

## **5. DESCRIPTION OF THE PROTECTIVE DEVICES**

Dial Thermometer:

Make:	JUMO
Type:	8550-10-80
Contacts:	2 change over

Delivery address: Mackenrodtstraße 14,  
36039 Fulda, Germany  
Postal address: 36035 Fulda, Germany  
Phone: +49 661 60 03-0  
Fax: +49 661 60 03-6 07  
E-mail: mail@jumo.net  
Internet: www.jumo.de

JUMO House  
Temple Bank, Riverway  
Harlow, Essex CM20 2TT, UK  
Phone: +44 12 79 63 55 33  
Fax: +44 12 79 63 52 62  
E-mail: sales@jumo.co.uk

885 Fox Chase, Suite 103  
Coatesville PA 19320, USA  
Phone: 610-380-8002  
1-800-554-JUMO  
Fax: 610-380-8009  
E-mail: info@JumoUSA.com  
Internet: www.JumoUSA.com



# Bimetal dial thermometer DIN 16 204

## Class 1.5

## Transformer version

## Series 8005

in stainless steel case  
Protection IP55  
case size: 80 mm and 100 mm dia.

### Brief description

Bimetal dial thermometers are universal instruments for local temperature measurement.

#### Features

- unaffected by ambient temperature
- heavy-duty measuring system
- stainless-steel anti-corrosion case
- Protection IP55
- environmentally friendly (no filling fluid)

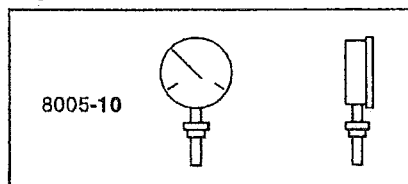
### Type designation

8005      Series 8005  
Bimetal dial thermometer  
transformer version

### Standard accessory

Operating Instructions B 60.8001

### Style



### Case size

8005-10-80 case 80 mm dia.  
8005-10-10 case 100 mm dia.

### Ranges

(similar to DIN 16 203)

Scale* °C	Measuring range °C	Accuracy °C
0 +120	+20 +100	3
-20 +120	0 +100	3

\* other ranges to special order

### Ordering example

Dial thermometer  
Type: 8005-10-80  
Range: -20 +120 °C  
Extra Code: TZ 002  
Temperature probe: TF 05, brass, 8 mm dia.  
Probe mounting: TA 22, 1" pipe male A,  
brass,  
S = 150 mm

**Temperature probe (TF)**  
TF 05, brass, 8 mm dia. throughout

**Probe mountings (TA)**  
TA 21 3/8" pipe male, brass  
probe with union nut and sealing taper

TA 22 1/2" pipe male, brass  
3/4" pipe male, brass  
1" pipe male, brass

probe with union nut, sealing taper and loose nipple

### Extra Codes (TZ)

TZ 002 drag pointer (glass window)  
TZ 052 plexiglass window (only in conjunction with TZ 086)  
TZ 060 scale to user specification  
TZ 086 drag pointer with screwdriver adjustment; protected by screw cap

### Technical data

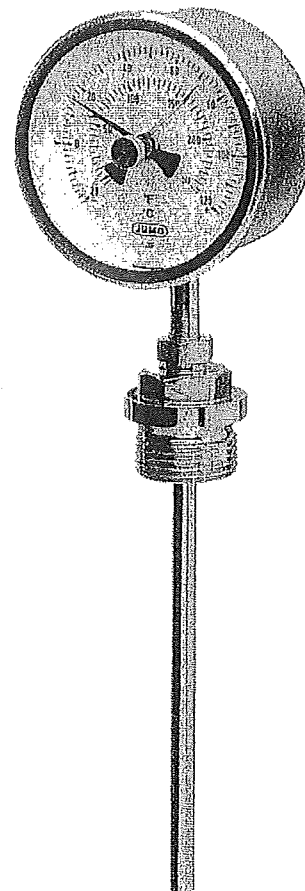
(details for standard version)

**Case**  
case and bezel stainless steel,  
Mat. Ref. 1.4301

**Scale**  
white, black figuring;  
other versions to special order

**Window**  
glass

**Indication**  
linear, pointer movement approx. 260° ∠



Type 8005-10-80

**Sensing system**  
bimetal spring

**Indication accuracy**  
±3 °C over measuring range

**Response time**  
90 % response time 30 sec approx.  
(measured in agitated water with 8 mm dia. brass probe)

**Nominal operating ranges**  
permitted ambient temperature  
-30 to +80 °C

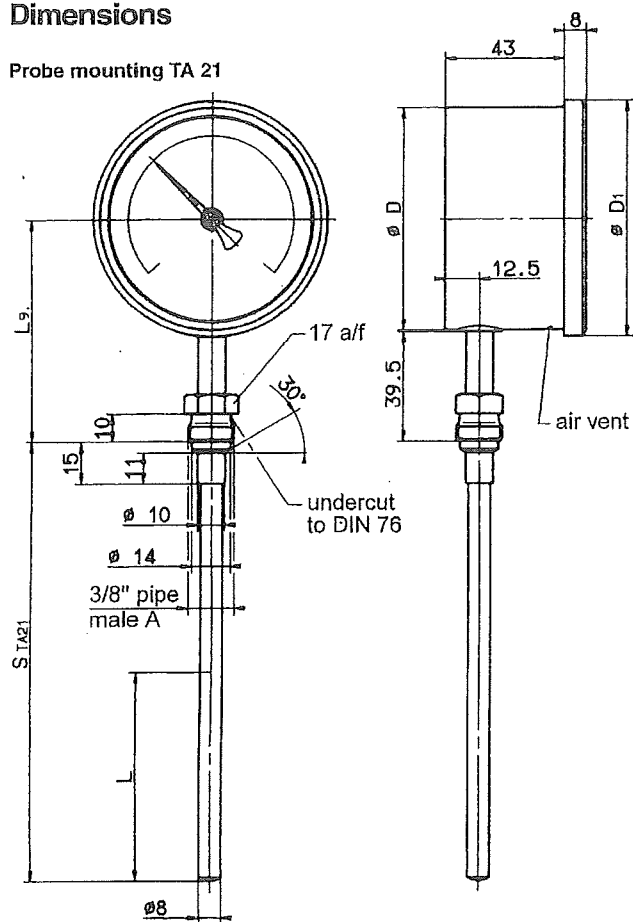
**Operating position**  
vertical NL 90, symbol: ⊥

**Permitted temperatures**  
for storage and transport  
-30 to +80 °C

**Protection**  
IP55 to EN 60 529

## Dimensions

Probe mounting TA 21



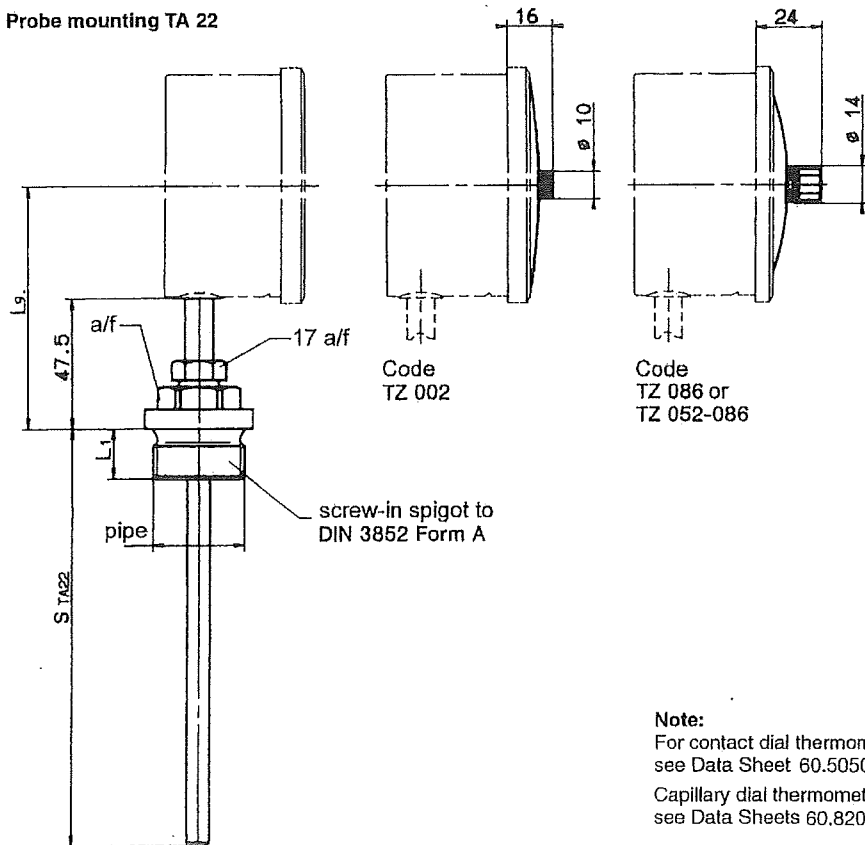
Type	D dia.	D1 dia.	L <sub>9</sub>	
			on TA 21	on TA 22
8005-10-80	80	85	80	88
8005-10-10	100	106	90	98

STA21	STA22	G thread	a/f	L <sub>1</sub>	L active probe length	
158*	—	3/8" male A	17	—	on range	on range
—	150*	1/2" male A	27	14		
—	150*	3/4" male A	32	16	0 +120 °C	-20 +120 °C
—	150*	1" male A	27	18	80 mm	75 mm

\* other stem lengths to special order

(14) on Type 8005-10-10

Probe mounting TA 22



mm	inch
8	0.315
10	0.39
11	0.43
12.5	0.49
14	0.55
15	0.59
16	0.63
18	0.71
24	0.94
39.5	1.56
43	1.69
47.5	1.87
75	2.95
80	3.15
85	3.35
88	3.46
90	3.54
98	3.86
100	3.94
106	4.17
150	5.91
158	6.22

### Note:

For contact dial thermometers for transformers  
see Data Sheet 60.5050

Capillary dial thermometers with and without contact  
see Data Sheets 60.8201 and 60.8520

Subject to modification.

05.01/00074773