



SYSTIMAX[®] HD and UD ULL fiber panels solution guide

For high- and ultra high-density fiber environments
with ultra low-loss capabilities

COMMSCOPE[®]

By 2021, global data center IP traffic will hit 15.3 zettabytes (ZB) a year¹. The resulting impact on data center infrastructure is not only imposing and imminent—it's happening now. In data centers around the world, the migration to higher speeds is accelerating. Creating a clear path to 100 Gbps and beyond involves higher fiber density and the best possible optical performance—from the core to every spine and leaf. Supporting that network will require fiber connectivity solutions that are more intelligent, better engineered and with the future already baked in.

At CommScope, we're already there. Our SYSTIMAX® ultra low-loss (ULL) fiber solutions support the density and optical performance needed to keep your fiber infrastructure agile, manageable and scalable—now and into the future. As part of our High Speed Migration platform, they put you on a clear path to faster speeds and a more capable network. That's CommScope. A vision for the future. The expertise to take you there.

Better thinking. Smarter connectivity.

SYSTIMAX ULL fiber solutions feature high-density (HD) and ultra high-density (UD) fiber panels that provide superior port density that is incredibly easy to manage. Compact panels allow for fast, easy, pluggable deployment even in the most densely populated data centers. And the unique split-tray design enables open access to each individual fiber, simplifying moves, adds, changes and future modifications—without interrupting live channels.

At the heart of the HD/UD fiber panels are easy-to-install fixed and sliding panels that accept G2 ULL modules, DM modules or 360DP adapter panels for LC or MPO. That flexibility also means unencumbered speed. Migrate from 10G up to 100G using the same compact footprint. The modular design lets you grow incrementally, as you need, without overprovisioning.

¹Cisco <https://newsroom.cisco.com/press-release-content?articleId=1819296>



ULTRA-LOW LOSS = faster, longer links

When paired with our preterminated TeraSPEED® singlemode and LazrSPEED® OM4 and OM5 wideband multimode cabling, CommScope's ULL fiber panel solutions give you the loss budget to run wide open over longer link spans. Trunk cabling, array and patch cords, breakouts—it's an end-to-end high-speed, lowest loss solution to help you get from where you are to where you need to go.

Application assurance

SYSTIMAX ULL fiber solutions are also available with embedded intelligence that leverages the power of CommScope's imVision®, a comprehensive automated infrastructure management (AIM) solution. Using the iPatch® portfolio of intelligent cabling enables you to monitor and manage the entire physical layer in real time, down to the port level.

And only CommScope is confident enough to guarantee support for your high-speed optic applications—including those you may want to run in the future! Your equipment may change every few years but, at CommScope, we're committed to ensuring your infrastructure remains scalable, manageable and agile enough to serve you over the long term. See [CommScope SYSTIMAX Infrastructure System 25-year Extended Product Warranty and Application Assurance](#) for details and conditions.

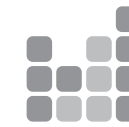


SYSTIMAX HD-4U sliding panel



SCALABLE

- Modular design makes moves, adds and changes (MACs) simple
- Migrate from 10G through 25G to 40/100G parallel without expanding the footprint
- Modular design offers more flexibility and allows for incremental spending as needed
- Available in LazrSPEED OM4 and OM5 Wideband and TeraSPEED to support current and future high-performance applications



MANAGEABLE

- Utilizes same footprint for duplex LC and MPO connections
- Intuitive, flexible labeling solutions for easy port identification
- Large, translucent window provides clear view of the patching field
- Supports imVision automated infrastructure management (AIM) solution



AGILE

- Split-tray design provides easy installation while minimizing network downtime
- Tool-less install of rear trunk cables significantly reduces trunk deployment time
- Utilizes common modules across the UD/HD platform

UD/HD solution comparison

Panel	Adapter types	Ports/RU LC/MPO	Max. fiber count
HD 1U	Duplex LC/MPO	48/32	96/768
HD 2U	Duplex LC/MPO	96/64	192/1536
HD 4U	Duplex LC/MPO	192/128	384/3072
UD 2U	Duplex LC/MPO	144/96	288/2304
UD 4U	Duplex LC/MPO	288/192	576/4608
iPatch HD 1U	Duplex LC/MPO	48/32	96/768
iPatch HD 2U	Duplex LC/MPO	96/64	192/1536
iPatch UD 2U	Duplex LC/MPO	144/96	288/2304

Configuring SYSTIMAX HD/UD with G2 ULL

STEP 1: SELECT PANELS AND ACCESSORIES



SYSTIMAX HD panels

MATERIAL ID	PRODUCT CODE	DESCRIPTION
760209940	HD-1U	SYSTIMAX HD 1U sliding fiber panel, accepts (4) G2 ULL modules or MPO panels, providing up to 48 duplex LC ports or up to 32 MPO ports
760209957	HD-2U	SYSTIMAX HD 2U sliding fiber panel, accepts (8) G2 ULL modules or MPO panels, providing up to 96 duplex LC ports or up to 64 MPO ports
760209965	HD-4U	SYSTIMAX HD 4U sliding fiber panel, accepts (16) G2 ULL modules or MPO panels, providing up to 192 duplex LC ports or up to 128 MPO ports
760210732	HD-1U-FX	SYSTIMAX HD 1U fixed fiber panel, accepts (4) G2 ULL modules or MPO panels, providing up to 48 duplex LC ports or up to 32 MPO ports
760210740	HD-2U-FX	SYSTIMAX HD 2U fixed fiber panel, accepts (8) G2 ULL modules or MPO panels, providing up to 96 duplex LC ports or up to 64 MPO ports
760210757	HD-4U-FX	SYSTIMAX HD 4U fixed fiber panel, accepts (16) G2 ULL modules or MPO panels, providing up to 192 duplex LC ports or up to 128 MPO ports
760231506	HD-1U-SP	SYSTIMAX HD 1U Sliding fiber panel, accepts (4) 360G2 pigtail cassettes or 360DP panels, providing field term/splice capability up to 48 duplex LC ports
760231514	HD-2U-SP	SYSTIMAX HD 2U Sliding fiber panel, accepts (8) 360G2 pigtail cassettes or 360DP panels, providing field term/splice capability up to 96 duplex LC ports
760231522	HD-4U-SP	SYSTIMAX HD 4U Sliding fiber panel, accepts (12) 360G2 pigtail cassettes or 360DP panels, providing field term/splice capability up to 192 duplex LC ports

SYSTIMAX UD panels

MATERIAL ID	PRODUCT CODE	DESCRIPTION
760227306	UD-2U	SYSTIMAX UD 2U sliding fiber panel, accepts (12) G2 ULL modules or MPO panels, providing up to 144 duplex LC ports or up to 96 MPO ports
760227314	UD-4U	SYSTIMAX UD 4U sliding fiber panel, accepts (24) G2 ULL modules or MPO panels, providing up to 288 duplex LC ports or up to 192 MPO ports
760218461	UD-2U-FX	SYSTIMAX UD 2U fixed fiber panel, accepts (12) G2 ULL modules or MPO panels, providing up to 144 duplex LC ports or up to 96 MPO ports
760218479	UD-4U-FX	SYSTIMAX UD 4U fixed fiber panel, accepts (24) G2 ULL modules or MPO panels, providing up to 288 duplex LC ports or up to 192 MPO ports

SYSTIMAX HD/UD panel accessories

MATERIAL ID	PRODUCT CODE	DESCRIPTION
760207944	HD-1U-REAR-EXT	1U Rear cable extension
760207951	HD-1U-REAR-COVER	1U Rear blanking panel
760209627	HD-2U-REAR-EXT-06-KIT	2U Rear cable extension
760209981	HD-4U-REAR-EXT-06-KIT	4U Rear cable extension—6 cable entries
760209999	HD-4U-REAR-EXT-12-KIT	4U Rear cable extension—12 cable entries
760209619	CABLE-MOUNT-KIT-12	Cable attachment molding x 12
760211078	HD-1U-REAR-DOOR-COVER	1U Rear door
760210286	HD-2U-REAR-DOOR	2U Rear door
760210294	HD-4U-REAR-DOOR	4U Rear door
760032110	MODG2-MGS	G2 Modular MGS bezel (package of 4)
760109462	360G2-MOD-BLANK-4PK	SYSTIMAX 360G2 Mod Panel Blank, 4 Panels
760058677	RMB-6-1/2	InstaPATCH Plus attachment bracket, rack mounted, six 1/2" fittings
760058685	RMB-6-3/8	InstaPATCH Plus attachment bracket, rack mounted, six 3/8" fittings
760225920	UD-2U-REAR-EXT-06-KIT	2UD Rear cable extension—6 cable entries
760236812	UD-2U-REAR-EXT-12-KIT	2UD Rear cable extension—12 cable entries
760225938	UD-4U-REAR-EXT-06-KIT	4UD Rear cable extension—6 cable entries
760225946	UD-4U-REAR-EXT-12-KIT	4UD Rear cable extension—12 cable entries

STEP 1: CONTINUED

SYSTIMAX iPatch panels

The SYSTIMAX® iPatch® HD & UD fiber panels are a component of the imVision® automated infrastructure management (AIM) solution and provide intelligent connectivity to the data center.

- Panels come pre-configured with Method B Enhanced ULL modules

SYSTIMAX iPatch HD Panels

MATERIAL ID	PRODUCT CODE	DESCRIPTION
760217463	HD-iP-1U-32-MPO-DP-SD	HD iPatch enabled 1U 32-MPO distribution panel, sliding shelf
760217471	HD-iP-2U-64-MPO-DP-SD	HD iPatch enabled 2U 64-MPO distribution panel, sliding shelf
760236401	HD-iP-1U-96F-LC-DM08-ULL-LS-SD	HD iPatch enabled 1U 96F-LC distribution MPO08 ULL module, LazrSPEED OM4, sliding shelf
760236400	HD-iP-1U-96F-LC-DM08-ULL-WB-SD	HD iPatch enabled 1U 96F-LC distribution MPO08 ULL module, LazrSPEED OM5 Wideband, sliding shelf
760236405	HD-iP-1U-96F-LC-DM12-ULL-LS-SD	HD iPatch enabled 1U 96F-LC distribution MPO12 ULL module, LazrSPEED OM4, sliding shelf
760236404	HD-iP-1U-96F-LC-DM12-ULL-WB-SD	HD iPatch enabled 1U 96F-LC distribution MPO12 ULL module, LazrSPEED OM5 Wideband, sliding shelf
760236409	HD-iP-1U-96F-LC-DM24-ULL-LS-SD	HD iPatch enabled 1U 96F-LC distribution MPO24 ULL module, LazrSPEED OM4, sliding shelf
760236408	HD-iP-1U-96F-LC-DM24-ULL-WB-SD	HD iPatch enabled 1U 96F-LC distribution MPO24 ULL module, LazrSPEED OM5 Wideband, sliding shelf
760236403	HD-iP-2U-192F-LC-DM08-ULL-LS-SD	HD iPatch enabled 2U 192F-LC distribution MPO08 ULL module, LazrSPEED OM4, sliding shelf
760236402	HD-iP-2U-192F-LC-DM08-ULL-WB-SD	HD iPatch enabled 2U 192F-LC distribution MPO08 ULL module, LazrSPEED OM5 Wideband, sliding shelf
760236407	HD-iP-2U-192F-LC-DM12-ULL-LS-SD	HD iPatch enabled 2U 192F-LC distribution MPO12 ULL module, LazrSPEED OM4, sliding shelf
760236406	HD-iP-2U-192F-LC-DM12-ULL-WB-SD	HD iPatch enabled 2U 192F-LC distribution MPO12 ULL module, LazrSPEED OM5 Wideband, sliding shelf
760236411	HD-iP-2U-192F-LC-DM24-ULL-LS-SD	HD iPatch enabled 2U 192F-LC distribution MPO24 ULL module, LazrSPEED OM4, sliding shelf
760236410	HD-iP-2U-192F-LC-DM24-ULL-WB-SD	HD iPatch enabled 2U 192F-LC distribution MPO24 ULL module, LazrSPEED Wideband, sliding shelf

SYSTIMAX iPatch enabled UD panels

MATERIAL ID	PRODUCT CODE	DESCRIPTION
760236362	UD-iP-2U-96-MPO-DP-SD	UD iPatch enabled 2U 96-MPO distribution panel, sliding shelf
760236367	UD-iP-2U-288F-LC-DM08-ULL-LS-SD	UD iPatch enabled 2U 288F-LC distribution MPO08 ULL module, LazrSPEED OM4, sliding shelf
760236366	UD-iP-2U-288F-LC-DM08-ULL-WB-SD	UD iPatch enabled 2U 288F-LC distribution MPO08 ULL module, LazrSPEED OM5 Wideband, sliding shelf
760236369	UD-iP-2U-288F-LC-DM12-ULL-LS-SD	UD iPatch enabled 2U 288F-LC distribution MPO12 ULL module, LazrSPEED OM4, sliding shelf
760236368	UD-iP-2U-288F-LC-DM12-ULL-WB-SD	UD iPatch enabled 2U 288F-LC distribution MPO12 ULL module, LazrSPEED OM5 Wideband, sliding shelf
760236371	UD-iP-2U-288F-LC-DM24-ULL-LS-SD	UD iPatch enabled 2U 288F-LC distribution MPO24 ULL module, LazrSPEED OM4, sliding shelf
760236370	UD-iP-2U-288F-LC-DM24-ULL-WB-SD	UD iPatch enabled 2U 288F-LC distribution MPO24 ULL module, LazrSPEED OM5 Wideband, sliding shelf

STEP 2: SELECT MODULES AND ADAPTER PANELS



- G2 ULL DM modules feature unpinned, rear MPO adapters to accept ULL MPO24, MPO12 or MPO8 preterminated trunk assemblies
- Shutters automatically actuated by connector insertion, allowing for one-handed operation
- Latch assist simplifies module removal for faster moves, adds and changes (MACs)
- Shutters designed to avoid ferrule contact during connector installation
- Shutter door will illuminate when exposed to a visual fault locator (VFL) for easier circuit tracing
- Utilizing Method B Enhanced polarity maintenance, the ULL modules that all transmit and receive paths are correctly routed in parallel applications

Note: AIM-compatible modules and preconfigured shelves available. iPatch modules do not use internal shutters.

STEP 2: CONTINUED



G2 ULL internal shuttered modules

MATERIAL ID	PRODUCT CODE	DESCRIPTION
760236109	DM08-24LC-WB-ULL	G2 ULL MPO-8 distribution module, 24LC to 3x8f MPOs unpinned, LazrSPEED OM5 Wideband internal shutter
760236108	DM08-24LC-LS-ULL	G2 ULL MPO-8 distribution module, 24LC to 3x8f MPOs unpinned, LazrSPEED OM4 internal shutter
760236111	DM12-24LC-WB-ULL	G2 ULL MPO-12 distribution module, 24LC to 2x12f MPOs unpinned, LazrSPEED OM5 Wideband internal shutter
760236110	DM12-24LC-LS-ULL	G2 ULL MPO-12 distribution module, 24LC to 2x12f MPOs unpinned, LazrSPEED OM4 internal shutter
760236113	DM24-24LC-WB-ULL	G2 ULL MPO-24 distribution module, 24LC to 1x24f MPO unpinned, LazrSPEED OM5 Wideband internal shutter
760236112	DM24-24LC-LS-ULL	G2 ULL MPO-24 distribution module, 24LC to 1x24f MPO unpinned, LazrSPEED OM4 internal shutter
760238082	DM08-24LC-SM-ULL	G2 ULL MPO-8 distribution module, 24LC to 3x8f MPOs unpinned, TeraSPEED SM internal shutter
760238083	DM12-24LC-SM-ULL	G2 ULL MPO-12 distribution module, 24LC to 2x12f MPOs unpinned, TeraSPEED SM internal shutter



G2 ULL iPatch ready modules

MATERIAL ID	PRODUCT CODE	DESCRIPTION
760236117	DM08iP-24LC-WB-ULL	G2 ULL MPO-8 distribution module, 24LC to 3x8f MPOs unpinned, LazrSPEED OM5 Wideband dust caps iPatch ready
760236116	DM08iP-24LC-LS-ULL	G2 ULL MPO-8 distribution module, 24LC to 3x8f MPOs unpinned, LazrSPEED OM4 dust caps iPatch ready
760236119	DM12iP-24LC-WB-ULL	G2 ULL MPO-12 distribution module, 24LC to 2x12f MPOs unpinned, LazrSPEED OM5 Wideband dust caps iPatch ready
760236118	DM12iP-24LC-LS-ULL	G2 ULL MPO-12 distribution module, 24LC to 2x12f MPOs unpinned, LazrSPEED OM4 dust caps iPatch ready
760236121	DM24iP-24LC-WB-ULL	G2 ULL MPO-24 distribution module, 24LC to 1x24f MPO unpinned, LazrSPEED OM5 Wideband dust caps iPatch ready
760236120	DM24iP-24LC-LS-ULL	G2 ULL MPO-24 distribution module, 24LC to 1x24f MPO unpinned, LazrSPEED OM4 dust caps iPatch ready
760238084	DM08ip-24LC-SM-ULL	G2 ULL MPO-8 distribution module, 24LC to 3x8f MPOs unpinned, TeraSPEED SM dust caps iPatch ready
760238085	DM12ip-24LC-SM-ULL	G2 ULL MPO-12 distribution module, 24LC to 2x12f MPOs unpinned, TeraSPEED SM dust caps iPatch ready

STEP 2: CONTINUED



SYSTIMAX 360 internal shuttered adapter panels

MATERIAL ID	PRODUCT CODE	DESCRIPTION
760216754	360DPis-24LC-LS	360 LazrSPEED OM4 distribution panel, 24 LC, internal shutter, aqua
760236041	360DPis-24LC-WB	360 LazrSPEED OM5 Wideband distribution panel, 24 LC, internal shutter, lime green
760216762	360DPis-24LC-SM	SYSTIMAX 360 Distribution Panel 12 LC TeraSPEED Blue

Note: Internal shutters are not compatible with iPatch. For iPatch compatible modules, see below.

SYSTIMAX 360 iPatch ready adapter panels

MATERIAL ID	PRODUCT CODE	DESCRIPTION
760115907	360DP-24LC-LS	360 LazrSPEED OM4 distribution panel, 24 LC, iPatch ready, external shutter, aqua
760236042	360DP-24LC-WB	360 LazrSPEED OM5 Wideband distribution panel, 24 LC, iPatch ready, external shutter, lime green
760216762	360DPis-24LC-SM	SYSTIMAX 360 Distribution Panel 12 LC TeraSPEED Blue



SYSTIMAX 360 MPO distribution panels

MATERIAL ID	PRODUCT CODE	DESCRIPTION
760107490	360DP-2MPO	360 2-MPO adapter panel
760107508	360DP-4MPO	360 4-MPO adapter panel
760107516	360DP-6MPO	360 6-MPO adapter panel
760107524	360DP-8MPO	360 8-MPO adapter panel

STEP 2: CONTINUED

G2 ULL conversion modules

- G2 ULL CM modules have unpinned rear MPO adapters for to accept ULL MPO24 or MPO12 preterminated trunk assemblies and pinned front MPO adapters to accept ULL MPO8 patch cords
- New latch assist provides easier module removal for faster moves, adds and changes (MAC's)
- Utilizing Method B Enhanced polarity maintenance, the ULL modules guarantee that all transmit and receive paths are correctly routed in parallel applications

MATERIAL ID	PRODUCT CODE	DESCRIPTION
760237217	CM12-2x3-LS-ULL	G2 ULL 2x3 LazrSPEED OM4 Conversion Module, (2) MPO-12 unpinned ports rear, (3) MPO-8 pinned front
760237220	CM12-4x6-LS-ULL	G2 ULL 4x6 LazrSPEED OM4 Conversion Module, (4) MPO-12 unpinned ports rear, (6) MPO-8 pinned front
760237218	CM12-2x3-WB-ULL	G2 ULL 2x3 LazrSPEED OM5 Wideband Conversion Module, (2) MPO-12 unpinned ports rear, (3) MPO-8 pinned front
760237221	CM12-4x6-WB-ULL	G2 ULL 4x6 LazrSPEED OM5 Wideband Conversion Module, (4) MPO-12 unpinned ports rear, (6) MPO-8 pinned front
760237216	CM12-2X3-SM-ULL	G2 ULL 2x3 TeraSPEED SM Conversion Module, (2) MPO-12 unpinned ports rear, (3) MPO-8 pinned front
760237219	CM12-4X6-SM-ULL	G2 ULL 4x6 TeraSPEED SM Conversion Module, (4) MPO-12 unpinned ports rear, (6) MPO-8 pinned front
760237222	CM24-1x3-LS-ULL	G2 ULL 1x3 LazrSPEED OM4 Conversion Module, (1) MPO-24 unpinned ports rear, (3) MPO-8 pinned front
760237224	CM24-2x6-LS-ULL	G2 ULL 2x6 LazrSPEED OM4 Conversion Module, (2) MPO-24 unpinned ports rear, (6) MPO-8 pinned front
760237223	CM24-1x3-WB-ULL	G2 ULL 1x3 LazrSPEED OM5 Wideband Conversion Module, (1) MPO-24 unpinned ports rear, (3) MPO-8 pinned front
760237225	CM24-2x6-WB-ULL	G2 ULL 4x6 LazrSPEED OM5 Wideband Conversion Module, (2) MPO-24 unpinned ports rear, (6) MPO-8 pinned front

STEP 3: SELECT TRUNKS, ARRAYS, RUGGEDIZED FANOUTS, JUMPERS

SYSTIMAX ULL preterminated trunk cables



- 8-, 12- and 24-fiber MPO connector-based modules available in LazrSPEED 550 OM4 and LazrSPEED OM5 Wideband multimode fiber solutions
- 8- and 12-fiber MPO connector-based modules available in TeraSPEED singlemode fiber solutions
- Factory-terminated and tested trunk cables provide superior quality and performance for field connections
- Reliable transmit-to-receive connectivity using Method B Enhanced polarity maintenance maximizes administrative convenience
- Simplified reconfiguration for moves, adds and changes (MACs)
- Easy upgrade path to parallel transmission and associated applications, and increased value of existing infrastructure
- SYSTIMAX ULL trunks are provisioned with pins to interface with G2 ULL modules (without pins)

SYSTIMAX ULL MPO-8 trunk cables

1	2	3	4	5	6	7	8	9	10	11	12	13	14-16
U	G	V	Q	X	Q	X	Q	H	-	N	A	M	010
Construction type U Ultra-low loss	Family G Trunk, Plenum J Trunk, LSZH/ Riser	Fiber type G TeraSPEED Singlemode (A2) X LazrSPEED 550 multimode V LazrSPEED OM5 WB multimode	Termination end A MPO (female) QP MPO (male) QX MPO (male)	Termination end B MPO (male) QX MPO (male)	Construction Q 8 Fiber PmP	Fiber count B 8-fiber R 16-fiber F 24-fiber H 48-fiber U 64-fiber L 96-fiber	Color M Aqua N Lime green J Yellow	Options A No gland B With gland C With pulling eye	Unit of measure F Feet M Meter	Length 010-999 Feet 003-305 Meter			

· No female to female configurations.

· LazrSPEED OM4 standard is aqua
· LazrSPEED OM5 standard is lime green
· TeraSPEED singlemode standard is yellow

SYSTIMAX ULL MPO-12 trunk cables

1	2	3	4	5	6	7	8	9	10	11	12	13	14-16
U	J	X	M	X	M	X	A	K	-	M	A	F	010
Construction type U Ultra-Low Loss	Family G Trunk, Plenum J Trunk, LSZH/ Riser	Fiber type G TeraSPEED singlemode (A2) X LazrSPEED 550 multimode V LazrSPEED OM5 WB multimode	Termination end A MPO (female) MP MPO (male) MX MPO (male)	Termination end B MPO (male) MX MPO (male)	Construction A 12 Fiber PmP	Fiber count D 12-fiber F 24-fiber H 48-fiber K 72-fiber L 96-fiber M 144-fiber	Color M Aqua N Lime green J Yellow	Options A No gland B With gland C With pulling eye	Unit of measure F Feet M Meter	Length 010-999 Feet 003-305 Meter			

· No female to female configurations.

· LazrSPEED OM4 standard is aqua
· LazrSPEED OM5 standard is lime green
· TeraSPEED singlemode standard is yellow

SYSTIMAX ULL MPO-24 trunk cables

1 U	2 G	3 V	4 2	5 X	6 2	7 X	8 B	9 M	10 -	11 N	12 C	13 F	14-16 010
Construction type U Ultra-Low Loss	Family G Trunk, Plenum J Trunk, LSZH/Riser	Fiber type X LazrSPEED 550 multimode V LazrSPEED OMS WB multimode	Termination end A MPO (female) 2C MPO (female) equipment 2P MPO (female) 2X MPO (male)	Termination end B MPO (male)	Construction B 24-fiber PmP	Fiber count F 24-fiber H 48-fiber K 72-fiber L 96-fiber M 144-fiber	Color M Aqua N Lime green	Options A No gland B With gland C With pulling eye	Unit of measure F Feet M Meter	Length 010-999 Feet 003-305 Meter			

· No female to female configurations
· Male to female will be configured as trunk extensions

· LazrSPEED OM4 standard is aqua
· LazrSPEED OM5 standard is lime green

SYSTIMAX ULL ruggedized fanout cables



- 8-, 12- and 24-fiber MPO connector-based modular design enables simple connections
- Ruggedized fanouts are constructed with LazrSPEED 550 OM4 and OM5 Wideband and TeraSPEED singlemode fibers
- Factory terminated and tested for instant field connections giving guaranteed quality and performance
- Designed for administrative convenience—guaranteed transmit-to-receive connectivity
- No special or non-standard polarity components

1 U	2 L	3 X	4 M	5 P	6 L	7 C	8 A	9 D	10 -	11 M	12 E	13 F	14-16 010
Construction type U Ultra-low loss	Cable family L Rugged F/O Plenum N Rugged F/O LSZH/Riser	Fiber type G TeraSPEED singlemode (A2) X LazrSPEED 550 multimode V LazrSPEED OMS WB multimode	Connector 1 QP 8f MPO (female) QX 8f MPO (male) MP 12f MPO (female) MX 12f MPO (male) 2P 24f MPO (female) 2X 24f MPO (male)	Connector 2 LC LC standard	Cordage size A 12-fiber PmP cable Q 8-fiber PmP Cable B 24-fiber PmP Cable	Fiber count D 12-fiber F 24-fiber S 32-fiber G 36-fiber H 48-fiber U 64-fiber K 72-fiber L 96-fiber	Color M Aqua N Lime green J Yellow	Breakout length LC End A No gland E 24 in breakout F 24 in breakout with gland G 24 in breakout pulling grip S 36 in breakout no gland T 36 in breakout pulling grip U 36 in breakout with gland H 48 in breakout no gland J 48 in breakout with gland K 48 in breakout pulling grip L 72 in breakout no gland M 72 in breakout with gland N 72 in breakout pulling grip	UOM F Feet M Meter	Length minimal length based on breakout 24 in 7-999 ft 36 in 8-999 ft 48 in 9-999 ft 72 in 11-999 ft 36 in 8-999 ft 24 in 2-305 m 36-48 in 3-305 m 72 in 4-305 m			

· Standard breakout length for Connector 1 is 33 in

*24-fiber PmP cable not available for TeraSPEED singlemode

· LazrSPEED OM4 standard is aqua
· LazrSPEED OM5 standard is lime green
· TeraSPEED singlemode standard is yellow

· Total length includes the breakout

SYSTIMAX ULL fiber-optic LC patch cords



- Duplex zipcord construction provides better mechanical performance with less risk of damage from crimping
- Rugged 1.6 mm cordage for durable and easily handled connections
- Outer jacket colored for easy identification

1 U	2 D	3 X	4 L	5 C	6 L	7 C	8 4	9 2	10 -	11 M	12 X	13 F	14-16 010
Construction type U Ultra-low loss	Cable family D Plenum F LSZH/Riser	Fiber type G TeraSPEED singlemode (A2) X LazrSPEED 550 multimode V LazrSPEED OMS WB multimode	Connector 1 LC Standard	Connector 2 LC LC Standard UC Unconnectorized	Cordage size 2 1.6mm simplex 4 1.6mm zipcord	Fiber count 1 1-fiber 2 2-fiber	Color M Aqua N Lime green J Yellow	Breakout length X No breakout	UOM F Feet M Meter	Length 2-200 Feet 1-061 Meters			

· LazrSPEED OM4 standard is aqua
· LazrSPEED OM5 standard is lime green
· TeraSPEED singlemode standard is yellow

· Other lengths available please contact CommScope

SYSTIMAX ULL fiber-optic MPO-8 patch cords

1 U	2 Q	3 G	4 Q	5 X	6 Q	7 X	8 J	9 8	10 -	11 J	12 A	13 F	14-16 010
Construction type U Ultra-low loss	Cable family Q Plenum array R LSZH array	Fiber type G TeraSPEED singlemode (A2) X LazrSPEED 550 multimode V LazrSPEED OMS WB multimode	Connector 1 QP 8f MPO (female) QX 8f MPO (male)	Connector 2 QP 8f MPO (female) QX 8f MPO (male) UC Unconnectorized	Cordage size J 8-fiber PmP Array Cord	Fiber count 8 8-fiber	Color M Aqua N Lime green J Yellow	Breakout length A No gland	UOM F Feet M Meter	Length 010-999 ft 003-305 m			

SYSTIMAX ULL fiber-optic MPO-12 patch cords

1 U	2 Q	3 G	4 M	5 X	6 M	7 X	8 G	9 12	10 -	11 J	12 A	13 F	14-16 010
Construction type U Ultra-low loss	Cable family Q Plenum array R LSZH array	Fiber type G TeraSPEED singlemode (A2) X LazrSPEED 550 multimode V LazrSPEED OMS WB multimode	Connector 1 MP 12f MPO (female) MX 12f MPO (male)	Connector 2 MP 12f MPO (female) MX 12f MPO (male) UC Unconnectorized	Cordage size G 12-fiber PmP Array Cord	Fiber count 12 12-fiber	Color M Aqua N Lime green J Yellow	Breakout length A No gland	UOM F Feet M Meter	Length 010-999 ft 003-305 m			

SYSTIMAX ULL fiber-optic MPO-24 patch cords

1 U	2 Q	3 V	4 2	5 X	6 2	7 X	8 H	9 24	10 -	11 N	12 A	13 F	14-16 010
Construction type U Ultra-low loss	Cable family Q Plenum array R LSZH array	Fiber type X LazrSPEED 550 multimode V LazrSPEED OMS WB multimode	Connector 1 2P 24f MPO (female) 2X 24f MPO (male)	Connector 2 2P 24f MPO (female) 2X 24f MPO (male) UC Unconnectorized	Cordage size H 24-fiber PmP Array Cord	Fiber count 24 24-fiber	Color M Aqua N Lime green	Breakout length A No gland	UOM F Feet M Meter	Length 010-999 ft 003-305 m			

SYSTIMAX ULL LC array cords



- TeraSPEED singlemode 8- and 12-fiber or multimode 8- 12- and 24-fiber MPO connectors ensure fast and simple connections
- All 8-fiber MPO arrays have QSFP wiring
- Available in LazrSPEED 550 OM4 and LazrSPEED 550 OM5 Wideband multimode and TeraSPEED singlemode fibers
- Factory-terminated and tested trunk cables provide superior quality and performance for field connections
- MPO-LC array fanouts are constructed with 1.6-millimeter reinforced zipcord furcation tubing for outstanding durability and dependability
- Array fanouts are available with multiple breakout lengths to simplify installation

1 U	2 Q	3 X	4 M	5 P	6 L	7 C	8 G	9 D	10 -	11 M	12 E	13 F	14-16 010
Construction type U Ultra-low loss	Cable family Q Plenum array R LSZH array	Fiber type G TeraSPEED singlemode (A2) X LazrSPEED 550 multimode V LazrSPEED OM5 WB multimode	Connector 1 QP 8f MPO (female) QX 8f MPO (male) MP 12f MPO (female) MX 12f MPO (male) 2P 24f MPO (female) 2X 24f MPO (male)	Connector 2 LC LC connector	Cordage size G 12-fiber PmP Array Cord J 8-fiber PmP Array Cord H 24-fiber PmP Array Cord *24-fiber PmP cable not available for TeraSPEED singlemode	Fiber count 8 8-fiber D 12-fiber F 24-fiber	Color M Aqua N Lime green J Yellow · LazrSPEED OM4 standard is aqua · LazrSPEED OM5 standard is lime green · TeraSPEED singlemode standard is yellow	Breakout length D 12 in breakout No gland E 24 in breakout No gland H 48 in breakout No gland L 72 in breakout No gland	UOM F Feet M Meter	Length minimal length based on breakout 12 in 3-999 ft 24 in 4-999 ft 48 in 6-999 ft 72 in 8-999 ft 12 in 1-305 m 24-48 in 2-305 m 72 in 3-305 m · Other lengths available please contact CommScope			

SYSTIMAX ULL MPO array cords



- 8-, 12- and 24-fiber MPO connector-based modular design enables simple connections
- Array cords are constructed with LazrSPEED 550 OM4 and OM5 Wideband and TeraSPEED singlemode fibers
- Factory-terminated and tested for instant field connections giving guaranteed quality and performance
- MPO-MPO arrays are constructed with 3.0 mm PmP array cords
- Arrays are available with multiple breakout lengths; minimum overall assembly length may vary based on breakout length selected (please see configuration table for specifics)

1 U	2 Q	3 X	4 M	5 P	6 M	7 P	8 G	9 D	10 -	11 M	12 E	13 F	14-16 010
Construction type U Ultra-low loss	Cable family Q Plenum array R LSZH array	Fiber type G TeraSPEED singlemode (A2) X LazrSPEED 550 multimode V LazrSPEED OM5 WB multimode	Connector 1 QP 8f MPO (female) QX 8f MPO (male) MP 12f MPO (female) MX 12f MPO (male) 2P 24f MPO (female) 2X 24f MPO (male) 2C 24f MPO (female) equipment	Connector 2 QP 8f MPO (female) QX 8f MPO (male) MP 12f MPO (female) MX 12f MPO (male) 2P 24f MPO (female) 2X 24f MPO (male)	Cordage size G 12-fiber PmP Array Cord J 8-fiber PmP Array Cord H 24-fiber PmP Array Cord *24-fiber PmP cable not available for TeraSPEED singlemode	Fiber count 8 8-fiber D 12-fiber F 24-fiber	Color M Aqua N Lime green J Yellow · LazrSPEED OM4 standard is aqua · LazrSPEED OM5 standard is lime green · TeraSPEED singlemode standard is yellow	Breakout length D 12 in breakout No gland E 24 in breakout No gland H 48 in breakout No gland L 72 in breakout No gland	UOM F Feet M Meter	Length minimal length based on breakout 12 in 3-999 ft 24 in 4-999 ft 48 in 6-999 ft 72 in 8-999 ft 12 in 1-305 m 24-48 in 2-305 m 72 in 3-305 m · Total length includes the breakout			

*For use when there is more than one MPO connector on one or both ends (ie: 1x2, 1x3, 2x3)

*2P, 2X and 2C only available for multimode fiber

PHYSICAL SPECIFICATIONS

HD

HD sliding fiber panel dimensions

- 1U = 1.75 in H x 19 in W x 16.3 in D (44mm x 483mm x 414.5mm)
- 2U = 3.50 in H x 19 in W x 16.3 in D (89mm x 483mm x 414.5mm)
- 4U = 7.00 in H x 19 in W x 16.3 in D (178mm x 483mm x 414.5mm)

Panel depth (behind mounting angles) 16.3 in (414.5mm)
Panel projection (in front of mounting angles) 5.2 in (132mm)
Tray travel = 5.00 in (127mm)

HD sliding fiber panel weight (installation weight)

- 1U = 12.4 lbs (5.62 kg)
- 2U = 17.0 lbs (7.71 kg)
- 4U = 24.8 lbs (11.25 kg)

HD fixed fiber panel dimensions

- 1U = 1.75 in H x 19 in W x 17.9 in D (44mm x 483mm x 455mm)
- 2U = 3.50 in H x 19 in W x 18.2 in D (89mm x 483mm x 462mm)
- 4U = 7.00 in H x 19 in W x 18.2 in D (178mm x 483mm x 462mm)

HD fixed fiber panel weight (installation weight)

- 1U = 9.0 lbs (4.08 kg)
- 2U = 11.6 lbs (5.26 kg)
- 4U = 16.0 lbs (7.26 kg)

HD capacity

- 1U = 4 G2 ULL DM modules, DM data modules or 360DP distribution panels
- 2U = 8 G2 ULL DM modules, DM data modules or 360DP distribution panels
- 4U = 16 G2 ULL DM modules, DM data modules or 360DP distribution panels

UD

UD sliding fiber panel dimensions

- 2U = 3.50 in H x 19 in W x 16.3 in D (89mm x 483mm x 414.5mm)
- 4U = 7.00 in H x 19 in W x 16.3 in D (178mm x 483mm x 414.5mm)

UD sliding fiber panel weight (installation weight)

- 2U = 21.2 lbs (9.62 kg)
- 4U = 35.2 lbs (16.0 kg)

UD fixed fiber panel dimensions

- 2U = 3.50 in H x 19 in W x 18.2 in D (89mm x 483mm x 462mm)
- 4U = 7.00 in H x 19 in W x 18.2 in D (178mm x 483mm x 462mm)

UD fixed fiber panel weight (installation weight)

- 2U = 11.6 lbs (5.26 kg)
- 4U = 16.0 lbs (7.26 kg)

UD capacity

- 2U = 12 G2 ULL DM modules, DM data modules or 360DP distribution panels
- 4U = 24 G2 ULL DM modules, DM data modules or 360DP distribution panels

Cable entry

Trunk cable entry in the back; patch cords/fanouts entry in the front

Termination types LC, MPO

Side cable entries

- 1U = 6 trunk cable entries (3 per side)
- 2U = 12 trunk cable entries (6 per side)
- 4U = 24 trunk cable entries (12 per side)

Additional rear cable entries with optional cable extension kit

- 1U = 6 trunk cable rear entries (HD-1U-REAR-EXT)
- 2U = 6 trunk cable rear entries (HD-2U-REAR-EXT-06-KIT)
- 4U = 6 trunk cable rear entries (HD-4U-REAR-EXT-06-KIT)
- 4U = 12 trunk cable rear entries (HD-4U-REAR-EXT-12-KIT)

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