

Thermometer

type 55 stainless steel
with adjustable stem

E 10.03.01

Ed.18.01

Design	Thermometer in stainless steel with adjustable stem in stainless steel
Design	EN 13190
Case diameter	Dim 100 mm
Accuracy Class	1,0% acc.to DIN EN 13190
Type	5550 = case dim 100 mm 5551 = case dim 160 mm
Case	Stainless steel with bayonet type bezel Option with liquid filled case (max 0+250°C) Option with liquid filled case (Food compatible)
Glass	Instrumentglass Option with laminated safety glass, clear non-splintering plastic
Dial	White dial of aluminium with unit Celsius °C Option dial with unit °F or unit °C+F
Temperature element	Coiled bimetal
Working temperature	90% of range by permanent measuring 100% by short time measuring
Weather protection	IP 65 acc.to EN 60529 Option with IP 66 or IP 67
Location of stem	Rotatable case on stem, every angle
Stem	Stem of stainless steel 1.4571 dim Ø 6, 8, 10 or 12 mm
Length of stem	Stem length from 50 mm to max 1000 mm See type 73 for longer stem > 1000 mm
Connection	Male thread, compression fitting, male nut or female nut G1/2", G3/4", M18x1,5, 1/2"NPT or 3/4"NPT
Working pressure	Max pressure rating without thermowell = 25 bar
Ambient temperature	Max -40+70°C Option with lower temperature range -50°C or -70°C
Electrical device	Electrical kontakt see datasheet E10.03.06 or E10.03.07
Thermowell	Fabricated or solid machined thermowell as accessorie. See page 4.
Certificate	Certificate EN 10204 as option Test report material EN 10204-2.2 Material certificate EN 10204-3.1 Test certificate EN 10204-3.1 with 3 measuring points
Optional extras	Option with Ex acc.to ATEX protection Cat 2G and 2D



Thermometer 5550/4
with compression fitting

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Design and connections



Male thread

Type 5550 = case dim 100 mm
Type 5551 = case dim 160 mm



Plain stem without thread

Type 5550/1 = case dim 100 mm
Type 5551/1 = case dim 160 mm



Compression fitting

Type 5550/4 = case dim 100 mm
Type 5551/4 = case dim 160 mm



Male nut

Type 5550/2 = case dim 100 mm
Type 5551/2 = case dim 160 mm



Female nut

Type 5550/3 = case dim 100 mm
Type 5551/3 = case dim 160 mm

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Scale range

Scale range	Measuring range	Scale space
-70 + 70°C	-50 + 50°C	70 divisions
-70 + 30°C	-60 + 20°C	100 divisions
-50 + 50°C	-40 + 40°C	100 divisions
-50 + 100°C	-30 + 80°C	75 divisions
-50 + 300°C	0 + 250°C	70 divisions
-50 + 500°C	0 + 450°C	60 divisions
-40 + 60°C	-30 + 50°C	100 divisions
-40 + 80°C	-20 + 60°C	60 divisions
-40 + 160°C	-20 + 140°C	100 divisions
-30 + 50°C	-20 + 40°C	80 divisions
-30 + 70°C	-20 + 60°C	100 divisions
-20 + 60°C	-10 + 50°C	80 divisions
-20 + 80°C	-10 + 70°C	100 divisions
-20 + 100°C	0 + 80°C	60 divisions
-20 + 120°C	0 + 100°C	70 divisions
-20 + 140°C	0 + 120°C	80 divisions
-10 + 50°C	0 + 40°C	60 divisions
0 + 60°C	+10 + 50°C	60 divisions
0 + 80°C	+10 + 70°C	80 divisions
0 + 100°C	+10 + 90°C	100 divisions
0 + 120°C	+10 + 100°C	60 divisions
0 + 150°C	+20 + 130°C	75 divisions
0 + 160°C	+20 + 140°C	80 divisions
0 + 200°C	+20 + 180°C	100 divisions
0 + 250°C	+30 + 220°C	50 divisions
0 + 300°C	+30 + 270°C	60 divisions
0 + 400°C	+50 + 350°C	80 divisions
0 + 500°C	+50 + 450°C	100 divisions
0 + 600°C	+100 + 500°C	60 divisions

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Thermowell

Thermowell TW50-H

Solid machined in stainless steel 1.4571. Working pressure max 150 bar.
Process connection G1/2", G3/4", 1/2"NPT or 3/4"NPT male
Female G1/2" for thermometer
Inside dim \varnothing 7, 9 or 10,6 mm for thermometer with immersion tube \varnothing 6, 8 or 10 mm
Insertion lengths U1 from 50 mm to 500 mm
U1 + 18-20 mm = Immersion L1- for thermometer
Thermowell with U1-100 mm is suitable for thermometer with L1-120 mm
[Datasheet E11.01.01](#)



Thermowell TW45-F

Fabricated in stainless steel 1.4571. Working pressure max 25 bar.
Process connection G1/2", G3/4" or 1/2"NPT male, female G1/2" for thermometer
Inside dim \varnothing 6,2 mm, \varnothing 8,2 mm or \varnothing 10,2 mm
for thermometer with immersion tube \varnothing 6, 8 or 10 mm
Insertion lengths U1- 32, 82, 132, 142, 182, 282 or 382 mm
U1 + 18 mm = Immersion L1- for thermometer
Thermowell with U1-82 mm is suitable for thermometer with L1-100 mm
[Datasheet E11.01.03](#)



Thermowell TW15-H

Solid machined in stainless steel 1.4571. Working pressure max 150 bar.
Special tapered design for process industry
Process connection male 1/2"NPT, 3/4"NPT or 1"NPT
Inside dim \varnothing 6,6 mm, \varnothing 8,6 mm or \varnothing 10,6 mm
Insertion lengths U1 = from 40 to 300 mm
U1 + (H) 45 mm - 10 mm = immersion length L1-for thermometer
Thermowell with U1-100 mm is suitable for thermometer with compression fitting
with immersion length L1-135 mm
[Datasheet E11.01.02](#)



Weld-in thermowell

Weld-in thermowell, solid machined acc.to DIN 43772 Form 4 for high process loads
Steel 1.0460 (C.22.8) DIN 17243, Stainless steel 1.4571 (SS2350) EN 10272
or 1.7335 (13CrMo44) DIN 17243
Female connection M18x1,5 for thermometer.
Inside dim \varnothing 7 mm for immersion tube \varnothing 6 mm
Material certificate EN 10204-3.1 with chemical analysis
Permanent marking with charge number and material designation
Thermometer with immersion tube L1-130x6 mm för weld-in thermowell type D 1
Thermometer with immersion tube L1-195x6 mm för weld-in thermowell type D 2 and D 4
Thermometer with immersion tube L1-255x6 mm för weld-in thermowell type D 5
[Datasheet E11.03.01](#)



Thermowell with flange connection

Thermowell with flange connection acc.to DIN, EN or ASME
DIN 1092 or EN 1092 from DN 25 to DN 100
ASME B16,5 from DN 1" to DN 2"
Pressure rating PN 16 to PN 100
Immersion length U = 100, 160, 250, 300, 400 or 500 mm
for thermometer with immersion tube \varnothing 6, 8 or 10 mm
Standard material stainless steel 1.4571
Special material as Duplex, Hastelloy, Monel, Tantal, Titan
Female G1/2" or 1/2"NPT for thermometer
Material certificate EN 10204-3.1 with chemical analysis
[Datasheet E11.05.02](#)



Thermometer

type 55 stainless steel

with adjustable stem

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Standard products thermometer 5550/4

Thermometer 5550/4 with adjustable stem and compression fitting

Scale range	Length L1	Connection	Code
-20 + 120°C	100 x 6 mm	1/2"NPT	55504740
	150 x 6 mm	1/2"NPT	55504744
0 + 60°C	120 x 10 mm	G1/2"	55500212
	130 x 6 mm	G1/2"	55500246
	130 x 6 mm	M18x1,5	55500226
	195 x 6 mm	M18x1,5	55500228
	255 x 6 mm	M18x1,5	55500230
0 + 80°C	130 x 6 mm	M18x1,5	55500326
	195 x 6 mm	M18x1,5	55500328
0 + 100°C	130 x 6 mm	M18x1,5	55500336
	195 x 6 mm	M18x1,5	55502329
	255 x 6 mm	M18x1,5	55502330
	300 x 6 mm	1/2"NPT	55500351
	450 x 6 mm	1/2"NPT	55500354
0 + 120°C	130 x 6 mm	M18x1,5	55500426
	195 x 6 mm	M18x1,5	55500428
	255 x 6 mm	M18x1,5	55500430
	255 x 6 mm	G1/2"	55503430
0 + 160°C	130 x 6 mm	M18x1,5	55500726
	195 x 6 mm	G1/2"	55503728
	195 x 6 mm	1/2"NPT	55502728
	195 x 6 mm	M18x1,5	55500728
	255 x 6 mm	M18x1,5	55500730
	450 x 6 mm	1/2"NPT	55500754
0 + 200°C	195 x 6 mm	M18x1,5	55500828
	255 x 6 mm	M18x1,5	55500830
0 + 250°C	195 x 6 mm	M18x1,5	55501028
	255 x 6 mm	M18x1,5	55501030
0 + 300°C	195 x 6 mm	M18x1,5	55501528
	255 x 6 mm	M18x1,5	55501530
0 + 500°C	195 x 6 mm	M18x1,5	55501828
	255 x 6 mm	M18x1,5	55501830
0 + 600°C	195 x 6 mm	M18x1,5	55502028
	255 x 6 mm	M18x1,5	55502030



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Thermowell TW50-H

Solid machined in stainless steel 1.4571. Working pressure max 150 bar.
Process connection G1/2" male, female G1/2" for thermometer
Inside dim \varnothing 10,5 mm for thermometer with immersion tube \varnothing 10 mm
Insertion lengths U1 = 50, 100, 180 or 280 mm
for thermometer with compression fitting G1/2" L1- 65, 120, 200 or 300 mm
Datasheet E11.01.01

Thermowell TW45-F

Fabricated in stainless steel 1.4571. Working pressure max 25 bar.
Process connection G1/2", G3/4" or 1/2"NPT male, female G1/2" for thermometer
Inside dim \varnothing 6,2 mm, \varnothing 8,2 mm or \varnothing 10,2 mm
for thermometer with compression fitting and immersion tube \varnothing 6, 8 or 10 mm
Insertion lengths U1- 32, 82, 132, 142, 182, 282 or 382 mm
U1 + 18 mm = Immersion L1- for thermometer
Thermowell with U1-82 mm is suitable for thermometer with L1-100 mm
Datasheet E11.01.03

Thermowell TW15-H

Solid machined in stainless steel 1.4571. Working pressure max 150 bar.
Special tapered design for process industry
Process connection male 1/2"NPT, 3/4"NPT or 1"NPT
Inside dim \varnothing 6,6 mm, \varnothing 8,6 mm or \varnothing 10,6 mm
Insertion lengths U1 = from 40 to 300 mm
U1 + (H) 45 mm - 10 mm = immersion length L1-for thermometer
Thermowell with U1-100 mm is suitable for thermometer with compression fitting
with immersion length L1-153 mm
Datasheet E11.01.02

Weld-in thermowell

Weld-in thermowell, solid machined acc.to DIN 43772 Form 4 for high process loads
Steel 1.0460 (C.22.8) DIN 17243, Stainless steel 1.4571 (SS2350) EN 10272
or 1.7335 (13CrMo44) DIN 17243
Female connection M18x1,5 for thermometer.
Inside dim \varnothing 7 mm for immersion tube \varnothing 6 mm
Material certificate EN 10204-3.1 with chemical analysis
Permanent marking with charge number and material designation
Thermometer with immersion tube L1-130x6 mm för weld-in thermowell type D 1
Thermometer with immersion tube L1-195x6 mm för weld-in thermowell type D 2 and D 4
Thermometer with immersion tube L1-255x6 mm för weld-in thermowell type D 5
Datasheet E11.03.01

Thermowell with flange connection

Thermowell with flange connection acc.to DIN, EN or ASME
DIN 1092 or EN 1092 from DN 25 to DN 100
ASME B16,5 from DN 1" to DN 2"
Pressure rating PN 16 to PN 100
Immersion length U = 100, 160, 250, 300, 400 or 500 mm
for thermometer with immersion tube \varnothing 6, 8 or 10 mm
Standard material stainless steel 1.4571
Special material as Duplex, Hastelloy, Monel, Tantal, Titan
Female G1/2" or 1/2"NPT for thermometer
Material certificate EN 10204-3.1 with chemical analysis
Datasheet E11.05.01, E11.05.02 or E11.05.04



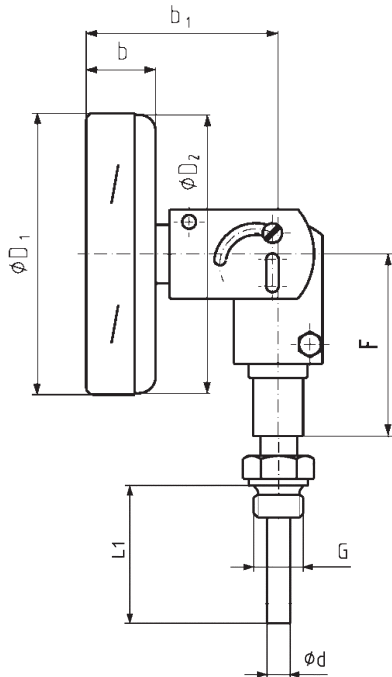
Thermometer

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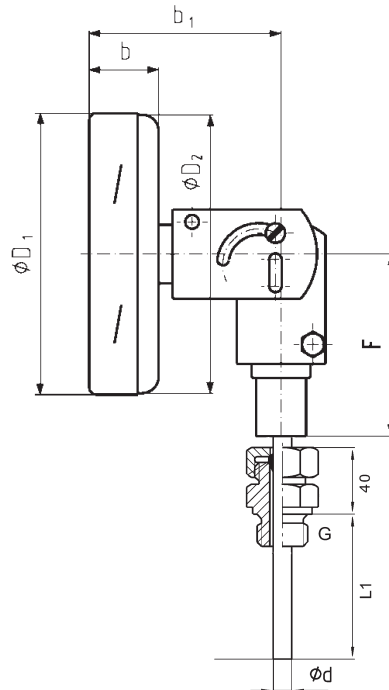
Male thread

Type 5550 = case dim 100 mm
Type 5551 = case dim 160 mm



Compression fitting

Type 5550/4 = case dim 100 mm
Type 5551/4 = case dim 160 mm



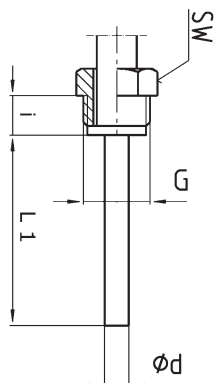
Type	Case	d	D1	D2	b	b1	F	G
5550/4	100	6, 8, 10 or 12	101	99	25	68	68	G1/2", 1/2"NPT, 3/4"NPT or M18x1,5
5551/4	160	6, 8, 10 or 12	161	159	25	68	68	G1/2", 1/2"NPT, 3/4"NPT or M18x1,5

Immersion length L1

L1 = immersion length

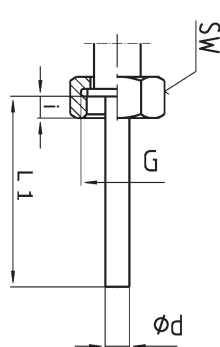
Male nut

Type 5550/2 = case dim 100 mm
Type 5551/2 = case dim 160 mm
G = G1/2", G3/4" or M18x1,5



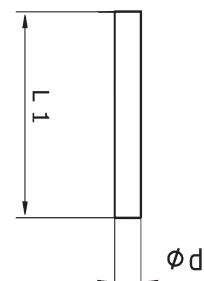
Female nut

Type 5550/3 = case dim 100 mm
Type 5551/3 = case dim 160 mm
G = G1/2", G3/4" or M18x1,5



Plain stem without thread

Type 5550/1 = case dim 100 mm
Type 5551/1 = case dim 160 mm



Immersion length L1

L1 = immersion length, d = 6, 8, 10 or 12 mm