

# Miniflex<sup>®</sup> Protection Tube

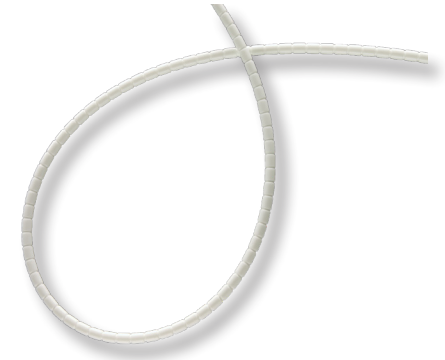


## Features & Benefits

- Tough, yet lightweight – as little as 5g/m
- Compact – small diameter down to 3mm
- Anti-kink property
- Very high crush resistance – up to 1400N
- Slit version – suitable for retro-fitting over installed fiber
- Small bend radius – down to 5x OD

### Compatibility

- All normal fiber termination methods (e.g. SC/LC/MTP/E2000)
- Standard tube/microduct push-fit connectors
- Electrical cable style installation – staples or cable clips
- All industry standard fiber, bend insensitive fiber and small-diameter cable



## Overview

Miniflex<sup>®</sup> protection tube is a flexible tube made from tough polymers to protect optical fibers or lightweight optical fiber units. PPC makes hard plastic flexible through our patented grooved design and process. Miniflex protection tube has exceptionally low weight for the level of strength and protection it provides and it's the only flexible, durable polymer protective jacket in the industry.

## Applications

- FTTh/FTTx – Indoor & Outdoor
- Broadband Networks
- Data Infrastructure
- Transport – Automotive & Aerospace

## Technical Data

### Materials

Material	Property	Best For	O.D.	I.D.	Crush	Tension	Nominal Weight
			(mm)	(mm)	(N)	(N)	(kg/km)
PBT	Hardest & toughest outdoor material with some UV resistance	General Use	3.0	1.4	950	140	8.0
			4.0	2.6	650	130	8.0
			5.0	3.1	1400	280	12.2
			5.0	3.3	1000	130	11.3
PA12	Hardest & toughest indoor material; LSZH	ODFs' & frequently accessed racks	3.0	1.4	650	100	6.0
			5.0	3.1	1000	150	10.5
PP	Basic, most cost effective grade	Protecting fiber in cabinets	5.0	3.1	800	100	9.7
PEMX	Specialized LSZH & Riser Material	Indoor use	5.0	3.1	500	100	12.9

- **Material Color:** Standard colors for all materials are black and white except for PA12 which is only available in white. The PP material is available in other solid colours on request.
- **Bend radius:** All protection tubes should have an installed bend radius that is 10x OD. The radius during installation should not be smaller than 5x OD.
- **Operating Temperature Range:** -10 °C to 60 °C (14 °F to 140 °F)

This product may be protected by one or more patents • For further information, please visit: [www.ppc-online.com/patents](http://www.ppc-online.com/patents)

# Miniflex<sup>®</sup> Protection Tube



## Ordering Information

Material	Part Number	Product Code	SKU Length	SKU Weight	Reel Diameter	Reel Depth	Reel Width
			<i>m</i>	<i>kg</i>	<i>mm</i>	<i>mm</i>	<i>mm</i>
PBT	10-0440	PT-3.0-1.4-PBT-BLK-V0	1000	8.1	500	350	320
	10-0922	PT-3.0-1.4-PBT-WHT-V0	1000	8.1	500	350	320
	10-0157	PT-4.0-2.6-PBT-BLK-V0	1000	11	500	350	320
	10-0468	PT-4.0-2.6-PBT-WHT-V0	1000	11	500	350	320
	10-0164	PT-5.0-3.1-PBT-BLK-V0	1000	15.2	500	350	320
	10-0166	PT-5.0-3.1-PBT-WHT-V0	1000	15.2	500	350	320
	10-0177	PT-5.0-3.3-PBT-BLK-V0	1000	14.3	500	350	320
	10-0178	PT-5.0-3.3-PBT-WHT-V0	1000	14.3	500	350	320
	10-0203	PT-S-5.0-3.1-PBT-BLK-V0	1000	17.9	550	350	320
	10-0204	PT-S-5.0-3.1-PBT-WHT-V0	1000	16.8	550	350	320
PA12	10-0533	PT-3-1.4-PA12-WHT-FRLSZH	1000	9	550	350	320
	10-0163	PT-5.0-3.1-PA12-WHT-FRLSZH	1000	13.5	550	350	320
PP	10-0175	PT-5.0-3.1-PP-WHT	1000	12.7	500	350	320
	10-1110	PT-S-5.0-3.1-PP-CLR	1000	13.6	550	350	320
PEMX	10-0169	PT-5-3.1-PE-WHT-V0LSZH	1000	15.9	550	350	320
	10-0205	PT-S-5-3.1-PE-WHT-V0LSZH	1000	13.5	550	350	320

Slit versions of the protection tube are indicated by an 'S' which immediately follows the initial two alpha characters "PT" of the product code

This version of the protection tube allows it to be retro-fitted onto already installed optical fiber or fiber cable. The PPC Zipper Hand Tool (5mm sized tubes only) is designed to facilitate applying the protection tube in this manner.

Fire retardant versions are indicated by V0 in their product code. Similarly for Low, Somke Zero Halogen (LSZH) versions.