Aruba 6300M DC Power Supply

Presenter
- Yash, TME
Aruba 6300M DC Power Supply

10.8 DC INPUT PS and recommended DC Power Cables

JL758A (PoE) DC INPUT PS

JL757A (Non-PoE) DC INPUT PS

5400-3519 DC Power Cable – 8 AWG
Size: 26cm x 26cm

5400-3521 DC Power Cable – 12 AWG
Size: 26cm x 26cm
**Aruba 6300M DC PoE PS**

**JL758A: DC INPUT PS**

- **Input:**
  - Nominal: -48V to -60V DC
  - Maximum: 36 to -72V DC, 32A

- **Output:** 54V 19.97A

- Modular Power Supply used for **6300M POE SKUs**

- JL758A with another JL758A PS on the same 6300M PoE switch model is supported.

- JL758A (DC INPUT PS) is interoperable with the JL087A (AC INPUT PS) on the supported 6300M PoE skus

- Recommended DC cable HPPN 5400-3519 for JL758A.

### CX6300M# show environment power-supply

<table>
<thead>
<tr>
<th>Mbr/PS</th>
<th>Product Number</th>
<th>Serial Number</th>
<th>Status</th>
<th>Input Type</th>
<th>Voltage</th>
<th>Wattage</th>
</tr>
</thead>
<tbody>
<tr>
<td>1/1</td>
<td>JL758A</td>
<td>TW07KWK02K</td>
<td>OK</td>
<td>DC</td>
<td>36V–72V</td>
<td>1050</td>
</tr>
<tr>
<td>1/2</td>
<td>JL758A</td>
<td>TW0BKWX01Y</td>
<td>OK</td>
<td>DC</td>
<td>36V–72V</td>
<td>1050</td>
</tr>
</tbody>
</table>

### VSF-6300# show environment power-supply vsf member 5

<table>
<thead>
<tr>
<th>Mbr/PS</th>
<th>Product Number</th>
<th>Serial Number</th>
<th>Status</th>
<th>Input Type</th>
<th>Voltage</th>
<th>Wattage</th>
</tr>
</thead>
<tbody>
<tr>
<td>5/1</td>
<td>JL758A</td>
<td>TW07KWK02K</td>
<td>OK</td>
<td>DC</td>
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<td>OK</td>
<td>DC</td>
<td>36V–72V</td>
<td>1050</td>
</tr>
</tbody>
</table>

CX6300M#
Aruba 6300M DC Non-PoE PS

**JL757A: DC INPUT PS**

- **Input:**
  - Nominal: -48V to -60V DC
  - Maximum: -36 to -72V DC, **8.2A**

- **Output:** 12V 20.83A

- Modular Power Supply used for 6300M non-POE SKUs

- JL757A with another JL757A PS on the same 6300M PoE switch model is supported.

- JL757A (DC INPUT PS) is interoperable with the JL085A (AC INPUT PS) on the supported 6300M PoE skus

- Redundancy support with JL085A (AC INPUT PS)

- Recommended DC cable HPPN 5400-3521 for JL757A.

---

**CX6300# show environment power-supply**

<table>
<thead>
<tr>
<th>Mbr/PS</th>
<th>Product Number</th>
<th>Serial Number</th>
<th>PS Status</th>
<th>Type</th>
<th>Range</th>
<th>Wattage</th>
</tr>
</thead>
<tbody>
<tr>
<td>1/1</td>
<td>JL757A</td>
<td>TW09WMJ01Q</td>
<td>OK</td>
<td>DC</td>
<td>36V-72V</td>
<td>250</td>
</tr>
<tr>
<td>1/2</td>
<td>JL757A</td>
<td>TW09WMJ00H</td>
<td>OK</td>
<td>DC</td>
<td>36V-72V</td>
<td>250</td>
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**CX6300-VSF# show environment power-supply vsf member 4**

<table>
<thead>
<tr>
<th>Mbr/PS</th>
<th>Product Number</th>
<th>Serial Number</th>
<th>PS Status</th>
<th>Type</th>
<th>Range</th>
<th>Wattage</th>
</tr>
</thead>
<tbody>
<tr>
<td>4/1</td>
<td>JL757A</td>
<td>TW09WMJ01Q</td>
<td>OK</td>
<td>DC</td>
<td>36V-72V</td>
<td>250</td>
</tr>
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<td>4/2</td>
<td>JL757A</td>
<td>TW09WMJ00H</td>
<td>OK</td>
<td>DC</td>
<td>36V-72V</td>
<td>250</td>
</tr>
</tbody>
</table>
Aruba 6300M Power Supply

- Aruba 6300M models have modular power supplies that provide high reliability with hot-swappable, redundant power supplies. Support up to 2 power supplies.

- 10.8: Aruba 6300M 1050W 36-72VDC PS (**JL758A**):
  - A 1050-watt power supply used for 6300M PoE switches.

- 10:8: Aruba 6300M 250W 36-72VDC PS (**JL757A**):
  - A 250-watt power supply used for 6300M non-PoE switches.

<table>
<thead>
<tr>
<th>Aruba 6300 PS Supported</th>
<th>PS Description</th>
<th>INPUT</th>
</tr>
</thead>
<tbody>
<tr>
<td>JL085A (Non-PoE)</td>
<td>Aruba X371 12VDC 250W Modular Power Supply</td>
<td>AC</td>
</tr>
<tr>
<td>JL086A (PoE)</td>
<td>Aruba X372 54VDC 680W Modular Power Supply</td>
<td>AC</td>
</tr>
<tr>
<td>JL087A (PoE)</td>
<td>Aruba X372 54VDC 1050W Modular Power Supply</td>
<td>AC</td>
</tr>
<tr>
<td>JL670A (PoE)</td>
<td>Aruba X372 54VDC 1600W Modular Power Supply</td>
<td>AC</td>
</tr>
<tr>
<td>JL760A (Non-PoE)</td>
<td>Aruba 250W AC PS (non-PoE) with reverse air flow (Port2Power)</td>
<td>AC</td>
</tr>
<tr>
<td>JL758A (PoE)</td>
<td>Aruba 6300M 1050W 36-72VDC Power Supply</td>
<td>DC</td>
</tr>
<tr>
<td>JL757A (Non-PoE)</td>
<td>Aruba 6300M 250W 36-72VDC Power Supply</td>
<td>DC</td>
</tr>
</tbody>
</table>
Q1. Is it mandatory to use Aruba DC power cables?
No, the customer is free to use their own DC cables.

- JL757A: 12 AWG
- JL758A: 8 AWG

Q2. Can either 8 AWG or 12 AWG cables be used to power either DC power supply?
The 8 AWG cable can be used to power either DC PS. However, the 12 AWG cable can only be used to power the JL757A (non-PoE PS).

This is due to the different current carrying capabilities of the cables. JL758A PS input current is 32A max, with system load. JL757A PS input current is 8.2A max.

Recommended DC cable HPPN 5400-3519 for JL758A.
Recommended DC cable HPPN 5400-3521 for JL757A.

Q3. What is the difference between the 8 AWG and 12 AWG cables?
The 8 AWG cable is rated for higher current (40A) than the 12 AWG (25A) cable.
The 8 AWG cable is thicker and heavier than the 12 AWG type.

*AWG* - American Wire Gauge
Aruba 6300M DC PS Supported Matrix

<table>
<thead>
<tr>
<th>DC PS Support Matrix</th>
<th>Supported</th>
</tr>
</thead>
<tbody>
<tr>
<td>JL757A (Non-PoE) 250W DC INPUT PS</td>
<td>JL757A (Non-PoE) 250W DC INPUT PS</td>
</tr>
<tr>
<td>JL758A (PoE) 1050W DC INPUT PS</td>
<td>JL758A (PoE) 1050W DC INPUT PS</td>
</tr>
<tr>
<td>JL757A (Non-PoE) 250W DC INPUT PS</td>
<td>JL085A (Non-PoE) 250W AC INPUT PS</td>
</tr>
<tr>
<td>JL758A (PoE) 1050W DC INPUT PS</td>
<td>JL087A (PoE) 1050W AC INPUT PS</td>
</tr>
</tbody>
</table>

Q1: Is it possible to mix PoE and non-PoE DC/AC power supplies in a 6300M?

Not possible. PoE PS are not insertable into a non-PoE model PS slot (and vice versa); this is due to mechanical keying implemented on PoE and non-PoE modular PS switch models to prevent incompatible power supplies from being installed.

All modular PS are mechanically keyed such that:

- A PoE PS cannot be inserted into a non-PoE switch model PS slot.
- And, a non-PoE PS cannot be inserted into a PoE switch model PS slot.

Q2: Is it possible to insert different PoE PS into 6300M?

Yes possible, but not recommended. Details covered in next slide.
# POE Power with AC and DC PS Support Matrix

<table>
<thead>
<tr>
<th>PS configurations</th>
<th>24/48P SR SKUs (JL660A/JL659A)</th>
<th>24/48P 10/100/1000 SKUs (JL662A/JL661A, )</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Redundancy: enabled</td>
<td>Redundancy: none</td>
</tr>
<tr>
<td></td>
<td>2x PS available</td>
<td>1x PS fails</td>
</tr>
<tr>
<td>JL086A + JL086A</td>
<td>300W</td>
<td>300W</td>
</tr>
<tr>
<td>JL086A + JL087A</td>
<td>N/A</td>
<td>N/A</td>
</tr>
<tr>
<td>JL087A + JL087A</td>
<td>600W</td>
<td>600W</td>
</tr>
<tr>
<td>JL670A @LL + JL670A @LL</td>
<td>600W</td>
<td>600W</td>
</tr>
<tr>
<td>JL670A @HL + JL670A @HL</td>
<td>1300W</td>
<td>1300W</td>
</tr>
<tr>
<td>JL758A + JL758A</td>
<td>600W</td>
<td>600W</td>
</tr>
<tr>
<td>JL087A + JL758A</td>
<td>600W</td>
<td>600W</td>
</tr>
<tr>
<td>JL670A @HL/LL + JL086A / JL670A @ HL/LL + JL087A / JL670A @HL + JL670A @LL / JL670A@ LL + JL758A / JL670A@ HL + JL758A/ JL086A + JL758A</td>
<td>N/A</td>
<td>N/A</td>
</tr>
</tbody>
</table>

### Notes

Note 1: JL670A PS – LL => 110V-120V and HL => 200V/208V-240V (PS input voltage)

Note 2: Invalid redundant PS combination. When both PS are available, allowable PoE power will be based on the higher capacity PS. When one PS fails, allowable PoE power will fall back to the lower capacity PS. This behavior is the same regardless of user enable/disable redundancy.

Note 3: When these PS combinations occur, system will allocate power based on the formula described in Note 2. On top of that, user will get warning message, event will be logged, and Global Status (Health) LED will blink amber. Pending implementation by SW.
## Competitive Comparison for 6300M DC PS

<table>
<thead>
<tr>
<th></th>
<th>Aruba 6300M DC PS</th>
<th>Cisco PWR-C1-715DC</th>
<th>Aruba 250W DC</th>
<th>Aruba 1050W DC</th>
<th>Cisco PWR-C4-950WDC-R</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Voltage Input range</strong></td>
<td>-36VDC to -72 VDC</td>
<td>-36VDC to -72 VDC</td>
<td>-36VDC to -72 VDC</td>
<td>-36VDC to -72 VDC</td>
<td>-36VDC to -72 VDC</td>
</tr>
<tr>
<td><strong>PoE Budget</strong></td>
<td>~430W</td>
<td>NA</td>
<td>~700W</td>
<td>~700W</td>
<td>~700W</td>
</tr>
<tr>
<td><strong>List Price</strong></td>
<td>$1,500</td>
<td>$1,499</td>
<td>$2,799</td>
<td>$2,500 $\text{ }^1$</td>
<td></td>
</tr>
</tbody>
</table>

### Notes:

- PoE Budget figures are approximate values and are dependent on other factors such as temperature voltage.
- Cisco has only 715W DC PSU for PoE and Non PoE use cases.
- Currently Extreme and Meraki don’t have a DC PSU and Juniper has one but is priced extremely low @$795 for a 550W DC PSU.
- Cisco PWR-C4-950WDC-R is supported on **Cat 9500 series** only and is added here for reference only.
Aruba 6300M DC Cable Installation

- The DC cable is used to connect the output of the DC source to the DC PS input.
- **Green**: GROUND
  - Screw terminal marked with symbol on the power supply (as shown in the picture)
- **Red**: DC+
  - Marked as +DC on the power supply (as shown in the picture)
- **Black**: DC-
  - Marked as -DC on the power supply (as shown in the picture)

<table>
<thead>
<tr>
<th>Aruba 6300M DC PS</th>
<th>Recommended DC Cable</th>
</tr>
</thead>
<tbody>
<tr>
<td>JL757A</td>
<td>12 AWG, 3-way cable (Ground, +DC, -DC) Recommended cable for use: HPE HPPN 5400-3521</td>
</tr>
<tr>
<td>JL758A</td>
<td>8 AWG, 3-way cable (Ground, +DC, -DC) Only cable for use: HPE HPPN 5400-3519</td>
</tr>
</tbody>
</table>

**Note1**
For JL758A – only 8 AWG cable can be used. This is also specified with a label pasted underneath the DC input connector on the PS.

**Note2**
Other cables may also be used, if they meet the input current requirements for the power supply.

**Note3**
Colour code usage may vary at the customer site. In telecommunications, +DC is at ground potential and therefore typically Black colour wire is used. While -DC is hot and therefore Red is preferred.
DC Cable Assembly Precautions

– Mandatory to leave a 3-inch gap below the unit for the DC cable.

– DC cable has to be supported after assembly by tying it to a fixed structure or letting it rest on a cable rack.
DC Cable Installation Instruction

– Under no circumstances should any lugs or wire terminals be loose.
– DO NOT tie the DC cables to the fan handles as it is not designed to take the weight of the cables.
– DO NOT install the lug in the reverse direction (i.e., crimped insulator should be facing outwards).
– DO NOT move the unit powered on or with the DC cables installed.
– DO NOT remove the PS with the DC cables installed.
– ALWAYS first connect the DC cable to the HPE DC input power supply and then followed by to the output of the DC source.
– NEVER connect the DC cable that is “LIVE” to the HPE DC input power supply.
– ALWAYS turn ON the DC source AFTER:
  – Making sure the DC power supply is correctly inserted into the PS slot on the HPE switch chassis.
  – The DC cable has been adequately restrained and strain relieved.
  – The DC cable has been connected to the power supply input terminals with correct polarity.
  – The other end of the DC cable has been connected with correct polarity to the DC source.
  – The power supply has been correctly connected to the electrical safety ground.
Stepwise DC Cable Assembly Process

Step 1: Place unit in rack, ensure the PS is properly inserted fully into the switch with the latch locked in place.

Step 2: Tie the cables to a fixed structure for strain relieve.
DC Cable Assembly Process

- Step 3: Remove the transparent protective cover.

- Step 4: Install the 3 wires (Ground, DC+ and DC-) Make sure that there is a 3 inch gap below the unit.

- Step 5: Reinstall the transparent protective cover, then connect the other end of the DC cable to a DC source.
Aruba 6300M with DC PS inside a rack
PS Troubleshooting

AC or DC PS Troubleshooting details are same!
PS Troubleshooting

AC or DC PS Show and Event logs Commands

VSP-6300# show events -r -d powerd
Event logs from current boot

Event logs:
2021-06-07T05:19:42.974267+00:00 Edison-VSP-6300 powerd[3984]: Event[301] LOG_INFO|UKWN|6|PSU 6/2 changed state to OK
2021-06-07T05:19:42.974267+00:00 Edison-VSP-6300 powerd[3984]: Event[301] LOG_INFO|UKWN|2|PSU 2/1 changed state to OK
2021-06-07T05:19:42.974267+00:00 Edison-VSP-6300 powerd[3984]: Event[300] LOG_INFO|UKWN|2|PSU 2/2 changed state to OK
2021-06-07T05:19:36.320357+00:00 Edison-VSP-6300 powerd[3984]: Event[301] LOG_INFO|UKWN|2|PSU 2/1 changed state to OK
2021-06-07T05:19:30.741691+00:00 6300 powerd[3984]: Event[301] LOG_INFO|MMBR|4|PSU 4/1 changed state to OK
2021-06-07T05:19:28.710045+00:00 6300 powerd[3984]: Event[301] LOG_INFO|MMBR|6|PSU 6/2 changed state to OK
2021-06-07T05:19:26.709945+00:00 6300 powerd[3984]: Event[301] LOG_INFO|MMBR|6|PSU 6/1 changed state to OK
2021-06-07T05:19:28.498952+00:00 6300 powerd[3984]: Event[301] LOG_INFO|MMBR|3|PSU 3/2 changed state to OK
2021-06-07T05:19:28.498875+00:00 6300 powerd[3984]: Event[300] LOG_INFO|MMBR|3|PSU 3/1 changed state to OK
2021-06-07T05:19:28.498875+00:00 6300 powerd[3984]: Event[301] LOG_INFO|MMBR|5|PSU 5/2 changed state to OK
2021-06-07T05:19:28.498875+00:00 6300 powerd[3984]: Event[301] LOG_INFO|MMBR|5|PSU 5/1 changed state to OK
2021-06-07T05:25.916720+00:00 6300 powerd[3984]: Event[300] LOG_INFO|MMBR|4|PSU 4/2 faulted. Total fault count: 1
2021-06-07T05:25.916660+00:00 6300 powerd[3984]: Event[300] LOG_INFO|MMBR|4|PSU 4/2 changed state to Output Fault
2021-06-07T05:19:26.380999+00:00 6300 powerd[3984]: Event[301] LOG_INFO|MMBR|8|PSU 8/1 changed state to OK
2021-06-07T05:19:26.380999+00:00 6300 powerd[3984]: Event[300] LOG_INFO|MMBR|10|PSU 10/1 changed state to OK
2021-06-07T05:19:24.030441+00:00 6300 powerd[3984]: Event[301] LOG_INFO|MMBR|7|PSU 7/2 changed state to OK
2021-06-07T05:19:24.030441+00:00 6300 powerd[3984]: Event[301] LOG_INFO|MMBR|7|PSU 7/1 changed state to OK
2021-06-07T05:19:23.326311+00:00 6300 powerd[3984]: Event[301] LOG_INFO|MMBR|9|PSU 9/1 changed state to OK
2021-06-07T05:19:18.101288+00:00 6300 powerd[3984]: Event[301] LOG_INFO|MMBR|7|PSU 7/1 changed state to OK
2021-06-07T05:19:18.101234+00:00 6300 powerd[3984]: Event[301] LOG_INFO|UKWN|5|PSU 5/2 changed state to OK
2021-06-07T05:19:18.101234+00:00 6300 powerd[3984]: Event[301] LOG_INFO|UKWN|5|PSU 5/1 changed state to OK
2021-06-07T05:19:17.730179+00:00 6300 powerd[3984]: Event[301] LOG_INFO|UKWN|7|PSU 7/1 changed state to OK
2021-06-07T05:19:17.730179+00:00 6300 powerd[3984]: Event[301] LOG_INFO|UKWN|4|PSU 4/1 changed state to OK
2021-06-07T05:19:17.730179+00:00 6300 powerd[3984]: Event[301] LOG_INFO|UKWN|4|PSU 4/2 faulted. Total fault count: 1
2021-06-07T05:19:17.730179+00:00 6300 powerd[3984]: Event[301] LOG_INFO|UKWN|4|PSU 4/2 changed state to Output Fault
2021-06-07T05:19:17.413327+00:00 6300 powerd[3984]: Event[301] LOG_INFO|UKWN|4|PSU 4/2 changed state to Output Fault
2021-06-07T05:19:17.413327+00:00 6300 powerd[3984]: Event[301] LOG_INFO|UKWN|4|PSU 4/1 changed state to OK
2021-06-07T05:19:17.413327+00:00 6300 powerd[3984]: Event[301] LOG_INFO|UKWN|4|PSU 4/2 faulted. Total fault count: 1
2021-06-07T05:19:17.413327+00:00 6300 powerd[3984]: Event[301] LOG_INFO|UKWN|4|PSU 4/2 changed state to Output Fault
2021-06-07T05:19:17.255059+00:00 6300 powerd[3984]: Event[301] LOG_INFO|UKWN|10|PSU 10/1 changed state to OK
2021-06-07T05:17.146129+00:00 6300 powerd[3984]: Event[301] LOG_INFO|UKWN|8|PSU 8/1 changed state to OK
2021-06-07T05:17.146129+00:00 6300 powerd[3984]: Event[301] LOG_INFO|UKWN|3|PSU 3/2 changed state to OK
2021-06-07T05:17.146129+00:00 6300 powerd[3984]: Event[301] LOG_INFO|UKWN|3|PSU 3/1 changed state to OK
2021-06-07T05:16.964017+00:00 6300 powerd[3984]: Event[301] LOG_INFO|UKWN|6|PSU 6/2 changed state to OK
2021-06-07T05:16.963964+00:00 6300 powerd[3984]: Event[301] LOG_INFO|UKWN|6|PSU 6/1 changed state to OK
2021-06-07T05:16:38.221609+00:00 6300 powerd[3984]: Event[301] LOG_INFO|UKWN|7|PSU 7/2 changed state to OK
2021-06-07T05:16:38.066756+00:00 6300 powerd[3984]: Event[300] LOG_INFO|UKWN|7|PSU 7/1 changed state to OK

CX6300M# show environment power-supply

<table>
<thead>
<tr>
<th>Mbr/PS</th>
<th>Product</th>
<th>Serial</th>
<th>PS</th>
<th>Number</th>
<th>Number</th>
<th>Status</th>
<th>Input</th>
<th>Voltage</th>
<th>Wattage</th>
</tr>
</thead>
<tbody>
<tr>
<td>1/1</td>
<td>JL758A</td>
<td>TWD70WX02X</td>
<td>OK</td>
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<td>36V-72V</td>
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<td></td>
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<tr>
<td>1/2</td>
<td>JL758A</td>
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<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

CX6300M#
PS Troubleshooting

depbug info

To enable debugging in the system execute, “debug pwrmgmt all severity info”
– Example output: To view the debug logs captured once debug is enable, execute “Debug module pwrmgmt severity info”
VSF-6300# diag show power-supply
Subsystem: Base

Maximum PSUs: 2
Minimum PSUs: 1
Power Maximum: 500 Watts
Power Instantaneous: 45 Watts
Power Correction Factor: 0 %
Mixed PSU configuration: No
Redundancy Set: none
Redundancy Operational: none
Max Redundant PSUs: 0
Num of OK PSUs: 0
Redundant PSUs: 0
Redundant PSU Type: (null)
Redundant Power: 0 Watts
Redundant PSU Power: 0 Watts

PSU: 1/1
Type: JL757A
FRU EEPROM: Present
PSU CONTROLLER: Present
PoE Capable: Non Capable
Product Name: JL757A
Serial Number: TW09KWJ01Q
Manufacturer Name: Aruba
Revision Number: 01
Model Number: 0957-2520
Description: Aruba X371 12VDC 250W PS
Status: ok
Present: ok
Input Power: ok
Output Power: ok
Bit Status: ok
MCU Status: 0
FW Revision: 00.00.00
Power Maximum: 250 Watts
Power Correction: 0 Watts
Power Instantaneous: 14 Watts
Last Read Uptime: 1807421 s 873297 ms
Present Uptime: 7 s 743483 ms
Power OK Uptime: 7 s 743483 ms
Fault Uptime: 0 s 000000 ms
Total Warning Counts: 0
Total Failure Counts: 0

PSU: 1/2
Type: JL757A
FRU EEPROM: Present
PSU CONTROLLER: Present
PoE Capable: Non Capable
Product Name: JL757A
Serial Number: TW09KWJ00H
Manufacturer Name: Aruba
Revision Number: 01
Model Number: 0957-2520
Description: Aruba X371 12VDC 250W PS
Status: ok
Present: ok
Input Power: ok
Output Power: ok
Bit Status: ok
MCU Status: 0
FW Revision: 00.00.00
Power Maximum: 250 Watts
Power Correction: 0 Watts
Power Instantaneous: 14 Watts
Last Read Uptime: 1807421 s 873297 ms
Present Uptime: 7 s 743483 ms
Power OK Uptime: 7 s 743483 ms
Fault Uptime: 0 s 000000 ms
Total Warning Counts: 0
Total Failure Counts: 0
PS Troubleshooting
diag commands

6300-1-VSFP# diag show power-supply fru 1/1
FRU contents of the PSU: 1/1

Common Header:
- Common Header Format Version: 1
- Internal Use Area Offset: 0x00
- Chassis Info Area Offset: 0x00
- Board Area Offset: 0x08
- Product Info Area Offset: 0x28
- MultiRecord Area Offset: 0x70
- PAD: 0x00
- Common Header Checksum: 0xeb

Internal Use Area:
- Section not found, nothing to dump

Chassis Info Area:
- Section not found, nothing to dump

Board Area:

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<th>Address Range</th>
<th>Value (Hex)</th>
<th>ASCII</th>
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<td>01000001 050e00eb</td>
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</tr>
<tr>
<td>0x08-0x0f</td>
<td>010419b0 58bc0c0</td>
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</tr>
<tr>
<td>0x10-0x17</td>
<td>c0ca3039 53372d32</td>
<td>...957-2</td>
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<td>0x18-0x1f</td>
<td>34373400 c830372f</td>
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<td>.......P</td>
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FAQs DC PS
FAQs DC PS

Q1. Why am I not able insert the PS into a slot on the 6300M?
   - Check that the correct PS type (PoE or non-PoE as applicable) is being used.
     - A non-PoE PS cannot be inserted into the PS slot of a PoE switch.
     - A PoE PS cannot be inserted into the PS slot of a non-PoE switch.

Q2. Why is my PS not turning on / 6300M switch not booting – if using a single PS or PS Green Status LED does not turn on?
   - Check that the correct cable supplied with the DC PS is used
     - JL758A cannot use the DC cable (5400-3521) supplied with the JL757A.
       - 5400-3521 cable cannot support the input current of the JL758A.
   - Check that the PS is fully inserted into the 6300M PS slot
     - Try re-inserting it again.
       - Be careful while doing this as the DC cable is quite stiff and it may be difficult to unplug the PS with the DC cable connected to it as well as tied to a fixture on the mounting rack.
   - Check that the +DC and -DC outputs of the DC source respectively wire to the +DC and -DC input of the PS DC input connector.
     - Be consistent with the wire colours vs DC polarity on both DC source and PS DC input sides.
   - Ensure that the DC and Ground terminals on both PS and DC source ends are tightened.
   - Ensure that the DC voltage measured at the PS input connector (with system load) is within the specified DC input range of the PS.
     - Use a DMM in DC Voltmeter mode for this measurement.
       - Exercise caution while taking the measurement due to the voltages involved here.
   - Ensure that the Green wire of the DC cable fastened to the PS Earth terminal is connected to a Safety Ground at the installation site.
   - Ensure that the circuit breaker (if used) on the DC source is correctly sized for the DC PS in use.
     - If not, then at system load (partial/full) and DC input being towards lower extreme of the DC input range, the breaker may trip due to high input current.
FAQs DC PS

Q1: Is it possible to mix PoE and non-PoE DC/AC power supplies in a 6300M?

Not possible. PoE PS are not insertable into a non-PoE model PS slot (and vice versa); this is due to mechanical keying implemented on PoE and non-PoE modular PS switch models to prevent incompatible power supplies from being installed.

All modular PS are mechanically keyed such that:
- A PoE PS cannot be inserted into a non-PoE switch model PS slot.
- And, a non-PoE PS cannot be inserted into a PoE switch model PS slot.

Q2: Is it possible to insert different PoE PS into 6300M?

- Yes possible, but not recommended.

Q3: Is DC PS NEBS (Network Equipment-Building System) Certified?

- Currently No. Once we have production level PS, team will work on NEBS.

Q4: Which customer or who needs DC PS?

- Telco's network
- Energy and Transportation few customers
- Few Japan and other APAC customers
- Few federal customers
FAQs DC PS

Q1. Is it mandatory to use Aruba DC power cables?
No, the customer is free to use their own DC cables.
  - JL757A: 12 AWG
  - JL758A: 8 AWG

Q2. Can either 8 AWG or 12 AWG cables be used to power either DC power supply?
The 8 AWG cable can be used to power either DC PS. However, the 12 AWG cable can only be used to power the JL757A (non-PoE PS).

This is due to the different current carrying capabilities of the cables. JL758A PS input current is 32A max, with system load. JL757A PS input current is 8.2A max.

Recommended DC cable HPPN 5400-3519 for JL758A.
Recommended DC cable HPPN 5400-3521 for JL757A.

Q3. What is the difference between the 8 AWG and 12 AWG cables?
The 8 AWG cable is rated for higher current (40A) than the 12 AWG (25A) cable.
The 8 AWG cable is thicker and heavier than the 12 AWG type.

AWG* - American Wire Gauge
Thank you

yashavantha.n.n@hpe.com