

# *SPD for GPS*

*Model: GPSP1-L1-□□□JJ*

## *Installation Instruction*

Thank you very much for your purchase of a Sankosha product.

- To use your product safely, please read this installation instruction before using your product.
- Keep this installation instruction in an easily accessible location, so that you can read it when you need to.
- The contents of this document may change without notice due to product improvement and other reasons.

This product protects against abnormal voltage resulting from the lightning surge to equipment that is connected to GPS port. This product frequency band is supporting GPS L1 frequency. Coaxial connector can be chosen from TNC and N.

### <Warranty Period and Conditions>













The warranty period is for one year from the delivery date. Your product will be replaced with a product in good condition if a problem that occurs during this period is determined to be the responsibility of Sankosha. Replacement is limited to the actual product only. Any expenses incurred by the replacement will be charged to the customer.

This product was shipped after a strict inspection. If a problem arises due to a manufacturing deficiency or if you believe the product was damaged during shipment, please inquire with your distributor or local Sankosha branch office.

 **SANKŌSHA**

## Warning

### For safe use of your product

 <b>No</b>	Do not use your product for any purposes other than the intended purpose. ◇It may lead to product failure.
 <b>No</b>	This product is not waterproof and should be used indoors. The product should not be used outside or in other locations where it come into direct contact with water. ◇It may lead to product failure.
 <b>No</b>	Do not disassemble the product, apply pressure deformation, and apply heat above the specified use conditions or either modify the product or change its components. ◇It may lead to product failure.
 <b>No</b>	During operation, do not let foreign matter enter between the terminals and avoid touching the terminal area directly with your hands. ◇It may lead to product failure.
 <b>No</b>	Do not wipe the product with water, thinner, or other solvents or otherwise wet it with such liquids. ◇It may lead to product failure.
 <b>No</b>	Be sure to keep the product free from physical shock from dropping to other means. ◇It may lead to product failure.
 <b>No</b>	Please fix this product body, and install so as not to apply load to the coaxial connector. ◇It may lead to product failure.
 <b>Warning</b>	To remove dirt from this product, wipe it with a soft cloth. Never wash it with water. It may lead to product failure.
 <b>Warning</b>	Please read this installation instruction before connecting this product. ◇It may lead to product failure.
 <b>Warning</b>	In order to reliably discharge a lightning surge, please connect the ground terminal of this product to the Ground terminal of the protecting equipment and ground the ground wire.
 <b>Danger</b>	Please do not touch to each terminal of the product, when there is a possibility of lightning. ◇There is a possibility of electric shock.
 <b>Danger</b>	If you can feel heat or see smoke coming from your product, remove the product immediately and do not use it any more. ◇Continued use may cause fire.

## Contact Details

**SANKOSHA CORPORATION**

URL: <https://www.sankosha.co.th/>

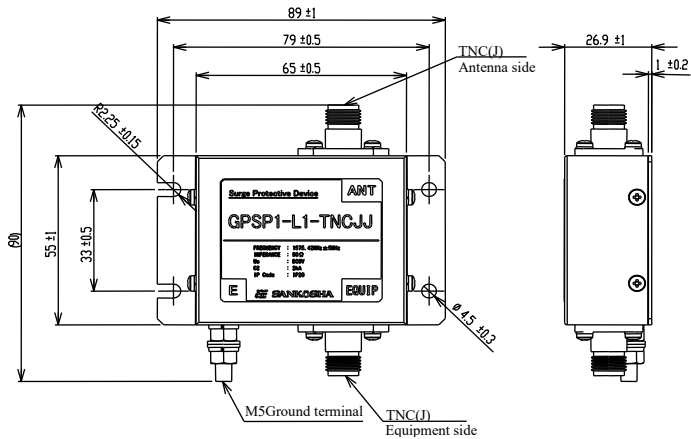
E-mail: [info@sankosha.co.th](mailto:info@sankosha.co.th)



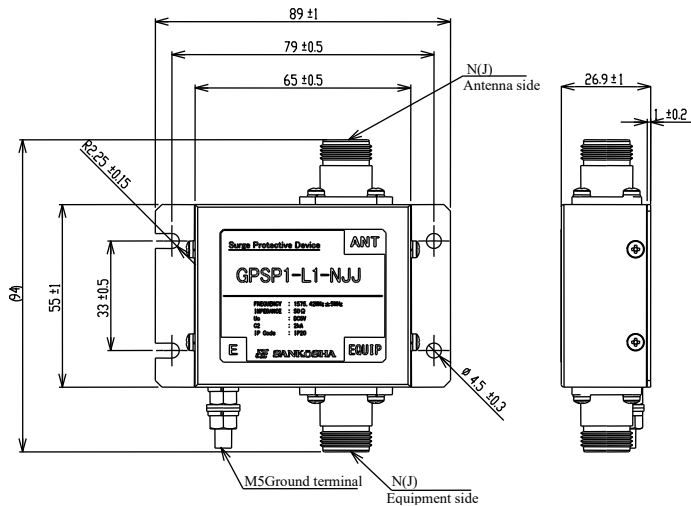
For contact information, please access from two-dimensional code on the left side, or visit our website on the following URL.

**[Outline Drawing]**

GPSP1-L1-TNCJJ outline drawing



GPSP1-L1-NJJ outline drawing



**[Product Model]**

GPSP1-L1-□□□JJ

→ It shows the connector Plug or Jack in the order of the equipment side from the antenna side.

JJ : Jack-Jack

It shows the connector Type.

TNC : TNC-type coaxial connector

N : N-type coaxial connector

**[Environment]**

Location	:	Indoor
Rated and storage temperature	:	-40°C ~ +85°C
Rated and storage humidity	:	≤90% (no condensation)

**[Specifications]**

No.	Item	Conditions	Performance
1	Frequency Band	---	1575.42MHz ± 5MHz
2	Characteristic Impedance	---	50Ω
3	Insertion Loss	1575.42MHz±5MHz	≤ 1.0dB
4	Voltage Standing Wave Ratio	1575.42MHz±5MHz	≤ 1.3
5	Propagation Delay Time	1575.42MHz±5MHz	≤ 1ns
6	Allowable Power	---	10W
7	Maximum continuous operating voltage · current	---	DC6V 100mA
8	Insulation resistance	DC6V	≥ 1kΩ
9	Voltage protection level(Up)	1.2/50μs 4kV	≤ 10V
10	Impulse durability	<span style="border: 1px solid black; padding: 0 2px;">C</span> 2 8/20μs	2kA
11	DC resistance	DC100mA	≤ 1Ω

**[Supplied Parts]**

- Installation Instruction (this document) ..... 1

**[Installation]**

Connection and installation of this product please follow the following order.

(See outline drawing and the real thing)

- (1) Please be reliably fix the body using the four holes of the body corners.
- (2) Prepare the coaxial cable and connect the EQUIP connector and protected equipment of this product.
- (3) Connect to the ANT connector of this product with coaxial cables currently in use.
- (4) Connect ground wire to ground terminal of this product.

**(Ground terminal tightening torque : Recommended 3N·m / Maximum 4 N·m)**

**Note**

- Please be sure the ground terminal of the product to the ground connection in order to exert a protective performance.
- Please do not rotate the product when connecting the coaxial connector. It may lead to product failure.
- Please do not loosen the nut at the product body side of the Ground terminal.  
It may lead to product failure.
- Ground wire, Coaxial cable and screws to fix the body are not included.  
Please purchase a commercial product separately.
- Tightening torques of Ground terminal are the largest 4N · m.
- It may peel off the paint around the fixing holes if the product body fixing using screws.