

Features

- Thermister temperature sensors are made of Negative Temperature Coefficient (NTC) embedded in a PVC or metal sleeve with a thermally-conductive sealer.
- Sensor TC
 - lead-in cable to sensor TC is made of wire CYSY 2D x 0.5 mm/0.02".
- Temperature sensors can be connected directly to the terminal block.
- Cable lengths can not be changed, connected or modified.

RS PRO Temperature Sensor

326823



RS PRO is the own brand of RS. The RS PRO Seal of Approval is your assurance of professional quality, a guarantee that every part is rigorously tested, inspected, and audited against demanding standards. Making RS PRO the Smart Choice for our customers.

Product Description

- *Thermister temperature sensors are made of Negative Temperature Coefficient (NTC) embedded in a PVC or metal sleeve with a thermally-conductive sealer.*
- *Sensor TC*
 - *lead-in cable to sensor TC is made of wire CYSY 2D x 0.5 mm/0.02".*
 - *silicone insulation for use in high temperature applications.*
- *Temperature sensors can be connected directly to the terminal block.*
- *Cable lengths can not be changed, connected or modified.*

Technical parameters

Range:	-20.. +80 °C (-4 ..176 °F)
Scanning element:	NTC 12K
Tolerance:	$\pm(0.15^{\circ}\text{C} + 0.002 t)$
In air/in water:	($\tau_{0.5}$) ≤ 18 s
In air/in water:	($\tau_{0.9}$) ≤ 48 s
Cable material:	PVC unshielded, 2x 0.25 mm ²
Terminal material:	polyamide
Protection degree:	IP67
Electrical strength:	2500 VAC
Insulation resistance:	> 200 M Ω at 500 VDC

τ_{65} (95): time, which sensor needs to heat up on 65 (95) % of ambient temperature of environment, in which is located.

Types of temperature sensor

Length:	3 m
Weight:	70 g

Odporové hodnoty senzorů v závislosti na teplotě

Temperature (°C/°F)	Sensor NTC (kΩ)
20 / 68	14.7
30 / 86	9.8
40 / 104	6.6
50 / 122	4.6
60 / 140	3.2
70 / 158	2.3

Tolerance of sensor NTC 12 kΩ is $\pm 5\%$ by 25 °C/77 °F.

Long-term resistance stability by sensor Pt100 is 0.05 % (10 000 hours).

Design and dimension

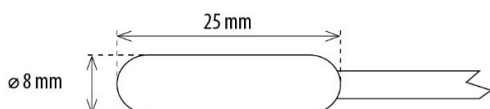
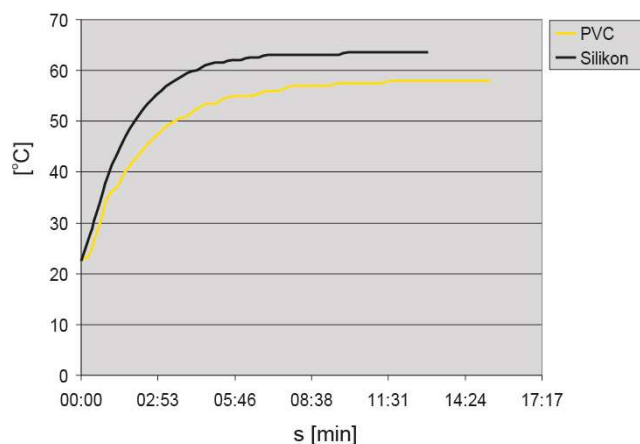


Diagramm of sensor warm up via air



PVC - reaction to air temperature from 22.5 °C .. 58 °C

(from 72.5 .. 136.4 °F).

Silicone - reaction to air temperature from 22.5 °C .. 63.5 °C

(from 72.5 .. 144.5 °F).