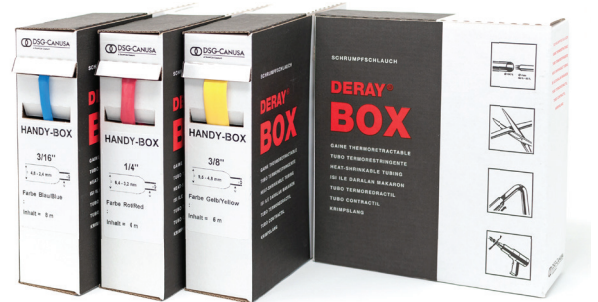


DERAY®-Handybox

Universal thin wall heat shrinkable tube on small reels in a dispenser box

The product range DERAY®-Handybox is a diversity of universal thin wall heat shrinkable tubing in small dispenser boxes.



Features and Benefits

- Great selection of different diameters and colors
- Possibility of customer-specific packaging
- Flexible
- Good resistance to conventional liquids and solvents
- High dielectric strength
- Shrink ratio: 2:1
- Continuous operating temperature: -55°C to 135°C
- Shrink temperature 110°C

Standards

- UL 224 (except transparent)

Typical Applications

- Electrical repair and maintenance
- Strain relief
- Insulation

2:1

Shrink ratio

-55°C - 135°C
(-67°F to 275°F)

Continuous
operating
temperature

Markets:

Industrial, commercial

Standards:



DERAY®-Handybox

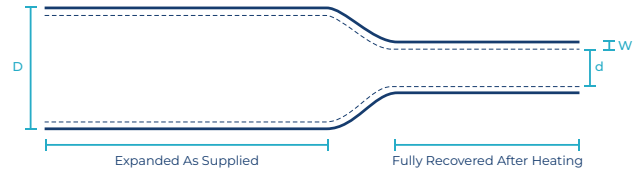
ORDER NUMBER	EXPANDED	RECOVERED		DELIVERY UNITS
	INTERNAL DIAMETER (MIN) D	INTERNAL DIAMETER (MAX) D	TOTAL WALL THICKNESS (NOM) W	MINIBOX
	mm (in)	mm (in)	mm (in)	m (ft)
HAN-12	1.2 (3/64)	0.6 (0.024)	0.40 (0.016)	10 (33)
HAN-16	1.6 (1/16)	0.8 (0.031)	0.40 (0.016)	10 (33)
HAN-24	2.4 (3/32)	1.2 (0.047)	0.50 (0.020)	10 (33)
HAN-32	3.2 (1/8)	1.6 (0.063)	0.50 (0.020)	10 (33)
HAN-48	4.8 (3/16)	2.4 (0.094)	0.50 (0.020)	8 (26)
HAN-64	6.4 (1/4)	3.2 (0.126)	0.60 (0.024)	6 (20)
HAN-95	9.5 (3/8)	4.8 (0.189)	0.60 (0.024)	5 (16)
HAN-127	12.7 (1/2)	6.4 (0.252)	0.60 (0.024)	5 (16)
HAN-190	19.0 (3/4)	9.5 (0.374)	0.80 (0.031)	4 (13)
HAN-254	25.4 (1)	12.7 (0.500)	0.90 (0.035)	3 (10)

Ordering

Select a dimension which will shrink snugly over the application to be covered. If recovery is restricted the resultant wall thickness will be less than specified.

- Select options:
 - Color: Black (BK), red (RD), white (WT), clear (CL), blue (BL), yellow (YL), green (GR), brown (BN), grey (GY)
- Please specify the product name, order number and options you require:
 - Example: DERAY®-Handybox, HAN-24, schwarz

Please contact your Customer Service Representative for information on custom colors, sizes, lengths and material data sheet.



We advise that customers should separately evaluate the suitability of our products for their particular application. Our responsibilities are only those listed in our Standard Terms and Conditions of Sale for these products. Please ask for the latest version of this data sheet. Subject to modification without prior notice.

For further information, please contact:

Americas: 800 422 6872
Canada: 800 845 6808

Asia Pacific: +86 512 82280099
Europe: +49 2226 9047 355

Technical data

PROPERTY	CURRENT VALUES	TEST METHODS
MATERIAL		
Material	PE, modified; free of lead, silicone and cadmium	n/a
Surface	matt	n/a
Specific gravity	1.3 g/cm ³ max.	ASTM-D 792, A-I
Shrink ratio	2:1	n/a
Longitudinal shrinkage	-10% max.	ASTM-D 2671
MECHANICAL		
Tensile strength	15 MPa	IEC 60684-2
Elongation	450%	IEC 60684-2
Secant modulus	175 MPa max.	ASTM-D 882
THERMAL		
Tensile strength after thermal ageing (168 h at 158°C)	12 MPa	UL 224
Elongation after thermal ageing (168 h at 158°C)	300%	UL 224
Tensile strength after thermal shock (4 h at 200°C)	13 MPa	IEC 811-1-2
Elongation after thermal shock (4 h at 200°C)	400%	IEC 811-1-2
Cold bend test	does not break at -55°C	ASTM-D 2671 Meth. C
Combustion behaviour	flame retardant	colored: UL 224; transparent: FMVSS 302
Shrink temperature	110°C min.	n/a
Storage temperature	50°C max.	n/a
Continuous operating temperature	-55°C to 135°C	IEC 216
CHEMICAL		
Corrosive action	non-corrosive	ASTM-D 2671 Meth. A
Compatibility with copper	non-corrosive	ASTM-D 2671 Meth. B
Resistance against chemicals	good	n/a
Water absorption	0.15% max.	VDE 0473
ELECTRICAL		
Dielectric strength	24 kV/mm	VDE 0303 Part 2
Spec. volume resistivity	10 ¹⁵ Ω x cm	VDE 0303 Part 3
Insulation class	E	VDE 0530

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