



## CABLE TIES

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### Product Selection Guide

# Comprehensive Cable Tie Solutions

Panduit offers a broad selection of industry approved styles, sizes, and materials to meet a full range of electrical, industrial, and networking applications.

**PLT Pan-Ty® Cable Ties**

Most comprehensive product offering

**SG Super-Grip® Cable Ties**

Withstand rough installations

**BT Dome-Top® Barb Ty Cable Ties**

Metal locking barb; infinite adjustability

**DT Dura-Ty® Cable Ties**

Acetal material; 20+ years outdoor service life

**CBR Contour-Ty® Cable Ties**

Low profile head, parallel-entry, outside teeth

**HV Hyper-V™ Cable Ties**

Teeth on both sides; 2-wedge locking design

**SST Sta-Strap® Cable Ties**

Two-piece design, low thread force, lightweight

**ERT Elastomeric Cable Ties**

Flexible, elastic material, UL 94V-0, releasable



	Product Family	PLT	SG	BT	DT	CBR	HV	SST	ERT
<b>Styles</b>	Locking	✓	✓	✓	✓	✓	✓	✓	
	Releasable	✓							✓
	Marker	✓		✓				✓	
	Clamp	✓		✓				✓	
	Push Mount	✓		✓					
	Specialty	✓		✓				✓	
<b>Cross Sections</b>	Miniature	✓	✓	✓		✓		✓	✓
	Intermediate	✓	✓	✓		✓		✓	
	Standard	✓	✓	✓		✓		✓	
	Heavy-Standard					✓			
	Light-Heavy	✓	✓	✓		✓	✓	✓	
	Heavy	✓	✓		✓				
	Extra-Heavy	✓			✓				

## Cable Tie Industry Approvals

Agency	Spec/Approval	Requirement	Products
ABS (American Bureau of Shipping)	05-HS463235-PDA	2005 Steel Vessel Rules 1-1-4/7.7, 4-8-4/21.9.32001 MODU Rules 4-3-3/5.9.1	PLT and BT Series
Bureau Veritas	Cert 05968/C0, BV File ACE 14/601/01 Product Code: 2535H	Bureau Veritas Rules for the Classification of Steel Ships	PLT, PRT, BT and CBR Series
Det Norske Veritas	E-6405	Det Norske Veritas' Rules for Classification of Ships and Mobile Offshore Units	PLT, PLC, PLM, PRT, PLWP, PRWP and PRST Series
Germanischer Lloyd	30562-83HH, 32666-83HH, 51796-89HH, 98731-96HH	Germanischer Lloyd Approval	PLT and BT Series
Germany (VG) Military	K17/96066	VG 95 387 – 100 MS 3367F	PLT, BT and SST Series
Korean Register of Shipping	NYK06431-EL001, EL002, EL003	Type Approval for the Rules for Classification of Steel Ships	PLT and BT Series Mounts
Lloyd's Register of Shipping	89/60111 (E3)	Lloyd's Register Type Approval	PLT, PLC, PLP, PLWP, PLM, PRT, SST, SSC, SSM, BT, BC, BM, BF, B2M, B3M, BM, BW, BP, ILT and CBR Series
Russian Maritime Register of Shipping	11130200	Russian Maritime Type Approval Certificate	PLT, PLC, PLM, PLF, SG, BT, BF, BM, BC, DT and CBR Series
NRC (Nuclear Regulatory Commission)	NRC 10CFR50	Quality Assurance Criteria for Nuclear Plants and Reprocessing Plants	All cable tie products
Nippon Kaiji Kyokai	85VZ004B, 85BZ005B, 85VZ006B	Nippon Kaiji Kyokai Type Approval	PLT2H-12H, PLT2EH-12EH, PR2EH-12EH and SST2H-8H
US Military Aerospace Standard	QPL-AS23190-3	SAE spec AS23190	Select PLT, BT, SST, and CBR Series

# Material Selection Criteria

Material	Test Method	Nylon 6.6	Weather Resistant Nylon 6.6	Impact Modified Weather Resistant Nylon 6.6	Heat Stabilized Nylon 6.6	Heat Stabilized Nylon 6.6	Heat Stabilized Weather Resistant Nylon 6.6	Flame Retardant Nylon 6.6	Flame Retardant Nylon 6.6	Weather Resistant Nylon 12	Polypropylene	Weather Resistant Polypropylene	TEFZEL*	HALAR*	PEEK	Metal Detectable Nylon	Metal Detectable Polypropylene	DT Weather Resistant Acetal	ERT Flame Retardant TPU
Color	—	Natural (other colors available)	Black	Black	Black	Natural	Black	Black	Natural Ivory	Black	Green	Black	Aqua Blue	Maroon	Translucent Brown	Lt. Blue	Dark Blue	Black	Black
Part Number Suffix (Material Designation)	—	No Suffix	0	0	30	39	300	60	69	120	109	100	76	702Y	71	86	186	N/A	20
<b>Mechanical Properties</b>																			
Tensile @ Yield @ 73°F (psi)	ISO 527	12,000	12,000	9,700	12,000	12,000	12,000	11,000	11,000	6,700	4,100	4,100	7,500	7,000	15,200	—	—	6,500	4,300
Water Absorption (24 Hours)	ASTM D570	1.2%	1.2%	1.2%	1.2%	1.2%	1.2%	1.1%	1.1%	0.3%	0.1%	0.1%	<0.03%	<0.05%	0.5%	1.2%	0.1%	<0.45%	0.25%
Radiation Resistance (Rads)	—	1 x 10 <sup>5</sup>	1 x 10 <sup>5</sup>	1 x 10 <sup>5</sup>	1 x 10 <sup>5</sup>	1 x 10 <sup>5</sup>	1 x 10 <sup>5</sup>	1 x 10 <sup>5</sup>	1 x 10 <sup>5</sup>	3.5 x 10 <sup>6</sup>	1 x 10 <sup>6</sup>	1 x 10 <sup>6</sup>	2 x 10 <sup>8</sup>	2 x 10 <sup>8</sup>	1 x 10 <sup>9</sup>	—	1 x 10 <sup>6</sup>	6 x 10 <sup>5</sup>	—
Weathering Life Expectancy (Years)/UV Resistance	—	1 – 2	7 – 9	7 – 9	4 – 5	1 – 2	7 – 9	1 – 2	1 – 2	12 – 15	1	7 – 9	>15	>15	—	—	1	>20	7 – 9 (Note 1)
Impact Resistance	—	○	○	⊖	○	○	○	⊖	⊖	○	⊖	⊖	●	●	●	○	⊖	⊖	●
<b>Chemical Resistance</b>																			
Salts	—	⊖	⊖	⊖	⊖	⊖	⊖	⊖	⊖	⊖	●	●	●	●	●	⊖	●	○	●
Hydrocarbons (Oil, Lubricants)	—	●	●	●	●	●	●	●	●	●	○	○	●	●	●	●	○	●	○
Chlorinated Hydrocarbons	—	⊖	⊖	⊖	⊖	⊖	⊖	⊖	⊖	⊖	○	○	●	●	●	⊖	○	⊖	●
Acids	—	●	●	●	●	●	●	●	●	●	●	●	●	●	○	●	●	●	●
Bases	—	⊖	⊖	⊖	⊖	⊖	⊖	⊖	⊖	⊖	●	●	●	●	●	⊖	●	●	●
Acid Rain	—	⊖	⊖	⊖	⊖	⊖	⊖	⊖	⊖	⊖	●	●	●	●	●	⊖	●	●	●
<b>Thermal Properties</b>																			
Max. Continuous Use Temperature	UL 746B	185°F 85°C	185°F 85°C	185°F 85°C	239°F 115°C	239°F 115°C	212°F 100°C (Note 1)	212°F 100°C	212°F 100°C	194°F 90°C	239°F 115°C	239°F 115°C	338°F 170°C	302°F 150°C	500°F 260°C (Note 2)	185°F 85°C	239°F 115°C	185°F 85°C	122°F 50°C
Min. Application Use Temperature	EN 50146	-76°F -60°C	-76°F -60°C	-76°F -60°C	-76°F -60°C	-76°F -60°C	-76°F -60°C	-40°F -40°C	-40°F -40°C	-76°F -60°C	-76°F -60°C	-76°F -60°C	-76°F -60°C	-76°F -60°C	-76°F -60°C	-76°F -60°C	-76°F -60°C	-76°F -60°C	-40°F -40°C
Flammability Rating	UL 94	V-2	V-2	HB	V-2	V-2	V-2	V-0	V-0	HB	HB	HB	V-0	V-0	V-0	HB	HB	HB	V-0
Low Smoke	ASTM E662	PASS	PASS	PASS	PASS	PASS	PASS	PASS	PASS	—	—	—	—	—	PASS	—	—	PASS	—
Oxygen Index	BS ISO 4589	28	28	—	28	28	28	34	34	—	—	—	30	52	35	—	—	—	26
Halogen-Free	IEC 60754-2	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	No	No	Yes	Yes	Yes	Yes	Yes
Burning Fume Toxicity	BSS-7239	PASS	PASS	PASS	PASS	PASS	PASS	PASS	PASS	—	—	—	—	—	—	—	—	—	—
Heat Deflection Temperature @ 1.8 Mpa	ASTM D648 ISO 75 -1/-2	158°F 70°C	158°F 70°C	145°F 63°C	158°F 70°C	158°F 70°C	158°F 70°C	154°F 68°C	154°F 68°C	122°F 50°C	122°F 50°C	122°F 50°C	—	149°F 65°C	313°F 156°C	—	—	147°F 64°C	—
Relative Price	—	Low	Low	Low	Low	Low	Med	Med	Med	Med	Med	Med	High	High	High	Low	Med	Med	High

Product Family	PLT	Cross Sections		✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
		SM, M, I, S	LH, H, EH																
Pan-Ty® Cable Ties	PLT	✓	SM, M, I, S LH, H, EH	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Super-Grip® Cable Ties	SG	✓	M, I, S, LH	✓															
Dome-Top® Barb Ty Cable Ties	BT	✓	M, I, S	✓	✓	✓	✓	✓	✓										
Dura-Ty™ Cable Ties	DT																		✓
Contour-Ty® Cable Ties	CBR	✓	M, I, S, HS	✓	✓				✓										
Hyper-V™ Cable Ties	HV				LH														
Sta-Strap® Cable Ties	SST	✓	M, I, S, LH	✓															
Elastomeric Cable Ties	ERT																		✓

Recommendation Legend				
Highest	High	Acceptable	Low	Lowest
●	⊖	○	⊖	●

Check mark indicates material availability in that product family for all cross sections.  
 Cross Sections: SM = Subminiature, M = Miniature, I = Intermediate, S = Standard, HS = Heavy-Standard, LH = Light-Heavy, H = Heavy, EH = Extra-Heavy

**Note 1:** Estimated  
**Note 2:** Based upon UL RTI for electrical properties  
 \*TEFZEL is a registered trademark of E.I. du Pont de Nemours and Company.  
 \*HALAR is a registered trademark of Ausimont USA, Inc.



# Bundling Systems for Network Cabling

Panduit has a comprehensive offering of cable ties that deliver reliability by protecting against over-tensioning of high performance fiber and copper cables. These ties are adjustable, releasable, and reusable to effectively support frequent moves, adds, and changes (MACs). A wide range of designs, sizes, and colors provides flexibility and an aesthetically pleasing appearance.



**Tak-Ty® Loop Ties**  
Slot allows for pre-wrapping of bundles



**Tak-Ty® Strip Ties**  
Rolls perforated in convenient 6", 8", or 12" strips for use with pre-determined bundle sizes



**Tak-Ty® Rolls**  
Continuous rolls of 15' and 75' can be cut to any length



**Tak-Ty® Stacked Strips**  
- Eliminates cutting and staging  
- 7" strips (100 pieces)



**Tak-Ty® Cable Ties – Plenum Rated**  
UL approved for use in air handling spaces



**Ultra-Cinch™ Ties**  
Cinch ring accommodates tighter bundles



**Elastomeric Cable Ties**  
- UL 94V-0 flammability rating  
- Safe and releasable



**Tak-Tape™ Rolls**  
General purpose fastener



**Hook and Loop Wrap Marker Ties**  
- Write-on identification area  
- Custom imprinting available

# Complete Your Bundling System

## Tools



### Manual Cable Tie Installation Tools

- Designed to speed installation for lower installed cost
- Flush tie cut-off limits exposure to sharp edges
- A full line of lightweight, ergonomic hand tools available
- Panduit leads the industry in reliability and performance



### Automatic Cable Tie Installation Systems

- An efficient solution for high volume harnessing, assembly, fastening and packaging applications
- High speed tools lower installed cost and reduce operator fatigue
- Wrap, tension, and cut off cable ties in less than one second
- Microprocessor based controller monitors system performance for production data and reporting

## Services



### Custom Imprinting Service

- Products available for custom imprinting include cable ties, marker plates, marker and flag ties, hook and loop wrap ties
- Results in a professional, high quality appearance for identification and labeling as well as promotional purposes
- Options include company logos, website addresses, sequential numbering, phone numbers, graphics and text

## Related Products



### Cable Accessories

- Comprehensive line of mounts, clips, and clamps that organizes and routes cables, speeds and simplifies installations, and lowers overall installed cost. Installation methods include adhesive backed, user applied adhesive, screws, rivets and push barb
- Accessories provide long term reliability while cable clips and clamps offer a one-piece solution to save time and reduce inventory



### Stainless Steel Cable Ties

- Durable method of bundling, fastening and permanent identification in applications where severe environmental conditions exist
- Engineered for safety, productivity and durability by providing round edges and smooth surfaces, easy threading, high loop tensile strength and tight clamping

**PANDUIT**®

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