



MDU - S5S

Fibre Optic Enclosure - Splice Only

Application Information

The largest of the HellermannTyton Multi-Dwelling Unit (MDU) Enclosures is the S5 and has been designed for deploying within the last mile of an FTTH network where demand for connections is at its greatest. The S5 is available in numerous configurations of tray styles, port types and optical functions depending on the particular requirements of the operator or the topology being deployed. The cornerstone of the enclosure is the modular fibre management system (FMS) which is present in many of HellermannTyton's fibre optic solutions. The increased capacity of the S5 allows for several different FMS styles to be deployed, including the standard FMS design for up to twenty splice trays or our more typical design capable of supporting up to 36 trays or 432 single-fibre 3A or ANT splices. Numerous styles of both splice tray and splice holder are available for point-to-point (P2P) configurations as well as many options for splitter-based splice trays for more typical passive optical network (PON) requirements.

The various applications of this style of enclosure have led to a number of aspects being adaptable depending on specific requirements of the optical distribution network (ODN). High fibre-count cable ports are deployable in four positions along the base of the enclosure for simple cable-to-cable butt-joint scenarios. In addition, multi-drop ports, where a more familiar radial solution to numerous dwellings or down-stream second-stage connections is the design of choice are available. These port styles are also interchangeable, allowing even the most varied cable and blown fibre tube (FBT) choices are required.

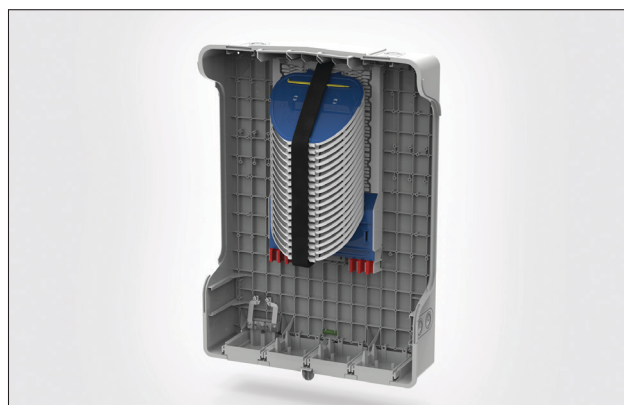
Customer separation can be as important in an MDU as any major metropolitan network and the S5 provides this functionality. With support for 24-splice single-element (SE) and 12-splice single-circuit (SC) splice trays, there are a few situations where the S5 fails to deliver. Mass fusion splice options for aggregation-node style deployments are easily accommodated.

The high port, cable, fibre and splice counts of the S5 in any number of configurations also ensure the S5 is as appropriate in an MDU scenario as it is a multi-tenant unit (MTU) or hybrid residential and commercial scenario.

A comprehensive range of both coarse wavelength division multiplexing (CWDM) and dense wavelength division multiplexing (DWDM) modules can also be installed in the standard FMS's for highly efficient fibre sharing which can easily combine the security and separation demands of even the most demanding of customers in a fully blended approach. Optical add-drop multiplexors (OADMs) in both duplex and BiDi configurations complete the WDM solutions on offer by enabling east and west connectivity to further mitigate service loss or optimise available bandwidth through diverse routing.

Loop storage basket options are also available in the S5 family of optical accessories where the enclosure is being deployed at various positions along a single length of fibre cable, often where numerous floors or even buildings are being severed from a common fibre ring.

No two MDU environments are the same and consequently no two MDU fibre infrastructures have the same design, use the same components or follow the same routes. With this in mind HellermannTyton have created a highly customizable MDU eco-system which include a number of optional accessories and associated products that ensure we have a solution for every situation. These include UV and UL94 VO materials for both inside and outside installations, B2ca compliant corridor cables for single dwelling drop-offs, face plates for connector presentation at the customer's optical network unit (ONU) and connectorised enclosures to ensure maximum flexibility within any deployment.



MDU-S5S Standard FMS (18 SE-IR MKII trays)



MDU-S5S Compact FMS (24 SE Compact trays)



MDU-S5S with lid and optional lock.

Splice trays (SE/SC-B MKII trays shown below)



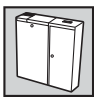
SE-IR MKII 2x3A and 2xANT.



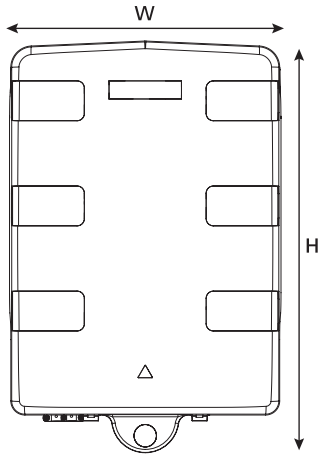
SC-B MKII with Moulded 3A and ANT.

Features and Benefits:

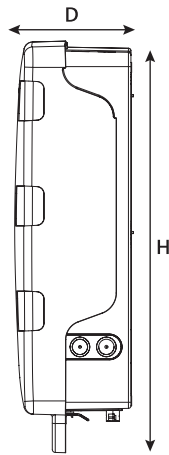
- Indoor/outdoor applications
- Maximum Splice Capacity: 576 (3A or ANT)
- FMS with 18 SE-IR, 36 SC-B, 24 Compact SE-IR or 48 Compact SC-B trays
- 6 or 8 FMS entry points
- Modular cable entry/exit ports
- Fitted Loop Through Anchor Gland with black rubber seals (ø 3-14mm)
- Extensive range of accessories



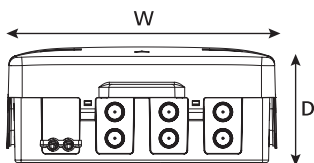
Technical Diagrams



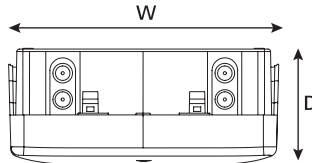
Front view.



Side view.



Base view including loop through cable gland kit.



Top view.

Technical Data

Dimensions (mm)	H	W	D
	568	375	165
IP Rating	IP54		
Mechanical IK protection	IK08		
Material	Acrylonitrile Butadiene Styrene (ABS)		
Material Properties	UV Stable / UL94 V0		
Colour	Light Grey RAL 7035		
Operating Temperatures	-20°C to +50°C		

Part codes

Part code	FMS			MKII Tray			Max. Splice Capacity	Splice Orientation	Seal Configuration
	Position	Type	Red Entry Points	Qty	Tray Type	Splice Type			
MDU-S55-C09A1	Central	Standard	6	18	SE-IR	3A	432	Horizontal	Loop Through
MDU-S55-C09B1				36	SC-B				
MDU-S55-C09C1				18	SE-IR	ANT			
MDU-S55-C09D1				36	SC-B				
MDU-S55-C08A1	Central	Compact	8	24	Compact SE-IR	3A	576	Horizontal	Loop Through
MDU-S55-C08B1				48	Compact SC-B				
MDU-S55-C08C1				24	Compact SE-IR	ANT			
MDU-S55-C08D1				48	Compact SC-B				

MDU-S55 Enclosure Accessories



Entry Seals



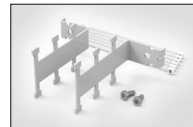
Single Cable Entry Kit



Loop Through Cable Kit



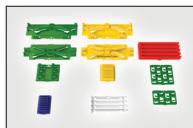
Multi Drop Cable Seals



Drop Cable Anchor Kit



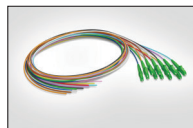
Unique and Generic Lock Options



Splitter / Splice Holders



Splitters



Pigtails



Internal Loop Storage Basket



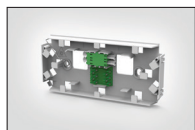
Rear Mounting Loop Basket



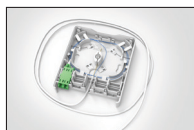
Mounting Basket Pest Guard



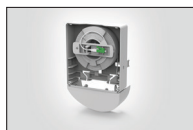
Associated Products



Internal Corridor Box (ICB)



Fibre Wall Outlet (FWO)



FWO Extension Kit (FWOE)



Faint Fibre Outlet (FFO)



MDU Cable (Bare End)



Internal Duct



MDU S1XS



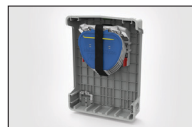
MDU S1



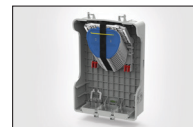
MDU S2



MDU S2 XL



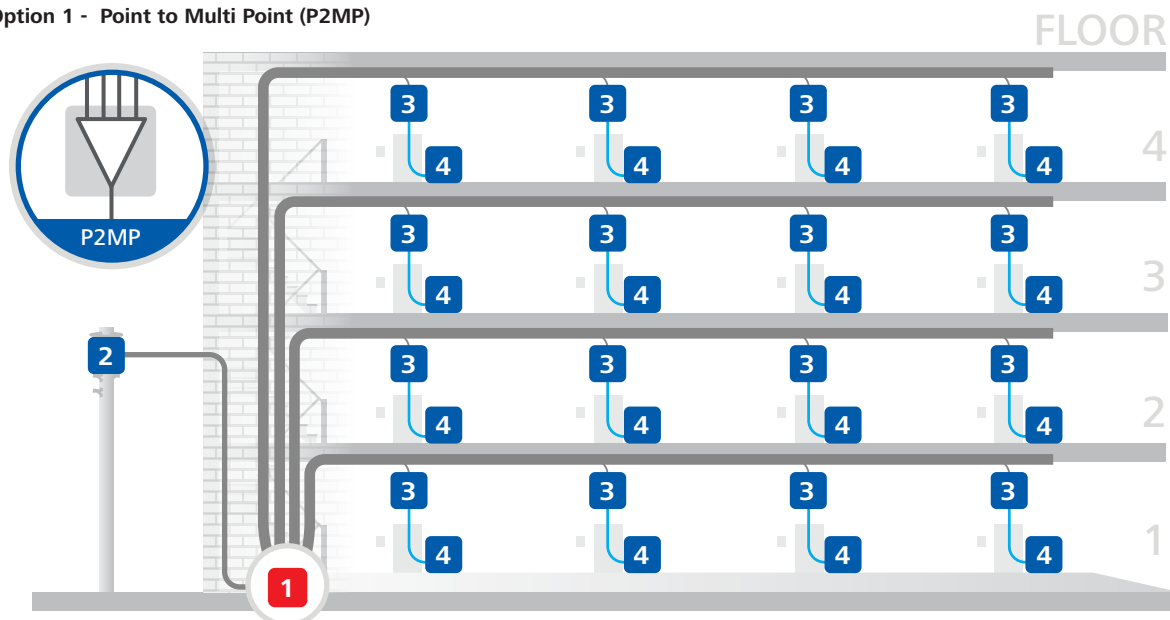
MDU S3



MDU S4

Topology

Option 1 - Point to Multi Point (P2MP)



ENCLOSURES

- | | |
|---|---|
| 1 MDU-S5S with splitters | 3 ICB
Internal corridor box |
| 2 AFN / FFE
Aerial distribution box | 4 FWOA / FWOE / FFO / FFO2.0
Customer wall outlet |

CABLE / DUCT

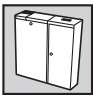
- | |
|--|
| 4F Incoming cable (bare end) |
| 8F Corridor drop cable (bare end) |
| 1F Fibre cable |

Datasheets and product info



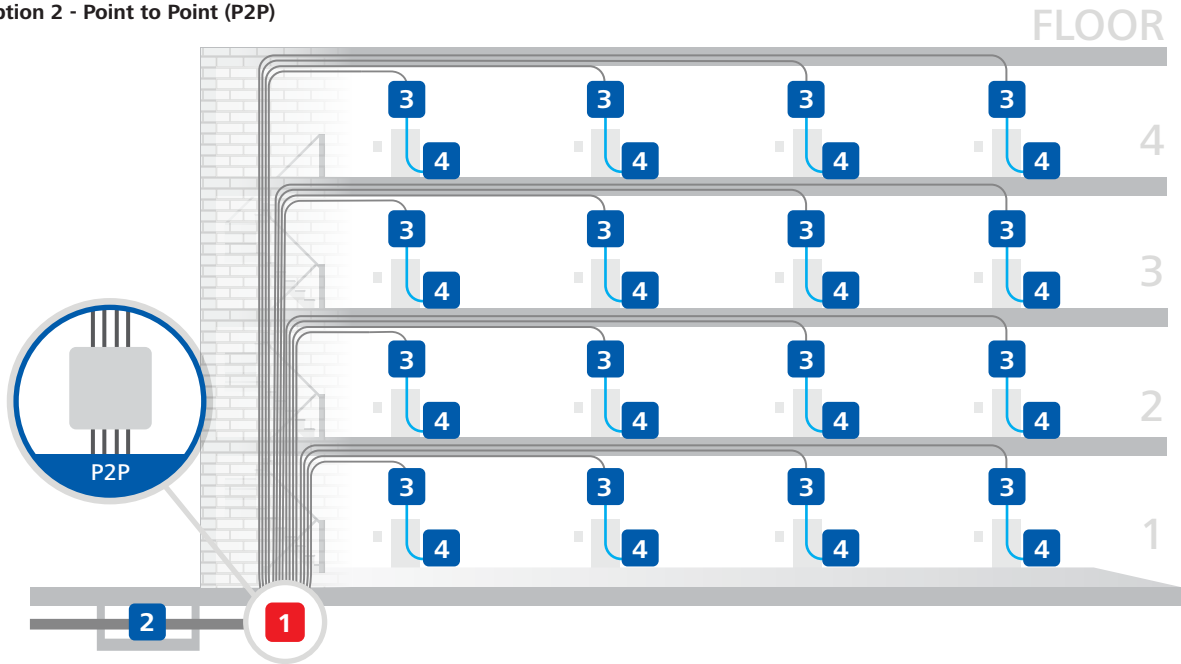
Information about these products can be found online via the QR code or via the link below:
URL link: bit.ly/4pirCQQ

This document is subject to change without notice.
 Further information at www.htdata.co.uk



Topology

Option 2 - Point to Point (P2P)



ENCLOSURES

- | | |
|---|---|
| 1 MDU-S5S | 3 ICB
Internal corridor box |
| 2 CFN / FDN / FRBU / FST
Underground dome closure | 4 FWOA / FWOE / FFO / FFO2.0
Customer wall outlet |

CABLE / DUCT

- | |
|---|
| 32F Incoming with External Duct (SP-G) |
| 1F Internal Duct (SP-I) |
| 1F Fibre Cable |