

### product type designation

product description



### MM FO Robust Cable GP

Glass fiber-optic cable, preferred length, preassembled

FO Robust Cable GP 50/125, pre-assembled with 2x LC Duplex connectors, length 1.0 m.

Technical Product Detail Page

<https://l.siemens.com/1P6XV1873-5RH10>

suitability for use

Waterproof cable (lengthwise and sideways) with non-metallic protection against rodents for use indoors and outdoors as well as for direct routing underground

version of the assembled FO cable

Pre-assembled with 2x LC DUPLEX connectors

cable designation

AT-V(ZN)H(ZN)BH 2G50/125 OM2+

wire length

1 m

### optical data

attenuation factor per length

- at 850 nm / maximum 2.7 dB/km
- at 1300 nm / maximum 1 dB/km

bandwidth length product

- at 850 nm 600 GHz·m
- at 1300 nm 1200 GHz·m

### 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 50/125/245 µm, OM2

design of the FOC core

Solid core, diameter 900 µm

design of the fiber-optic cable

segmentable

outer diameter

- of the optical fibers 50 µm
- of the optical fiber sheath 125 µm
- of the FOC core sheath 2.2 mm

outer diameter / of the cable

7.5 mm

material

- of the fiber-optic cable core Quartz glass
- of the optical fiber sheath Quartz glass
- of the FOC core sheath PE flame retardant
- of the fiber-optic cable sheath PE flame retardant
- of the strain relief Aramid fibers and glass roving

color

- of the FOC core sheath orange/black, with direction arrow
- of cable sheath Black

bending radius

- with single bend / minimum permissible 25 mm
- with multiple bends / minimum permissible 40 mm

tensile load

<ul style="list-style-type: none"> <li>during installation / short-term</li> </ul>	2000 N
<ul style="list-style-type: none"> <li>during operation / maximum</li> </ul>	1000 N
short-term shear force per length	600 N/cm
continuous shear force per length	200 N/cm
weight per length	67 kg/km
<b>ambient conditions</b>	
ambient temperature	
<ul style="list-style-type: none"> <li>during operation</li> </ul>	-40 ... +70 °C
<ul style="list-style-type: none"> <li>during storage</li> </ul>	-40 ... +70 °C
<ul style="list-style-type: none"> <li>during transport</li> </ul>	-40 ... +70 °C
<ul style="list-style-type: none"> <li>during installation</li> </ul>	-20 ... +60 °C
fire behavior	flame-resistant acc. to IEC 60332-3-24
chemical resistance	
<ul style="list-style-type: none"> <li>to mineral oil</li> </ul>	conditional resistance
<ul style="list-style-type: none"> <li>to grease</li> </ul>	conditional resistance
<ul style="list-style-type: none"> <li>to water</li> </ul>	resistant
radiological resistance / to UV radiation	resistant
<b>product features, product functions, product components / general</b>	
product feature	
<ul style="list-style-type: none"> <li>halogen-free</li> </ul>	Yes
<ul style="list-style-type: none"> <li>silicon-free</li> </ul>	Yes
product component / rodent protection	Yes
wire length	
<ul style="list-style-type: none"> <li>for glass FOC / for 100BaseFX / for Industrial Ethernet / maximum</li> </ul>	5000 m
<ul style="list-style-type: none"> <li>for glass FOC / for 1000BaseSX / for Industrial Ethernet / maximum</li> </ul>	750 m
<ul style="list-style-type: none"> <li>for glass FOC / for 1000BaseLX / for Industrial Ethernet / maximum</li> </ul>	2000 m
<ul style="list-style-type: none"> <li>for glass FOC / with 10GBaseSR / for Industrial Ethernet / maximum</li> </ul>	60 m
<ul style="list-style-type: none"> <li>for glass FOC / with PROFIBUS / maximum</li> </ul>	3000 m
<b>standards, specifications, approvals</b>	
certificate of suitability	
<ul style="list-style-type: none"> <li>RoHS conformity</li> </ul>	Yes
<b>further information / internet links</b>	
internet link	
<ul style="list-style-type: none"> <li>to website: Selection guide for cables and connectors</li> </ul>	<a href="https://support.industry.siemens.com/cs/ww/en/view/109766358">https://support.industry.siemens.com/cs/ww/en/view/109766358</a>
<ul style="list-style-type: none"> <li>to web page: selection aid TIA Selection Tool</li> </ul>	<a href="https://www.siemens.com/tstcloud">https://www.siemens.com/tstcloud</a>
<ul style="list-style-type: none"> <li>to website: Industrial communication</li> </ul>	<a href="https://www.siemens.com/simatic-net">https://www.siemens.com/simatic-net</a>
<ul style="list-style-type: none"> <li>to web page: SiePortal</li> </ul>	<a href="https://sieportal.siemens.com/">https://sieportal.siemens.com/</a>
<ul style="list-style-type: none"> <li>to website: Image database</li> </ul>	<a href="https://www.automation.siemens.com/bilddb">https://www.automation.siemens.com/bilddb</a>
<ul style="list-style-type: none"> <li>to website: CAx-Download-Manager</li> </ul>	<a href="https://www.siemens.com/cax">https://www.siemens.com/cax</a>
<ul style="list-style-type: none"> <li>to website: Industry Online Support</li> </ul>	<a href="https://support.industry.siemens.com">https://support.industry.siemens.com</a>
<b>security information / header</b>	
security information	<p>Siemens provides products and solutions with industrial cybersecurity functions that support the secure operation of plants, systems, machines and networks. In order to protect plants, systems, machines and networks against cyber threats, it is necessary to implement – and continuously maintain – a holistic, state-of-the-art industrial cybersecurity concept. Siemens' products and solutions constitute one element of such a concept. Customers are responsible for preventing unauthorized access to their plants, systems, machines and networks. Such systems, machines and components should only be connected to an enterprise network or the internet if and to the extent such a connection is necessary and only when appropriate security measures (e.g. firewalls and/or network segmentation) are in place. For additional information on industrial cybersecurity measures that may be implemented, please visit <a href="http://www.siemens.com/cybersecurity-industry">www.siemens.com/cybersecurity-industry</a>. Siemens' products and solutions undergo continuous development to make them more secure. Siemens strongly recommends that product updates are applied as soon as they are available and that the latest product versions are used. Use of product versions that are no longer supported, and failure to apply the latest updates may increase customer's exposure to cyber threats. To stay informed about product updates, subscribe to the Siemens Industrial Cybersecurity RSS Feed under <a href="https://www.siemens.com/cert">https://www.siemens.com/cert</a>. (V4.7)</p>



[Manufacturer Declaration](#)

[Declaration of Conformity](#)

[China RoHS](#)

last modified:

11/11/2025