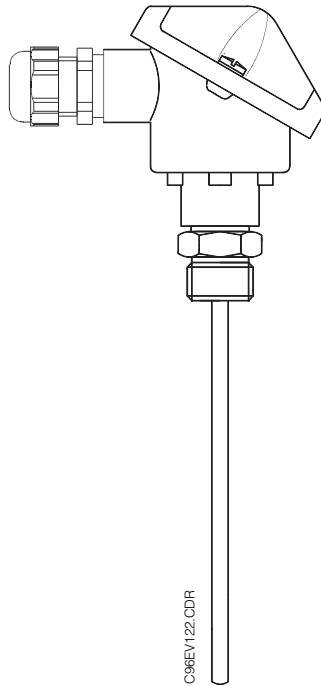


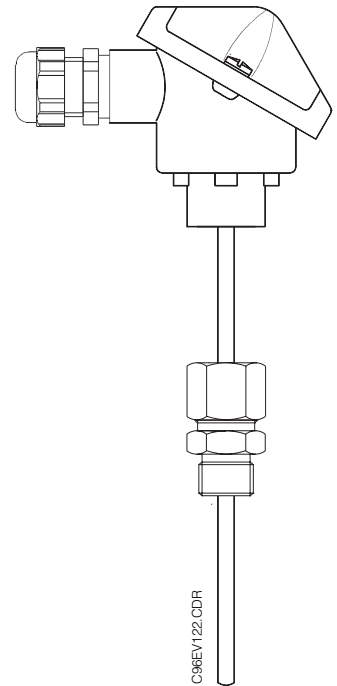
RTD Thermometer *omnigrad TST425*

**Medium duty - General purpose
fiberglass insulated inset - not replaceable**

**Ø 6 mm protecting tube with threaded process
connection or adjustable fitting**



TST425 with
threaded process connection



TST425 with
adjustable compression fitting

Description

TST425 RTD thermometer assembly includes a single Pt100 fiberglass insulated probe and a terminal head. The process connection can be selected both from threaded process connections and adjustable compression fittings. Three terminal head versions according to DIN 43729 form B and a mignon type head are available.

Application

TST425 is a general purpose RTD thermometer particularly suited to many light and medium duty applications either in vessels or pipes. It can be applied where pressure and temperature are not extreme and where the performance cost ratio is very important.

Technical data

Probe

Sensing element:	Platinum resistance, 1 x Pt100 Ω at 0°C, standard type
Tolerances:	class A or B to IEC 751
Operating temperature:	-50°C to 300°C
Wiring:	3 or 4 wire connections
Electrical connections:	terminal board
Inset:	fiberglass insulated - not replaceable
Sheath:	AISI 316Ti / W. 1.4571
Standard diameter:	6 mm
Connection to process:	G 1/4", G 1/2", 1/4" NPT or TA50 adjustable compression fitting (refer also to the Order key)
Response time values:	according to IEC751, in moving water at 0.4 m/s T ₅₀ = 17 s ; T ₉₀ = 45 s

Terminal head

TA20A

Dimensions:	according to DIN 43729 form B
Protection grade:	IP55
Max. temperature:	130°C
Material:	light alloy dye casting rubber gasket under the cover
Cable entry:	PG 16 + grey gland skintop
Thermowell entry:	M24 x 1.5
Body colour:	blue (RAL 5012), epoxy coated
Cap colour:	grey (RAL 7035), epoxy coated
Weight:	180 g

TA20B

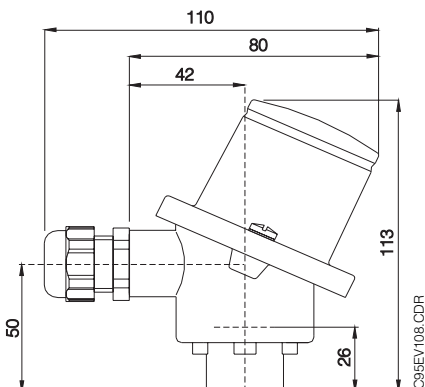
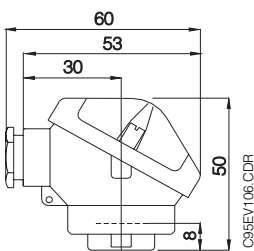
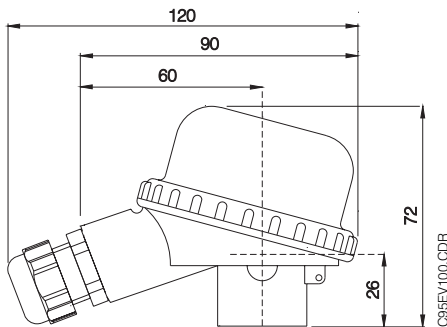
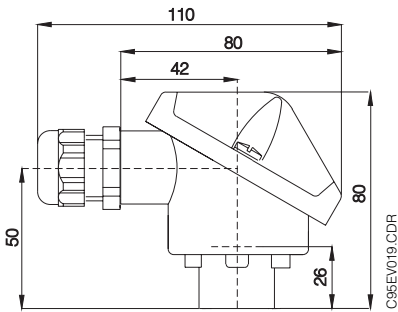
Dimensions:	according to DIN 43729 form B
Protection grade:	IP55
Max. temperature:	80°C
Material:	polyamide
Cable entry:	PG 16 + grey gland skintop
Thermowell entry:	M24 x 1.5
Body colour:	black
Cap colour:	black
Weight:	80 g

TA20L

Dimensions:	mignon type
Protection grade:	IP55
Max. temperature:	130°C
Material:	light alloy dye casting-rubber gasket under the cover
Cable entry:	PG 9
Thermowell entry:	M10 x 1 mm
Body colour:	blue (RAL 5012), epoxy coated
Cap colour:	grey (RAL 7015), epoxy coated
Weight:	75 g

TA20P

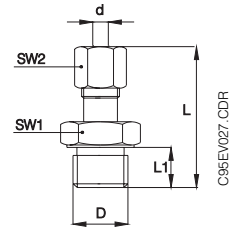
Dimensions:	according to DIN 43729 form B
Protection grade:	IP55
Max. temperature:	130°C
Body material:	light alloy with rubber gasket under the cover
Cap material:	AISI316
Cable entry:	PG 16 + grey gland skintop
Thermowell entry:	M24 x 1.5
Body colour:	blue (RAL 5012), epoxy coated
Cap colour:	grey epoxy coated or epoxy coated only
Weight:	130 g



Mounting accessories

TA50 Threaded Compression Fitting

d = 6 mm
 D = G 1/4", 1/4" NPT
 Sealing ring Teflon:
 Tmax 200°C; Pmax 10 bar (at 20°C)
 Sealing ring in W.1.4401:
 Tmax 400°C; Pmax 40 bar (at 20°C)



Order key

- For a correct temperature measurement the thermometer nominal length must be 30 times the thermometer diameter. Shorter nominal lengths can be supplied but the thermometer requires an external (process connection and connection head) thermal insulation.

TST425 RTD Thermometer - Medium duty - General purpose fiberglass insulated inset - not replaceable

Ø 6 mm protecting tube with threaded process connection or adjustable fitting

Outer diameter
 B - 6 mm

Nominal length NL

- 1 - 50 mm
- 2 - 100 mm
- 3 - 150 mm
- 4 - 250 mm
- 9 - mm to specification

Price for 100 mm complete sensor
 A - AISI 316Ti / W. 1.4571

Terminal head

- 1 - TA20A - DIN B, in Al
- 2 - TA20L - Mignon type, in Al
- 3 - TA20B - DIN B, in PA
- 4 - TA20P - DIN B, in Al, with high cap

Class and type of RTD/Wiring

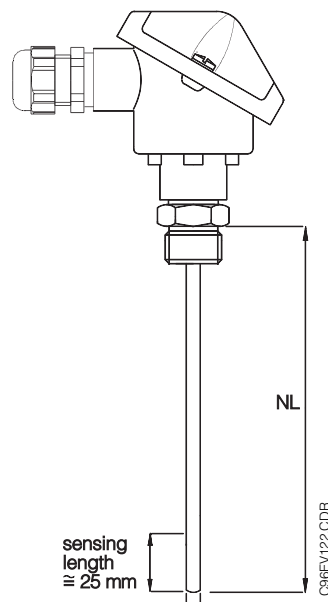
- 1B3 - 1Pt100, class B (IEC 751), 3 wires
- 1B4 - 1Pt100, class B (IEC 751), 4 wires
- 1A3 - 1Pt100, class A (IEC 751), 3 wires
- 1A4 - 1Pt100, class A (IEC 751), 4 wires

Process connection

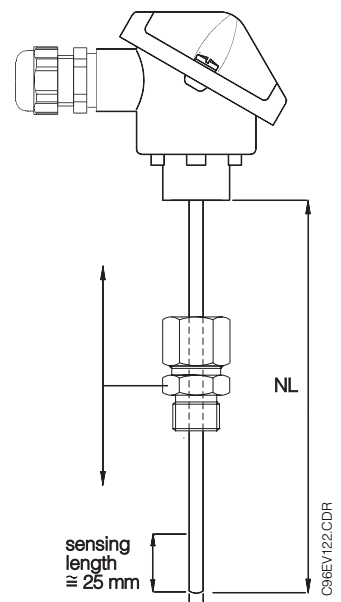
- A - Without
- C - AISI 316, G 1/4" - Adj. fitting, PTFE ring ⁽¹⁾
- D - AISI 316, G 1/4" - Adj. fitting, st. st. ring
- L - AISI 316, 1/4" NPT - Adj. fitting, st. st. ring
- M - G 1/4"
- N - G 1/2"
- P - NPT 1/4"

TST425- [] [] [] [] [] [] **Complete Order Code**

Note ⁽¹⁾ : Max. 200°C @ 10 bar.



TST425 with threaded process connection



TST425 with adjustable compression fitting

Supplementary Documentation

- TA20 terminal heads
Technical Information TI072T/02/en
- TA fittings
Technical Information TI091T/02/en

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