

# BLACK-STONE MPO/MTP PATCH CORD

## BLACK-STONE MPO/MTP Mini Patch Cord

PART NO. :BSOM412MPOMMPOULSZHM5M

BLACKSTONE MPO/MTP ribbon and trunk multicore cable assemblies facilitate rapid deployment of high-density backbone cabling in data centers and other high-fiber environment, reducing network installation or reconfiguration time and cost. The compact cable optimizes cableway use and improves airflow.



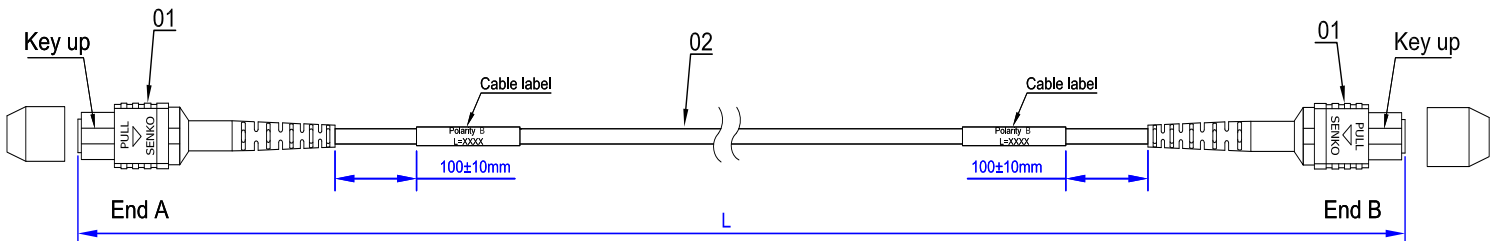
### FEATUERS

- MPO-MPO connectors
- 4Fibers, 8Fibers, 12Fibers or 24Fibers version on request
- UPC or APC polish available
- Any other connector type at another side upon request
- Fan-out on request
- Superior quality standard /UPC polishing
- 100% factory test (Insertion Loss & Return Loss)
- 0.9mm, 2.0mm and 3.0mm cable optional.

### APPLICATION

- CATV
- Active device termination
- Telecommunication networks
- Metro
- Local Area Networks (LANs)
- Data processing networks
- Test equipment
- Precise installations
- Wide Area Networks (WANs)

### ELECTRONIC FILES



### Specifications

Connector	MPO to MPO
Jacket Color	Magenta
Fiber Mode	50/125µm OM4
Polish	UPC TO UPC
Fiber Type	12 & 24Fiber
Wave Length	850/1300NM
Jacket Material	LSZH/PVC/OFNP/TPU
Insertion Loss (MPO)	≤0.35dB
Return Loss	≤30dB
Operating Temperature	-40~75°C
Storage Temperature	-45~85°C

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## BLACK-STONE 1\*MPO to 3\*MTP Patch Cord

PART NO. :BSOM4241MPOM3MTPULSZHM5M

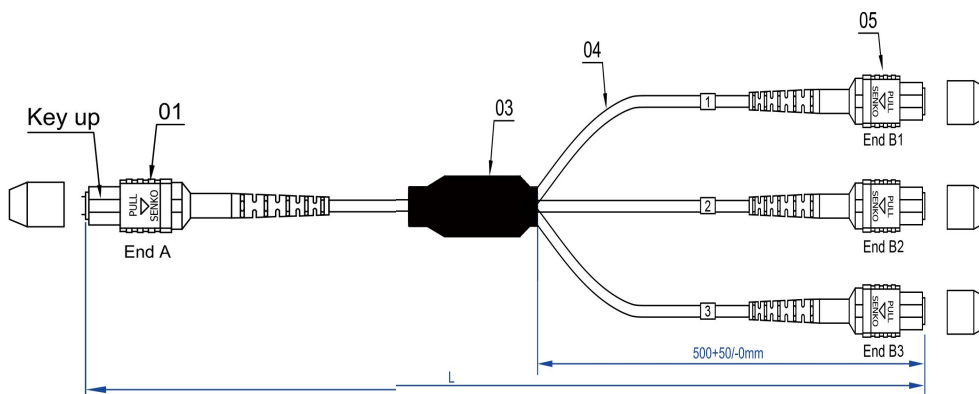
BLACKSTONE MPO/MTP 50/125um OM4 multimode fiber optic cable is suitable for 10GBase-SR, Faster Ethernet and 40/100Gb applications, such as in data center, telecom room, server farms, cloud storage networks, and any place fiber jumper cables are needed. It meets RoHS compliant and cable is optically tested for insertion loss to ensure high quality.



### FEATUERS

- MPO-MPO connectors
- 4Fibers, 8Fibers, 12Fibers or 24Fibers version on request
- Any other connector type at another side upon request
- Fan-out on request
- Superior quality standard /UPC/APC polishing
- 100% factory test (Insertion Loss & Return Loss)

### ELECTORNIC FILES



### APPLICATION

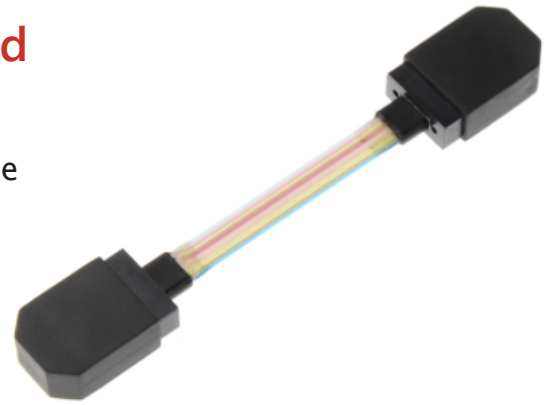
- CATV
- Active device termination
- Telecommunication networks
- Metro
- Local Area Networks (LANs)
- Data processing networks
- Test equipment
- Precise installations
- Wide Area Networks (WANs)

### Specifications

Connector	MPO to MPO
Jacket Color	Magenta
Fiber Mode	50/125 $\mu$ m OM4
Polish	UPC TO UPC
Fiber Type	24Fiber
Wave Length	850/1300NM
Jacket Material	LSZH/PVC/OFNP/TPU
Insertion Loss (MPO)	$\leq 0.35$ dB
Return Loss	$\leq 0$ dB
Operating Temperature	-40~75°C
Storage Temperature	-45~85°C

## BLACK-STONE MPO Female Ribbon Cord

BLACKSTONE MPO 12C Ribbon Fiber Patch Cable uses Senko MPO multi-fiber type connectors, each one of the connectors is used with ribbon type fiber optic cable, which contains multi-fiber in one single jacket so that MPO Fiber Patch Cord greatly saves space and is very convenient to use.



### FEATUERS

- 1 MPO-MPO connectors
- 4Fibers, 8Fibers, 12Fibers or 24Fibers version on request
- UPC or APC polish available
- Any other connector type at another side upon request
- Fan-out on request
- Superior quality standard /UPC polishing
- 100% factory test (Insertion Loss & Return Loss).

### APPLICATION

- CATV
- Active device termination
- Telecommunication networks
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- Wide Area Networks (WANs)

### Specifications

Connector	MPO to MPO
Jacket Color	12 Color
Fiber Mode	SM/MM
Polish	UPC
Fiber Type	12 Fiber
Wave Length	1310/1550NM & 850/1300NM
Jacket Material	Hytrel
Insertion Loss (MPO)	≤0.35dB
Return Loss	≤0dB
Operating Temperature	-40~75°C
Storage Temperature	-45~85°C

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## BLACK-STONE 1\*MTP to 2\*MTP Patch Cord

PART NO. :BSOS2121MTPM2MTPULSZHM5M

BLACKSTONE 24 Fibers MTP Fiber Optic Cables are designed to provide a more flexible multi-fiber cabling system based on MTP products. Unlike MTP harness cables, MTP Fiber Optic Cables are terminated with MTP connectors at both ends, providing more possibilities for existing 24-core cabling systems. 40/100G MTP Fiber Optic Cables eliminate wasted fiber in current 40G transmissions and upcoming 100G transmissions. Using an MTP Fiber Optic Cable is more cost-effective and has lower losses than purchasing and installing a converter box separately.

### FEATUERS

- 1xMTP to 2xMTP connectors
- 4Fibers, 8Fibers, 12Fibers or 24Fibers version on request
- UPC or APC polish available
- Any other connector type at another side upon request
- 100% factory test (Insertion Loss & Return Loss).



### APPLICATION

- Data communication network
- Optical System Access network
- High-density architectures
- Telecommunication networks
- Local Area Networks (LANs)
- Test equipment
- Precise installations
- Wide Area Networks (WANs).

### Specifications

Connector	1 MTP to 2MTP
Fiber Mode	OS2 90/125μm
Polish	UPC to UPC
Fiber Type	12 & 24 Fiber
Wave Length	1310/1550NM
Jacket Material	LSZH/PVC/OFNP/TPU
Insertion Loss	≤0.35dB
Return Loss	≤60dB
Operating Temperature	-10~70°C
Storage Temperature	-45~85°C

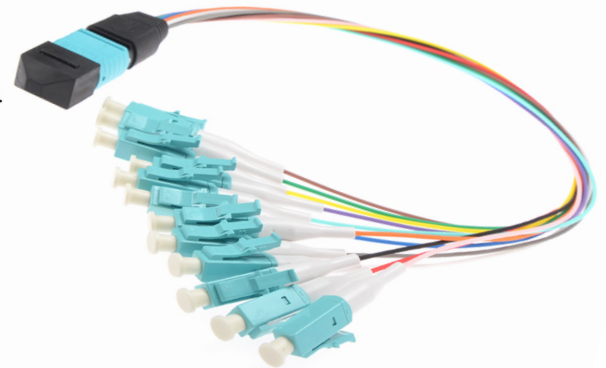
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## BLACK-STONE MPO/MTP-LC Ribbon Cord

PART NO. :BSOM3121MPOM12LCULSZHM5M

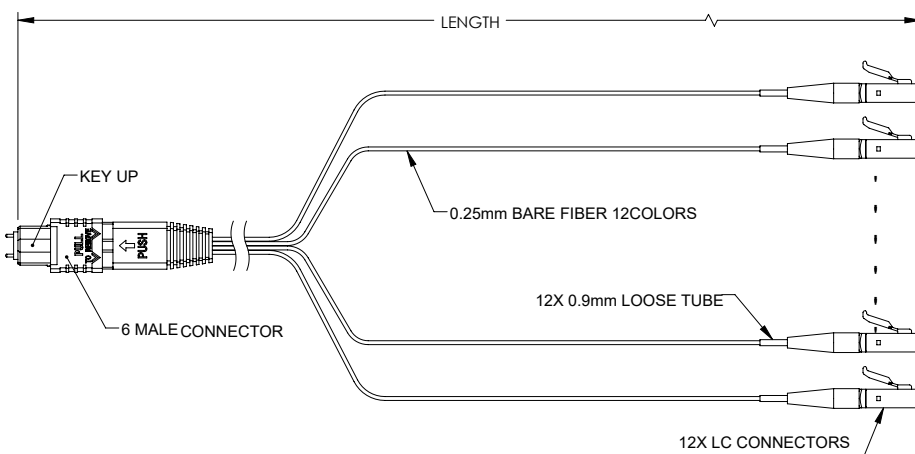
BLACKSTONE MPO/MTP to LC 50/125um OM3 multimode fiber optic cable is suitable for 10GBase-SR, 10GBase-LRM, Faster Ethernet and 40/100Gb applications, such as in data center, telecom room, server farms, cloud storage networks, and any place fiber jumper cables are needed. It meets RoHS compliant and cable is optically tested for insertion loss to ensure high quality.



### FEATUERS

- MPO-LC connectors
- 4Fibers, 8Fibers, 12Fibers or 24Fibers version on request
- Any other connector type at another side upon request
- Fan-out on request
- Superior quality standard /UPC polishing
- 100% factory test (Insertion Loss & Return Loss).

### ELECTORNIC FILES



### APPLICATION

- Data communication network
- Optical System Access network
- High-density architectures
- Telecommunication networks
- Local Area Networks (LANs)
- Test equipment
- Precise installations
- Wide Area Networks (WANs)

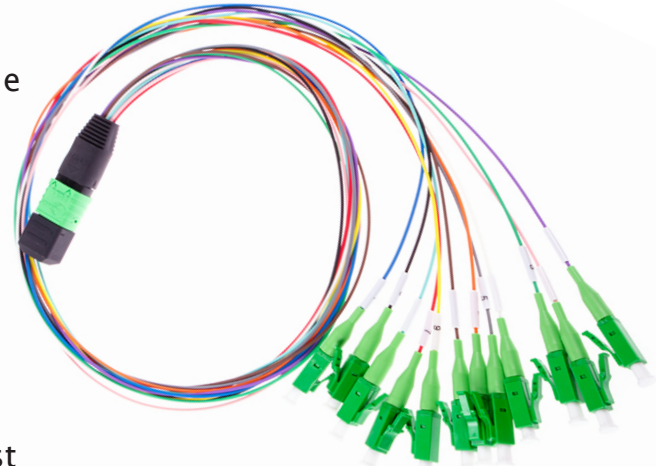
### Specifications

Connector	MPO/MTP to LC
Jacket Color	12 colors
Fiber Mode	50/125µm OM3
Polish	UPC to UPC
Fiber Type	12 Fiber
Wave Length	850/1300NM
Jacket Material	LSZH/PVC/OFNP
Insertion Loss (MPO)	≤0.35dB
Insertion Loss (LC)	≤0.2dB
Return Loss	≤50dB
Operating Temperature	-40~75°C
Storage Temperature	-45~85°C

## BLACK-STONE MPO/MTP-LCA Ribbon Cord

PART NO. :BSOS2121MTPM12LCULSZH5M

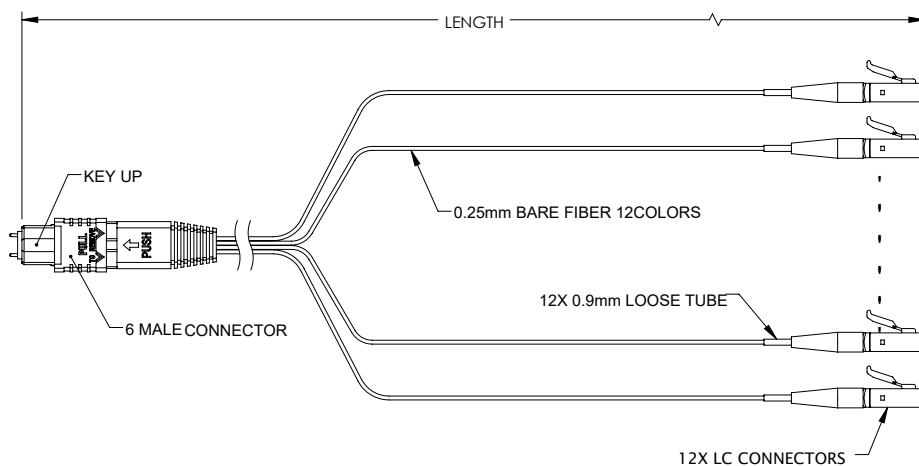
BLACKSTONE MPO/MTP to LCA fiber optic cable is suitable for 10GBase-SR, 10GBase-LRM, Faster Ethernet and 40/100Gb applications, such as in data centers, telecom rooms, server farms, cloud storage networks, and any place fiber jumper cables are needed. It meets RoHS compliant and cable is optically tested for insertion loss to ensure high quality.



### FEATUERS

- MPO-LC connectors
- 4Fibers, 8Fibers, 12Fibers or 24Fibers version on request
- Any other connector type at another side upon request
- High-temperature stability
- Fan-out on request
- Superior quality standard /UPC polishing
- 100% factory test (Insertion Loss & Return Loss).

### ELECTRONIC FILES



### APPLICATION

- Data communication network
- Optical System Access network
- High-density architectures
- Telecommunication networks
- Local Area Networks (LANs)
- Test equipment
- Precise installations
- Wide Area Networks (WANs)

### Specifications

Connector	MPO/MTP to LC
Jacket Color	12 Colors
Fiber Mode	9/125 $\mu$ m OS
Polish	UPC
Fiber Type	12 Fiber
Wave Length	850/1300NM
Jacket Material	LSZH/PVC/OFNP
Insertion Loss (MPO)	$\leq 0.35$ dB
Insertion Loss (LC)	$\leq 0.2$ dB
Return Loss	$\leq 50$ dB
Operating Temperature	-40~75 $^{\circ}$ C
Storage Temperature	-45~85 $^{\circ}$ C

## BLACK-STONE MTP/MPO Trunk Cable

PART NO. :BSOM3241MPOMMPOMULSZHAQ5M

BLACKSTONE MTP/MPO 100Gb, 24-Strand, Multimode OM3 Fiber Optic Patch Cable is just what you need for handling tasks that require large bandwidth with ease. This is the perfect cable for the data center that moves a large amount of data across short to medium distances. As this cable holds 24 fibers, thanks to the MTP/MPO brand connector's high-density capability, you have a solution to your fiber optics needs that benefits you in terms of space, which translates to saving money from reduced containment costs.



### FEATUERS

- Factory-terminated provides consistent quality, high performance, and reduced installation time
- High-quality MPO-24 connectors guaranteed by the 3D interferometer
- Type A polarity for 100GBASE-SR10 link
- Provides 0.6dB Standard & 0.35dB Elite low loss for customers' choice
- Comply with IEC 61754-7, TIA/EIA 604-5, Telcordia GR-1435-CORE, and RoHS.

### APPLICATION

- Data communication network
- Optical System Access network
- High-density architectures
- Storage area networking fiber channel

### Specifications

Connector	MPO/MTP to MPO
Jacket Color	Aqua
Fiber Mode	OM3
Polish	UPC
Fiber Type	24 Fiber
Wave Length	850/1300NM
Jacket Material	LSZH/PVC/OFNP
Insertion Loss (MPO)	≤0.35dB
Insertion Loss (MPO)	≤0.35dB
Return Loss	≤50dB
Operating Temperature	-40~75°C
Storage Temperature	-45~85°C

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## BLACK-STONE MPO/MTP-LC Breakout Cord

PART NO. :BSOM3241MPOM24LCULSZHAQ5M

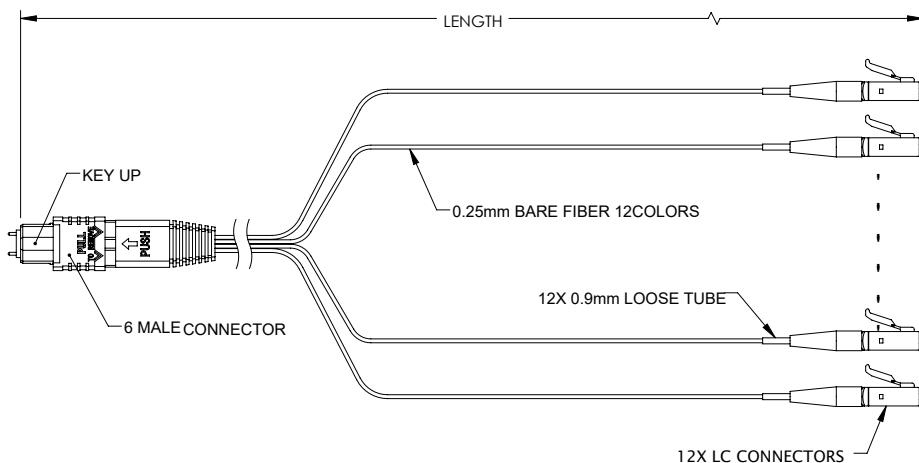
BLACKSTONE multi-fiber ribbon cables provides great advantages in size by offering 24 times the density compared to the same-size SC connectors. Fan-out assemblies with LC connectors are ideal for connecting within a rack or wall-mounted enclosures using single fiber connectors. These are fully compatible with Senko MPO or US Conec MTP products which are factory terminated and tested.



### FEATUERS

- MPO/MTP-LC connectors
- 4Fibers, 8Fibers, 12Fibers or 24Fibers version on request
- UPC or APC polish available
- Any other connector type at another side upon request
- Fan-out on request
- Factory-terminated modular system saves time
- 100% factory test (Insertion Loss & Return Loss).

### ELECTRONIC FILES



### APPLICATION

- CATV
- Active device termination
- Telecommunication networks
- Metro
- Local Area Networks (LANs)
- Data processing networks
- Test equipment
- Precise installations
- Wide Area Networks (WANs)

### Specifications

Connector	MPO/MTP to LC
Jacket Color	Aqua
Fiber Mode	OM3
Polish	UPC
Fiber Type	24 Fiber
Wave Length	850/1300NM
Jacket Material	LSZH/PVC/OFNP
Insertion Loss (MPO)	≤0.35dB
Insertion Loss (LC)	≤0.2dB
Return Loss	≤50dB
Operating Temperature	-40~75°C
Storage Temperature	-45~85°C

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# BLACK-STONE MPO to LC Breakout Cord

PART NO. :BSOM412MPOF12LCULSZHM5M

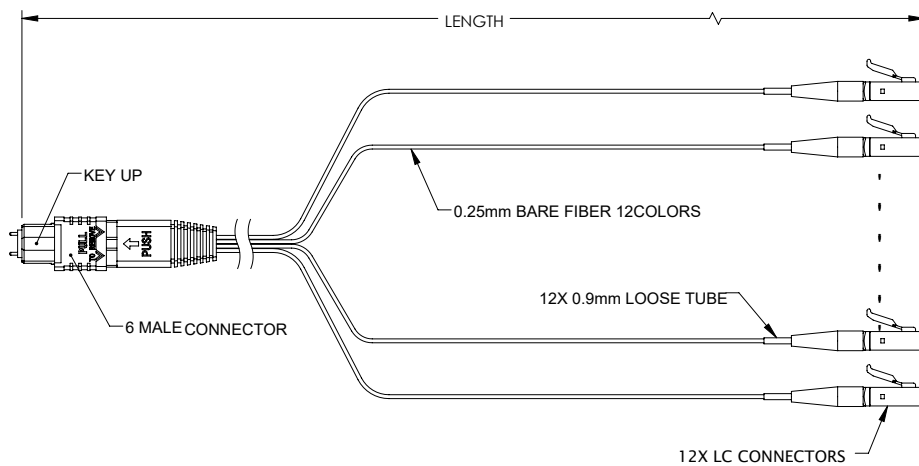
BLACKSTONE multi-fiber ribbon cables provides great advantages in size by offering 24 times the density compared to the same-size SC connectors. Fan-out assemblies with LC connectors are ideal for connecting within a rack or wall-mounted enclosures using single fiber connectors.

## FEATUERS

- MPO-LC connectors
- 4Fibers, 8Fibers, 12Fibers or 24Fibers version on request
- UPC or APC polish available
- Any other connector type at another side upon request
- Fan-out on request
- 100% factory test (Insertion Loss & Return Loss).



## ELECTRONIC FILES



## APPLICATION

- CATV
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## Specifications

Connector	MPO/MTP to LC
Jacket Color	Aqua/Magenta
Fiber Mode	OM4
Polish	UPC to UPC
Fiber Type	12 Fiber
Wave Length	850/1300NM
Jacket Material	LSZH/PVC/OFNP
Insertion Loss (MPO)	≤0.35dB
Insertion Loss (LC)	≤0.2dB
Return Loss	≤50dB
Operating Temperature	-40~75°C
Storage Temperature	-45~85°C



## BLACK-STONE MPO- Uniboot LC Breakout Cord

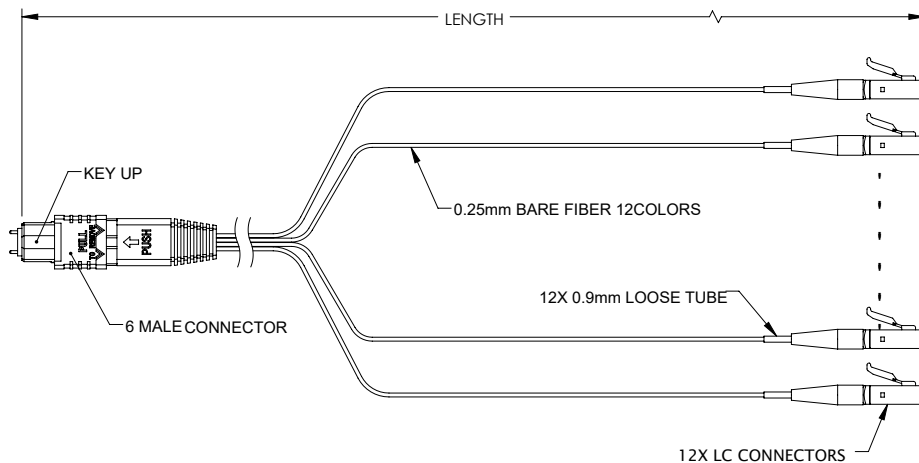
PART NO. :BSOM48MPOFLCULSZHM5M

BLACKSTONE MPO Breakout cable is designed for high-density fiber patching in data centers which need space saving and reduce cable management troubles. it is optimized for 40G QSFP+ SR4 to 10G SFP+ SR, 100G QSFP SR4 to 25G SFP-25G-SR-S optics direct connection and high-density data center applications.

### FEATUERS

- MPO-LC connectors
- 8Fibers, 12Fibers or 24Fibers version on request
- UPC or APC polish available
- Any other connector type at another side upon request
- Fan-out on request
- Superior quality standard /UPC polishing
- 100% factory test (Insertion Loss & Return Loss)
- 0.9mm, 2.0mm and 3.0mm cable optional.

### ELECTRONIC FILES



### APPLICATION

- CATV
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### Specifications

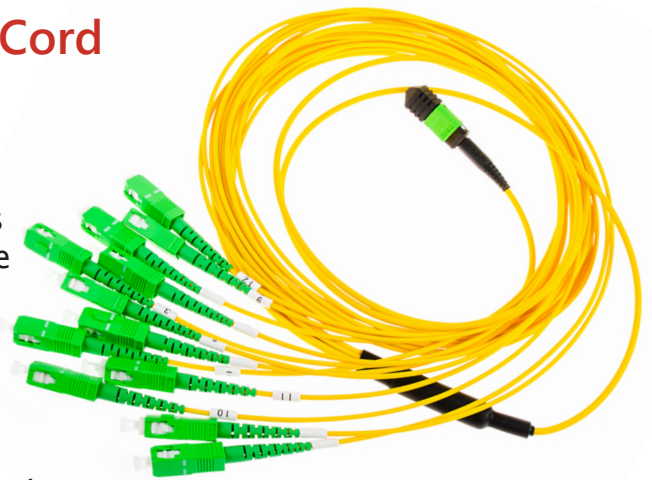
Connector	MPO to LC
Jacket Color	Magenta/Pink/Purple
Fiber Mode	50/125μm OM4
Polish	UPC
Fiber Type	8 Fiber
Wave Length	850NM
Jacket Material	LSZH/PVC/OFNP
Insertion Loss (MPO)	≤0.35dB
Insertion Loss (LC)	≤0.2dB
Return Loss	≤30dB
Operating Temperature	-40~75°C
Storage Temperature	-45~85°C



## BLACK-STONE MPO/MTP-SCA Breakout Cord

PART NO. :BSOS28MPOFSCULSZHYL5M

BLACKSTONE MPO Breakout cable multi-fiber ribbon cables Fan-out assemblies with SC connectors are ideal for connecting within a rack or wall-mounted enclosures using single fiber connectors. These are fully compatible with Senko MPO or US Conec MTP products which are factory terminated and tested.



### FEATUERS

- MPO/MTP-SCA connectors
- 4Fibers, 8Fibers, 12Fibers or 24Fibers version on request
- UPC or APC polish available
- Any other connector type at another side upon request
- Fan-out on request
- 100% factory test (Insertion Loss & Return Loss)
- 0.9mm, 2.0mm, and 3.0mm cable optional.

### APPLICATION

- CATV
- Active device termination
- Telecommunication networks
- Metro
- Local Area Networks (LANs)
- Data processing networks
- Test equipment
- Precise installations
- Wide Area Networks (WANs)

### Specifications

Connector	MPO to SCA
Jacket Color	Yellow
Fiber Mode	9/125 $\mu$ m SM
Polish	UPC
Fiber Type	8 Fiber
Wave Length	1310/1550NM
Jacket Material	LSZH/PVC/OFNP
Insertion Loss (MPO)	$\leq$ 0.35dB
Return Loss	$\leq$ 50dB
Operating Temperature	-40~75°C
Storage Temperature	-45~85°C

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## FIBER OPTIC PATCH CORDS - TRANSMISSION DISTANCE COMPARISON

Data Rate	Interface Type	Fiber Mode	Wavelength	Maximum Distance
1G	1000BASE-LX	OM5	850nm	550m
		OM4	1300nm	550m
		OM3	1300nm	550m
		OM2	1300nm	550m
		OM1	1300nm	550m
	1000BASE-SX	SMF	1310nm	10km
		OM4	850nm	550m
		OM3	850nm	550m
		OM2	850nm	550m
		OM1	850nm	275m
10G	10GBASE-SR	OM4	850nm	400m
		OM3	850nm	300m
		OM2	850nm	82m
		OM1	850nm	33m
	10GBASE-LRM	OM5	850nm	220m
		OM3	1300nm	220m
		OM2	1300nm	220m
		OM1	1300nm	220m
	10GBASE-LR	SMF	1310nm	10km
	10GBASE-ER	SMF	1550nm	30km - 40km
10GBASE-ZR	SMF	1550nm	80km - 100km	
40G	40G-BIDI	OM5	850nm	200m
		OM4	850nm	150m
		OM3	850nm	100m
	40GBASE-SR4	OM5	850nm	150m
		OM4	850nm	150m
		OM3	850nm	100m
	40G-SWDM4	OM5	850nm	440m
		OM4	850nm	350m
		OM3	850nm	240m
	40GBASE-LR4	SMF	1310nm	10km
100G	100GBASE-SR4	OM5	850nm	100m
		OM4	850nm	100m
		OM3	850nm	70m
	100G-SWDM4	OM5	850nm	150m
		OM4	850nm	100m
		OM3	850nm	75m
	100GBASE-SR10	OM4	850nm	125m
		OM3	850nm	100m
		SMF	1310nm	10km
100GBASE-LR4	SMF	1310nm	40km	

# Black-stone, MPO Patch Cables

## Part number guide configurations

Part number guide example for Black-stone OM4 12Fiber MPO to MPO, UPC, LSZH, Magenta, 3M

Data cord	Mode	Fiber	Connector 1	Type	Connector 2	Polish	Jacket material	Color	Length
BS	OS2	4	MPO	Male(M)	MPO	UPC (U)	PVC	Aqua (AQ)	1M
	OM3	8	MTP	Female(F)	MTP	APC(A)	OFNP	Magenta (M)	3M
	OM4	12			LC		LSZH	Pink(P)	5M
		24			SC			Yellow (YL)	
BS	OM4	12	MPO	M	MPO	U	LSZH	M	3M

PN://BS OM4 12 MPO M MPO U LSZH M 3M

PN://BSOM412MPOMMPOULSZHM3M