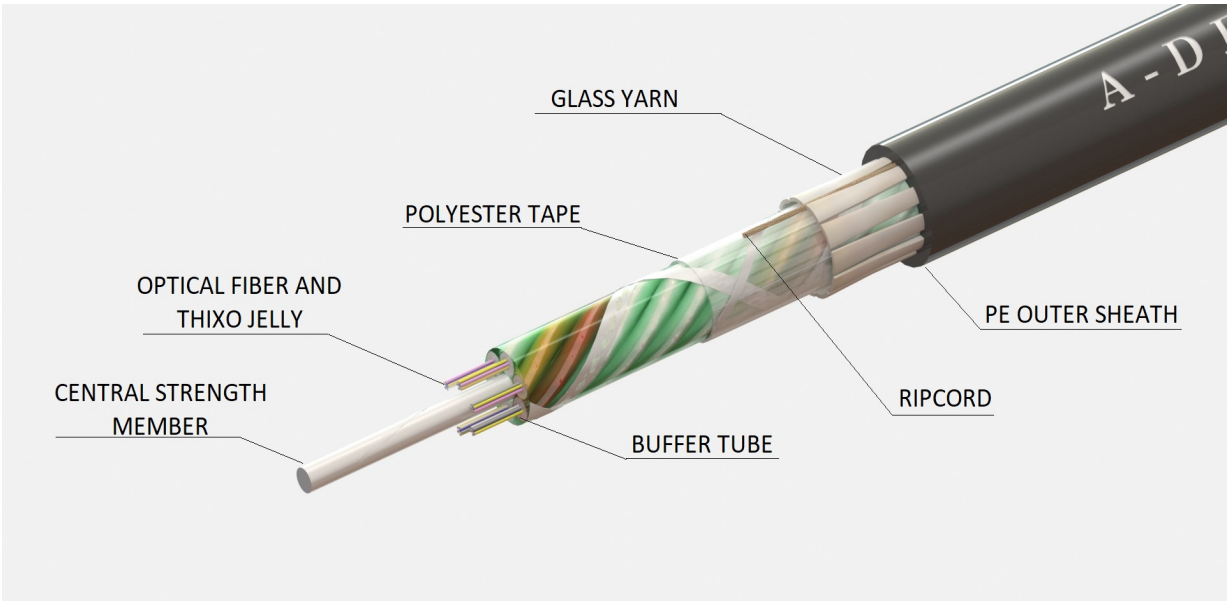
CENKABLO
perfectLINK

A-DF(ZN)2Y
8 to 48 F SM DUCT TYPE F.O. CABLE TECHNICAL SPECIFICATIONS



Cable Construction						
- Number of fibers	8	16	24	32	40	48
- Number of loose tubes x Number of fibers per tube	1x8	2x8	3x8	4x8	5x8	6x8
- Central strength member - Diameter - Material - CSM Oversheathing diameter	 2,2 ± 0,05 mm FRP ---					
- Loose tube -Material -Diameter -Type of filling compound	 PBT 2,15 ± 3% mm Thixotropic jelly					
- Filler (if required) -Material	 PE					
- Core flooding compound	Petroleum gel					
- Core wrapping -Material	 Polyester tape					
- Periphery strength members -Material	 Swellable glass yarn					
- Outer Sheath - Material - Thickness	 HDPE 1,5 mm ± 0,1					
- Cable diameter	10,6 mm ± 0,2					
- Cable weight	95 kg/km ± 10%					

- **Mechanical characteristics**			(All optical measurements at 1550 nm)
Test	**Test Standard**	**Specified Value**	**Acceptance Criteria**
- Tensile Force Dynamic (Installation)	IEC 60794-1-2-E1	Load= 2700 N, Duration of load: 10 min, Cable length ≥ 100 m	Change in attenuation to be reversible. Max. fiber elongation $\varepsilon_f \leq 0.33$ % Δα ≤ 0,05 dB after the test Δα ≤ 0,1 dB during the test
- Tensile Force Static (Operation)	IEC 60794-1-2-E1	Load= 1700 N, Duration of load: 15 min, Cable length ≥ 100 m	No fiber elongation Δα ≤ 0,05 dB during and after the test
- Crush Resistance	IEC 60794-1-2-E3	Length of plate: 100 mm Duration of load: 15 min, Number of positions where the load shall be applied : 3, Force applied: 2000 N/100 mm.	Change in attenuation to be reversible. Δα ≤0,05 dB after the test Δα ≤0,1 dB during the test No damage.
- Impact	IEC 60794-1-2-E4	1 impact in 3 different places. Anvil radius r=10 mm Impact energy E=5J	No damage There shall be no permanent change in attenuation after the test.
- Torsion	IEC 60794-1-2 E7	1 meter specimen, load is 100 N, 1 turn 360 ° each directions, 3 cycles	Δα ≤0,05 dB after the test Δα ≤0,1 dB during the test, no damage on cable jacket
- Bend	IEC 60794-1-2-E11A	Diameter of the mandrel = 15xD, number of turns/helix=5, number of cycles: 3	Change in attenuation to be reversible. Δα ≤ 0,05 dB after the test Δα ≤ 0,1 dB during the test No damage.
- Bending under tension	IEC 60794-1-2-E18	Diameter of the mandrel = 20xD, number of cycles: 5, Tensile force: 200 N	Change in attenuation to be reversible. Δα ≤ 0,05 dB after the test Δα ≤ 0,1 dB during the test No damage.
- Repeated bending	IEC 60794-1-2-E6	r = 15 x D, 100N load, 300 bending	No damage Δα ≤ 0,05 dB after the test
- Cable Kink	IEC 60794-1-2-E10	The dimension of loop: 40xD	Δα ≤ 0,05 dB after the test, no cable kink

- **Environmental Characteristics**			
Test	**Test Standard**	**Specified Value**	**Acceptance Criteria**
- Water penetration	IEC 60794-1-2-F5B	1 meter specimen,1 m water altitude, 48 hours	After test any dye must be detected when the cable examined with UV light.
- Temperature cycling	IEC 60794-1-2-F1	TA1= -40 ºC TA2= -45 ºC TB1=+ 65 ºC TB2=+ 70 ºC T1 (dwell time) : 6 hours Number of cycles: 2	Δα ≤ 0,05 dB/km at 1550 nm for TA1 & TB1 Δα ≤ 0,1 dB/km at 1550 nm for TA1 to TA2 & TB1 to TB2 Change in attenuation to be reversible

- **Identification**	
- Cable Marking	1m ±1% Intervals in white color with hot print.
- Identification of cable[1]	<number of fibers> F <fiber type> CENKABLO <year of manufacture> <length marking in meter>
- Color of filler	Black
- Color of loose tube[2]	1.Blue, 2.Orange, 3.Green, 4.Brown, 5.Grey, 6.White
- Color of fibers[2]	1.Blue, 2.Orange, 3.Green, 4.Brown, 5.Grey, 6.White, 7.Red, 8.Black
- Color of outer sheath[2]	Black

[1] *This inscription is standard imprint. It can be changed according to request.*

[2] *The other tube, fiber and sheath colors are optional.*

- **Delivery Information**	
- Drum length/Tolerance[3]	2000 m ± 5%
- Drum Flange diameter[3]	1000 mm
- Drum core diameter[3]	500 mm
- Outside width[3]	780 mm
- Central hole diameter	85 mm

[3] *Drum dimensions can change depends on cable length on a drum.*

- **Transmission characteristics**
-Refer to fiber data