31.

**Figure 3-31 Mounting the Pole Mounting Clamp** 



- 2. Install the RRU mounting base on the back of the device: For the operation, refer to Using Mounting Kit 2 to Mount the Device on a Wall.
- Mount and secure the device on the RRU mounting base: For the operation, refer to Using Mounting Kit 1 to Mount the Device on a Wall.
  - End of Steps -

## 3.6 Installing the Protection Shade

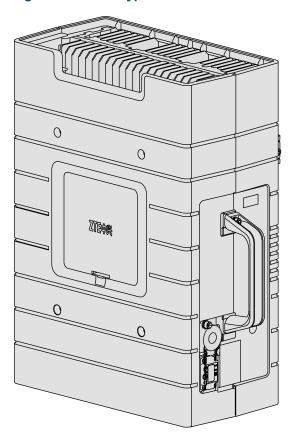
### **Prerequisite**

ZXSDR R8882 has been installed.

### Context

There are two types of protection shades. The new type has already been assembled before delivery to customer, as shown in Figure 3-32.





This section describes how to install the old type of protection shade.

### **Steps**

 Align the four mounting holes on the protection shade with the four mounting holes on both sides of ZXSDR R8882, and then secure the protection shade with M5×16 cross recessed head screw assemblies and M5×20 hexagon socket cap head screw assemblies, as shown in Figure 3-33.

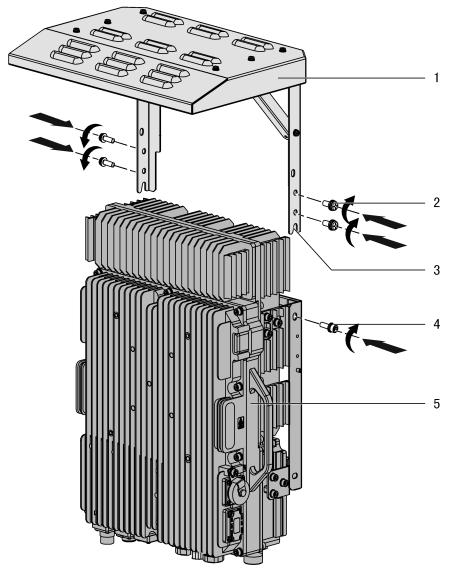


Figure 3-33 Installing the Protection Shade

- 1. Protection shade
- 2. M5×16 cross recessed head screw assembly
- 3. Locking position
- End of Steps -
- M5×20 hexagon socket cap head screw assembly
- 5. ZXSDR R8882

## Chapter 4

# **Cabling**

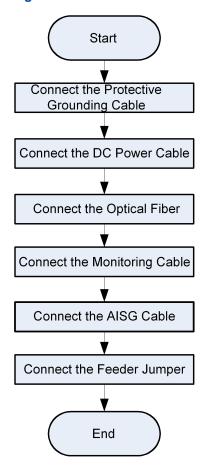
### **Table of Contents**

Flow of Connecting External Cables	4-1
Connecting the Protective Grounding Cable	
Connecting the DC Power Cable	4-3
Connecting the Optical Fiber	
Connecting the Monitoring Cable	4-9
Connecting the AISG Cable	4-11
Connecting the Feeder Jumper	4-12

## 4.1 Flow of Connecting External Cables

Figure 4-1 shows the recommended flow of connecting external cables. The flow can be adjusted as required by the on-site conditions.

Figure 4-1 Flowchart of Connecting External Cables







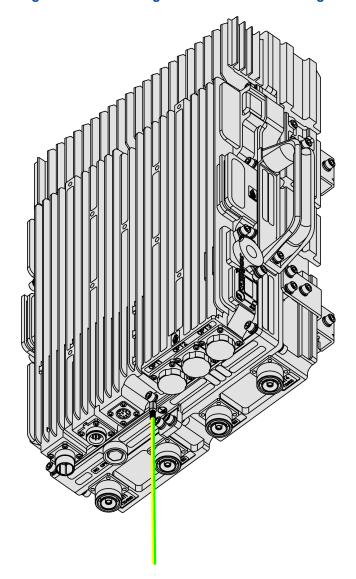
For the appearances and line sequence definitions of all the interface cables, refer to the ZXSDR R8882 Hardware Description.

## 4.2 Connecting the Protective Grounding Cable

### **Steps**

1. Put one copper tubular lug of the protective grounding cable on one grounding bolt of ZXSDR R8882 and tighten the grounding bolt, as shown in Figure 4-2.

**Figure 4-2 Connecting the Protective Grounding Cable** 



- 2. Put the other copper tubular lug of the protective grounding cable on one grounding point of the power adapter box such as the PIMDC.
- 3. Connect the other grounding point of the power adapter box to the nearest grounding bar and secure it with a bolt.
- 4. Attach appropriate labels at both ends of the cable.
- 5. Apply grease to the copper tubular lugs at both ends of the cable.
  - End of Steps -

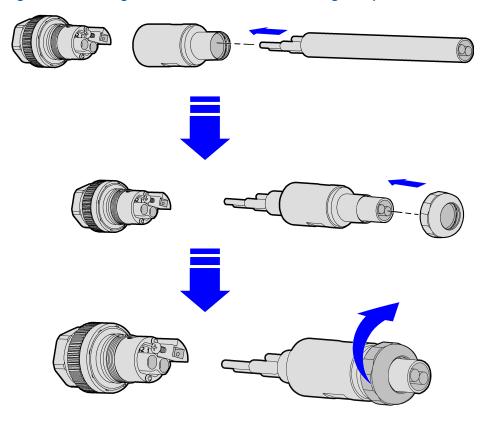
## 4.3 Connecting the DC Power Cable

#### Context

The power cable should be connected with the connector before the power cable is installed.

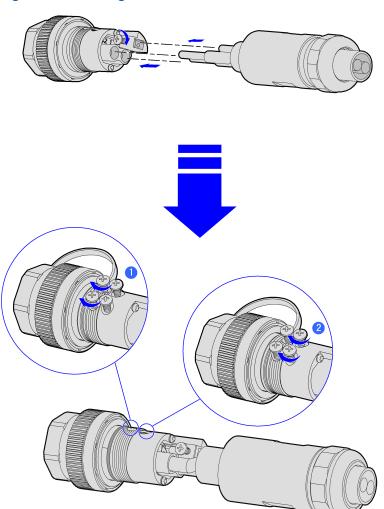
1. Insert the power cable into the sealing component, and then strip off the protective layer of the power cable as required, as illustrated in Figure 4-3.

Figure 4-3 Inserting the Power Cable Into the Sealing Component



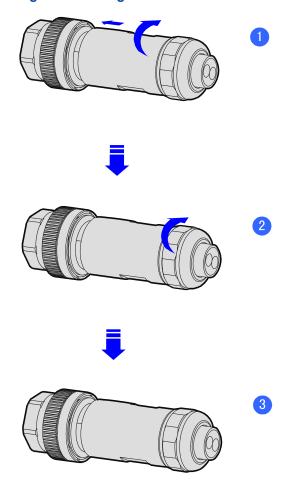
- 2. Insert the power cable into the corresponding hole at the terminal, and tighten it with screws, as illustrated in Figure 4-4.
  - a. Secure the screw a at each terminal with a screw driver, and pull the power cable slightly to check whether it is properly secured.
  - b. Secure the screw 2 with the screw driver.
  - c. Thread the shielding layer that is twisted into a strand into the hole on the shielding unit, and then secure it with screws.

Figure 4-4 Installing the Power Cable Into the Terminal Hole



3. Secure the sealing component clockwise to the connector, and then fix the power cable by tightening the rear nut, as illustrated in Figure 4-5.

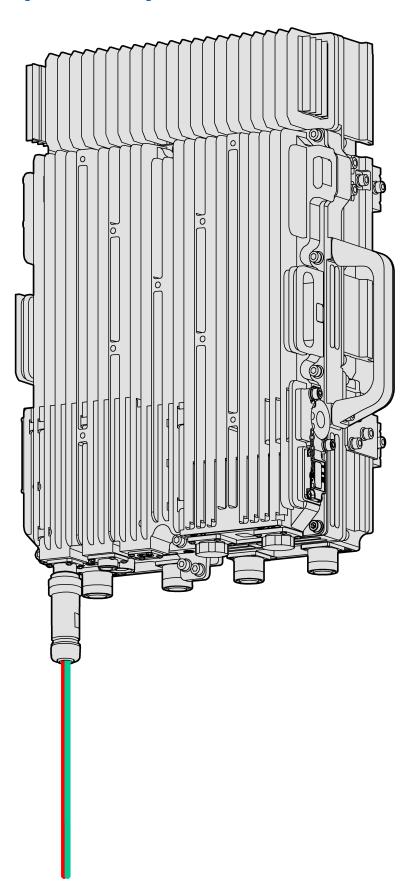
**Figure 4-5 Fixing the Power Cable** 



### **Steps**

1. Connect end A of the DC power cable to the PWR interface of ZXSDR R8882, as shown in Figure 4-6.

**Figure 4-6 Connecting the DC Power Cable** 



2. Strip the protective layer at end B of the DC power cable and connect the core wires to the power supply device according to their colors.



If using the PIMDC, installation personnel need to connect the core wires to the PIMDC according to the colors of the core wires before connecting the PIMDC to the external power supply.

Connect the blue core wire to the **-48 V** terminal, connect the black core wire to the **-48VRTN** terminal.

- 3. Waterproof both connectors of the DC power cable.
- 4. Attach appropriate labels at both ends of the DC power cable.
- 5. Tie up the DC power cable.
  - End of Steps -

## 4.4 Connecting the Optical Fiber

### **Steps**

- 1. Attach appropriate labels at both ends of the optical fiber.
- 2. Remove the protective cap of the optical fiber, remove the protective sleeve, and remove the white protective cap of the core.
- 3. Adjust the side with a color mark at end A of the optical fiber, insert end A of the optical fiber into the baseband RF optical interface (OPT1/2/3) of the device, and then tighten the protective sleeve, as shown in Figure 4-7.

**Figure 4-7 Connecting the Optical Fiber** 



If the device has two optical ports, then install two optical fibers in optical ports 1 and 2.

- 4. When the optical fiber connects the device to a BBU, connect the DLC optical connector at end B of the optical fiber to the optical connector of the BBU; when the optical fiber cascades the device to another ZXSDR R8882, connect end B of the optical fiber to the baseband RF optical interface (OPT1/2/3) of the other ZXSDR R8882.
- 5. Tighten the outdoor sealing assembly of the optical fiber and waterproof the connector.
  - End of Steps -

## 4.5 Connecting the Monitoring Cable

### **Steps**

1. Connect end A of the monitoring (MON) cable to the AISG interface of ZXSDR R8882, as shown in Figure 4-8.