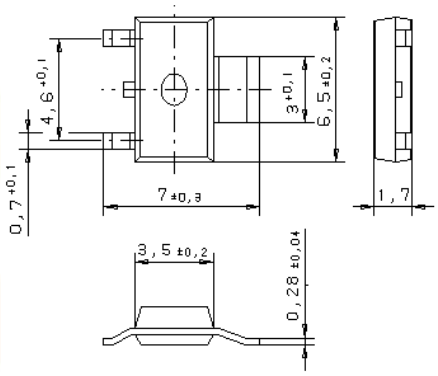
Housed Platinum Resistance Temperature Detector SOT 223

The Pt1000 PRTD in a standard SOT 223 housing is characterized by its standardized signal according to DIN EN 60751 (according to IEC 751), interchangeability, high long time stability and accuracy. It is designed for automatic mounting in electronic applications and serves e. g. for temperature compensation on PCBs. It is equipped with a cooling fin improving thermal contact to the PCB.

Nominal resistance R_0	Tolerance	Order No. Plastic bag
1000 Ohm at 0°C	Class 2 B	32 209 116

Other resistances and tolerances on request!

Specification	DIN EN 60751 (according to IEC 751)
Temperature range	- 50 °C to + 150 °C
Temperature coefficient	TCR = 3850 ppm/K
Soldering connection	copper alloy with Sn / Pb coating
Long-term stability	max. R_0-drift 0.04% after 1000 h at 150 °C max. R_0-drift 0.04% after 1000 h at - 55 °C
Resistance to soldering heat	max. deviation 0.03% after 10s at 260 °C
Self heating	0.049 K/mW at 0 °C; mounted on PCB 0.2 K/mW at 0 °C; package only
Response time	water current (v = 0.4 m/s):$t_{0.5}$ = 0.45 s; $t_{0.9}$ = 1.20 s air stream (v = 2 m/s): $t_{0.5}$ = 8.0 s; $t_{0.9}$ = 26.0 s
Measuring current	0.1 mA to 0.3 mA (self heating has to be considered)
Flammability	UL 94-V0
Specific volume resistance	20 °C: 5 x 10^{16} Ω cm 150 °C: 5 x 10^{13} Ω cm
Physical data of housing	material: duroplastic coefficient of thermal expansion: 13 x 10^{-6} 1/°C thermal conductivity: 0.65 W/mK moisture absorption: 0.5% (P.C.T.: 121 °C, 24 h)
Storing information	≤ 1 year (in dry environments) for best solderability
Note	Other tolerances and values of resistance are available on request.



We reserve the right to make alterations and technical data printed. All technical data serves as a guideline and does not guarantee particular properties to any products.

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Status: 04/2004

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