

Product type designation

FO Trailing Cable

FO Trailing Cable 50/125, pre-assembled with 2x2 BFOC connectors, insertion aid, Length 100 m



Suitability for use	Flexible cable for use in cable carriers for high mechanical loading, no UL approval
Version of the assembled FO cable	Assembled with four BFOC connectors
Cable designation	AT-W(ZN)Y(ZN)11Y 2G 50/125 OM2++
Wire length	100 m

Optical data

Damping ratio per length	
<ul style="list-style-type: none"> • at 850 nm / maximum • at 1300 nm / maximum 	<p>2.7 dB/km</p> <p>0.7 dB/km</p>
Bandwidth length product	
<ul style="list-style-type: none"> • at 850 nm • at 1300 nm 	<p>600 GHz·m</p> <p>1200 GHz·m</p>

Mechanical data

Number of fibers / per FOC core	1
Number of FO cores / per FOC cable	2
Version of the FO conductor fiber	Multi-mode gradient fiber 50/125 µm, OM 2
Design of the FOC core	Hollow core, filled, diameter 1400 µm
Design of the fiber-optic cable	segmentable

Outer diameter	
<ul style="list-style-type: none"> • of the optical fibers • of the optical fiber sheath • of the FOC core sheath 	<p>50 µm</p> <p>125 µm</p> <p>2.9 mm</p>
Symmetrical deviation / of the outer diameter of the FOC core sheath	0.1 mm
Outer diameter / of the cable	10.5 mm
Symmetrical deviation / of the outer diameter of the line	0.5 mm
Material	
<ul style="list-style-type: none"> • of the fiber-optic cable core • of the optical fiber sheath • of the FOC core sheath • of the fiber-optic cable sheath • of the strain relief 	<p>Quartz glass</p> <p>Quartz glass</p> <p>PVC</p> <p>PUR</p> <p>Aramid fibers</p>
Color	
<ul style="list-style-type: none"> • of the FOC core sheath • of cable sheath 	<p>orange/black</p> <p>green</p>
Bending radius	
<ul style="list-style-type: none"> • with single bend / minimum permissible • with multiple bends / minimum permissible 	<p>150 mm</p> <p>200 mm</p>
Number of bending cycles	5000000
Tensile load	
<ul style="list-style-type: none"> • during installation / short-term • during operation / maximum 	<p>2000 N</p> <p>800 N</p>
Short-term shear force per length	700 N/cm
Continuous lateral force per length	400 N/cm
Weight per length	90 kg/km

Permitted ambient conditions	
Ambient temperature	
<ul style="list-style-type: none"> • during operation • during storage • during transport • during installation 	<p>-40 ... +80 °C</p> <p>-40 ... +80 °C</p> <p>-40 ... +80 °C</p> <p>-5 ... +50 °C</p>
Burning behavior	flammable
Chemical resistance	
<ul style="list-style-type: none"> • to mineral oil • to grease 	<p>acc. to IEC 60811-404 with test oil IRM 902 (acc. to ISO 1817), +100 °C, 168 h, pull speed 250 mm/min.</p> <p>resistant</p>
Radiological resistance / to UV radiation	resistant
Protection class IP	IP20

Product properties, functions, components / general

Product feature	
• halogen-free	No
• silicon-free	Yes
Product component / Rodent protection	No
Wire length	
• for glass FOC / for 100BaseFX / for Industrial Ethernet / maximum	5000 m
• for glass FOC / for 1000BaseSX / for Industrial Ethernet / maximum	750 m
• for glass FOC / for 1000BaseLX / for Industrial Ethernet / maximum	2000 m
• for glass FOC / with PROFIBUS / maximum	3000 m

Standards, specifications, approvals

Certificate of suitability	
• RoHS conformity	Yes

Further information / Internet-Links

Internet-Link	
• to website: Selector SIMATIC NET SELECTION TOOL	http://www.siemens.com/snst
• to website: Industrial communication	http://www.siemens.com/simatic-net
• to website: Industry Mall	https://mall.industry.siemens.com
• to website: Information and Download Center	http://www.siemens.com/industry/infocenter
• to website: Image database	http://automation.siemens.com/bilddb
• to website: CAx Download Manager	http://www.siemens.com/cax
• to website: Industry Online Support	https://support.industry.siemens.com

last modified: 11/11/2019