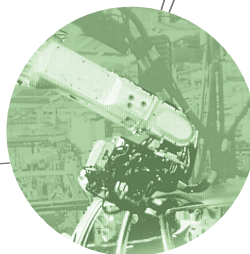
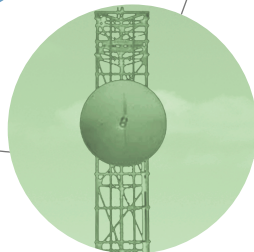






Environmental Weatherproof Optical Connectors



Amphenol

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Environmental Weatherproof Optical Connectors

		TVOP	LJTOP	ECTAOP Metal	TWINOP
					
ENVIRONMENTAL SPECIFICATIONS	Coupling	Screw	Bayonet	Push pull	Screw
	Plug outer diameter (mm (inch))	28.2 (1.11) ⁽¹⁾	28.8 (1.13) ⁽¹⁾	26 (1.02) ⁽¹⁾	22.5 (0.89)
	Scoop-proof	Yes	Yes	No	No
	Locking end	Yes (visual)	Yes	Yes	No Option: visual color line
	Mating cycles	200	200	200	200
	Standard specification	MIL-DTL-38999 III	MIL-DTL-38999 I	N/A	MIL-C-3855
	Shell material	Aluminium, Nickel or olive drab cadmium plated - Bronze	Aluminium, Nickel or olive drab cadmium plated - Bronze	Aluminium, Nickel plated	Die cast, Nickel plated
	Waterproofness	IP 67	IP 67	IP 67	IP 64
	Operation Temperature (min. / max.)	-40°C / +70°C	-40°C / +70°C	-40°C / +70°C	-40°C / +70°C
	UV resistant	N/A	N/A	N/A	N/A
	Advantage	Standard MIL-IND	Known mating bayonet	Quick mating "Push Pull"	Standard RF interface

OPTICAL SPECIFICATIONS	Typical Insertion Loss	Multimode	0.5 dB	0.5 dB	0.5 dB	0.5 dB
		Singlemode	0.5 dB	0.5 dB	0.5 dB	0.5 dB
	Maximum Return Loss (Singlemode)	PC	-30 dB	-30 dB	-30 dB	-30 dB
		UPC	-45 dB	-45 dB	-45 dB	-45 dB
		APC	-55 dB	-55 dB	-55 dB	-55 dB
	Channels		2, 4 ^{(1) (2)}	2, 4 ^{(1) (2)}	2 ^{(1) (2)}	2 ⁽²⁾
	Fiber optic termini		Standard Ø2.5mm ⁽²⁾	Standard Ø2.5mm ⁽²⁾	Standard Ø2.5mm ⁽²⁾	Standard Ø2.5mm ⁽²⁾

STANDARD / OPTIONAL DEVICES	PLUG BACKSHELL	Straight, with standard metal PG	●	●	●	●
		Straight, with standard plastic PG	●	●	●	●
		Straight, with integrated metal PG	●	●	●	●
		Straight, with integrated plastic PG	●	●	●	●
		Straight heat shrink				
		Right angle heat shrink	○	○	○	○
	RECEPTACLE	Square Flange	●	●	●	○
		Jam nut	●	●	●	●
		With backshell	○	○	○ (only square flange type)	
	PLUG CAP	Plastic Cap	●	●	●	●
		Waterproof metal Cap	○	○	○	
		Waterproof plastic Cap				
		Rubber Cap	○			
	RECEPTACLE CAP	Plastic Cap	●	●	●	●
		Waterproof metal Cap	○	○	○	
		Waterproof plastic Cap				
		Rubber Cap	○			
	SALT SPRAY RESISTANCE	Standard Coating (cf shell material)	● 48/500/1000 h	● 48/500/1000 h	● 96 h	● 48 h
		Heat shrink protection	○	○	○	○
		Anodisation	○ > 240 h	○ > 240 h	○ > 240 h	
		Organic Coating	○	○	○	

⁽¹⁾: For other sizes / arrangements, please contact us

⁽²⁾: For other channels, please contact us (possibility to replace standard termini Ø2.5mm by termini Ø1.25mm)

Amphenol manufactures **fiber optic connectors for outdoor applications** (industrial, telecommunication, railway...).

Amphenol proven shells offer high performance in many environments and for blindmate applications.

Most of them are available in **multimode and singlemode versions**, and use the **standard optical termini** (Ø2.5mm), providing high reliability performance and cost-effective design.

FOC 91	BDC / MBC	ECTAOP Plastic	FOC 16-3	NLOP	Amphe-Lite	ECTA-LX.5
						
Screw	Bayonet	Push Pull	Bayonet	Screw	Screw	Push Pull
18 (0.71)	21.7 (0.853) / 29.0 (1.141)	31 (1.22) ⁽¹⁾	34 (1.34) ⁽¹⁾	30.2 (1.19) ⁽¹⁾	29.39 max. (1.157 max.) ⁽¹⁾	32 (1.26)
Yes	Yes	No	No	Yes	Yes	No
No	Yes	Yes	Yes	Yes	Yes (visual)	Yes
Option: visual color line						
200	500 / 1500	200	200	200	500	500
DIN	MIL-C-26482	N/A	DIN	N/A	MIL-DTL-38999 III type	N/A
Die cast, Nickel plated	Aluminium alloy, black Zinc cobalt plated, olive drab	Composite glass reinforced (UL94V0)	Polyamid 6,6	Die cast, Nickel plated or Zinc plated	Composite, Nickel plated or black Zinc alloy finish	Aluminium, Nickel plated
IP 67	IP 68	IP 67	IP 65	IP 65	IP 67	IP 67
-40°C / +70°C	-55°C / +85°C	-40°C / +70°C	-40°C / +70°C	-40°C / +70°C	-55°C / +125°C	-40°C / +80°C
N/A	N/A	> 6 years		N/A	> 25 years	N/A
Small diameter	Known mating advantage	Quick mating "Push Pull"	Known mating bayonet	Quick mating	Standard MIL-IND Low-cost	Quick mating "Push Pull" insert with LX5 standard

0.5 dB	0.3 dB	0.5 dB	0.5 dB	0.5 dB	0.8 dB	0.35 dB
0.5 dB	–	0.5 dB	–	0.5 dB	–	0.3 dB
-30 dB	–	-30 dB	–	-30 dB	–	-40 dB
-45 dB	–	-45 dB	–	-45 dB	–	-55 dB
-55 dB	–	–	–	-55 dB	–	-65 dB
2 ⁽²⁾	2 ⁽¹⁾ / 4	2 ⁽¹⁾	2 ^{(1) (2)}	2 ^{(1) (2)}	2, 4 ⁽¹⁾	2
Standard Ø2.5mm ⁽²⁾	Standard Ø2.5mm ⁽²⁾	Size 12	Standard Ø2.5mm ⁽²⁾	Standard Ø2.5mm ⁽²⁾	Size 16, 20	Ø1.25mm

●				●		●
●		●	●	●	○	○
				●	○	○
		●	●	●	○	○
	●				●	
○		○	○	○	○	
●	●	●	●	●	●	●
●	●		●		●	●
				○	○	
●		●	●	●	●	
○	●			○	○	●
		○	○		○	
	●			○		
●		●	●	●	●	
○				○	○	●
		○	○		○	
	●			○		
● 96 h	● IEC68-2-52	● 1000 h	● 1000 h	● 48 h	● 2000 h	● 96 h
○				○	○	
	only BDC			○	●	

● : Standard device
○ : Standard option

Amphenol, your Worldwide Interconnect Partner !

50 manufacturing and assembly operations on 5 continents
Sales, marketing and distribution organizations in 60 countries

Amphenol Corporation is one of the world's leading producers of electronic and fiber optic connectors, cable and interconnect systems.

Our Company's focus is on producing connecting devices for the converging technologies of voice, video and data transmission, for wired and wireless internet and broadband networks, as well as industrial, automotive and aerospace industries.

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