

Cable ties for thin-walled bundles

OS-Series

OS-Series cable ties are used in many areas where thin-walled or soft insulation wires and cable are being installed, for instance automotive and aircraft industry. OS ties manufactured from PA66V0 material are suitable for applications where safety regulations require reduction of smoke and dangerous gases.

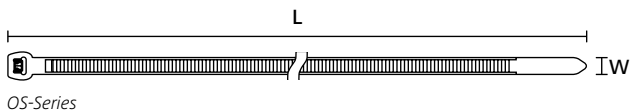
Features and benefits

- Outside serrated cable tie with smooth surface to the bundle
- Tie follows the contours of the cable bundle perfectly
- Takes up less space due to curved head design
- Easy insertion combined with high tensile strength
- PA46 material for higher temperatures up to +195 °C (500 h)
- PA66V0 cable ties fulfill Limited Fire Hazard requirements
- Easy application either manually or with a processing tool



Outside serrated OS-Series cable tie with smooth surface to the bundle.

Material information on page 22.



OS-Series



The curved head design of the OS-Series

TYPE	Width (W)	Length (L)	Bundle Ø max.	N	Material	Colour	Pack Cont.	Tools	Article-No.
T18ROS	2.5	100.0	20.0	80	PA66HS	Black (BK)	100 pcs.	1-2;4-6;25	118-04700
	2.5	100.0	20.0	80	PA66HS	Black (BK)	500 pcs.	1-2;4-6;25	118-04701
	2.5	100.0	20.0	80	PA66HS	Natural (NA)	1000 pcs.	1-2;4-6;25	118-00035
	2.5	100.0	20.0	80	PA66V0	White (WH)	100 pcs.	1-2;4-6;25	118-00079
T30ROS	3.4	145.0	35.0	135	PA66HS	Black (BK)	100 pcs.	1-2;4-6;25	118-04800
	3.4	145.0	35.0	135	PA66HS	Natural (NA)	100 pcs.	1-2;4-6;25	118-00064
T30LOS	3.4	200.0	50.0	135	PA66HS	Black (BK)	100 pcs.	1-2;4-6;25	118-04900
	3.4	200.0	50.0	135	PA66HS	Natural (NA)	100 pcs.	1-2;4-6;25	118-00044
	3.4	200.0	50.0	135	PA66V0	White (WH)	100 pcs.	1-2;4-6;25	118-00080
T50SOS	4.6	150.0	35.0	225	PA66HS	Black (BK)	100 pcs.	1-2;4-7;25	118-05850
T50ROS	4.6	200.0	50.0	225	PA46	Grey (GY)	500 pcs.	1-2;4-7;25	118-05078
	4.6	200.0	50.0	225	PA66HS	Black (BK)	500 pcs.	1-2;4-7;25	118-05040
	4.6	200.0	50.0	225	PA66HS	Natural (NA)	100 pcs.	1-2;4-7;25	118-05059
T50MOS	4.6	245.0	66.0	225	PA66HS	Black (BK)	100 pcs.	1-2;4-6;25	118-00018
	4.6	245.0	66.0	225	PA66HS	Natural (NA)	100 pcs.	1-2;4-6;25	118-00055
	4.6	245.0	66.0	225	PA66V0	White (WH)	100 pcs.	1-2;4-6;25	118-00081
T50LOS	4.6	384.0	110.0	225	PA66HS	Black (BK)	100 pcs.	1-2;4-7;25	118-05900
T120ROS	7.6	385.0	105.0	535	PA66HS	Black (BK)	100 pcs.	1;3;7;9-10;25	118-00066
	7.6	385.0	105.0	535	PA66HS	Natural (NA)	100 pcs.	1;3;7;9-10;25	118-00067
	7.6	385.0	105.0	535	PA66V0	White (WH)	100 pcs.	1;3;7;9-10;25	118-00082

Recommended Tools: 1=MK10-SB, 2=MK20, 3=MK21, 4=MK3PNSP2, 5=EVO7i, 6=MK7P, 7=EVO9i, 9=EVO9iHT, 10=MK9P, 25=EVOcut. For more information on toolings please refer to the Application Tooling chapter on page 346.

All dimensions in mm. Subject to technical changes. Minimum Order Quantity (MOQ) may differ from package content. Other packaging options may also be available.

EN 45545-2

Please note! Not all products listed on this page may have this approval. Please check our website for latest approvals.



Material Specification Overview

MATERIAL	Material Shortcut	Operating Temperature	Colour**	Flammability	Material Properties*	Material Specifications
Aluminium alloy	AL	-40 °C to +180 °C	Natural (NA)		• Corrosion resistant • Antimagnetic	RoHS
Chloroprene Rubber	CR	-20 °C to +80 °C	Black (BK)		• Weather resistant • High yield strength	RoHS
Ethylene Tetrafluoroethylene (Tefzel®)	E/TFE	-80 °C to +170 °C	Blue (BU)	UL 94 V0	• Resistance to radioactivity • UV resistant, not moisture sensitive • Good chemical resistance to acids, bases, oxidizing agents	RoHS
Polyacetal	POM	-40 °C to +90 °C, (+110 °C, 500 h)	Natural (NA)	UL 94 HB	• Limited brittleness sensitivity • Flexible at low temperature • Not moisture sensitive • Robust on impact	RoHS
Polyamide 11	PA11	-40 °C to +85 °C, (+105 °C, 500 h)	Black (BK)	UL 94 HB	• Bio-plastic, derived from vegetable oil • Strong impact resistance at low temperature • Very low moisture absorption • Weather resistant • Good chemical resistance	HF RoHS
Polyamide 12	PA12	-40 °C to +85 °C, (+105 °C, 500 h)	Black (BK)	UL 94 HB	• Good chemical resistance to acids, bases, oxidizing agents • UV resistant	HF RoHS
Polyamide 4.6	PA46	-40 °C to +130 °C, (+150 °C, 5000 h; +195 °C, 500 h)	Natural (NA), Grey (GY)	UL 94 V2	• Resistance to high temperatures • Very moisture sensitive • Low smoke sensitivity	HF LFH RoHS
Polyamide 6	PA6	-40 °C to +80 °C	Black (BK)	UL 94 V2	• High yield strength	RoHS
Polyamide 6, high impact modified	PA6HIR	-40 °C to +80 °C	Black (BK)	UL 94 HB	• Limited brittleness sensitivity • Higher flexibility at low temperature	RoHS
Polyamide 6.6	PA66	-40 °C to +85 °C, (+105 °C, 500 h)	Black (BK), Natural (NA)	UL 94 V2	• High yield strength	HF RoHS
Polyamide 6.6, glass-fibre reinforced	PA66GF13	-40 °C to +105 °C	Black (BK)	UL 94 HB	• Good resistance to lubricants, fuels, salt water and solvents	HF RoHS
Polyamide 6.6, heat and UV-stabilised	PA66HSUV	-40 °C to +105 °C	Black (BK)	UL 94 V2	• High yield strength • Modified elevated maximum temperature • UV resistant	HF RoHS
Polyamide 6.6, heat stabilised	PA66HS	-40 °C to +105 °C	Black (BK), Natural (NA)	UL 94 V2	• High yield strength • Modified elevated maximum temperature	HF RoHS
Polyamide 6.6, high impact modified	PA66HIR	-40 °C to +80 °C, (+105 °C, 500 h)	Black (BK)	UL 94 HB	• Limited brittleness sensitivity • Higher flexibility at low temperature	RoHS
Polyamide 6.6, high impact modified, heat and UV-stabilised	PA66HIRHSUV	-40 °C to +110 °C	Black (BK)	UL 94 HB	• Limited brittleness sensitivity • Higher flexibility at low temperature • Modified elevated maximum temperature • High yield strength, UV resistant	RoHS
Polyamide 6.6, high impact modified, heat stabilised	PA66HIRHS	-40 °C to +105 °C	Black (BK)	UL 94 HB	• Limited brittleness sensitivity • Higher flexibility at low temperature • Modified elevated maximum temperature	RoHS
Polyamide 6.6, high impact modified, scan black)	PA66HIR(S)	-40 °C to +80 °C, (+105 °C, 500 h)	Black (BK)	UL 94 HB	• Limited brittleness sensitivity • Higher flexibility at low temperature	HF RoHS
Polyamide 6.6, UV-resistant	PA66W	-40 °C to +85 °C, (+105 °C, 500 h)	Black (BK)	UL 94 V2	• High yield strength • UV resistant	HF RoHS

MATERIAL	Material Shortcut	Operating Temperature	Colour**	Flammability	Material Properties*	Material Specifications
Polyamide 6.6, with metal particles	PA66MP	-40 °C to +85 °C, (+105 °C, 500 h)	Blue (BU)	UL 94 HB	- High yield strength - Metal and X-Ray detectable	HF RoHS
Polyamide 6.6, with metal particles	PA66MP+	-40 °C to +85 °C	Blue (BU)	not flame-retardant	- High yield strength - Metal and X-Ray detectable	HF RoHS
Polyamide 6.6 V0	PA66V0	-40 °C to +85 °C	White (WH)	UL 94 V0	- High yield strength - Low smoke emission	HF LFH RoHS
Polyester	SP	-50 °C to +150 °C	Black (BK)		- UV resistant - Good chemical resistance to most acids, bases and oils	HF LFH RoHS
Polyetheretherketone	PEEK	-55 °C to +240 °C	Beige (BGE)	UL 94 V2	- Resistance to radioactivity - Not moisture sensitive - Good chemical resistance to acids, bases, oxidising agents	HF LFH RoHS
Polyethylene	PE	-40 °C to +50 °C	Black (BK), Grey (GY)	UL 94 HB	- Low moisture absorption - Good chemical resistance to most acids, bases, alcohol, oils	HF RoHS
Polyolefin	PO	-40 °C to +90 °C	Black (BK)	UL 94 V0	Low smoke emissions	HF LFH RoHS
Polypropylene	PP	-40 °C to +115 °C	Black (BK), Natural (NA)	UL 94 HB	- Floats in water - Moderate yield strength - Good chemical resistance to acids, bases and solvents	HF RoHS
Polypropylene, Ethylene Propylene Diene Terpolymer rubber free of Nitrosamine	PP, EPDM	-20 °C to +95 °C	Black (BK)	UL 94 HB	- Good resistance to high temperature - Good chemical and abrasion resistance	HF RoHS
Polypropylene with metal particles	PPMP	-40 °C to +115 °C	Blue (BU)	UL 94 HB	- Metal and X-Ray detectable - Heat resistant - Moderate yield strength - Good chemical resistance	RoHS
Polypropylene with metal particles	PPMP+	-40 °C to +85 °C	Blue (BU)	not flame-retardant	- High yield strength - Metal and X-Ray detectable	HF RoHS
Polyvinylchloride	PVC	-10 °C to +70 °C	Black (BK), Natural (NA)	UL 94 V0	- Low moisture absorption - Good chemical resistance to acids, bases, salts, alcohol, oils	RoHS
Stainless Steel, Stainless Steel	SS304, SS316	-80 °C to +538 °C	Natural (NA)	non-burning	- Corrosion resistant - Antimagnetic - Weather resistant - Chemical resistance - SS316 also resistant against seawater, salt spray and anorganic acids	HF LFH RoHS
Thermoplastic Polyurethane	TPU	-40 °C to +85 °C	Black (BK)	UL 94 HB	- High elasticity - Good chemical resistance to acids, bases and oxidising agents	HF RoHS

Tefzel® is a registered trademark of DuPont. General linguistic usage for cable ties made from raw material E/TFE is Tefzel®-Tie. In addition to Tefzel® from DuPont HellermannTyton also uses equivalent E/TFE raw material from other suppliers.

*These details are only guide values. They should not be regarded as an exhaustive material specification and are no substitute for suitability tests. Please see our datasheets for further details.

HF = Halogen Free

LFH = Limited Fire Hazard

RoHS = Restriction of Hazardous Substances

**Further colours available on request.



N = Minimum Loop Tensile Strength
for Cable Ties (newton)

**For more material information
please visit our website.**