

## MD-TA INTEGRATED TEMPERATURE TRANSMITTER

### TECHNICAL CHARACTERISTICS:

- ✓ Integrated design, compact structure, max diameter 18mm
- ✓ 4~20mA output, strong anti-interference design
- ✓ Circuit design using lightning protection and anti-electrical fast transient (pulse group) interference
- ✓ Ultra-low power consumption design
- ✓ 316L stainless steel probe and shell



MD-TA compact temperature transmitter is an integrated ultra-stable temperature transmitter with a built-in imported PT100 high-precision temperature sensor. It adopts a compact circuit with input and output isolation.

This temperature transmitter adopts the circuit design of lightning protection and anti-electrical fast transient (pulse group) interference. It has the lightning protection function which the lightning protection index reaches the induction lightning( $\leq$ IA4000V) for 5 times continuously without damage to the equipment. Input and output are capable of resisting iA4000V interference from electrical fast transients (pulse group). This product can effectively protect the damage due to induction lightning or start and stop of the high power facility in the power supply system, circuit fault, the operation of inverter equipment and electric welder in the construction site etc. This product can effectively prevent damage caused by induction lightning or start-stop of high-power equipment in the power supply system, line failures, switching operations, operation of frequency conversion equipment, and welding machines during field construction

The probe and housing of the product are made of 316L stainless steel, the structure is laser welded, and the connection line adopts IP67 waterproof aviation plug-in line, which greatly guarantees the long-term stability and reliability of the product.

### APPLICATION:

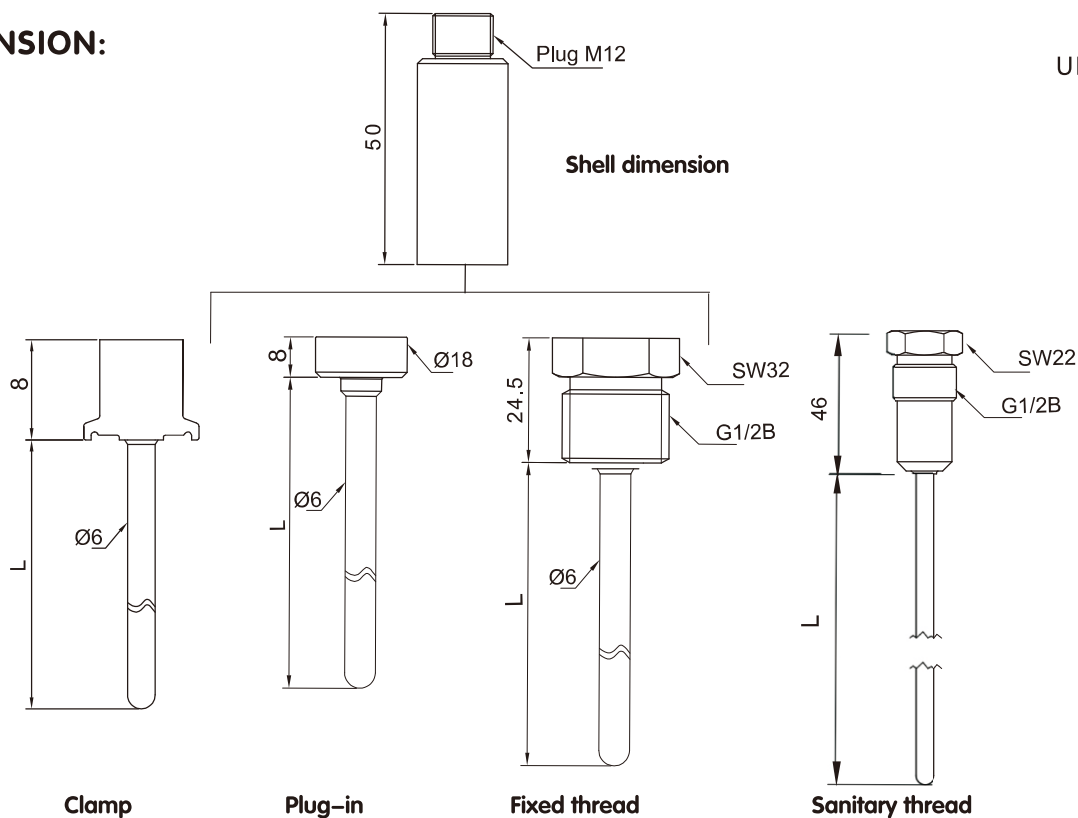
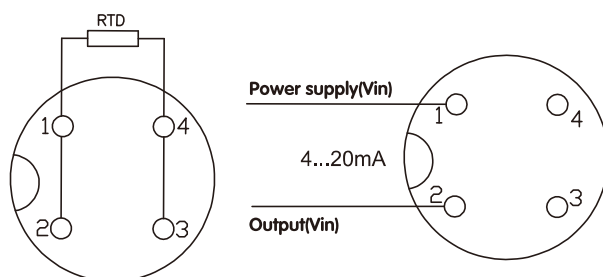
- ◇ Instrumentation supporting
- ◇ Laboratory
- ◇ Construction machinery
- ◇ Automatic production line
- ◇ Petrochemical
- ◇ Environmental monitoring

### SPECIFICATION:

Range	-50~255℃ ( Output: 4~20mA ) -200~500℃ ( PT100 platinum resistance is optional )
Acc.	0.2℃
Output	4~20mA
Limit current	<25mA
Power supply	9~30V (Typical 24VDC)
Response time	1 second
Temperature drift coefficient	0.005%FS/1℃ (Typical value)
Environment temperature	-40~85℃
Lightning protection	4000V ( $\leq$ 5 times)
Anti-pulse group	4000V
Anti-radio frequency interference	>10V/m (80MHz~1000MHz)
Probe diameter	6mm (customized)
Connection	G1/4 M20*1.5 (customized)
Connector material	316SS
Shell material	316SS
Measurement Medium	Gases and liquids compatible with 316 stainless steel
IP rating	IP 67
Outlet method	M12 waterproof aviation plug
Product protection	Reverse polarity protection

**DIMENSION:**

UNIT:mm


**ELECTRICAL CONNECTION:**

**SELECTION GUIDE:**
**MD — TA — (–50~100)°C — 2 — M20 — 6 — 25**
**MODEL:**

TA

**RANGE:**

–50~100°C

**ACCURACY:**

2 (0.2°C)

**SCREW THREAD:**

M20 (M20\*1.5) G14 (G1/4)

G12 (G1/2) N12(NPT1/2)

N14(NPT1/4) M9(Customized)

**PROBE LENGTH:**

X (Length can be selected according to customer's requirement)

**PROBE DIAMETER:**

6 (6 mm diameter)

8 (8 mm diameter)

10 (10 mm diameter)

