

Indoor Riser Fiber Optics Cable with Micro-modules

Product Code: [LAN-OFC-RIMxx-yy-HF](#)

Indoor Riser Fiber Optics Cable with Micro-modules

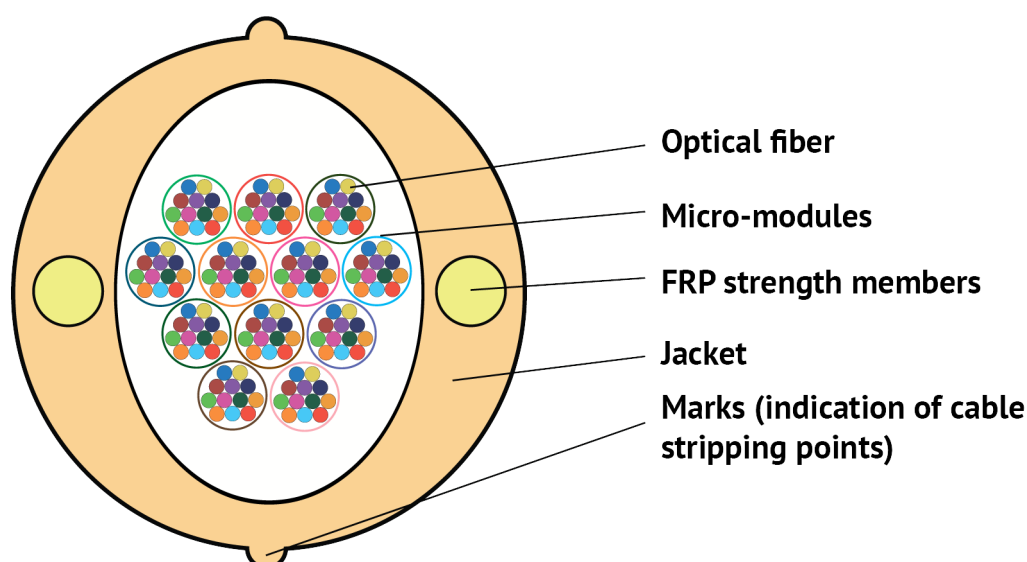


Description

Application:

Used as a riser cable for vertical installation inside buildings with direct fiber access.

Design:



The cable contains a bundle of micro-modules with optical fibers. The cable jacket is made of a flame retardant, halogen-free, low-smoke polymer composition. There are two diametrically opposite FRP rods in the cable jacket, which prevent axial twisting of the cable and act as strength members.

Color identification of optical fibers and micromodules:

Fiber color		Micro-module color		Modules 13-24	
№	Fibers 1-12	№	Modules 1-12	№	Modules 13-24
1	Blue	1	Blue	13	Blue + 1 mark
2	Orange	2	Orange	14	Orange + 1 mark
3	Green	3	Green	15	Green + 1 mark
4	Brown	4	Brown	16	Brown + 1 mark
5	Grey	5	Grey	17	Grey + 1 mark
6	White	6	White	18	White + 1 mark
7	Red	7	Red	19	Red + 1 mark
8	Black	8	Black	20	Black + 1 mark
9	Yellow	9	Yellow	21	Yellow + 1 mark
10	Violet	10	Violet	22	Violet + 1 mark
11	Pink	11	Pink	23	Pink + 1 mark
12	Turquoise	12	Turquoise	24	Turquoise + 1 mark

Weight and Dimensions:

Count of fibers in the cable	Cable diameter, mm	Minimum jacket thickness, mm	Maximum jacket thickness, mm	Cable weight, kg/km
2 (1x2)	6,5	1,0	2,0	38,2
4 (1x4)	6,5	1,0	2,0	38,4
8 (2x4)	6,5	1,0	2,0	39,4
12 (3x4)	6,5	1,0	2,0	40,4
16 (4x4)	6,5	1,0	2,0	41,3
20 (5x4)	8,5	1,0	2,0	56,4
24 (4x6)	8,5	1,0	2,0	56,7
24 (6x4)	8,5	1,0	2,0	57,4
24 (12x2)	8,5	1,0	2,0	60,6
32 (8x4)	8,5	1,0	2,0	59,3
36 (6x6)	8,5	1,0	2,0	59,2
40 (10x4)	8,5	1,0	2,0	61,3
48 (6x8)	8,5	1,0	2,0	60,3
48 (8x6)	10,5	1,0	2,0	75,9
48 (12x4)	10,5	1,0	2,0	77,4
60 (10x6)	10,5	1,0	2,0	78,4
64 (8x8)	10,5	1,0	2,0	77,3
64 (16x4)	10,5	1,0	2,0	81,2
72 (6x12)	10,5	1,0	2,0	76,0
72 (12x6)	10,5	1,0	2,0	81,0
96 (8x12)	10,5	1,0	2,0	79,4
96 (16x6)	13,5	1,5	2,5	130,8
96 (24x4)	13,5	1,5	2,5	133,7
144 (12x12)	13,5	1,5	2,5	131,0
144 (24x6)	13,5	1,5	2,5	141,0
192 (24x8)	13,5	1,5	2,5	145,2
192 (16x12)	13,5	1,5	2,5	137,8
288 (24x12)	14,5	1,5	2,5	160,9

Operating conditions:

Operating Temperature	-30°C...+50°C
Installation Temperature	-10°C...+50°C
Storage Temperature	-50°C...+50°C
Minimum Bend Radius	At least 10 cable diameters
Lifetime	25 years

Physical characteristics:

Optical cable is resistant to the following impacts

Impact type	Nominal value	Criteria for evaluation
Pulling tension (IEC 794-1-93 E1 test procedure)	400 N	$\Delta\alpha^* \leq 0,05$ dB no damage
Crushing strength (IEC 794-1-93 E3 test procedure)	80 N/cm	
Dynamic Bending Stresses (IEC 794-1-93 E6 test procedure)	20 cycles at an angle $\pm 90^\circ$	
Axial twisting stresses (IEC 794-1-93 E7 test procedure)	- 10 cycles - at an angle of $\pm 360^\circ$ at a length of 4 m	
Impact (IEC 794-1-93 E4 test procedure)	Impact energy is 3 J	
Climatic impact (IEC 794-1-93 F1 test procedure)	- temperature range from minus 30 to 50 °C - 2 cycles - cycle time ≥ 16 hours	$\Delta\alpha \leq 0,05$ dB/km

* - increase in attenuation of an optical fiber in a cable at specific wavelengths.

Product code	Description
LAN-OFC-RIMxx-yy-HF	Indoor FO cable, Riser, HF(A)-HF, xx (n x m) fibers, micro-modules, OS2 Ultra/OS2/OM1/OM2/OM3/OM4
xx – fiber count	
yy – fiber type (SU, S2, S5, S7, M1, M2, M3, M4)	
n - micro-module count	
m - fiber count in micro-module	

Applicable optical fibers:

SU	Single-mode fiber with extended operating wavelength and reduced attenuation and low bending loss (ITU G.652D+G.657.A1 recommendation)
S2	Single-mode fiber with an extended bandwidth of operating wavelengths (ITU-T G.652D recommendation)
S5	Single-mode positive non-zero dispersion shifted fiber (ITU-T G.655 recommendation)
S7	Single-mode with low bending loss (ITU-T G.657 recommendation)
M1	Multi-mode with core to cladding ratio 62,5/125 μm (IEC 60793-2-10 A1b type recommendation)
M2	Multi-mode with core to cladding ratio 50/125 μm (ITU-T G.651 recommendation and IEC 60793-2-10 type A1a.1 requirements)
M3	Multi-mode with low bending loss and core to cladding ratio 50/125 μm (ITU-T G.651 recommendation and IEC 60793-2-10 A1a.2 type requirements)
M4	Multi-mode with low bending loss and core to cladding ratio 50/125 μm (ITU-T G.651 recommendation and IEC 60793-2-10 A1a.3 type requirements)

Model range

LAN-OFC-RIM8-S2-HF	Indoor Riser Fiber Optics Cable with Micro-modules
LAN-OFC-RIM8-M2-HF	Indoor Riser Fiber Optics Cable with Micro-modules
LAN-OFC-RIM8-M3-HF	Indoor Riser Fiber Optics Cable with Micro-modules
LAN-OFC-RIM8-M4-HF	Indoor Riser Fiber Optics Cable with Micro-modules
LAN-OFC-RIM12-S2-HF	Indoor Riser Fiber Optics Cable with Micro-modules
LAN-OFC-RIM12-M2-HF	Indoor Riser Fiber Optics Cable with Micro-modules
LAN-OFC-RIM12-M3-HF	Indoor Riser Fiber Optics Cable with Micro-modules
LAN-OFC-RIM12-M4-HF	Indoor Riser Fiber Optics Cable with Micro-modules

Product descriptions are listed according to the available information at the time of publication. Product specifications can be changed without advanced notification. More detailed and exact information can be obtained from the official partners and distributors of LANMASTER.