

### Product type designation

Product description

### FO Standard Cable GP

Glass fiber-optic cable, preferred length, preassembled  
SIMATIC NET FO STANDARD CABLE 50/125, PREASSEMBLED  
WITH 2X2 BFOC CONNECTORS, INSERTION GUIDE, LENGTH 80  
M



Suitability for use	Cable for installation indoors and outdoors, UL approval
Version of the assembled FO cable	Assembled with four BFOC connectors
Cable designation	AT-W(ZN)YY 2x1 G 50/125
Wire length	80 m

### Optical data

Damping ratio per length	
<ul style="list-style-type: none"> <li>at 850 nm / maximum</li> <li>at 1300 nm / maximum</li> </ul>	<p>2.7 dB/km</p> <p>0.7 dB/km</p>
Bandwidth length product	
<ul style="list-style-type: none"> <li>at 850 nm</li> <li>at 1300 nm</li> </ul>	<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"> <li>• of the optical fibers</li> <li>• of the optical fiber sheath</li> <li>• of the FOC core sheath</li> </ul>	50 µm 125 µm 2.9 mm
Symmetrical deviation / of the outer diameter of the FOC core sheath	0.1 mm
Width / of cable sheath	7.4 mm
Thickness / of cable sheath	4.5 mm
Material	
<ul style="list-style-type: none"> <li>• of the fiber-optic cable core</li> <li>• of the optical fiber sheath</li> <li>• of the FOC core sheath</li> <li>• of the fiber-optic cable sheath</li> <li>• of the strain relief</li> </ul>	Quartz glass Quartz glass PVC PVC Aramid fibers
Color	
<ul style="list-style-type: none"> <li>• of the FOC core sheath</li> <li>• of cable sheath</li> </ul>	orange/black green
Bending radius	
<ul style="list-style-type: none"> <li>• with single bend / minimum permissible</li> <li>• with multiple bends / minimum permissible</li> </ul>	45 mm 65 mm
Tensile load	
<ul style="list-style-type: none"> <li>• during installation / short-term</li> <li>• during operation / maximum</li> </ul>	1200 N 500 N
Short-term shear force per length	600 N/cm
Continuous lateral force per length	400 N/cm
Weight per length	40 kg/km

### Permitted ambient conditions

Ambient temperature	
<ul style="list-style-type: none"> <li>• during operation</li> <li>• during storage</li> <li>• during transport</li> <li>• during installation</li> </ul>	-25 ... +80 °C -25 ... +80 °C -25 ... +80 °C -5 ... +50 °C
Burning behavior	flame-resistant acc. to IEC 60332-1-2 and IEC 60332-3-22 (Cat. A)
Chemical resistance	
<ul style="list-style-type: none"> <li>• to mineral oil</li> <li>• to grease</li> </ul>	conditional resistance conditional resistance
Radiological resistance / to UV radiation	resistant
Protection class IP	IP20

### Product properties, functions, components / general

Product feature	
<ul style="list-style-type: none"> <li>• halogen-free</li> </ul>	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	<a href="http://www.siemens.com/snst">http://www.siemens.com/snst</a>
• to website: Industrial communication	<a href="http://www.siemens.com/simatic-net">http://www.siemens.com/simatic-net</a>
• to website: Industry Mall	<a href="https://mall.industry.siemens.com">https://mall.industry.siemens.com</a>
• to website: Information and Download Center	<a href="http://www.siemens.com/industry/infocenter">http://www.siemens.com/industry/infocenter</a>
• to website: Image database	<a href="http://automation.siemens.com/bilddb">http://automation.siemens.com/bilddb</a>
• to website: CAx Download Manager	<a href="http://www.siemens.com/cax">http://www.siemens.com/cax</a>
• to website: Industry Online Support	<a href="https://support.industry.siemens.com">https://support.industry.siemens.com</a>

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