

# Huawei CloudEngine 8800 Switch

# **Ordering Guide**



# Contents

| 1 CloudEngine 8800 Product Overview  | 3 |
|--|---|
| 2 Basic Configurations   | 4 |
| 2.1 Selecting the CE8800 Model   | 5 |
| 2.2 Performing Basic Configuration   | 5 |
| 2.3 Selecting the CE8800 interface card  | 6 |
| 2.4 Selecting the CE8800 License   | 7 |
| 2.5 Selecting Optical Modules, Optical Fibers, Optical Cable Assemblies, and High-Speed Cables | 7 |
| 2.6 Other Configurations   | 8 |
| 2.7 Exporting the Quotation  | 8 |



# 1 CloudEngine 8800 Product Overview

The CE8800 is the next-generation data center TOR switch designed for enterprise data centers and campus networks. It can be used by various network operators, institutions, and enterprises, such as China Telecom, CNC, China Mobile, China Unicom, SARFT, China TieTong, banks, police stations, tax stations, schools, and global data communications markets. The CE8800 can be sold with Huawei broadband products, routers, and transport products.

The CE8800 uses the integrated chassis design and provides one device model in V100R006: CE8860-4C-EI.

| Description          | Specifications   |  |  |  |  |  |  |
|----------------------|--|--|--|--|--|--|--|
| Service port         | The CE8860-4C-EI does not provide fixed ports and provides four card slots supporting the following types of cards:  |  |  |  |  |  |  |
|                      | 1. 8x100G QSF<br>with 40GE po<br>or 10GE port  | P28: The 100GE ports are downward compatible<br>orts. Each 100GE port can be split into four 25GE<br>s.  |  |  |  |  |  |
|                      | 2. 16x40G QSF<br>10GE ports.   | P+: Each 40GE QSFP+ port can be split into two   |  |  |  |  |  |
|                      | 3. 24x10G RJ45<br>downward co<br>be split into f   | 5 + 2x100G QSFP28: The 100GE ports are<br>ompatible with 40GE ports. Each 100GE port can<br>four 25GE or 10GE ports.   |  |  |  |  |  |
|                      | <ul> <li>4. 24x25G SFP28 + 2x100G QSFP28: The 25GE ports are downward compatible with 10GE ports. The 100GE port downward compatible with 40GE ports. Each 100GE ports be split into four 25GE or 10GE ports.</li> </ul> |  |  |  |  |  |  |
| Management<br>port   | Two 10/100/1000M RJ45 management network ports, one RS-232 serial port, one MiniUSB port (multiplexed with the RS-232 serial port), and one USB port   |  |  |  |  |  |  |
| Power supply         | Two power mod<br>hot swapping  | ules working in 1+1 backup mode and supporting   |  |  |  |  |  |
| Power<br>consumption | Static power<br>consumption  | Configured with four CE88-D24S2CQ cards:<br>335 W<br>Configured with four CE88-D24T2CQ cards:<br>327 W<br>Configured with four CE88-D16Q cards: 272 W<br>Configured with four CE88-D8CQ cards: 341 W |  |  |  |  |  |
|                      | Typical power<br>consumption   | Configured with four CE88-D24S2CQ cards:<br>399 W<br>Configured with four CE88-D24T2CQ cards:<br>522 W   |  |  |  |  |  |

The following table lists the CE8860-4C-EI configuration.



C (Product Support)

| Description  | Specifications   |   |  |  |  |  |
|--------------|--|---|--|--|--|--|
|              |  | Configured with four CE88-D16Q cards: 340 W   |  |  |  |  |
|              |  | Configured with four CE88-D8CQ cards: 355 W   |  |  |  |  |
|              |  | (100% traffic load, all copper cables inserted into<br>the ports, normal temperature, double power<br>modules)                  |  |  |  |  |
|              |  | Configured with four CE88-D24S2CQ cards: 410 W  |  |  |  |  |
|              |  | Configured with four CE88-D24T2CQ cards: 528 W  |  |  |  |  |
|              |  | Configured with four CE88-D16Q cards: 421 W   |  |  |  |  |
|              |  | Configured with four CE88-D8CQ cards: 459 W   |  |  |  |  |
|              |  | (100% traffic load, all short-distance optical<br>modules inserted into the ports, normal<br>temperature, double power modules) |  |  |  |  |
|              | Maximum<br>power   | Configured with four CE88-D24S2CQ cards: 602 W  |  |  |  |  |
|              | consumption  | Configured with four CE88-D24T2CQ cards: 750 W  |  |  |  |  |
|              |  | Configured with four CE88-D16Q cards: 585 W   |  |  |  |  |
|              |  | Configured with four CE88-D8CQ cards: 625 W   |  |  |  |  |
| Fan assembly | Two fan assembl  | ies supporting hot swapping   |  |  |  |  |
|              | Heat dissipation:  | front-to-back or back-to-front airflow  |  |  |  |  |
|              | Front-to-back air  | flow: Air flows from the fan side to the port side.   |  |  |  |  |
|              | Back-to-front air  | flow: Air flows from the port side to the fan side.   |  |  |  |  |
|              | The device heat dissipation system is selected depending on t<br>airflow direction of used power modules and fan modules.  |   |  |  |  |  |
|              | <b>NOTE</b><br>The power modules and fan modules must have the same airflow direction.<br>That is, on the same device, the models of the two fan modules must be<br>consistent and the models of the two power modules must be consistent. |   |  |  |  |  |
| Others       | ID indicator   |   |  |  |  |  |

# **2** Basic Configurations

The CE8800 configuration procedure is as follows:

- 1. Select the CE8800 model.
- 2. Select the bundle, and power cable type.
- 3. Select the interface card.
- 4. Select function license.
- 5. Select optical modules, optical fibers, optical cable assemblies, and high-speed cables.
- 6. Select other components.



The following describes the configuration of each step.

#### 2.1 Selecting the CE8800 Model

Step 1 On the SCT home page, select My Quotations. Create a quotation, set basic information and save it, and click Next.

| Quotati     |  | Set Ba                          | asic In     | fo   | 2 °  | configure                           | 3 Set Disc  | ounts                                  | 4 Export&  | Share&Submit     |
|-------------|--|---------------------------------|-------------|------|--|-------------------------------------|---|--|------------|------------------|
| Add the     | Add the products, spare parts or service, configure them and set the quantity. Previous Next |                                 |             |      |  |                                     |   |  | Next       |                  |
| Add Product | Add Service  | Add Config                      | X<br>Delete | Сору | Add to Favorites                                   | Batch Set Services                  | Site Management                                   |  | 1          | Preview By Site  |
|             | Produ<br>Conf<br>V   | ict Name/<br>ig Name/<br>ersion |             |      | Config Type/<br>Config Status/ Sit<br>Pack Product | tes/Qty. Estimated L<br>Time (Days) | ead List Price (USD)/<br>O Total List Price (USD) | Unit Price (USD)/<br>Total Price (USD) | Operations | Other Operations |

Step 2 Click Add Product. In the check box that is displayed, select the desired model.

| Product Part Show Restricted & EOM Product |          |                   |                             |                  |                  |  |  |  |
|--|----------|-------------------|-----------------------------|------------------|------------------|--|--|--|
| Type a product name or description         | Data Cer | iter Switch       | ▼                           |                  |                  |  |  |  |
| Product Name                               | Туре     | SET OF TODE QUI   | Description                 | Product EOM Date | Product EOS Date |  |  |  |
| CE8860-4C-EI                               | 1        | Offering 32 x 100 | GE, 64 x 40 GE, or 128 x 25 | 2023-06-30       | 2028-12-31       |  |  |  |

Step 3 Click the configuration name of the model. The **Product Parameter** tab page is displayed.

| Add | Product | Add Service | Add from Favorites      | Move To                        | X<br>Delete | <b>П</b><br>Сору    | Add to Favorite                           | es Batch | X<br>Set Service | es Model & Si                   | <b>b</b><br>ie Mgmt                         | to Pr  | eview By Site                        |
|-----|---------|-------------|-------------------------|--------------------------------|-------------|---------------------|---|----------|------------------|---------------------------------|---|--|--------------------------------------|
| NO  |         | Product Na  | Model<br>me Confi<br>Ve | Category,<br>g Name/<br>ersion | /           | Con<br>Con          | fig Type/<br>fig Status                   | Sites    | /Qty.            | Estimated Lead<br>Time (Days) 🚺 | List Price (USD)/<br>Total List Price (USD) | Internal Unit Price<br>(USD)/<br>Total Price After<br>Internal Discount<br>(USD) | Operat                               |
| 1   |         | E8860-4C-EI | 📝 <u>CE8860</u>         | <u>-4C-EI</u>                  |             | Configur<br>W/O Mai | able Equipment<br>ntenance Serv.<br>Error | Site     | 1/1              | Uncertain                       | 40,000.00<br>40,000.00                      | 40,000.00<br>40,000.00   | Delete Move<br>Copy Add f<br>Batch I |

#### 2.2 Performing Basic Configuration

**Step 1** On the **Product Parameter** tab page, select a bundle, Recommended selecting bundle with fan assemblies and power modules.

| New site or Expansion   | 🕜 New Site | New Site   | • |
|---|------------|------------|---|
| Select the type of Power Supply   | AC&240V DC | AC&240V DC | - |
| Quote by Bundle(Contains power module and fan) configuration or not-Recommend             | 🕜 Yes      | Yes        | • |
| Need 4m PGND cable for Chassis or not(used in Alibaba project)                            | 🕜 No       | No         | - |
| <pre>===Basic Configuration(Please confirm the Airflow: port exhaust, port intake)=</pre> |            |            |   |
| ▼ ===Mainframe===   | <b>?</b>   |            |   |
| CE8860 Bundle(CE8860-4C-EI Mainframe,4*CE88-D16Q Interface Card,2*AC Power                | <b>?</b> 1 |            |   |
| CE8860 Bundle(CE8860-4C-EI Mainframe,4*CE88-D16Q Interface Card,2*AC Power                | 0 📀        | 0          |   |
| CE8860 Bundle(CE8860-4C-EI Mainframe,1*CE88-D24S2CQ Interface Card,1*CE88                 | 0 🕥        | 0          |   |
|   |            |            |   |

Step 2 Select proper power modules based on the customer equipment room requirements. Skip this step when configuring the bundle.



C (Product Support)

| That wer Cloud Ling inc 0000 Berles Bwittenes Ordering Guide                    | C (1100   | uet Support)  |   |
|---|---|---|---|
| ▼ ===Mainframe===   | 0   |   |   |
| CE8860-4C-EI Mainframe(With 4 Subcard Slots, Without FAN Box, Without Power Mod | 0 🕜   | æ   | U   |
| ▼ ===Fan Box&Power===   |   |   |   |
| Fan box(F,FAN panel side intake )   | 0 🕥   | o   |   |
| Fan box(B,FAN panel side exhaust)   | 0 📀   | o   |   |
| 1200W AC&240V DC Power Module(Power panel side intake)                          | 0 📀   | o   |   |
| 1200W AC&240V DC Power Module(Power panel side exhaust)                         | 0 🕥   | o   |   |
|   | It at we'r eifodd Enigine oboo berres bwrtenes ordering oudd         * ===Mainframe===         CE8860-4C-EI Mainframe(With 4 Subcard Slots,Without FAN Box,Without Power Mod         * ===Fan Box&Power===         Fan box(F,FAN panel side intake )         Fan box(B,FAN panel side exhaust)         1200W AC&240V DC Power Module(Power panel side intake)         1200W AC&240V DC Power Module(Power panel side exhaust) | Indexer CroadEngine 00000 Derres Dwitches Ordering Or | Indexer Croducting increases of defining State       C (1104)                 ===Mainframe=== |

- The CE8800 series switches use Port-side exhaust or Port-side intake airflow design. Power modules (with fans) and fan boxes on a switch must have the same airflow direction.
- Power module types:

The CE8860-4C-EI supports 1200W AC&240V DC and 1200W HVDC.

The power modules in 1+1 backup mode are recommended.

**Step 3** Select power cable types.

| 8                                | Select the type of C13 power cable    | None | None           | •    |
|----------------------------------|---------------------------------------|------|----------------|------|
| ▼===Optical Transceiver&Fiber=== |                                       |      | ordinarily C13 | None |
|                                  | ====40GE-QSFP+ Optical Transceiver=== | None |                |      |

Currently, the CE series switches provide two types of power cables: PDU power cables and standard-compliant power cables. The two types of power cables apply to different cabinet sockets. Select proper C13 power cables based on the cabinet socket type.

Figure 2-1 shows the sockets used for PDU power cables.

Figure 2-1 Sockets for PDU power cables



Figure 2-2 shows a PDU power cable.

Figure 2-2 PDU power cable



#### 2.3 Selecting the CE8800 Interface Card

**Step 1** Select the interface card type as required. Currently, the CE8800 switches support 10GE, 25G, 40GE, and 100GE interface cards.



 Huawei CloudEngine 8800 Series Switches Ordering Guide
 C (Product Support)

**Step 2** Select the required interface cards according to the number of required ports.

Step 3 Enter the number of required interface cards.

| ▼ ===Interface Card===  |               |   |  |
|---|---------------|---|--|
| CE8860:8 Port 100GE QSFP28 Interface Card                         | 0 📀           | o |  |
| CE8860:16 Port 40GE QSFP+ Interface Card                          | 0 🕥           | o |  |
| CE8860:24 Port 10GE Base-T and 2 Port 100GE QSFP28 Interface Card | 0 📀           | O |  |
| CE8860:24 Port 25GE SFP28 and 2 Port 100GE QSFP28 Interface Card  | <b>(?</b> ) 0 | 0 |  |

### 2.4 Selecting the CE8800 License

If functions, including VXLAN, NPV, and FCF are required, configure the corresponding licenses.

| ▼ ===Software===                          |      |     |   |
|---|------|-----|---|
| Select need License or not                | None | YES | - |
| Select need CE88-LIC-BUN01 or not         | 🕢 No | No  |   |
| Select need VXLAN function or not         | 🕜 No | No  | • |
| Select need FCOE NPV function or not      | 🕜 No | No  | - |
| CE8800 FCF 16 Ports license               | 0    | 0   |   |
| Select need FCF ALL Ports function or not | 🕜 No | No  |   |

# 2.5 Selecting Optical Modules, Optical Fibers, Optical Cable Assemblies, and High-Speed Cables

**Step 1** Select the type and number of optical modules based on the configured card type.

- 100G optical modules include the 100 m QSFP28 multimode optical modules.
- 40GE optical modules include the 150 m and 300 m multimode optical module, 1.4km,10 km,40km QSFP+ optical module.
- 10GE optical modules include the multimode SFP+ optical modules of 100 m, 220 m, and 300 m, and single-mode SFP+ optical modules of 1.4km, 10 km, 40 km, and 80 km. 10GE optical interfaces on the CE12800 can work as GE optical interfaces.

Step 2 Select optical cable assemblies.

| • | ===Patch Cord===  |      |  |
|---|---|------|--|
|   | Select the Client Interface of Patch Cord(the local in 🥝 None | None |  |
| • | Select the type of cable assemblies client interface(t 🕢 None | None |  |

- Step 3 Use high-speed cables or AOC high-speed cable if the transmission distance is short.
  - ➢ High-speed cables:
    - 40GE high-speed cables include two types. One type is used to connect two 40GE interfaces. The other type is used to connect one 40GE interface and four 10GE interfaces. The two types of cables provide transmission distances of 1 m, 3 m, and 5 m. There are a total of six types of high-speed cables.

When configuring high-speed cables, you do not need to configure optical modules.



The following figures show some high-speed cables.







10GBASE-CR SFP+ direct copper cable

40GBASE-CR4 QSFP direct copper cable

QSFP to 4\*10G SFP+ copper cable

AOC high-speed cable

40G QSFP+ AOC high-speed cable:



#### 2.6 Other Configurations

- 1. **USB**: The CE8800 provides USB interfaces and USB flash drive (USB2.0, 4.0 GB, part number 06010171, and model NUSBDSK01). These USB components can be configured as required.
- 2. **Network cables**: Each network cable has two RJ45 connectors (part number 14080082). The length of network cables is determined according to user requirements. A network cable (part number 25050014) for a GE interface is sold on a per-meter basis and must be sold with RJ45 connectors (part number 14080082). A network cable (part number 04050612) for a 10GE interface is sold on a 3-meter basis and already has connectors installed.

#### 2.7 Exporting the Quotation

Step 1 After the preceding configurations are complete, click Verify&Save.

| / Product Parameter | / Service Parameter / Co | Configuration Result | <ul> <li>Attribute</li> </ul> | Verify&Save | ar<br>port |
|---------------------|--------------------------|----------------------|-------------------------------|-------------|------------|
| -                   | Parameter                | Sug                  | gestion                       | Setting     |            |

Step 2 Verify the configurations, and click My Quotations. On the My Quotations page, click Export. The quotation is exported. For details about how to perform operations on the SCT, see the help on the SCT website.



C (Product Support)

| Quotation                  | Customer/<br>Country | Price/<br>Estimated Lead Time<br>(Days) 0 | From | Operations           | Other Operations | All Da |
|----------------------------|----------------------|---|------|----------------------|------------------|--------|
| Normal BOQ                 |                      | 151,824.00 (USD FOB C                     |      | Copy Delete          |                  |        |
| test                       | Armenia              | hina)                                     | SCT  | Share Export         |                  | 2014   |
| 0000Hc00139102201408140002 |                      | Uncertain                                 |      | Submit Offline Quote |                  |        |