

RTD TRANSMITTER

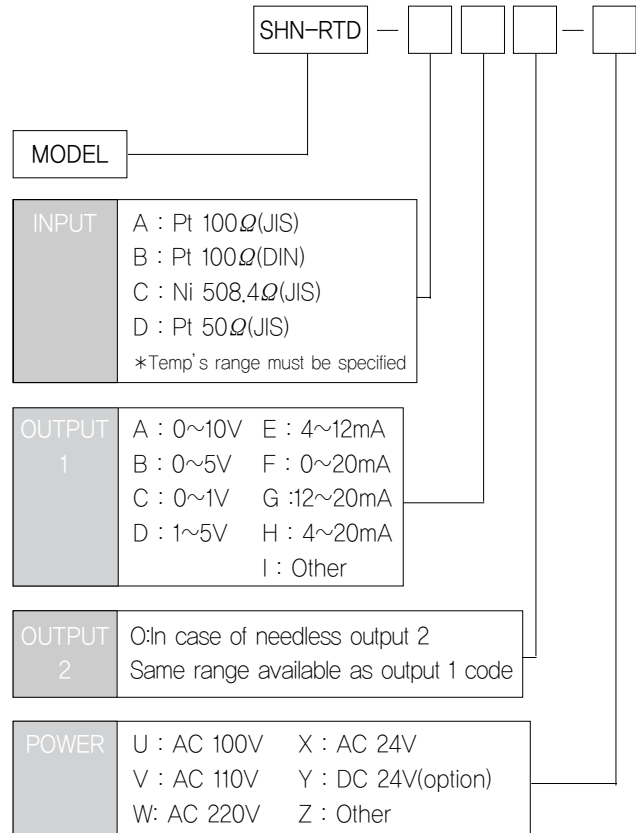
SHN-RTD



A converter is designed for converting the input signal that receives from RTD temperature sensor into isolated process signal.

- Long distance transmission between the RTD and the transmitter
- Combination with intrinsic safety barriers.
- Contains linearizer circuit.
- 1 or 2 outputs are available from 1 input.
- Contains overvoltage protection circuit.
- Transformer isolation type.

MODEL & SUFFIX CODE SELECTION



GENERAL SPECIFICATIONS

| | | | |
|--------------------------------|--|----------|----------|
| Isolation/Type | Input to output to power/Transformer isolation type | | |
| Power Supply | AC rating ±10%, approx. 3.5VA DC rating ±10%, (ripple 10%)100mA | | |
| Accuracy | ±0.25%(Max) | | |
| Temp Coefficient | ±0.015% / °C(±0.008%/°F) | | |
| Linearity | ±0.02% F.S | | |
| Insulation Resistance | Greater than 100MΩ with DC 500V | | |
| Dielectric Strength | Input - Power | AC 2500V | 1 minute |
| | Input - Output | | |
| | Output 1 - Output 2 | | |
| | GND - Power | | |
| Front Adjustments | Zero and Span ±5% | | |
| Overrange Output | approx. -10% ~ 110% at DC 1~5V | | |
| Response Time | ≤0.5 sec (0~90%) | | |
| Operating Temperature/Humidity | -20~60°C / 90%(N,C) | | |
| Storage Temperature/Humidity | -20~80°C / 95%(N,C) | | |
| Dimensions | 8 pin: W50xH85xD122(mm) | | |
| | 11 pin: W50xH85xD133(mm) | | |
| Case Material | ABS Resin (black) | | |
| Weight | about 400g | | |
| Mounting | Wall & Rail mounting | | |

INPUT & OUTPUT SPECIFICATIONS

Input Specification

- (1)Sensing current:DC 2mA
- (2)Temperature range(°C)

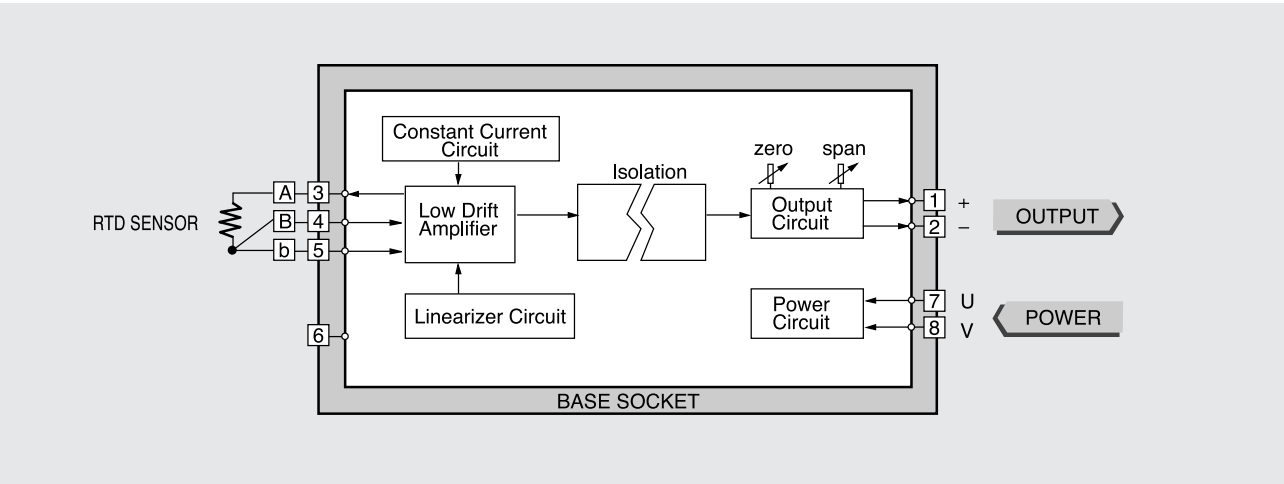
| RTD | Usable Range | | Min | | SPAN | |
|-------------|--------------|--------------|-----|-----|------|----|
| | °C | °F | °C | °F | °C | °F |
| Pt100Ω /JIS | -200 to+650 | -328 to+1202 | 50 | 122 | | |
| Pt100Ω /DIN | -200 to+650 | -328 to+1202 | 50 | 122 | | |
| Pt 50Ω | -200 to+500 | -328 to+ 932 | 100 | 212 | | |
| Ni508.4Ω | - 50 to+200 | - 58 to+ 392 | 50 | 122 | | |

Output Load Resistance

| Output | 1 Point | 2 Point | | Remark |
|----------|---------|----------|----------|--------|
| | Output | Output-1 | Output-2 | |
| 4 ~ 20mA | 700Ω | 600Ω | 350Ω | (Max) |
| 0 ~ 20mA | 700Ω | 600Ω | 350Ω | (Max) |
| 2 ~ 10mA | 1200Ω | 1200Ω | 700Ω | (Max) |
| 1 ~ 5V | 5000Ω | 5000Ω | 5000Ω | (Min) |
| 0 ~1V | 1000Ω | 1000Ω | 1000Ω | (Min) |

BLOCK DIAGRAM

1 Point Output



2 Point Output

