

Single-Mode, 9-Micron Duplex Fiber Optic Cable

Increase data  
transmission distance  
and speed without  
fear of interference.



## FEATURES

- » Easy to handle and use.
- » 9/125- $\mu\text{m}$  single-mode cable.
- » Higher rate of data transmission than multimode fiber.
- » One mode of propagation eliminates interference between wavelengths and reduces the need for repeaters.
- » Choose from 14 different connector combinations.

## OVERVIEW

With Single-Mode Duplex Fiber Optic Cables, you get up to 50 times more distance than multimode fiber. And you can increase your throughput, too!

These single-mode fiberoptic cables are lighter and more durable than copper—which translates into easier handling and less replacement for you. And security isn't an issue—these cables can't be tampered with or have data taps installed.

The cables transmit data faster and over greater distances than multimode fibers—increasing the distance between repeaters.

Plus, they're immune to electromagnetic interference. You can install them safely with other fiber and/or copper cables without worrying about crosstalk.

These are the ideal cables to use to patch single-mode backbones to high-speed network devices, such as Gigabit Ethernet switches.

The PVC cable is certified OFNR for use as a riser cable. The plenum cable is certified OFNP for use in air plenums.

## TECH SPECS

**Application** — For duplex single-mode riser and plenum applications

**Attenuation** — Maximum: 1.0/0.75 dB at 1310/1550 nm;

Typical: 0.5/0.4 dB at 1310/1550 nm

**Bend Radius** — Minimum 2" (5.1 cm) loaded, 1" (2.5 cm) unloaded

**Buffer Diameter** — 900  $\mu\text{m}$

**Cladding** — 125  $\mu\text{m}$

**Conductors** — 2

**Core** — 9  $\mu\text{m}$

**Distance** — Serial Gigabit Ethernet: 5000 m at 1310 nm;

Serial 10-Gigabit Ethernet: 10,000/40,000 m at 1310/1550 nm

**Ferrule** — Ceramic

**Housing** — Composite

**Insertion Loss** — 0.2 dB typical

**Tensile Loads (Maximum)** — Short-term: 220 Newtons or 48 lbf;

Long-term: 66 Newtons or 15 lbf

**Operating Temperature** — 32 to 158°F (0 to 70°C)

Item		Code
Single-Mode, 9-Micron, Duplex Fiber Optic Cable		
ST®-ST		
PVC	1-m (3.2-ft.)	EFN310-001M-STST
	2-m (6.5-ft.)	EFN310-002M-STST
	3-m (9.8-ft.)	EFN310-003M-STST
	5-m (16.4-ft.)	EFN310-005M-STST
	10-m (32.8-ft.)	EFN310-010M-STST
	15-m (49.2-ft.)	EFN310-015M-STST
	20-m (65.6-ft.)	EFN310-020M-STST
	30-m (98.4-ft.)	EFN310-030M-STST
	Custom Lengths	EFN5009
	Plenum	5-m (16.4-ft.)
10-m (32.8-ft.)		EFP310-010M-STST
15-m (49.2-ft.)		EFP310-015M-STST
30-m (98.4-ft.)		EFP310-030M-STST
SC-SC		
PVC	1-m (3.2-ft.)	EFN310-001M-SCSC
	2-m (6.5-ft.)	EFN310-002M-SCSC
	3-m (9.8-ft.)	EFN310-003M-SCSC
	5-m (16.4-ft.)	EFN310-005M-SCSC
	10-m (32.8-ft.)	EFN310-010M-SCSC
	15-m (49.2-ft.)	EFN310-015M-SCSC
	20-m (65.6-ft.)	EFN310-020M-SCSC
	30-m (98.4-ft.)	EFN310-030M-SCSC
	Custom Lengths	EFN5010
	Plenum	5-m (16.4-ft.)
10-m (32.8-ft.)		EFP310-010M-SCSC
15-m (49.2-ft.)		EFP310-015M-SCSC
30-m (98.4-ft.)		EFP310-030M-SCSC

Item		Code
Single-Mode, 9-Micron, Duplex Fiber Optic Cable (Continued)		
ST-SC		
PVC	1-m (3.2-ft.)	EFN310-001M-STSC
	2-m (6.5-ft.)	EFN310-002M-STSC
	3-m (9.8-ft.)	EFN310-003M-STSC
	5-m (16.4-ft.)	EFN310-005M-STSC
	10-m (32.8-ft.)	EFN310-010M-STSC
	15-m (49.2-ft.)	EFN310-015M-STSC
	20-m (65.6-ft.)	EFN310-020M-STSC
	30-m (98.4-ft.)	EFN310-030M-STSC
	Custom Lengths	EFN5011
	Plenum	5-m (16.4-ft.)
10-m (32.8-ft.)		EFP310-010M-STSC
15-m (49.2-ft.)		EFP310-015M-STSC
30-m (98.4-ft.)		EFP310-030M-STSC
MT-RJ-MT-RJ		
PVC	1-m (3.2-ft.)	EFN310-001M-MTMT
	2-m (6.5-ft.)	EFN310-002M-MTMT
	3-m (9.8-ft.)	EFN310-003M-MTMT
	5-m (16.4-ft.)	EFN310-005M-MTMT
	10-m (32.8-ft.)	EFN310-010M-MTMT
	15-m (49.2-ft.)	EFN310-015M-MTMT
	20-m (65.6-ft.)	EFN310-020M-MTMT
	30-m (98.4-ft.)	EFN310-030M-MTMT
	Custom Lengths	EFN5013
	Plenum	5-m (16.4-ft.)
10-m (32.8-ft.)		EFP310-010M-MTMT
15-m (49.2-ft.)		EFP310-015M-MTMT
30-m (98.4-ft.)		EFP310-030M-MTMT



EFN310-001M-STST

Item		Code	
Single-Mode, 9-Micron, Duplex Fiber Optic Cable (Continued)			
MT-RJ-ST®			
PVC	1-m (3.2-ft.)	<b>EFN310-001M-STMT</b>	
	2-m (6.5-ft.)	<b>EFN310-002M-STMT</b>	
	3-m (9.8-ft.)	<b>EFN310-003M-STMT</b>	
	5-m (16.4-ft.)	<b>EFN310-005M-STMT</b>	
	10-m (32.8-ft.)	<b>EFN310-010M-STMT</b>	
	15-m (49.2-ft.)	<b>EFN310-015M-STMT</b>	
	20-m (65.6-ft.)	<b>EFN310-020M-STMT</b>	
	30-m (98.4-ft.)	<b>EFN310-030M-STMT</b>	
	Custom Lengths	<b>EFN5014</b>	
	Plenum		
	5-m (16.4-ft.)	<b>EFP310-005M-STMT</b>	
10-m (32.8-ft.)	<b>EFP310-010M-STMT</b>		
15-m (49.2-ft.)	<b>EFP310-015M-STMT</b>		
30-m (98.4-ft.)	<b>EFP310-030M-STMT</b>		
MT-RJ-SC			
PVC	1-m (3.2-ft.)	<b>EFN310-001M-SCMT</b>	
	2-m (6.5-ft.)	<b>EFN310-002M-SCMT</b>	
	3-m (9.8-ft.)	<b>EFN310-003M-SCMT</b>	
	5-m (16.4-ft.)	<b>EFN310-005M-SCMT</b>	
	10-m (32.8-ft.)	<b>EFN310-010M-SCMT</b>	
	15-m (49.2-ft.)	<b>EFN310-015M-SCMT</b>	
	20-m (65.6-ft.)	<b>EFN310-020M-SCMT</b>	
	30-m (98.4-ft.)	<b>EFN310-030M-SCMT</b>	
	Custom Lengths	<b>EFN5015</b>	
	Plenum		
	5-m (16.4-ft.)	<b>EFP310-005M-SCMT</b>	
10-m (32.8-ft.)	<b>EFP310-010M-SCMT</b>		
15-m (49.2-ft.)	<b>EFP310-015M-SCMT</b>		
30-m (98.4-ft.)	<b>EFP310-030M-SCMT</b>		
LC-LC			
PVC	1-m (3.2-ft.)	<b>EFN310-001M-LCLC</b>	
	2-m (6.5-ft.)	<b>EFN310-002M-LCLC</b>	
	3-m (9.8-ft.)	<b>EFN310-003M-LCLC</b>	
	5-m (16.4-ft.)	<b>EFN310-005M-LCLC</b>	
	10-m (32.8-ft.)	<b>EFN310-010M-LCLC</b>	
	15-m (49.2-ft.)	<b>EFN310-015M-LCLC</b>	
	20-m (65.6-ft.)	<b>EFN310-020M-LCLC</b>	
	30-m (98.4-ft.)	<b>EFN310-030M-LCLC</b>	
	Custom Lengths	<b>EFN092</b>	
	Plenum		
	5-m (16.4-ft.)	<b>EFP310-005M-LCLC</b>	
10-m (32.8-ft.)	<b>EFP310-010M-LCLC</b>		
15-m (49.2-ft.)	<b>EFP310-015M-LCLC</b>		
30-m (98.4-ft.)	<b>EFP310-030M-LCLC</b>		
LC-ST			
PVC	1-m (3.2-ft.)	<b>EFN310-001M-STLC</b>	
	2-m (6.5-ft.)	<b>EFN310-002M-STLC</b>	
	3-m (9.8-ft.)	<b>EFN310-003M-STLC</b>	
	5-m (16.4-ft.)	<b>EFN310-005M-STLC</b>	
	10-m (32.8-ft.)	<b>EFN310-010M-STLC</b>	
	15-m (49.2-ft.)	<b>EFN310-015M-STLC</b>	
	20-m (65.6-ft.)	<b>EFN310-020M-STLC</b>	
	30-m (98.4-ft.)	<b>EFN310-030M-STLC</b>	
	Custom Lengths	<b>EFN093</b>	

Item		Code	
Single-Mode, 9-Micron, Duplex Fiber Optic Cable (Continued)			
LC-ST (Continued)			
Plenum	5-m (16.4-ft.)	<b>EFP310-005M-STLC</b>	
	10-m (32.8-ft.)	<b>EFP310-010M-STLC</b>	
	15-m (49.2-ft.)	<b>EFP310-015M-STLC</b>	
	30-m (98.4-ft.)	<b>EFP310-030M-STLC</b>	
	Custom Lengths	<b>EFN094</b>	
LC-SC			
PVC	1-m (3.2-ft.)	<b>EFN310-001M-SCLC</b>	
	2-m (6.5-ft.)	<b>EFN310-002M-SCLC</b>	
	3-m (9.8-ft.)	<b>EFN310-003M-SCLC</b>	
	5-m (16.4-ft.)	<b>EFN310-005M-SCLC</b>	
	10-m (32.8-ft.)	<b>EFN310-010M-SCLC</b>	
	15-m (49.2-ft.)	<b>EFN310-015M-SCLC</b>	
	20-m (65.6-ft.)	<b>EFN310-020M-SCLC</b>	
	30-m (98.4-ft.)	<b>EFN310-030M-SCLC</b>	
	Custom Lengths	<b>EFN094</b>	
	MU-MU		
	PVC	1-m (3.2-ft.)	<b>EFN095-001M</b>
2-m (6.5-ft.)		<b>EFN095-002M</b>	
3-m (9.8-ft.)		<b>EFN095-003M</b>	
5-m (16.4-ft.)		<b>EFN095-005M</b>	
10-m (32.8-ft.)		<b>EFN095-010M</b>	
Custom Lengths		<b>EFN095</b>	
MU-SC			
PVC	1-m (3.2-ft.)	<b>EFN096-001M</b>	
	2-m (6.5-ft.)	<b>EFN096-002M</b>	
	3-m (9.8-ft.)	<b>EFN096-003M</b>	
	5-m (16.4-ft.)	<b>EFN096-005M</b>	
	10-m (32.8-ft.)	<b>EFN096-010M</b>	
	Custom Lengths	<b>EFN096</b>	
MU-ST			
PVC	1-m (3.2-ft.)	<b>EFN097-001M</b>	
	2-m (6.5-ft.)	<b>EFN097-002M</b>	
	3-m (9.8-ft.)	<b>EFN097-003M</b>	
	5-m (16.4-ft.)	<b>EFN097-005M</b>	
	10-m (32.8-ft.)	<b>EFN097-010M</b>	
	Custom Lengths	<b>EFN097</b>	
MU-LC			
PVC	1-m (3.2-ft.)	<b>EFN098-001M</b>	
	2-m (6.5-ft.)	<b>EFN098-002M</b>	
	3-m (9.8-ft.)	<b>EFN098-003M</b>	
	5-m (16.4-ft.)	<b>EFN098-005M</b>	
	10-m (32.8-ft.)	<b>EFN098-010M</b>	
	Custom Lengths	<b>EFN098</b>	
MU-MT-RJ			
PVC	1-m (3.2-ft.)	<b>EFN099-001M</b>	
	2-m (6.5-ft.)	<b>EFN099-002M</b>	
	3-m (9.8-ft.)	<b>EFN099-003M</b>	
	5-m (16.4-ft.)	<b>EFN099-005M</b>	
	10-m (32.8-ft.)	<b>EFN099-010M</b>	
	Custom Lengths	<b>EFN099</b>	