GPS Antenna Distributions System T208

1. Description

T216 is a GPS 2x8 antenna distribution tiny system, low power consumption, simple system without network management system, it supports dual antennas input and 8 ports output for BBU system . Sharing the two GPS timing antennas. T208 is a splitter system for sharing gps antenna for 5G BBU systems. The T208 supports dual 48V DC inputs. Supply 4 ways dry contact outpouts. Designed for 5G BBU system.
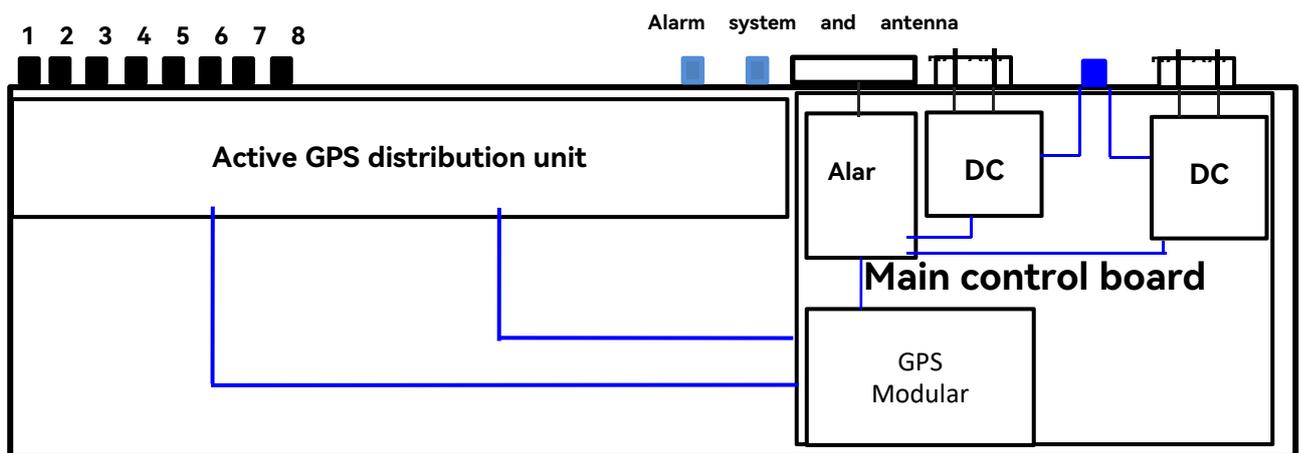

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2. Performance Parameter
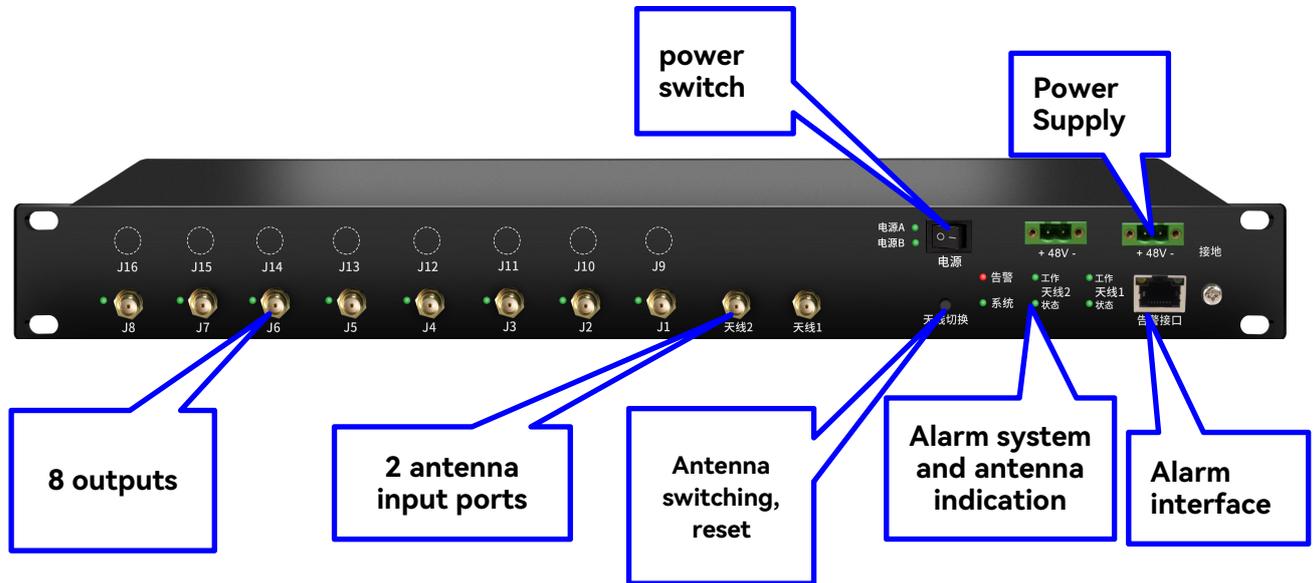
Working Frequency（MHz）	1557.5~1587.5
Gain（dB）	Overall Gain≥30±2;
Noise figure（dB）	≤3
Standing wave ratio	≤1.5
Output power（dBm）	≥-25
Impedance（Ω）	50
Input Ports	2　SMA-Female
Output ports	8　　SMA-Female
Input Power	30V~72V Isolated DC Power 2 Ways
Working power	48V/≤200mA
Output Power From Input Ports	5V/ < 200mA
Dimension	482.6mm ×96mm × 44 mm (D * W * H)
Net Weigh	1.4KG
Working temperature	-20℃~70℃
Storage temperature	-30℃~80℃

3. Product block diagram and interface

Interface description

power switch

Power Supply

8 outputs

2 antenna input ports

Antenna switching, reset

Alarm system and antenna indication

Alarm interface

4. Installation steps and instructions:

1. Fixed equipment: fix the side ears on both sides of the front end of the equipment on the equipment rack.

2. Connect the grounding wire: connect one end of the grounding wire to the equipment grounding device and the other end to the frame grounding device.

3. Access the GPS Beidou antenna signal: when confirming that the outdoor GPS Beidou antenna is well installed and the feeder is led into the equipment rack, connect the antenna 1 and antenna 2 ports respectively, and tighten the connector.

4. When the DC power supply of the two pairs of equipment is connected to the 48V power supply of the base station, ensure that the power supply of the two pairs of equipment is switched off respectively.

5. Turn on the power supply and debug the equipment: turn on the power supply, the power indicator is on, and the power input is normal; The working indicator light is on and the equipment works normally; The antenna status indicator is on and the antenna works normally (antenna 1 and antenna 2 will automatically switch once. After that, antenna 1 works normally and antenna 2 is backed up by default).

6. Detect the output port signal: use the signal detector to detect the signal state of each output port.

7. Connect equipment and BBU \ slave equipment: connect the equipment output port with BBU \ slave equipment with soft jumper (sma-j interface), and tighten the connector. The idle interface of the equipment does not need to connect the load, and it can be dustproof with a dust cap.

8.   Let the equipment remember the current connection status: when the equipment is connected to the port, long press the antenna switching button (for 5 seconds), the equipment will remember the status of the currently connected port. When the status of the port changes, the equipment will generate an alarm (buzzer will sound, dry contact alarm output alarm signal). Long press the antenna switching key for 5 seconds again, the equipment will remember the current status again, the alarm disappears, and the system returns to normal state.

9.   Observe the status of the indicator light:

Power supply a and power supply B are always on, the status indicators of antenna 1 and antenna 2 are always on, and the system light is always on, which is the normal working state.

The following is the meaning of the indicator:

1) The indicator lights of power supply a and power supply B are on, indicating that there is power supply and it works normally; An off indicates that the power supply is not powered or the power module is faulty.
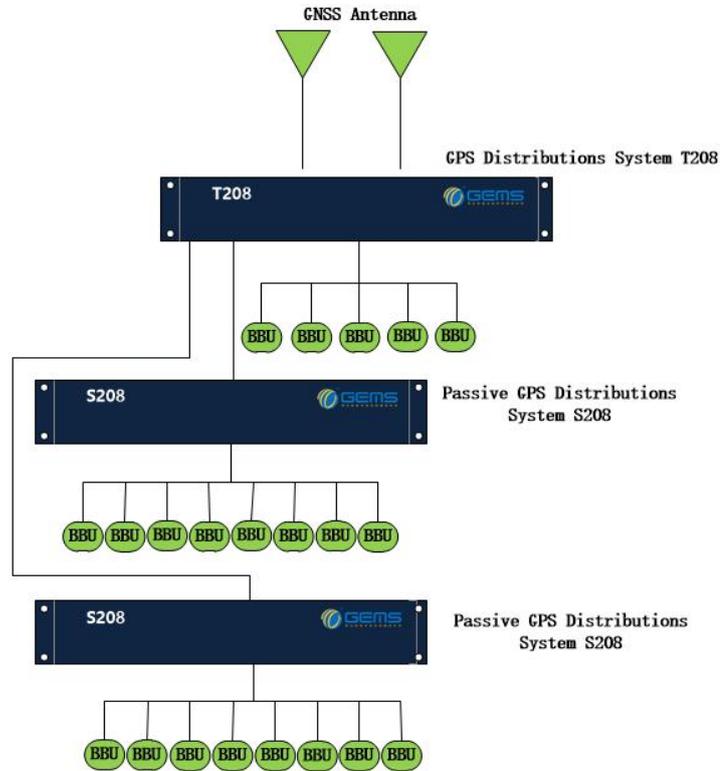
2)   The working indicator lights of antennas 1 and 2 flash, which means that the antenna switching mode is automatic (when one antenna is disconnected, it will automatically switch to the other);

3) The working indicator lights of antennas 1 and 2 are always on, which means that the antenna switching mode is selected (only this antenna is selected and will not be switched when disconnected). Press the antenna switching button to adjust the automatic mode;

4) If the antenna status indicator is always on, it indicates that the antenna is connected normally, and the port antenna or antenna goes out in case of failure.

5)   Normally on means the satellite system is not locked.

5.Typical application:

6 . Product Size:

Equipment Size: 482.6mm ×96mm × 44 mm (D * W * H)