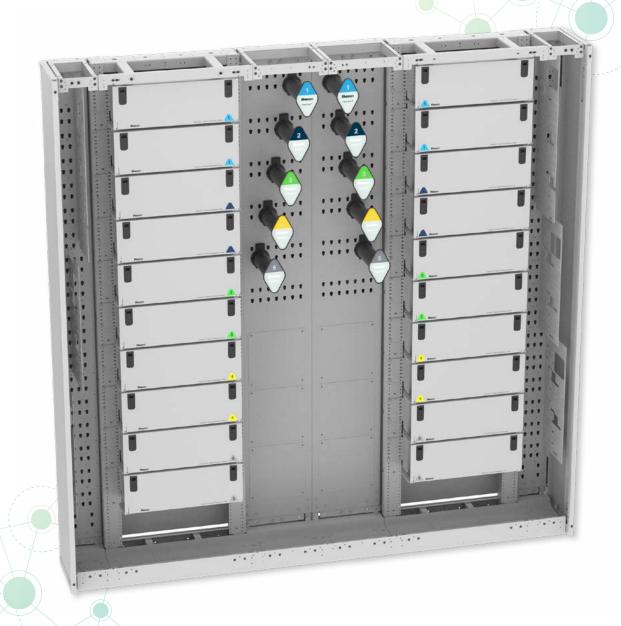
## FlexCore<sup>™</sup> Optical Distribution Frame



PANDUIT®

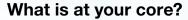
infrastructure for a connected world

**ORDERING GUIDE** 

## FlexCore<sup>™</sup> at a Glance

## **Every connection counts**

With the use of cutting-edge technologies in a number of environments, network dependency has transitioned from the era of 'mission' to 'life' critical from access points back to the data center. Simultaneously, high speed data transport accelerated from 1G to 400G and is expected to quadruple in the near future.



Optical distribution frames (ODF's) are an all-important network element at the heart of this fiber network. Representing <5% of a typical IT project investment, high density, performance, and quality are pivotal attributes for an ODF ensuring business continuity 24/7/365.

# Panduit FlexCore<sup>™</sup> Optical Distribution Frame solution offers the ultimate in flexibility, manageability, scalability and security.

- Highly intuitive cable routing paths remove guess work and prevent 'rip and replace' costs
- Innovative cable management and lockable vertical cable manager door eliminates circuit risk and downtime
- Data center floor space can be reduced by 50%<sup>†</sup>
- Moves, adds, and changes up to 30% faster
- Multiple form factor (width) cassettes optimize rack space across wider applications
- Patch cords consolidated to a single length freeing up capital locked in maintaining inventory
- Multi-layer security with lock capability available at both 4RU enclosure and ODF doors

Total front access cabling principles and modular building blocks of 150mm, 300mm and 600mm (width of frame units) that delivers scalability with outstanding system flexibility.



<sup>&</sup>lt;sup>†</sup>6 double FlexCore<sup>™</sup> frames in a back-to back arrangement vs HD Flex<sup>™</sup> enclosure with 4 post rack and vertical cable management

## **FlexCore™ Common Frame Arrangements**



### **FIGURE 1A**

Single Cross Connect Frame, recommended patch cord length 4m



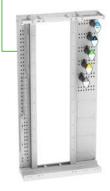
#### FIGURE 1B

**Double Cross Connect** Frame, with end panels, recommended patch cord length 4m



#### FIGURE 4:

**Double Cross** Connect Frame (Compact) Recommended LC Uniboot patch cord length 4m















#### FIGURE 3

**Double Cross Connect** Back-to-Back, fully enclosed. Recommended patch cord length 4m



#### FIGURE 5

Interconnect or Splice Through frame with end panels



#### FIGURE 2

Cross Connect, four frame line-up, with end panels and over-length storage (300mm wide intermediate VCM). Recommended patch cord length between two double frames is 10m

#### **FRAME**

Robust ODF frame with configuration options that meet Telcordia Zone 3 seismic requirements.

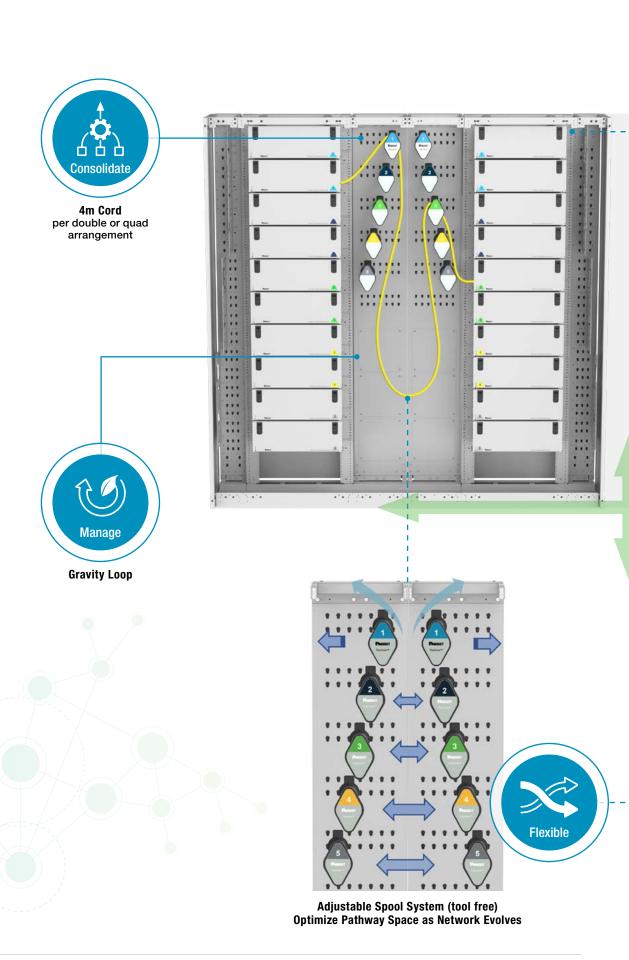
#### **ENCLOSURE**

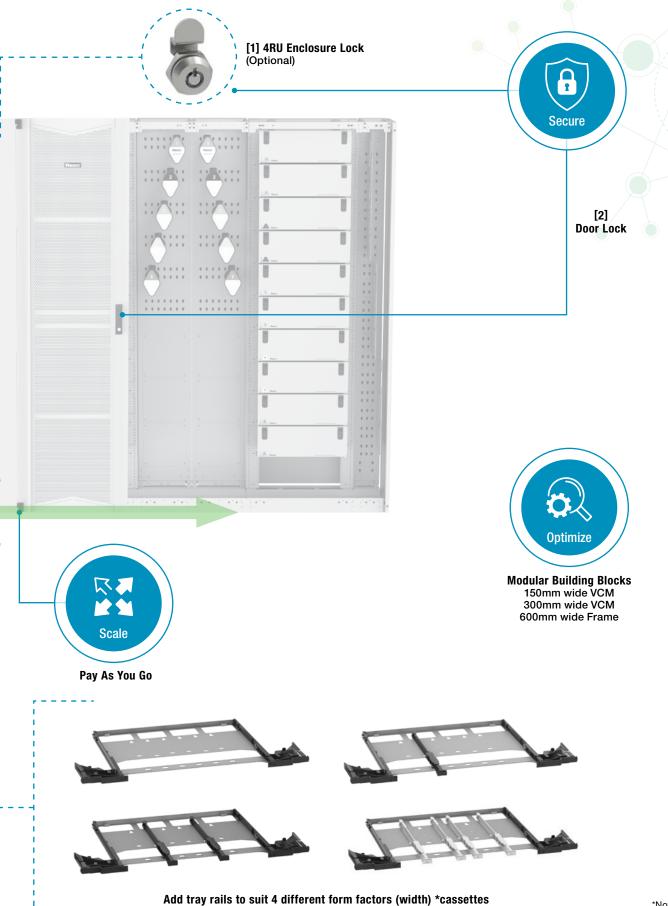
Each Frame holds up to eleven 4RU enclosures with twelve sliding trays that can accept four different cassettes types. Available with optional locks.

Patent US 10,215,944

#### **CASSETTES**

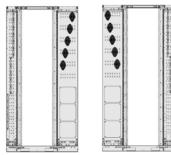
Factory or field terminated. MPO-LC, LC-Tethered, LC-Splice and Splice Through (cable-cable)





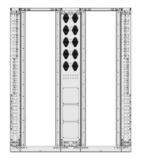
\*Not suitable for HD Flex™ cassette styles with both front and rear facing connectivity

### **STEP 1:** Select a Frame

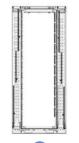




\*Assemble as opposite hand (RH)



Double Frame (Compact) Cross Connect



Splice Through



Description (short)	QTY	Part Number*	Maximum Capacity**	Dimensions (mm) <sup>††</sup>
Frame 600mm – GY VCM 150mm – GY VCM 300mm – GY	1† 1† 1†	FDFF45GY FDFVCM1545GY FDFVCM3045GY	3168F per single frame	Height – 2133 (2159-2200 with leveling feet)
Spool Kit (x6)	1† 1†	FDUSP6	132 × 24F (LC) Cassettes	Width – 1050
			11 × 4RU Enclosures	Depth – 300
			12 Trays per 4RU Enclosure	
Frame 600mm – GY	2	FDFF45GY	6336F	Height – 2133
VCM 150mm - GY	2	FDFVCM1545GY	per double frame	(2159-2200 with leveling feet)
VCM 300mm – GY Spool Kit (x6)	1 2	FDFVCM3045GY FDUSP6	132 × 24F (LC) Cassettes	Width – 1800
Duplex LC patch cords must be <2mm outside diameter unitary cable (Uniboot patch cord)			11 × 4RU Enclosures	Depth – 300
33.3)			12 Trays per 4RU Enclosure	
Frame 600mm – GY VCM 150mm – GY	1 2	FDFF45GY FDFVCM1545GY	6336F Splice only – Ribbon	Height – 2133 (2159-2200 with leveling feet)
			3168F	Width – 900
			Splice only – shrink down (single fiber)	Depth – 300
			3168F Interconnect (LC Cassette)	
			11 × 4RU Enclosures	
			12 Trays per 4RU Enclosure	

150mm VCM illustrated is supplied with 4 x cable management plates

Refer to design guides for configuration specifics

VCM can be assembled for top (as illustrated) or bottom cable entry/exit.

 $^{\dagger\dagger}\mbox{Width}$  and depth stated excludes end panel(s) and door(s)

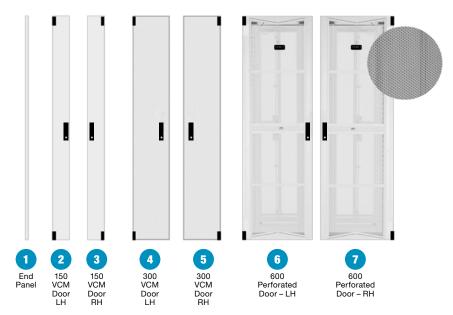
†for a 2100mm wide double cross connect frame (where both LH + RH version is needed) double quantity shown

\*\*maximum fiber capacity (stated) applies to single, double and quad (quad = double frame placed back-to-back) frame arrangements in combination with 24F LC cassettes. If using a line-up of >2 frames side by side the maximum number of 4RU enclosure is 10 off (2880F per frame) to allow bottom patch cord pass-through (trough) to be used.

<sup>\*</sup>Change 'GY to 'BL in part number for black.

## STEP 2: Select a Surround

LH - Left Hinged RH - Right Hinged



Ref.	Part Number**	Description (short)
1	FDFEP45GY	*End Panel
2	FDUFD1545SLGY	150mm VCM Door LH
3	FDUFD1545SRGY	150mm VCM Door RH
4	FDUFD3045SLGY	300mm VCM Door LH
5	FDUFD3045SRGY	300mm VCM Door RH
6	FDUFD6045PLGY	600mm Perforated Door LH
7	FDUFD6045PRGY	600mm Perforated Door RH

<sup>\*</sup>for multi rack line up(s) end panel is only required at end of each row \*\*change 'GY' to 'BL' in part number for black

#### **Splice Through or Interconnect**

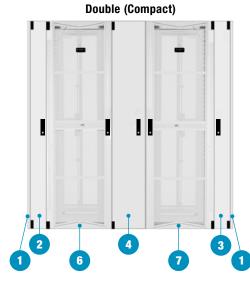


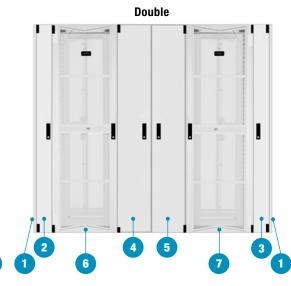
Single Cross Connect (LH)



**Double (Compact)** 







## **STEP 3:** Select a FlexCore<sup>™</sup> Enclosure







Part Number	Description
FDFUE4GY	ODF Front Access Universal Enclosure, 4RU, Gray
	12 x Slide out trays
Change 'GY' to 'BL' in part number for black	
FDFELS	Enclosure Locking Kit
	Standard, Keyed Alike Each it supplied with two locks



4 RU Enclosure Assembled with Cassettes



## FlexCore<sup>™</sup> Cassettes



FDS9N-24-10P

FlexCore <sup>™</sup> LC Splice Cassettes		
Part Number	Description	
FDS9N-24-LA*	24F Front Access Splice Cassette, LC APC. STD IL	
FDS9N-24-10*	24F Front Access Splice Cassette, LC UPC. STD IL	
FDSZO-12-10*	24F Front Access Splice Cassette, LC OM4. OPT IL	
FDSZA-12-10P	24F Front Access Splice Cassette, LC OM4. ULTRA IL	
*P for 250mm pigtails, R for ribbon pigtails		



FDC9N-24-10ASLH

FlexCore <sup>™</sup> MPO-LC Cassettes		
Part Number	Description	
FDC9N-24-LAASLH	24F OS2 LC APC (Duplex) to 2 x MPO12, Std IL., Method A, Left Hand	
FDC9N-24-10ASLH	24F OS2 LC UPC (Duplex) to 2 x MPO12, Std IL., Method A, Left Hand	
FDCZO-24-10ASLH	24F OM4 LC (Duplex) to 2 x MPO12, Opt IL., Method A, Left Hand	
FDCZA-24-10ASLH	24F OM4 LC (Duplex) to 2 x MPO12, Ultra IL., Method A, Left Hand	
FDCSA-24-10ASLH	24F OM4+ LC (Duplex) to 2 x MPO12, Ultra IL., Method A, Left Hand	

Change AS to: AF for Modified Method A (pair flipped) U for Universal polarity



FDC9N-24-10ASRH

FDC9N-24-LAASRH	24F OS2 LC APC (Duplex) to 2 x MPO12, Std IL., Method A, Right Hand
FDC9N-24-10ASRH	24F OS2 LC UPC (Duplex) to 2 x MPO12, Std IL., Method A, Right Hand
FDCZO-24-10ASRH	24F OM4 LC (Duplex) to 2 x MPO12, Opt IL., Method A, Right Hand
FDCZA-24-10ASRH	24F OM4 LC (Duplex) to 2 x MPO12, Ultra IL., Method A, Right Hand
FDCSA-24-10ASRH	24F OM4+ LC (Duplex) to 2 x MPO12, Ultra IL., Method A, Right Hand

Change AS to: AF for Modified Method A (pair flipped) U for Universal polarity



FlexCore <sup>™</sup> Splice Through (cable-cable) Cassette		
Part Number	Description	
FDSN-24	Front Access - Splice Only	
	24F Discrete Splice or 48F Ribbon Splice	
	Includes 24 x discrete and 4 x ribbon shrink down splice protectors	



PON Cassettes – FlexCore <sup>™</sup> Compatible		
Part Number	Description	
FHP9N-LA1X02	2 Simplex Output Ports	
FHP9N-LA1X04	4 Simplex Output Ports	
FHP9N-LA1X08	8 Simplex Output Ports	
FHP9N-LA1X16	16 Simplex Output Ports	
	HD Flex Splitter Cassettes	

#### **FlexCore™ Tethered Cassette**

Tethered LC cassettes enable fast, efficient, and reliable network deployment. The stub on the far end of the cable can be confidently deployed thanks to the Patented cassette-cable strain relief feature, then spliced or connectorized into the required system.

#### Features:

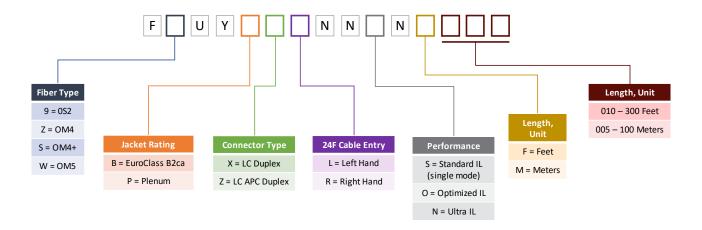
- Panduit's 24F small diameter indoor cable
- One end connectorized and fully tested
- Patented cable strain relief feature
- Dry cable construction 24 × 250-micron fibers

#### **Pre-Configured Lengths:**

- 5m to 30m in 5m increments
- 30m to 100m in 10m increments
- 10 Ft. to 100 Ft. in 10-Ft. increments
- 100 Ft. to 300 Ft. in 50m increments

Contact your Panduit sales representative for alternatives not shown







Part Number	Dimensions
F9UYPZLNNSNF100	Single mode 24-fiber Indoor Plenum Tethered LC/APC Cassette, Left-Side 24F Cable Ingress, Standard IL, 100-Ft.
FZUYBXRNNONM010	OM4 24-fiber Indoor EuroClass B2ca, Tethered LC Cassette, Right-Side 24F Cable Ingress, Optimized IL, 30m

## FlexCore<sup>™</sup> Accessories





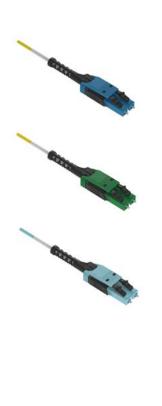






Part Number	Description
FDUSP	ODF Spool (Single)
	1/bag, 10/carton
FDUSP6	ODF Spool – 6-pack with labels
1 2001 0	OBI Opool o paok with labolo
	Includes corresponding enclosure door labels (not illustrated) for 11 x 4RU enclosures
FDFMX5KITBL	Cable Breakout Box
	Complete with 12' × 2' (610mm) protection tubes.
	Tubing provides bend radii protection and high crush resistance for cables and/or cable sub-elements as they are transported to a fiber enclosure.
FM5PPBLF4.0-12	Direct action tubes 41 (1.0m) v. 10 off
FINISPPBLF4.U-12	Protection tubes, 4' (1.2m) × 12 off Inside diameter 3.1mm
FM5PPBLF8.0-12	Protection tubes, 8' (2.4m) × 12 off Inside diameter 3.1mm
FOBKF144YM1	Fiber Optic Breakout Kit, Flat, 144F, Singlemode, 1m
FOBKF288YM1	Fiber Optic Breakout Kit, Flat, 288F, Singlemode, 1m
FDFSPLKITBL	Slack Spool Kit
	Manage excess fiber trunk length

## Patch Cords – Uniboot LC Duplex, 2 Fiber, 2.0mm Round Jacket



Part Number	Description
F92R*U1U1ONM004	OS2, LC-LC (Uniboot) Optimized IL, 4m
F92R*U1U1ONM010	OS2, LC-LC (Uniboot) Optimized IL, 10m
F92R*U2U2ONM004	OS2, LC APC-LC APC (Uniboot) Optimized IL, 4m
F92R*U2U2ONM010	OS2, LC-LC (Uniboot) Optimized IL, 10m
FZ2R*U1U1ONM004	OM4, LC-LC (Uniboot) Optimized IL, 4m
FZ2R*U1U1NNM004	OM4, LC-LC (Uniboot) Ultra IL, 4m
FS2R*U1U1NNM004	OM4+, LC-LC (Uniboot) Ultra IL, 4m
FZ2R*U1U1ONM010	OM4, LC-LC (Uniboot) Optimized IL, 10m
FZ2R*U1U1NNM010	OM4, LC-LC (Uniboot) Ultra IL, 10m
FS2R*U1U1NNM010	OM4+, LC-LC (Uniboot) Ultra IL, 10m

<sup>\*</sup>P for Plenum, L for LSZH

https://www.panduit.com/content/dam/panduit/en/products/media/4/64/264/8264/110318264.pdf
For extended range of patch cord styles and grades visit <a href="https://www.panduit.com">www.panduit.com</a> and/or contact your Panduit sales representative.

## QuickNet<sup>™</sup> Trunk Cable Assemblies

Click to visit Panduit's online configurator.



