

# Pan-Ty® Cable Ties – Polypropylene

## specifications

Mechanical and chemical attributes of natural and weather resistant polypropylene cable ties shall provide superior resistance to chemical attack when exposed to various concentrations of salts, bases, and acids. In addition, polypropylene ties shall be buoyant in liquid applications and shall float to the surface where they can be seen and recovered.



## technical information

<b>Tensile @ yield @ 73°F (psi):</b>	4,100 per ISO 527
<b>Water absorption (24 hours):</b>	0.1% per ASTM D570
<b>Radiation resistance (Rads):</b>	1x10 <sup>6</sup>
<b>Weathering life expectancy (years)/ UV resistance:</b>	7 – 9 years – Weather Resistant (100) 1 year – Natural (109)
<b>Max. continuous use temperature:</b>	239°F (115°C) per UL 746B
<b>Min. application use temperature:</b>	-76°F (-60°C) per EN 50146
<b>Heat deflection temperature @ 1.8 Mpa:</b>	122°F (50°C) per ASTM D648 ISO 75 -1/-2
<b>Chemical resistance:</b>	
<b>Salts</b>	Excellent
<b>Hydrocarbons (Gas, Oil, Lubricants)</b>	Good
<b>Chlorinated Hydrocarbons</b>	Good
<b>Acids</b>	Excellent
<b>Bases</b>	Excellent
<b>Acid Rain</b>	Excellent
<b>Impact resistance:</b>	Very Good

## key features and benefits

<b>Polypropylene material</b>	Resists chemical attack when exposed to salts, bases, and acids in various concentrations to help maintain cable tie performance in harsh conditions
<b>Buoyancy</b>	Cable tie will float to the surface of most liquids so the tie can easily be seen and removed
<b>One-piece design with locking wedge</b>	Provides low thread force for easy and reliable installation; improves productivity and reduces operator fatigue
<b>Curved, tapered tip (on applicable sizes)</b>	Threads easily into head; installs quickly for improved productivity
<b>Distinct green color (natural ties)</b>	Easy to identify for operators and/or inspectors to ensure the proper cable tie is used in the right application (indoor use)
<b>Black color with ultraviolet inhibitor (weather resistant ties)</b>	Allows ties to withstand exposure to sunlight; contributes to weathering life expectancy (7 – 9 years)

## applications

Polypropylene cable ties are used to fasten wiring and hoses in the chemical process industry and related harsh environments. Ideal for applications that demand a cable

tie material that provides superior chemical resistance to salts, bases, and acids in various solutions and concentrations.

### Polypropylene Cable Ties

#### Miniature Cross Section 11 Lbs. (49N) Min. Loop Tensile

<b>Natural:</b>	PLT1M-M109
<b>Weather resistant:</b>	PLT1M-M100

#### Intermediate Cross Section 18 Lbs. (80N) Min. Loop Tensile

<b>Natural:</b>	PLT1.5I-M109
<b>Weather resistant:</b>	PLT1.5I-M100

#### Standard Cross Section 30 Lbs. (133N) Min. Loop Tensile

<b>Natural:</b>	PLT2S-M109, PLT3S-M109, PLT4S-M109
<b>Weather resistant:</b>	PLT2S-M100, PLT3S-M100, PLT4S-M100

#### Light-Heavy Cross Section 50 Lbs. (222N) Min. Loop Tensile

<b>Natural:</b>	PLT2H-TL109, PLT3H-TL109, PLT4H-TL109
<b>Weather resistant:</b>	PLT2H-TL100, PLT3H-TL100, PLT4H-TL100

### Recommended Installation Tools

<b>Hand tools tool controlled tension and cut-off:</b>	GTS-E, GTH-E, GS2B-E, GS4H-E, GS4EH-E
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<b>Hand tools installer controlled tension and cut-off:</b>	STS2, STH2, ST3EH
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<b>Pneumatic tools:</b>	PTS, PPTS, PTH
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# Pan-Ty® Cable Ties – Polypropylene

## ordering information

Natural Part Number	Weather Resistant Part Number	Length In. (mm)	Width In. (mm)	Thickness In. (mm)	Max. Bundle Dia. In. (mm)	Min. Loop Tensile Strength Lbs. (N)	Recommended Installation Tool	Bulk Pkg. Qty.*	Bulk Ctn. Qty.
<b>Miniature Cross Section</b>									
PLT1M-M109	PLT1M-M100	3.9 (99)	0.098 (2.5)	0.043 (1.1)	0.87 (22)	11 (49)	GTS-E, GS2B-E, PTS, PPTS, STS2	1000	50,000
<b>Intermediate Cross Section</b>									
PLT1.5I-M109	PLT1.5I-M100	5.6 (142)	0.142 (3.6)	0.045 (1.1)	1.38 (35)	18 (80)	GTS-E, GS2B-E, PTS, PPTS, STS2	1000	25,000
<b>Standard Cross Section</b>									
PLT2S-M109	PLT2S-M100	7.4 (188)	0.190 (4.8)	0.052 (1.3)	1.88 (48)	30 (133)	GTS-E, GS2B-E, GTH-E, GS4H-E, PTS, PTH, PPTS, STS2, STH2	1000	10,000
PLT3S-M109	PLT3S-M100	11.5 (292)			3.00 (76)			1000	10,000
PLT4S-M109	PLT4S-M100	14.5 (368)			4.00 (102)			1000	5,000
<b>Light-Heavy Cross Section (Straight Tip)</b>									
PLT2H-TL109	PLT2H-TL100	8.1 (206)	0.300 (7.6)	0.075 (1.9)	2.00 (51)	50 (222)	GTH-E, GS4H-E, GS4EH-E, PTH, STH2, ST3EH	250	2,500
PLT3H-TL109	PLT3H-TL100	11.4 (290)			3.00 (76)			250	2500
PLT4H-TL109	PLT4H-TL100	14.5 (368)			4.00 (102)			250	2500

\*Order number of pieces required, in multiples of Bulk Package Quantity.

## related products



Part Number	Used With Polypropylene Cable Ties	Description	Std. Pkg. Qty.
<b>Tool Controlled Tension and Cut-Off Tools</b>			
GTS-E, GS2B-E	Miniature, Intermediate, Standard	Tool controlled tension tools consistently provide flush tie cut-offs to speed installation.	1
GS4H-E, GTH-E, GS4EH-E	Standard, Light-Heavy		1



<b>Installer Controlled Tension and Cut-Off Tools</b>			
STS2	Miniature, Intermediate, Standard	Installer controlled tension tools are economical and ideal for low volume applications.	1
STH2	Standard, Light-Heavy		1
ST3EH	Light-Heavy		1



<b>Pneumatic Tools</b>			
PTS, PPTS	Miniature, Intermediate, Standard	Pneumatic, push button operation tools tension and cut-off excess tie in a fraction of a second.	1
PTH	Standard, Light-Heavy		1

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CTSP05--WW-ENG  
6/2017