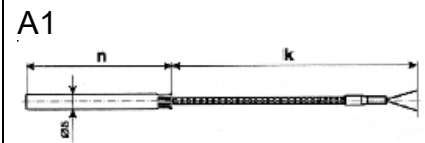
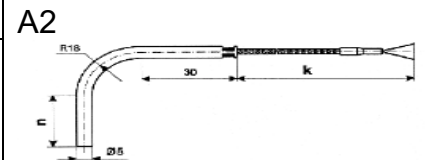


SENSORS FOR TEMPERATURE

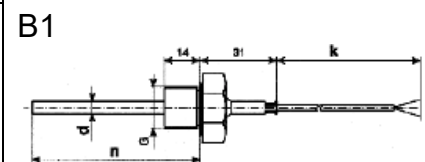
PROBE WITHOUT MOUNTING APPLIANCE	SENSITIVE ELEMENT	TEMPERATURE RANGE	DIMENSIONS
<i>Material of the sheath</i> – stainless steel Nr.1.4571 <i>Cable</i> – Heat-resistant, over-braiding – Heat-resistant, silikon insulation – With PVC insulation	R – 1 x Pt100 BDS EN60751	t1 0 ... 60°C t2 0 ... 200°C t3 –50 ... 200°C t4 0 ... 400°C	n = 30, 50, 100, 150, 200, 300 mm Other dimensions are allowed too
	2R – 2 x Pt100 BDS EN60751	J – Fe-CuNi BDS EN60584	
	K – NiCr-Ni BDS EN60584	t1 0 ... 60°C t4 0 ... 400°C	



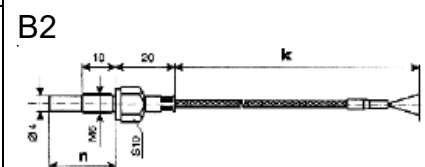
ANGLE-TYPE PROBE WITHOUT MOUNTING APPLIANCE	SENSITIVE ELEMENT	TEMPERATURE RANGE	DIMENSIONS
<i>Material of the sheath</i> – stainless steel Nr.1.4571 <i>Cable</i> – Heat-resistant, overbraiding – Heat-resistant, silikon insulation – With PVC insulation	R – 1 x Pt100 BDS EN60751	t1 0 ... 60°C t2 0 ... 200°C t3 –50 ... 200°C t4 0 ... 400°C	n = 30, 50, 100, 150, 200, 300 mm Other dimensions are allowed too
	2R – 2 x Pt100 BDS EN60751	J – Fe-CuNi BDS EN60584	
	K – NiCr-Ni BDS EN60584	t1 0 ... 60°C t4 0 ... 400°C	



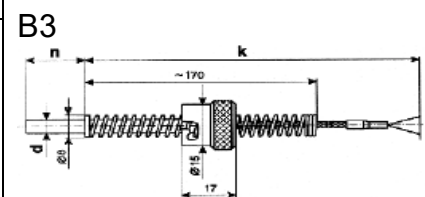
MOISTURE-PROOF SCREW-IN TYPE PROBE	SENSITIVE ELEMENT	TEMPERATURE RANGE	DIMENSIONS
<i>Material of the sheath</i> – stainless steel Nr.1.4571 <i>Cable</i> – Heat-resistant, overbraiding – Heat-resistant, silikon insulation – With PVC insulation	R – 1 x Pt100 BDS EN60751	t1 0 ... 60°C t2 0 ... 200°C t3 –50 ... 200°C t4 0 ... 400°C	n = 30, 50, 100, 150, 200, 300 mm G = 3/8", 1/4", M8, M10, M12, M14, M16 Other dimensions are allowed too
	2R – 2 x Pt100 BDS EN60751	J – Fe-CuNi BDS EN60584	
	K – NiCr-Ni BDS EN60584	t1 0 ... 60°C t4 0 ... 400°C	



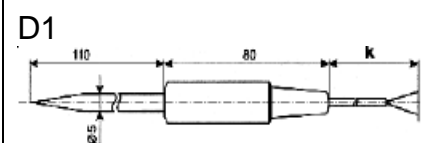
BOLT- TYPE PROBE	SENSITIVE ELEMENT	TEMPERATURE RANGE	DIMENSIONS
<i>Material of the sheath</i> – stainless steel Nr.1.4571 <i>Cable</i> – Heat-resistant, overbraiding – Heat-resistant, silikon insulation – With PVC insulation	R – 1 x Pt100 BDS EN60751	t1 0 ... 60°C t2 0 ... 200°C t3 –50 ... 200°C t4 0 ... 400°C	n = 12 ... 40 mm Other dimensions are allowed too
	2R – 2 x Pt100 BDS EN60751	J – Fe-CuNi BDS EN60584	
	K – NiCr-Ni BDS EN60584	t1 0 ... 60°C t4 0 ... 400°C	



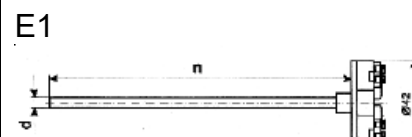
BAYONET-TYPE PROBE	SENSITIVE ELEMENT	TEMPERATURE RANGE	DIMENSIONS
<i>Material of the sheath</i> – stainless steel Nr.1.4571 <i>Cable</i> – Heat-resistant, overbraiding – Heat-resistant, silikon insulation – With PVC insulation	R – 1 x Pt100 BDS EN60751	t1 0 ... 60°C t2 0 ... 200°C t3 –50 ... 200°C t4 0 ... 400°C	n = 12 ... 40 mm
	2R – 2 x Pt100 BDS EN60751	J – Fe-CuNi BDS EN60584	
	K – NiCr-Ni BDS EN60584	t1 0 ... 60°C t4 0 ... 400°C	



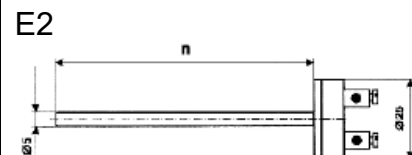
NEEDLE PROBE WITH HANDLE	SENSITIVE ELEMENT	TEMPERATURE RANGE	DIMENSIONS
<i>Material of the sheath</i> – stainless steel Nr.1.4571 <i>Cable</i> – Heat-resistant, silikon insulation – With PVC insulation <i>Handle</i> – plastic material	R – 1 x Pt100 BDS EN60751	t1 0 ... 60°C t3 –50 ... 200°C t4 0 ... 400°C	K = max 6000 mm
	2R – 2 x Pt100 BDS EN60751	J – Fe-CuNi BDS EN60584	
	K – NiCr-Ni BDS EN60584	t1 0 ... 60°C t4 0 ... 400°C	



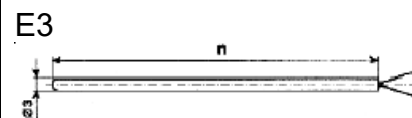
REPLACEABLE INSERT	SENSITIVE ELEMENT	TEMPERATURE RANGE	DIMENSIONS
<i>Material of the sheath stainless steel Nr.1.4571 Brass terminals Base Al₂O₃</i>	<i>R – 1 x Pt100 BDS EN6075 1</i>	<i>t₂ 0 ... 200°C t₃ -50 ... 200°C t₄ 0 ... 400°C</i>	<i>n = 50, 150, 300, 500 mm d = 5, 6, 8, 10 Other dimensions are allowed too</i>
	<i>2R – 2 x Pt100 BDS EN60751</i>	<i>t₄ 0 ... 400°C t₅ 0 ... 600°C</i>	
	<i>K – NiCr-Ni BDS EN60584</i>	<i>t₄ 0 ... 400°C t₆ 0 ... 1000°C</i>	



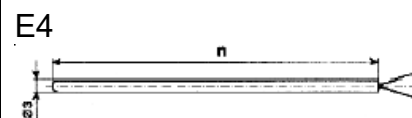
REPLACEABLE INSERT	SENSITIVE ELEMENT	TEMPERATURE RANGE	DIMENSIONS
<i>Material of the sheath stainless steel Nr.1.4571 Brass terminals Base Al₂O₃</i>	<i>R – 1 x Pt100 BDS EN60751</i>	<i>t₂ 0 ... 200°C t₃ -50 ... 200°C t₄ 0 ... 400°C</i>	<i>n = 50, 150, 300, 500 mm d = 5, 6, 8 Other dimensions are allowed too</i>
	<i>2R – 2 x Pt100 BDS EN6075</i>	<i>t₄ 0 ... 400°C t₅ 0 ... 600°C</i>	
	<i>K – NiCr-Ni BDS EN6058</i>	<i>t₄ 0 ... 400°C t₆ 0 ... 1000°C</i>	



MANTEL THERMOCOUPLE	SENSITIVE ELEMENT	TEMPERATURE RANGE	DIMENSIONS
<i>Enclosure stainless steel Nr.1.4571 with mineral insulation</i>	<i>K – NiCr-Ni BDS EN60584</i>	<i>T₉ 0 ... 1100°C For air medium</i>	<i>n = 50 ... 1500mm Other dimensions are allowed too</i>



MANTEL THERMOCOUPLE WITH CABLE	SENSITIVE ELEMENT	TEMPERATURE RANGE	DIMENSIONS
<i>Enclosure stainless steel Nr.1.4571 with mineral insulation Cable – Heat-resistant, metal PWM – With PVC insulation</i>	<i>K – NiCr-Ni BDS EN60584</i>	<i>T₉ 0 ... 1100°C For air medium</i>	<i>n = 12 ... 40 mm Other dimensions are allowed too</i>



COMPENSATION WIRES

STANDARD	THERMOCOUPLES SYMBOLS			COMPENSATION WIRES SYMBOLS			COLOUR SYMBOLS		
	TYPE	+ Pol	- Pol	КОД	+ Pol	- Pol	INNER		OUTER
BDS EN60584	T	Cu	CuNi	TX	Cu	CuNi	brown	white	brown
	E	NiCr	CuNi	EX	NiCr	CuNi	violet	white	violet
	J	Fe	CuNi	JX	Fe	CuNi	black	white	black
	K	NiCr	Ni	KX	NiCr	Ni	green	white	green
	K	NiCr	Ni	KC1	Fe	CuNi	green	white	green
	K	NiCr	Ni	KC2	Cu	CuNi	green	white	green
	R/S	Pt13/10Rh	Pt	RC A/SC A	Cu	CuNi	orange	white	orange
	R/S	Pt13/10Rh	Pt	RC B/SC B	Cu	CuNi	orange	white	orange
	N	NiCrosil	Nisil	NC	Cu	CuNi	pink	white	pink
DIN 43710	B	Pt30Rh	Pt6Rh	BC	CuMn	Cu	red	grey	grey
	U	Cu	CuNi	UX	Cu	CuNi	red	brown	brown
	L	Fe	CuNi	LX	Fe	CuNi	red	blue	blue

COMPENSATION WIRE WITH INSULATION OF GLASS FIBRE TYPE GLGLP oval AND GLGLP

Shape	Section of 1 wire	Number of the channels	Outer diameter Ømm	Weight (kg/m)	Application	
					Electromagnetic interference	Radioactivity
Oval	S 1.5 mm ²	2	3.5 x 5.5	0.055	Mineral oils	-
Oval	Ø 1.38 mm	2	3.3 x 5.1	0.055	Bases	•
Round	S 0.22 mm ²	2	3.6	0.020	Acids	-
Round	S 0.75 mm ²	2	4.5	0.040	Benzol	•
Round	S 1.5 mm ²	4	6.3	0.115	Benzine	•
Round	Ø 1.38 mm	4	5.8	0.115	Water steam	-
1. Glass insulation		Temperature stability of the insulation 200°C 2 Parallel or 4 twisted cables			Moist medium	•
2. Glass braiding					Dry medium	+
3. Steel shield					Immovable fixture	+
					Movable fixture	•

COMPENSATION WIRE WITH PVC INSULATION TYPE JJ oval AND JJ

Shape	Section of 1 wire	Number of the channels	Outer diameter Ømm	Weight (kg/m)	Application	
					Electromagnetic interference	Radioactivity
Oval	S 1.5 mm ²	2	4.2 x 6.85	0.065	Mineral oils	•
Oval	Ø 1.38 mm	2	4.0 x 6.4	0.065	Bases	+
Round	S 0.22 mm ²	2	3.6	0.035	Acids	+
Round	S 0.22 mm ²	4	4.1	0.050	Benzol	-
Round	S 1.5 mm ²	2	6.8	0.075	Benzine	+
Round	S 1.5 mm ²	4	7.8	0.120	Water steam	+
Round	Ø 1.38 mm	2	6.4	0.070	Moist medium	+
Round	Ø 1.38 mm	4	7.4	0.115	Dry medium	+
1. PVC insulation		Temperature stability of the insulation from -10°C to 105°C Parallel cables at oval or twisted – at round shape			Immovable fixture	+
2. PVC shell					Movable fixture	•

COMPENSATION WIRE WITH SILIKONE INSULATION TYPE SLSLoval AND SLSL

Shape	Section of 1 wire	Number of the channels	Outer diameter Ømm	Weight (kg/m)	Приложение	
					Electromagnetic interference	Radioactivity
Oval	S 1.50 mm ²	2	4.4 x 7.2	0.100	Mineral oils	•
Oval	S 0.22 mm ²	2	4.4	0.020	Bases	+
Round	S 1.50 mm ²	2	7.2	0.110	Acids	+
1. Silikone insulation 2. Silikone shell		Temperature stability of the insulation from -60°C to 200°C Parallel cables at oval or twisted – at round shape			Benzol	-
					Benzine	-
					Water steam	•
					Moist medium	+
					Dry medium	+
					Immovable fixture	•
					Movable fixture	+

MICROSYST offers all types of compensation cables to order: GLGL oval and GLGL, J, YY, JJPJ, YYPY, JFJ, YFY, JFJPJ, YFYPY, SLSLGL, SLFSL, SLGL oval and SLGL, SLGLP oval and SLGLP, TT oval and TT, TGLP oval and TGLP, TGLV oval and TGLV, TFT, etc.

Legend: S (mm²) – effective section of multicable wire ; Ø (mm) – diameter of singlecable wire ;
+ – applicable; • – conditionally applicable; - – inapplicable