Marshall
Tufflex
Cable Management

Marshall Tufflex

www.marshall-tufflex.com

Elegance Aluminium
Trunking Systems

Elegance Aluminium Trunking Systems from Marshall Tufflex

Elegance Aluminium is an excellent choice for office and educational areas requiring a stylish yet robust trunking system, particularly effective where a high quality of screening performance and security is required.

Now available in two choices of height, 110mm and the new 170mm version, Elegance Aluminium is attractive, light to handle and with a mechanical strength and impact-resistance that is superior to steel.

Extruded sections are finished with a high quality, powder-coat that provides a blemish-resistant surface.

- Stylish and robust
- Cat 6, 6a and 7 compliant
- Lightweight for simple installation
- High screening performance
- New height of 170mm now available

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110 x 55mm

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About Marshall Tufflex

Marshall-Tufflex is the UK's leading manufacturer of cable management products. The company specialises in the supply of systems to the commercial, education and healthcare sectors worldwide.

Our area sales engineers, project managers and technical specialists work closely with electrical consultants, contractors and clients in order to provide the best possible technical and sales support.

Marshall-Tufflex products are designed to meet the latest BS EN ISO standards and to accommodate all building designs and construction parameters. Our bespoke solutions can also be designed and pre-fabricated to meet individual requirements and save time on site.

Elegance Aluminium provides the specifier, contractor and end-user with stylish, stream-lined containment together with the practical advantages of inherent LSOH and screening properties.

Elegance 110

Elegance 170

NEW

Standards

Marshall-Tufflex is committed to excellence and is recognised by the BSI as a firm of Assessed Capability for Quality Management Systems to BS EN ISO 9001:2008, Environmental Management Systems to BS EN ISO 14001:2004, Energy Management Systems to BS EN ISO 50001:2011 and Occupational Health and Safety Systems to BS OHSAS 18001:2007.

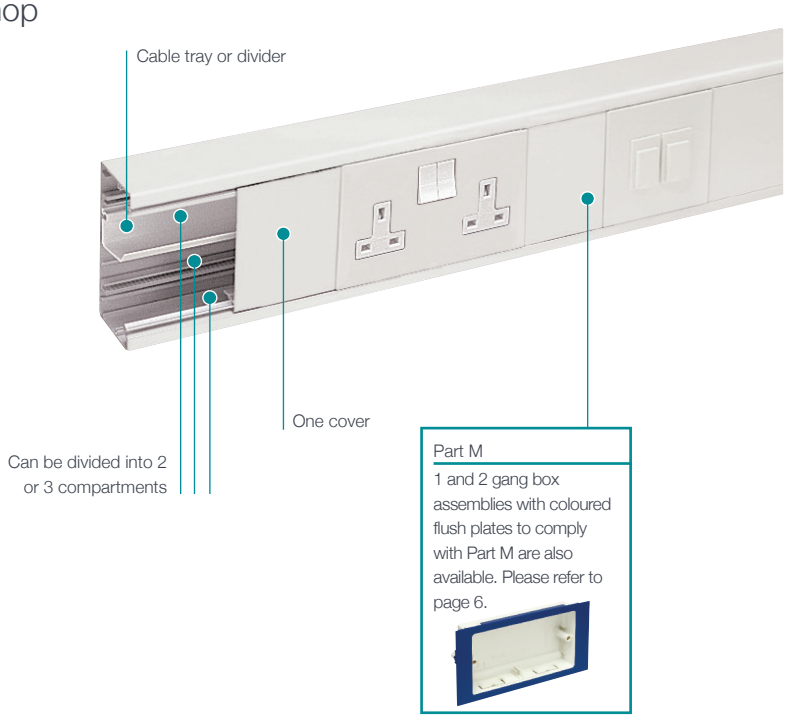
bsi.	ISO 9001 Quality Management	ISO 14001 Environmental Management	OHSAS 18001 Occupational Health & Safety Management	ISO 50001 Energy Management
	Q05393	EMS 539245	OHS 622466	ENMS 602935

Elegance 110 Aluminium

Elegance 110 aluminium is a small, rectangular, dado trunking system with a single cover. It is particularly useful for workshop or laboratory supply or in a commercial environment where extra mechanical strength is necessary.

Product information

- 110 x 55mm
- Can be sub-divided into 2 or 3 compartments
- Suitable for dado applications
- A range of fabricated fittings
- Fully compatible with Marshall-Tufflex flush data accessories and standard UK wiring power and accessories
- Cat 6, 6a and 7 compliant
- Standard powder coat finishes in white RAL 9016 or silver-grey RAL 9006



Part M

1 and 2 gang box assemblies with coloured flush plates to comply with Part M are also available. Please refer to page 6.

Standard colour	
WH	SG

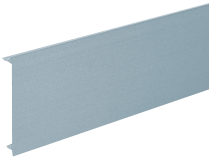
WH: White
SG: Silver Grey

Colour code suffix: to indicate the finish you require, add the required colour code to the end of the product code.
Options: optional colours and finishes are available but these will be subject to minimum quantity orders, longer lead times and set up charges.
For more information contact the Technical Team on 01424 856688.

Basic components

Base Unit

code	pack
LTB2SG	1 x 3m



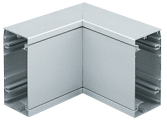
Main Compartment Cover

code	pack
LTL1SG	1 x 3m

Fittings

End Cap (Screws included)

code	pack
LECPSSG	1



Internal bend

code	pack
LIBPSSG	1

External bend

code	pack
LXBPSSG	1

Flat angle

code	pack
LFASSG	1

Flat tee

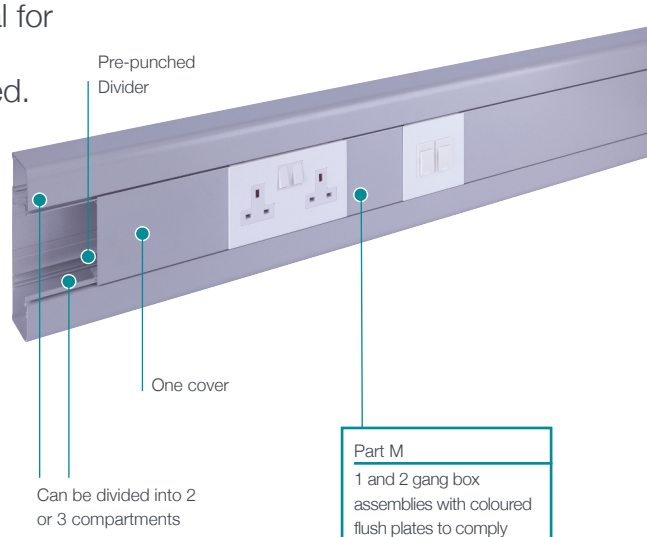
code	pack
LFTSSG	1

Elegance 170 Aluminium

Elegance 170 Aluminium is a sleek and rounded 170mm rectangular dado trunking system with a single cover, ideal for use in office or educational environments where extra mechanical strength and a higher cable capacity is required.

Product information

- 170 x 55mm
- "C" type section can be used as a single large compartment section or can be further sub-divided into 2 or 3 compartments
- Cat 6, 6a and 7 compliant
- Suitable for dado and skirting applications
- Pre-punched dividers for quick installation
- A range of fabricated fittings
- Part M compliant
- Compatible with Marshall-Tufflex flush power and data accessories and standard UK wiring power and accessories
- Standard silver-grey RAL 9006 powder coat finish. White RAL 9016 is also available to order subject to a lead time.
- Can be used inconjunction with Conduit and Mini trunking systems



Part M

1 and 2 gang box assemblies with coloured flush plates to comply with Part M are also available. Please refer to page 6.

Standard colour	
WH	SG

WH: White
SG: Silver Grey

Colour code suffix: to indicate the finish you require, add the required colour code to the end of the product code.
Options: optional colours and finishes are available but these will be subject to minimum quantity orders, longer lead times and set up charges.
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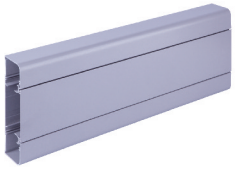
Basic components



Base unit and cover

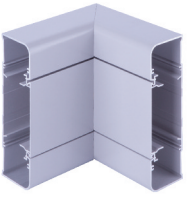
code	pack
LP1050SG	1 x 2.9m

Note: In order to sub-divide Elegance 170, LP1005 dividing fillets should be used

Fittings

End cap (screws included)

code	pack
LP1030SG	1



Internal bend 90º

code	pack
LP1020SG	1

External bend 90º Slow

code	pack
LP1026SG	1

Flat angle

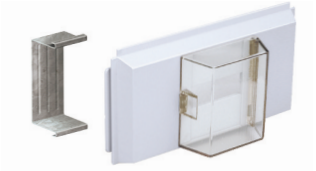
code	pack
LP1040SG	1

Flat tee

code	pack
LP1045SG	1

Components and Accessories

Components



RCD/MCB Housing

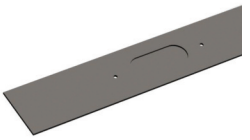
code	pack
EAHC1MWH	1

Up to 4 modules can be accommodated
Note: RCDs and MCBs are not supplied by Marshall-Tufflex.

Dividing fillet

code	description	pack
LDF1	unscreened	8 x 3m

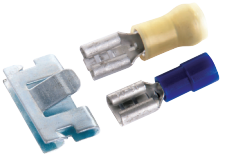
This product is for use with the Elegance 110 system only.



Dividing fillet (pre-punched)

code	length	pack
LP1005	1.45m	1

Note: In order to sub-divide Elegance 170, the above LP1005 dividing fillets should be used

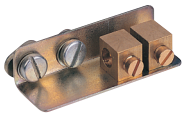


Earth bonding kit

code	pack
LBT3	1

Note: Fastons supplied suit 1.5mm to 2.5mm cable (blue) and 4.0mm to 6.0mm (yellow).

Bonding assembliess



Bonding terminal assembly

code	description	pack
LBT1	incoming 16mm²	5

This product is for use with the Elegance 110 system only.

Bonding strap

code	description	pack
LBS1	base to base 32Amp	5

This product is for use with the Elegance 110 system only.

Bonding strap

code	description	pack
LBS2	cover to base	5

End cap bonding strap

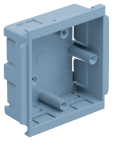
code	pack
LBS5	1

Coupler Pin

code	description	pack
LDP1	ø2.5 x 20mm	10

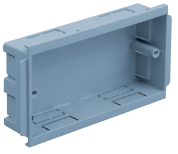
To aid alignment of base profiles

Boxes and plates



1 gang accessory box 30mm deep

code	description	pack
ESSB1SG	ABS	1
ESSB401WH	polycarbonate	1



2 gang accessory box 30mm deep

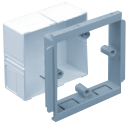
code	description	pack
ESSB2SG	ABS	1
ESSB402WH	polycarbonate	1

Part M

Part M box assembly

code	description	pack
ESPM1BU	1 gang - blue plate	1
ESPM1CH	1 gang - charcoal plate	1
ESPM1RD	1 gang - red plate	1
ESPM1GN	1 gang - green plate	1
ESPM1LG	1 gang - light grey plate	1
ESPM2BU	2 gang - blue plate	1
ESPM2CH	2 gang - charcoal plate	1
ESPM2RD	2 gang - red plate	1
ESPM2GN	2 gang - green plate	1
ESPM2LG	2 gang - light grey plate	1

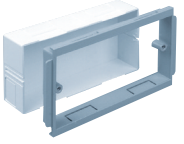
1 and 2 gang box assemblies are available to comply with the requirements of Part M (DDA).



1 gang adjustable depth box

DATA

code	depth	pack
EAB1SG	32 – 40mm	1



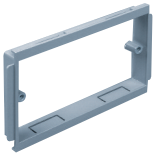
2 gang adjustable depth box

DATA

code	depth	pack
EAB2SG	32 – 40mm	1

1 gang accessory plate

code	pack
ESSP1SG	1



2 gang accessory plate

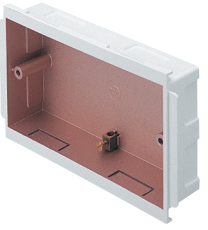
code	pack
ESSP2SG	1

Screened boxes

Screening

Conductive spray (CS) is unique to Marshall-Tufflex and is applied in the factory to provide screening from electromagnetic interference to data and communications cabling within trunking systems. The coating is applied to a range of data boxes, covers, clip-on components and fabricated fittings.

WARNING: A CS coating is not suitable for low voltage circuits.



Note: These products will be subject to minimum quantity orders, longer lead times and set up charges. For more information or a quotation, please contact the Technical Team on 01424 856688.

1 gang screened accessory box

DATA

code	depth	description	pack
ESSB1SWH*	30mm	PVC-U	20

2 gang screened accessory box

DATA

code	depth	description	pack
ESSB2SWH*	30mm	PVC-U	10

*Supplied complete with earth terminal

Technical Information

Elegance Aluminium

Material

Aluminium trunking is manufactured from high precision extruded aluminium with a powder coat finish.
White RAL 9016
Silver Grey RAL 9006

Installation

Positioning

Elegance can be installed at dado level or as a bench-mounted installation.

Fitting

- Secure trunking base every 750mm.
- Secure using No.8 round head screws and washers using the grooves in the outer (110) or inner (170) compartments of the base to facilitate drilling Ø6mm holes.
- Avoid over-tightening to permit thermal movement.
- The use of plastic caps over screw heads is recommended to protect installed cables.
- To cut the trunking, use a fine tooth blade (32/36tpi) or, preferably, a circular saw with a 350mm diameter fine tungsten blade (90/108tpi). This will produce an edge requiring minimal de-burring.
- Consecutive lengths of base are aligned and butt jointed together.

Earthing

- Base, covers and metallic fittings to be cleaned of protective powder coatings for earth bonding.
- Elegance 110. Incoming earth connection is made using LBT1 bonding assembly installed in the earth channel of the base.
- Elegance 170. Incoming earth connection is made using LBT3 bonding kit, with edge clip attached to the earth rib in the base and faston connector crimped to incoming earth cable.
- Bonding base to base: in final ring or radial 32Amp circuits, bonding strap LBS1 can be used.
- Bonding end caps to base: use bonding strap LBS5.
- Bonding base to cover, use LBS2.

Joints and bends

- Straight lengths should be butt jointed together with the aid of LDP1 coupler pin if required.
- Internal bends, external bends, flat angles and tees are prefabricated in aluminium and butt jointed together so cutting of base and covers has to be very accurate to produce a good finish.

Accessory boxes

- Remove appropriate knockout and clip box into trunking base.
- For boxes in same compartment as supply, remove appropriate knockout and clip box into trunking base.
- When boxes are installed consecutively, a 14mm wide length of cover is required to cover the space between the boxes.
- Part M box assemblies with contrasting coloured faceplates are available to meet the requirements of DDA regulations for Visual Impairment.

Covers

Covers are designed to limit unauthorised removal and to remain in position during normal conditions irrespective of impact and minor undulations of the mounting surface.

Covers – fitting

Covers are clipped into place from front. If accessory boxes are installed, the LTL1/LP1010 cover is butt-joined to the edge of the box (ESSB1/2 only). Cut edges of the cover are concealed by the accessory.

Covers – removal

To remove a cover, first detach an accessory to gain access. The main cover can then be gently eased off the base.

Screening

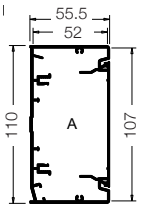
Aluminium containment will protect all internal circuits from external electromagnetic interference. For internal segregation metallic dividing fillets are avaliable.

Offset dimensions

The minimum set that can be accommodated in the same plane (from internal to external bend), is 145mm.

Dimensions

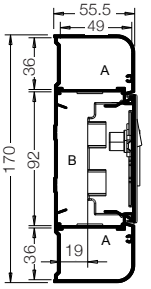
Elegance 110



A = 5254mm² total area
A = 2365mm² 45% space factor

With box in comp 1
A = 2987mm² total area
A = 1344mm² 45% space factor

Elegance 170



A = 1764mm² total area
A = 794mm² 45% space factor

Without Accessory
B = 4508mm² total area
B = 2028mm² 45% space factor

With Accessory
B – 1748mm² total area
B = 787mm² 45% space factor

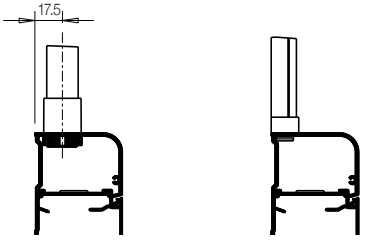
Cable capacities

- All calculations allow for a 45% space factor.

As there can be differences between data cable sizes, Marshall-Tufflex recommend that cable dimensions are confirmed with the manufacturing company.

Fixing to Conduit and Mini Trunking

Elegance 170 can be used in conjunction with Conduit and Mini trunking systems as detailed in the diagrams below:



Cable capacity chart Total cables = Volume/cable factor	Elegance 110		Elegance 170		
	Compartment A		Compartment A	Compartment B	
	No box	With box		No box	With box
PVC power cable 1.5mmv stranded copper	275	–	92	236	92
PVC power cable 2.5mm² stranded copper	188	–	63	161	62
PVC power cable 4.0mm² stranded copper	142	–	48	122	47
PVC power cable 6.0mm² stranded copper	112	–	37	96	37
Data cable: Ø5.5mm	76	–	26	65	25
Data cable: Ø6.0mm	64	–	21	55	21
Data cable: Ø6.5mm	54		18	46	18
Data cable: Ø7.0mm	48		16	41	16

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In pursuance of our policy of continued improvement Marshall-Tufflex reserves the right to change the design or specification of its products without notification.

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