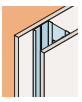


The wide range of Cormet metal partitions allows repeatable, guaranteed performance to be achieved across a broad range of applications from apartments, cinemas and factories to hospitals, museums, and schools.



3



Introduction

Cormet Partitions

Cormet metal stud partitioning is an economical friction-fit system used for the assembly of frames for non-loadbearing partitions. The unique design of the components ensures high strength with easy installation.

Cormet Partitions are suitable for domestic and general commercial use. They are strong high performance systems which are:

- cost effective
- lightweight
- versatile
- able to achieve high levels of fire resistance, acoustic and thermal insulation.

Performance

The selection of Cormet C Stud size, and the type, number and thickness of plasterboard layers will depend on the partition height and the performance required for fire resistance and sound insulation. Refer to the performance tables 3.14 to 3.21.

Lafarge Toughcheck/Sound Resistant Partitions

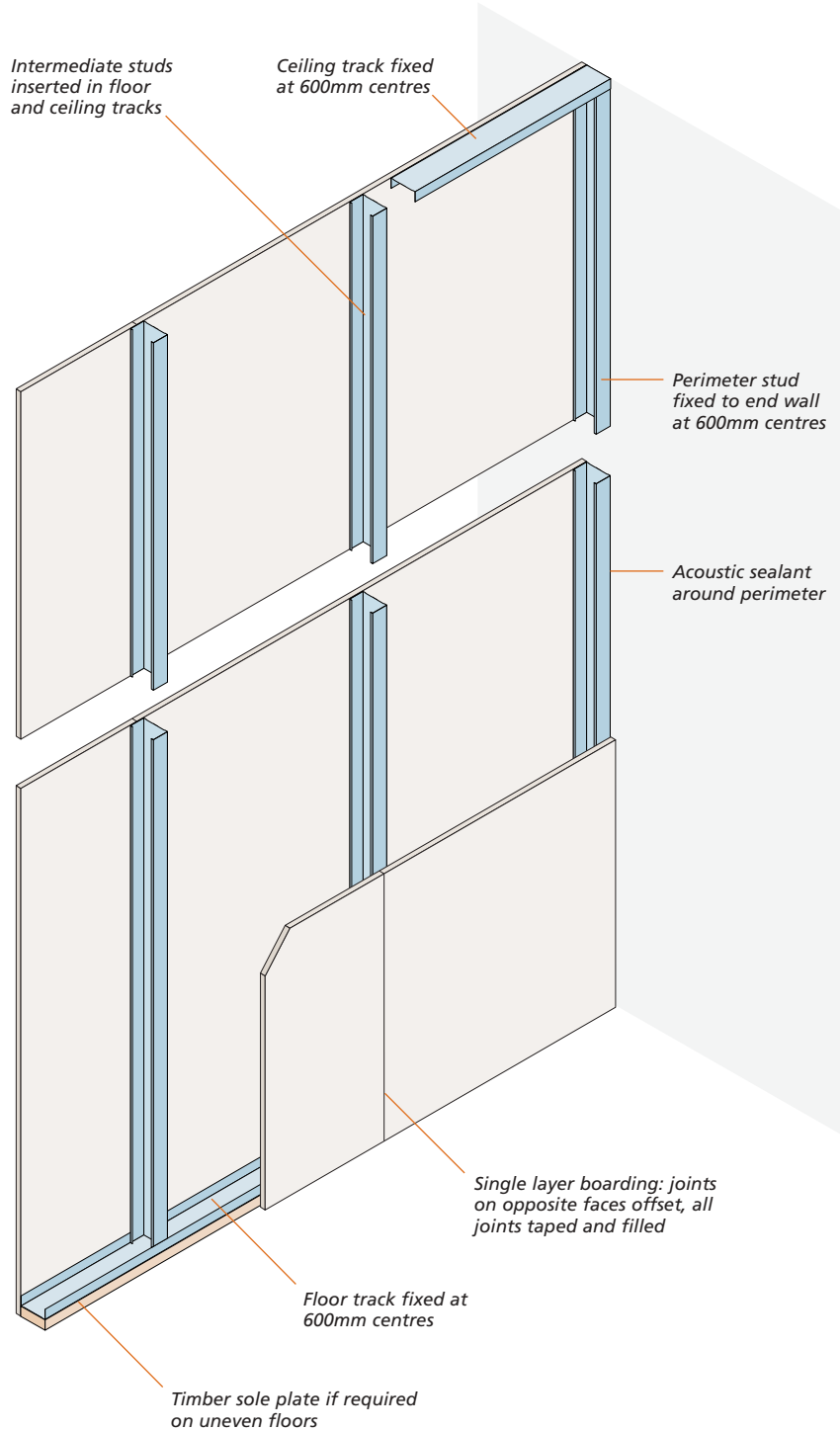
Lafarge Toughcheck Partitions comprise Cormet C Stud framing and Lafarge Toughcheck wallboard to provide a stronger partition which is more resistant to knocks and scratches.

In addition, Lafarge Toughcheck and dBcheck Partitions provide superior sound insulation performance.

Performance

Lafarge Toughcheck/dBcheck wallboards are defined as Class 0 in accordance with National Building Regulations 1991 Approved Documents B1/2/3/4/5 *Fire Safety* and Building Standards (Scotland) Regulations 1990, Regulation D2 when tested to BS 476: Part 6: 1989 and Part 7: 1997 and Euroclass A2. The gypsum core is classified as non-combustible when tested in accordance with BS 476: Part 4: 1970 and Euroclass A1. Lafarge jointing compounds, metal systems, textures and bonding compounds are non-combustible when tested in accordance with BS 476: Part 4: 1970 and Euroclass A1.

Partition with single layer boarding





Components

The range of Cormet Partition components is shown in the illustrations and table.

Rigidising plus vertical ribs in the stud webs ensures stiffness with strength, whilst the fold-outs allow for better services access. The flanges have deep knurling for easier screw-fixing, and plasterboard alignment guides, all of which makes installation even easier.

Colour coding is used to identify metal thickness: red (R) 0.50mm, blue (B) 0.70mm, white (W) 0.90mm and yellow (Y) 1.2mm. Maximum heights shown in tables 3.14 to 3.21 refer to 0.50mm thick studs (red gauge). If 0.70mm thick studs (blue gauge) are used the maximum height can be increased by 0.30m for systems faced with a single layer of plasterboard and by 0.60m for double layer systems.

Deep Flange U Tracks are used for partitions with heights above 4.2m, or at the soffit where a deflection head is required.

Cormet Fixing Channel can be fixed horizontally between two metal studs to provide extra support.

As an alternative Cormet Flat Strap Ref. FS50/R may be used between wallboards on two layer board systems.

All components are manufactured to BS 7364: 1990 *Specification for galvanised steel studs and channels for stud and sheet partitions and linings using screw fixed gypsum wallboards.*

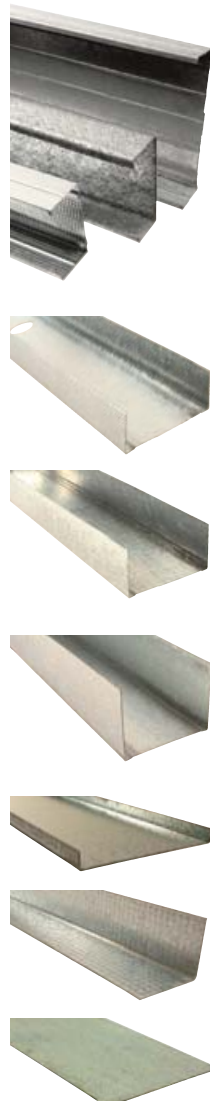
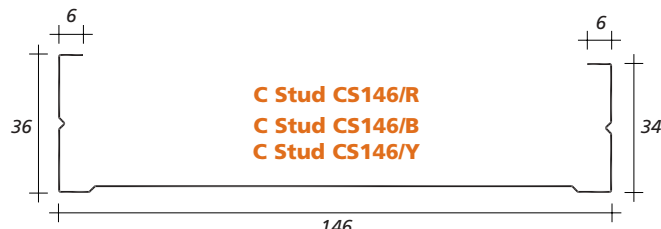
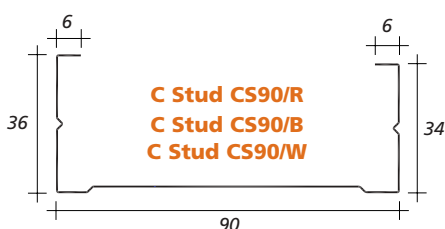
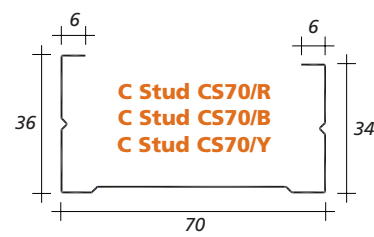
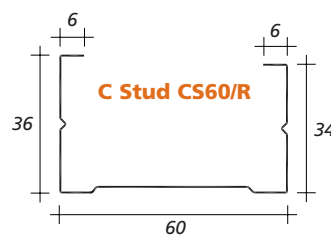
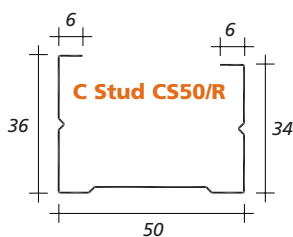
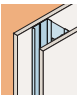


Table 3.11 Cormet Partitions components

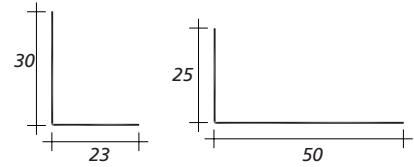
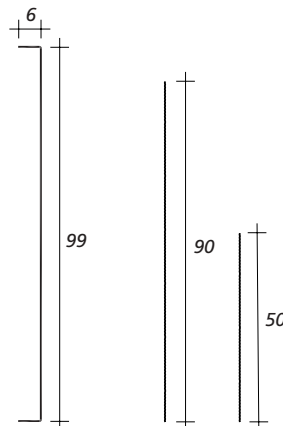
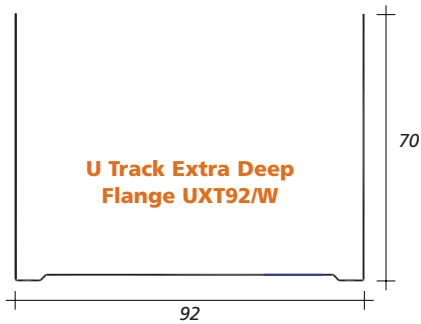
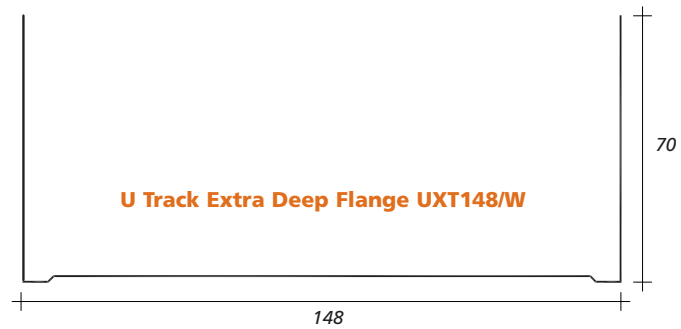
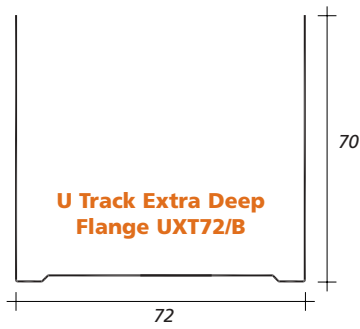
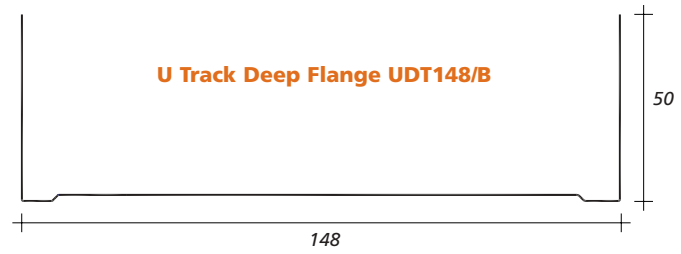
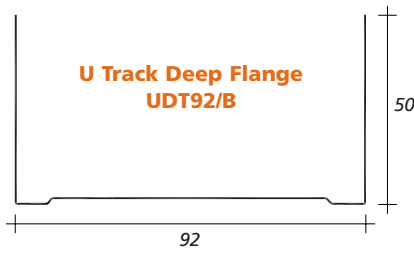
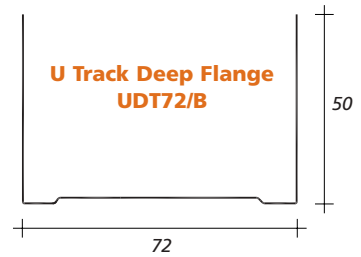
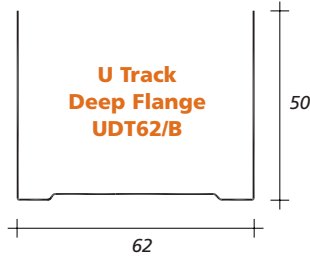
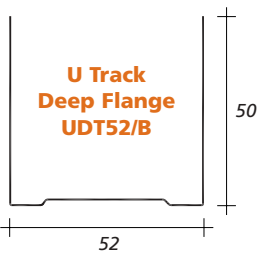
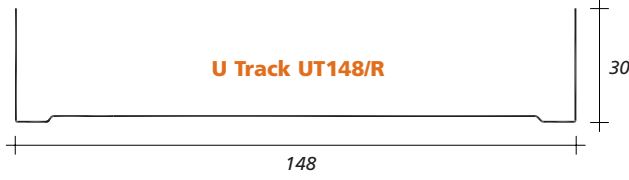
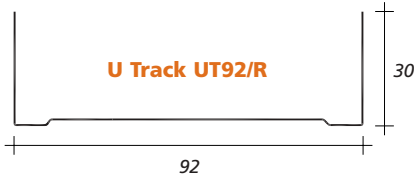
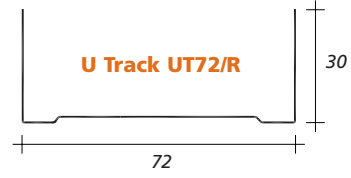
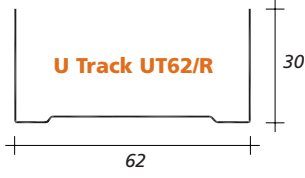
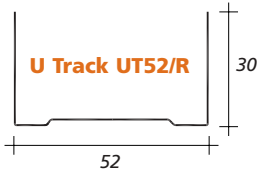
Component	Width (mm)	Length (mm)	Lafarge code
C Stud	50	2400, 2700, 3000, 3600	CS 50/R
red gauge 0.5mm	60	2400, 2700, 3000, 3600, 4200	CS60/R
	70	2400, 2700, 3000, 3300 3600, 4200, 4800	CS70/R
	90	2700, 3000, 3600, 4000, 4200	CS90/R
	146	2400, 2700, 3000 3600, 4200, 4800	CS146/R
C Stud	70	3600, 4200	CS70/B
blue gauge 0.7mm	90	3600, 4200	CS90/B
	146	3600, 4200, 4800, 5400, 6000	CS146/B
	U Track	52	3000
red gauge 0.5mm	62	3000	UT62/R
	72	3000	UT72/R
	92	3000	UT92/R
	148	3000	UT148/R
	U Track Deep Flange	52	3000
blue gauge 0.7mm	62	3000	UDT62/B
	72	3000	UDT72/B
	92	3000	UDT92/B
	148	3000	UDT148/B
	U Track Extra Deep Flange	72	3000
Flange	92	3000	UXT92/W
	148	3000	UXT148/W
	Fixing Channel	99	2400
Metal Angle		3600	MFC2330
		3600	MFC2525
		3600	MFC2550
		3600	MFC135
Flat Strap	50	2400	FS50/R
	90	2400	FS90/W

Component specifications may vary from those shown.



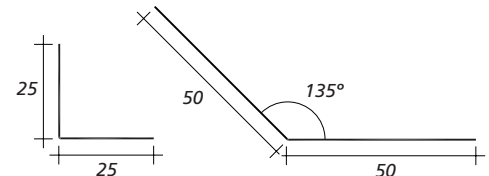


Components



Metal Angle MFC2330

Metal Angle MFC2550

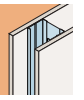


Metal Angle MFC2525

Metal Angle MFC135

Fixing Channel MFIX

Flat Strap FS90/W FS50/R



System assembly

Framing

Set out Cormet U Tracks along the setting out line of the partition at floor and ceiling, and fix at 600mm centres. If applying the Cormet U Tracks direct to new concrete which has not completely dried out, a damp proofing membrane should be used.

On uneven floors a timber sole plate may be required.

Cut Cormet C Studs 5mm shorter than the floor to ceiling height to allow for floor variations. Insert the Cormet C Studs into the Cormet U Tracks and twist to lock. Perimeter Cormet C Studs should be fixed at 600mm centres with the webs flat against abutting walls or partitions.

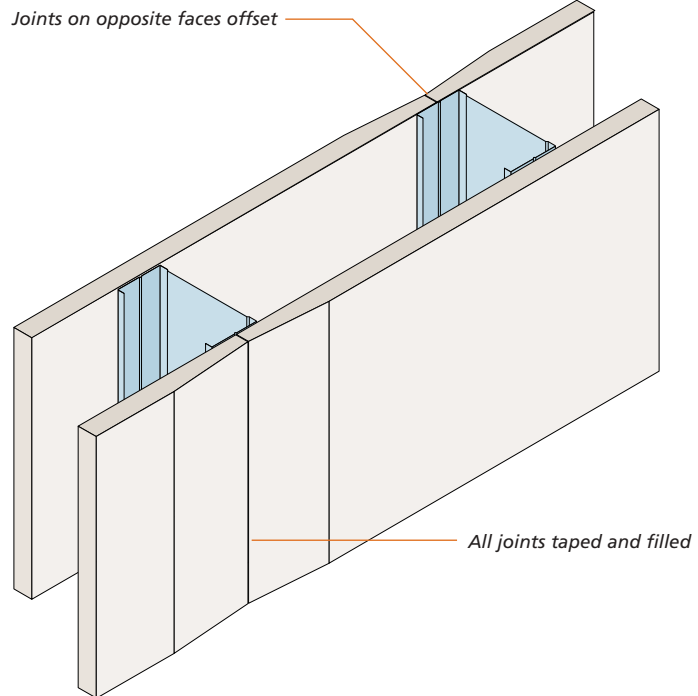
The intermediate Cormet C Studs should all face the same way and be positioned at either 400mm or 600mm centres for 12.5 mm plasterboard, depending on the height of the partition. Arrange the framing so that plasterboard widths of less than 300mm are avoided. Intermediate studs should not be fixed to Cormet U Tracks to allow for adjustment when fixing boards.

Use extra Cormet C Studs at openings, corners, junctions and stop ends, fixing to head and floor U Tracks with Lafarge Wafer Head Screws or crimping tool.

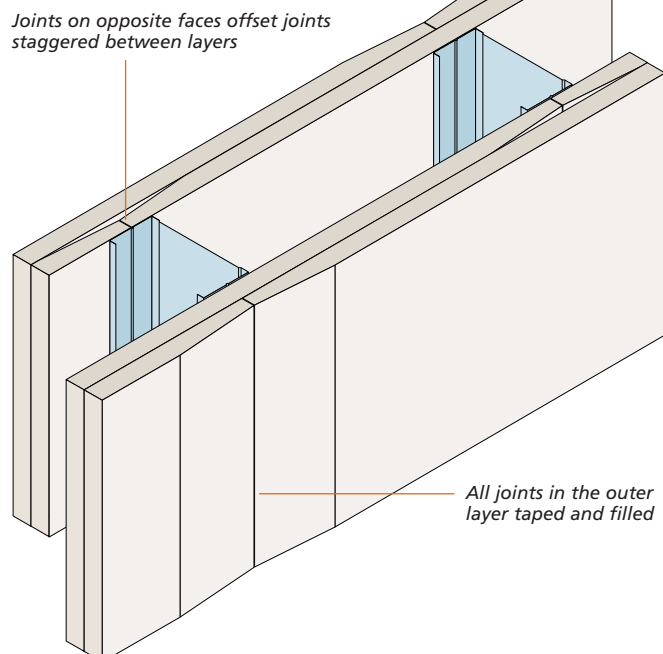
Doors and windows can be built into the partitioning by positioning and fixing full-length studs on each side of the openings. Cormet U Track is cut to form the head of the opening, and lined with 38mm deep timber where required.

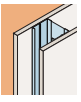
Make provision for fixtures as described in Section 8, Sitework.

Partition with single layer boarding



Partition with two layer boarding

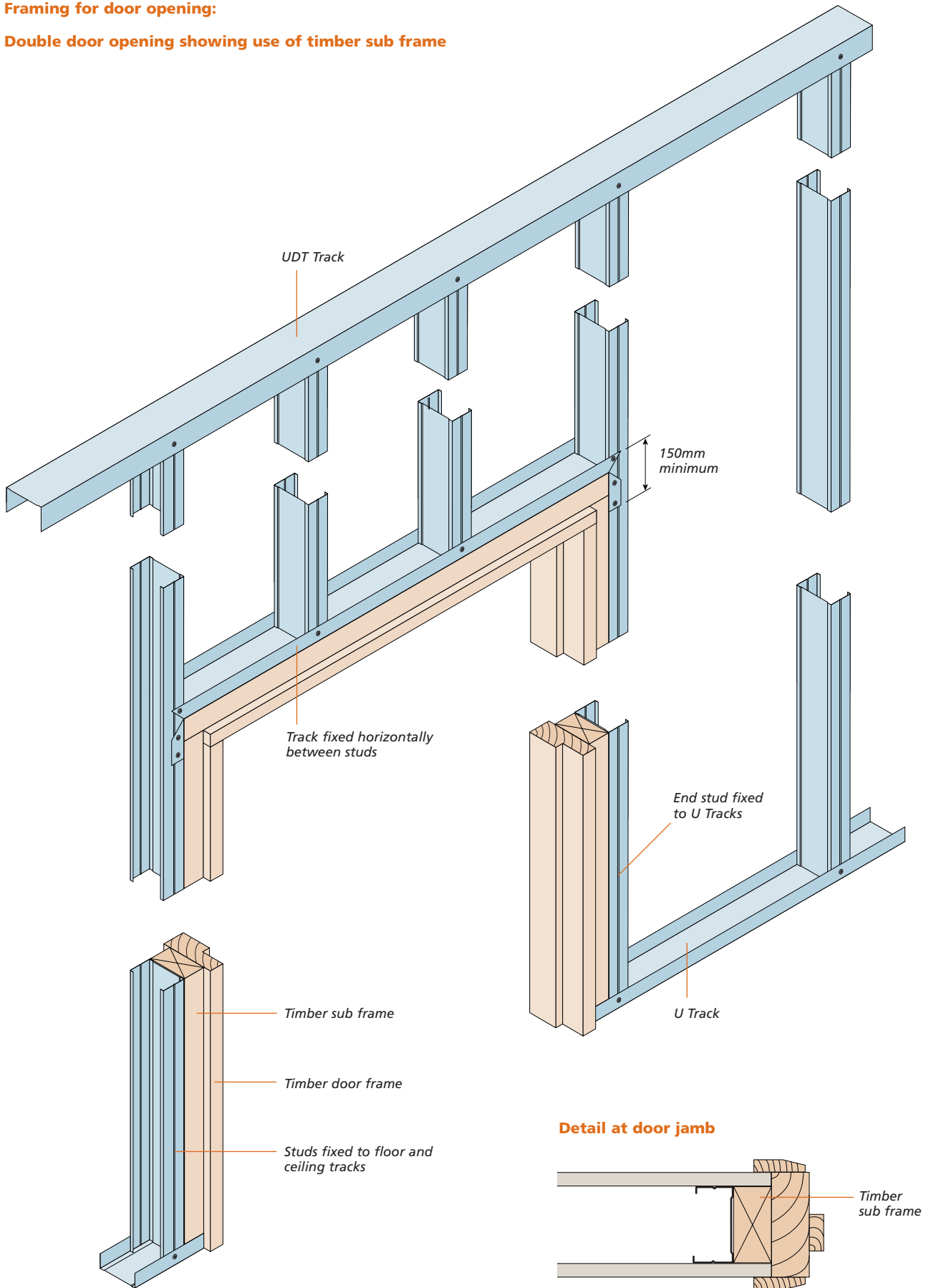


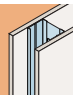


Application details

Framing for door opening:

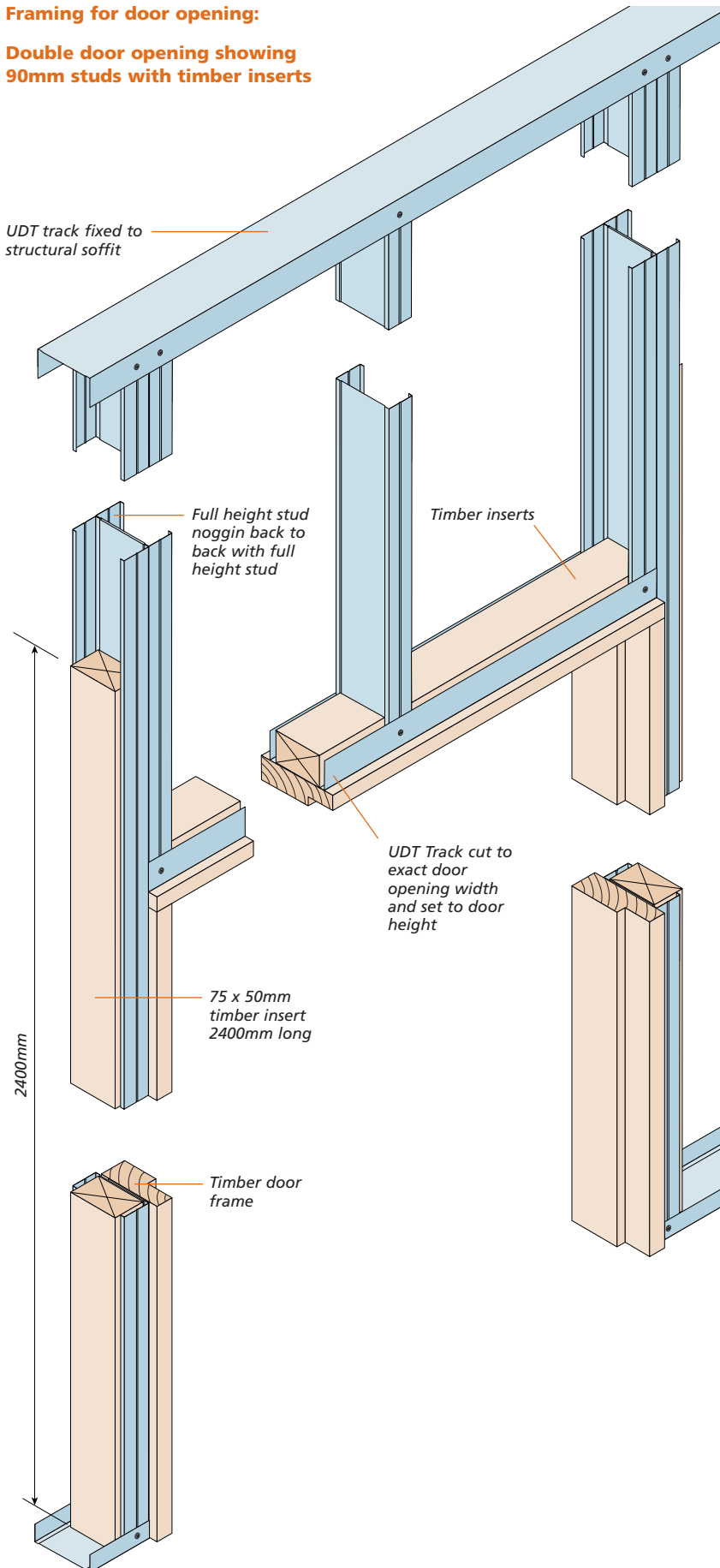
Double door opening showing use of timber sub frame



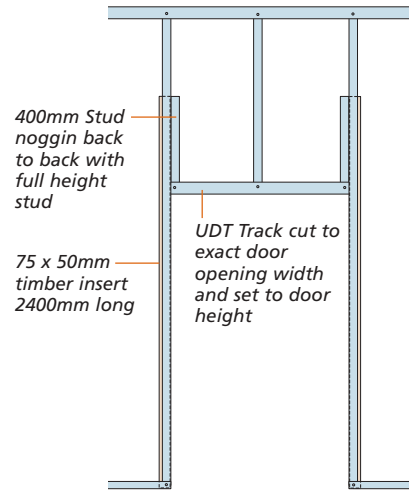


Framing for door opening:

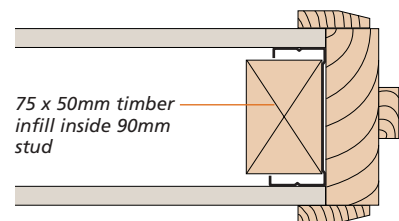
**Double door opening showing
90mm studs with timber inserts**

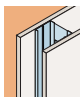


Detail of single door opening



HTM56 Door jamb





Application details

Boarding

To maintain acoustic performance, apply a 6mm bead of Lafarge Intumescent Acoustic Sealant around the perimeter of the boarding and all cut-outs before applying the boards.

Board one side of the partition at a time. Cut plasterboard 5mm to 8mm shorter than the floor-to-ceiling height, butt firmly against the ceiling and fix with Lafarge Drywall Self-Tapping Screws (Toughcheck Screws for Toughcheck partitions and Checkpoint Screws for Moisturecheck, dBcheck and Firecheck boards).

Butt plasterboard edges lightly against each other and centre edges of the plasterboard over the studs. When the partition height is greater than the plasterboard length, use Cormet Fixing Channel to support the horizontal cut edges of the plasterboards.

In partition constructions with double layer boarding each side of the frame, all horizontal plasterboard joints should be staggered by a minimum of 600mm between layers. Joints should not coincide with those on the opposite side of the partition. In double board system the Cormet Fixing Channel should be positioned to coincide with horizontal joints in the outer layer. Joints should also be staggered between layers.

As an alternative Cormet Flat Strap may be used between layers on double board systems.

Insulation

Where glass/rock mineral wool insulation is required, use batts or quilt as specified. Secure insulation with Cormet Insulation Hold Strip. This will prevent later sagging and loss of performance. Cormet Insulation Hold Strip is 25mm wide galvanised steel strip, with pre-punched arrows, which is screw fixed or crimped to the studs at 150mm from the partition head and at 1200mm centres vertically down the partition prior to boarding.

Spliced studs

Single C Studs can be easily spliced together to extend them. Overlap the C Studs at least 600mm and fix together with steel pop rivets or stud interlocking tool on both flanges.

Do not exceed maximum partition height specified in tables 3.14 to 3.21.

Boxed studs

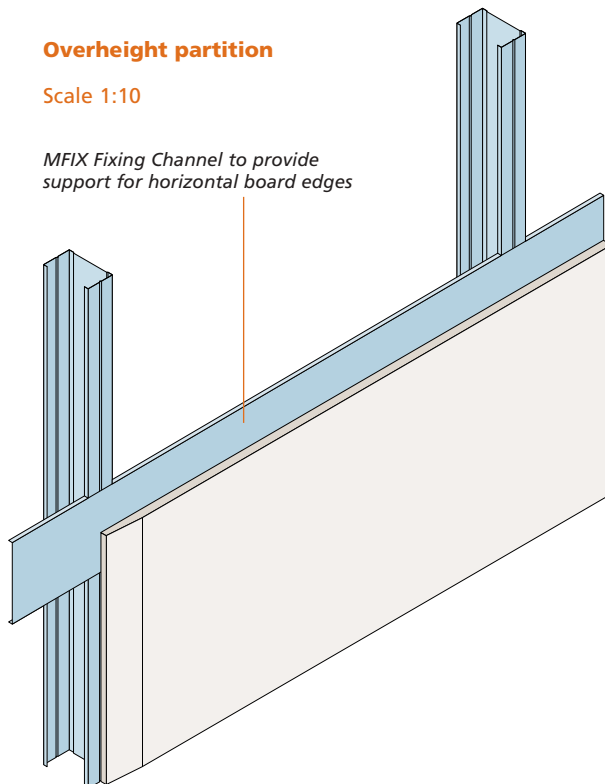
C Studs may be boxed together to give partitions of greater rigidity and height and to provide support at doorways. The bearing faces of the C Studs are asymmetrical (36mm and 34mm) to allow for boxing. Nest alternate short and long faces and snap together.

To avoid bulging track leave 50mm both ends as single stud.

Overheight partition

Scale 1:10

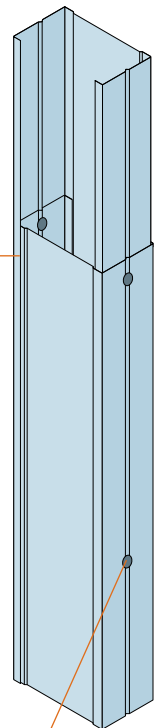
MFIX Fixing Channel to provide support for horizontal board edges



Spliced studs

C Studs with 600mm overlap

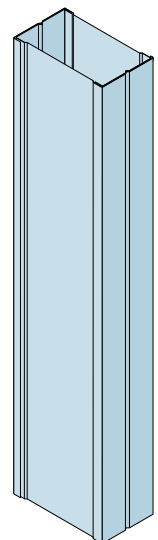
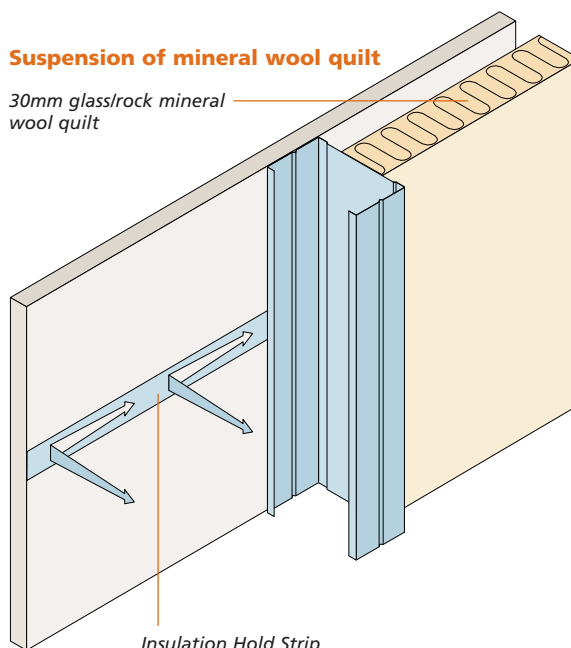
Steel pop rivets at 150mm centres on both flanges

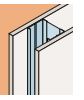


Boxed studs

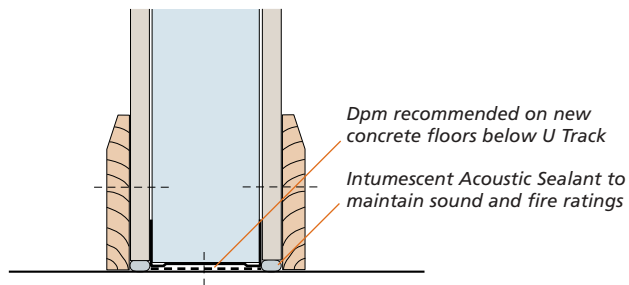
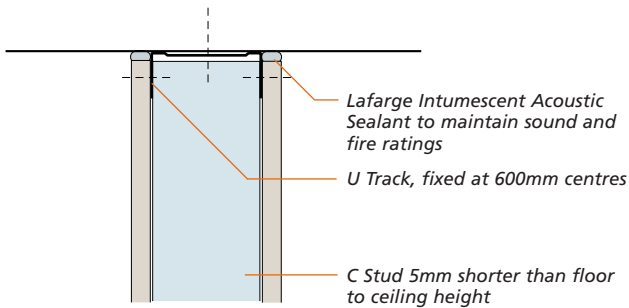
Suspension of mineral wool quilt

30mm glass/rock mineral wool quilt

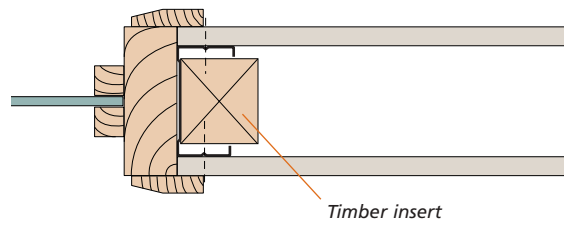




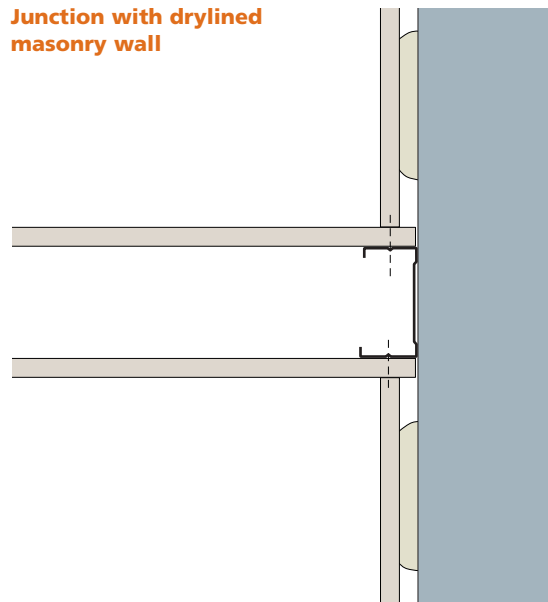
Ceiling and floor details



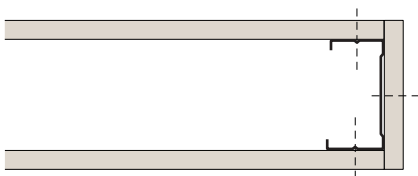
Glazed opening



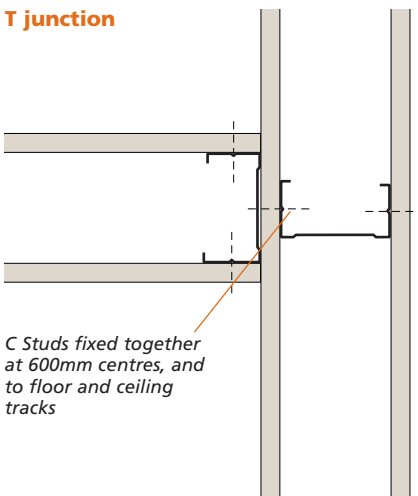
Junction with drylined masonry wall



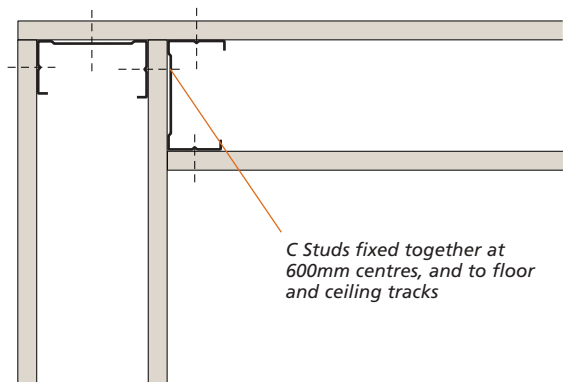
Partition end

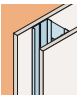


T junction



Corner



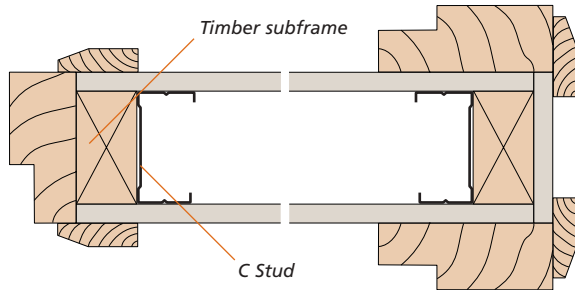


PARTITIONS
CORMET METAL STUD

Application details

Door frame details
Standard & BS 5234

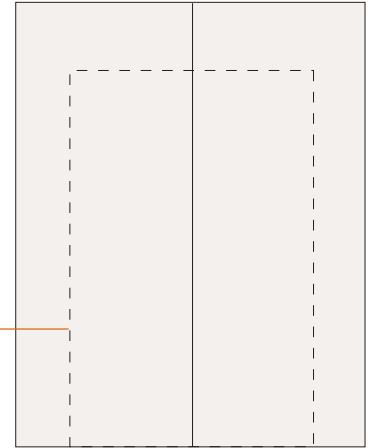
Standard door frame



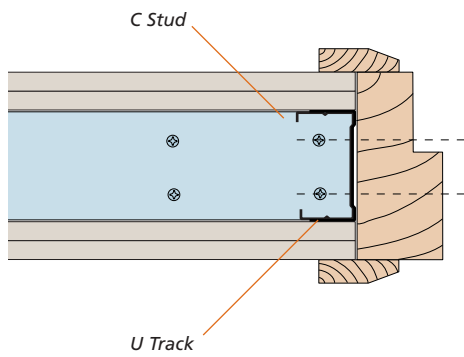
Wallboard setting out

Cut wallboard for door openings as shown to avoid joints running parallel to framing studs at sides of door

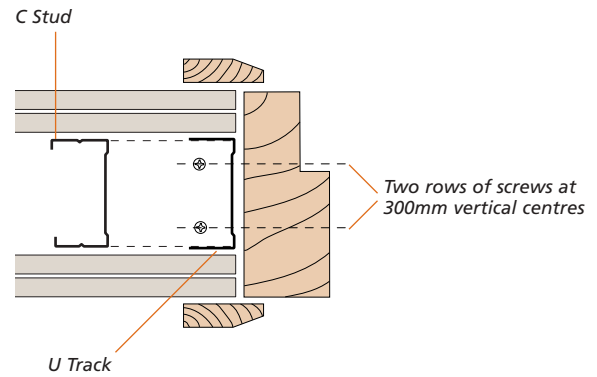
Door opening shown dotted



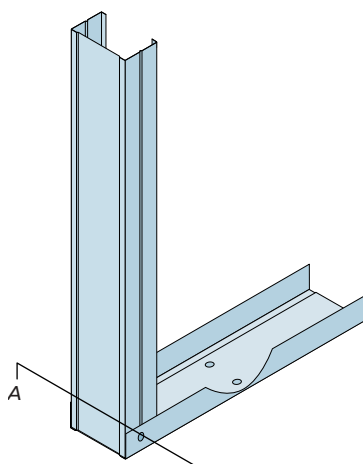
Door frame – detailing to satisfy BS 5234 : Part 2 : 1992
Severe duty (See exploded plan)



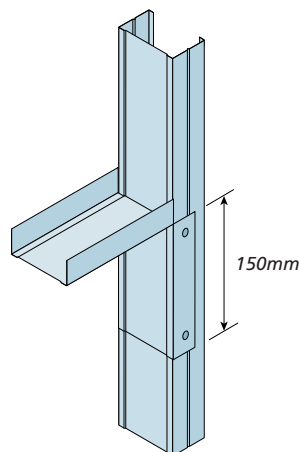
Exploded plan at door frame



Base detail



Head detail

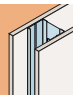


Notes:

At the head, U Track is cut and bent to extend 450mm down the face of the studs and fixed twice to each side.

Section AA





Deflection head

When partitions are erected to span the full height between floors, structural slabs or beams, accommodation for movement may be needed. The deflection head shown here will allow for movement up to 15mm and protect the partition from damage.

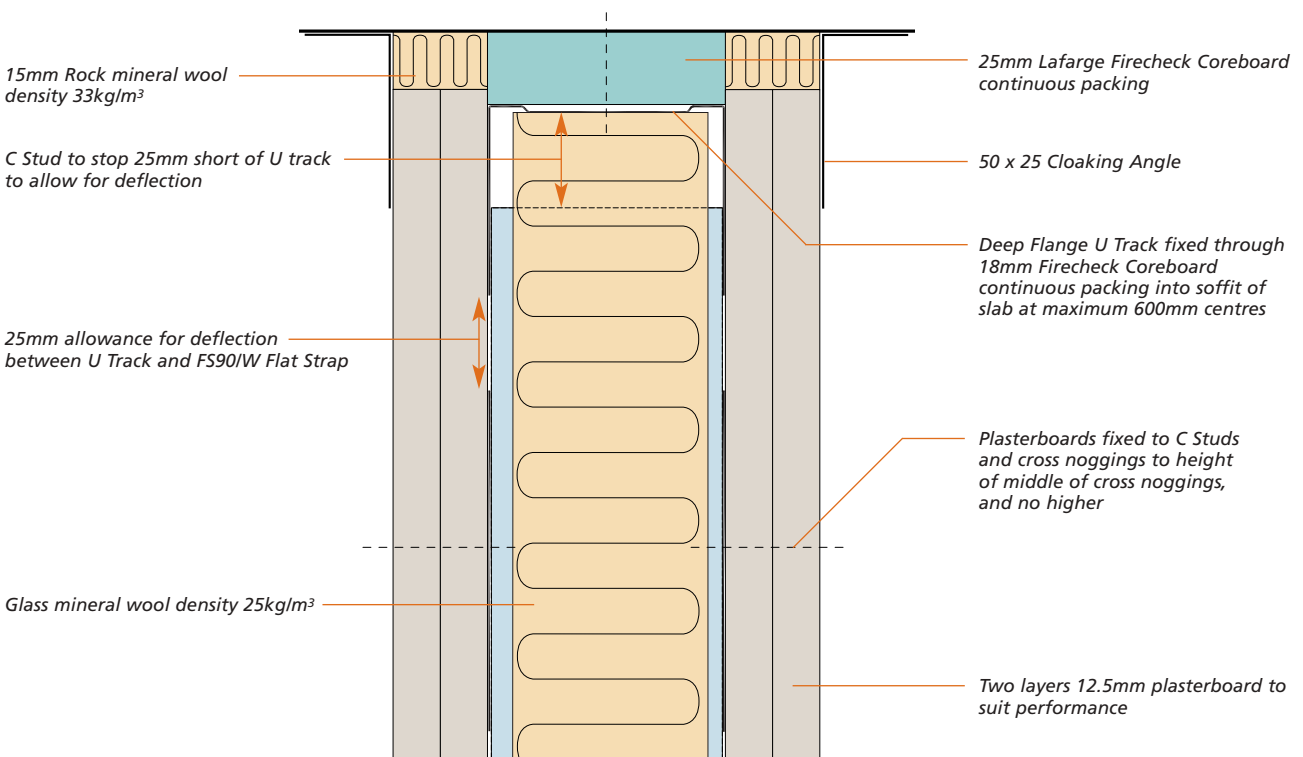
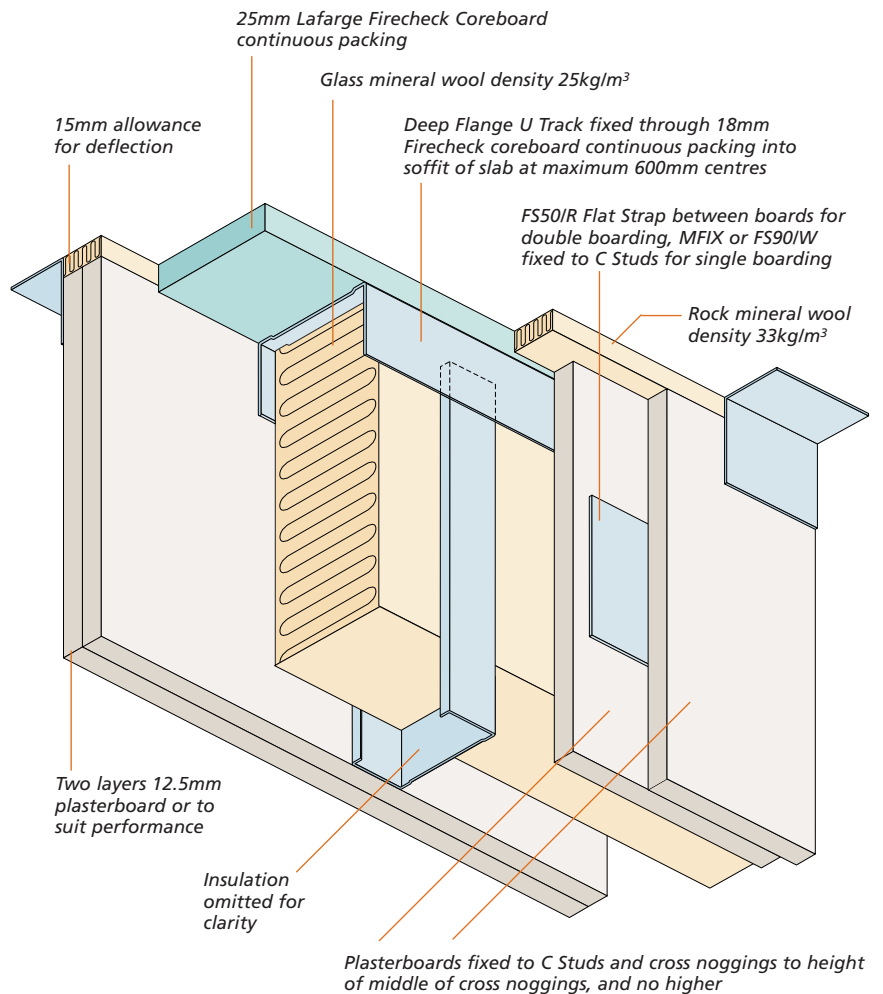
Form a head track from Cormet Deep Flange U Track fixed through 19mm Lafarge Firecheck Coreboard continuous packing to the structure with suitable fixings at 600mm centres.

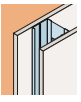
Cut studs 25mm short of the floor to ceiling height. Fix Cormet Flat Strap to sides of C Studs to take top fixings of boards. The top of the Flat strap should be spaced 25mm below the bottom of the Deep Flange U Track.

Fix plasterboard, allowing for a 15mm deflection at the partition head; do not screw fix the plasterboard to the studs or track above Cormet Flat Strap.

For other arrangements, greater deflection allowance or different structural backgrounds contact Technical Enquiryline.

One hour fire resistant 15mm deflection head



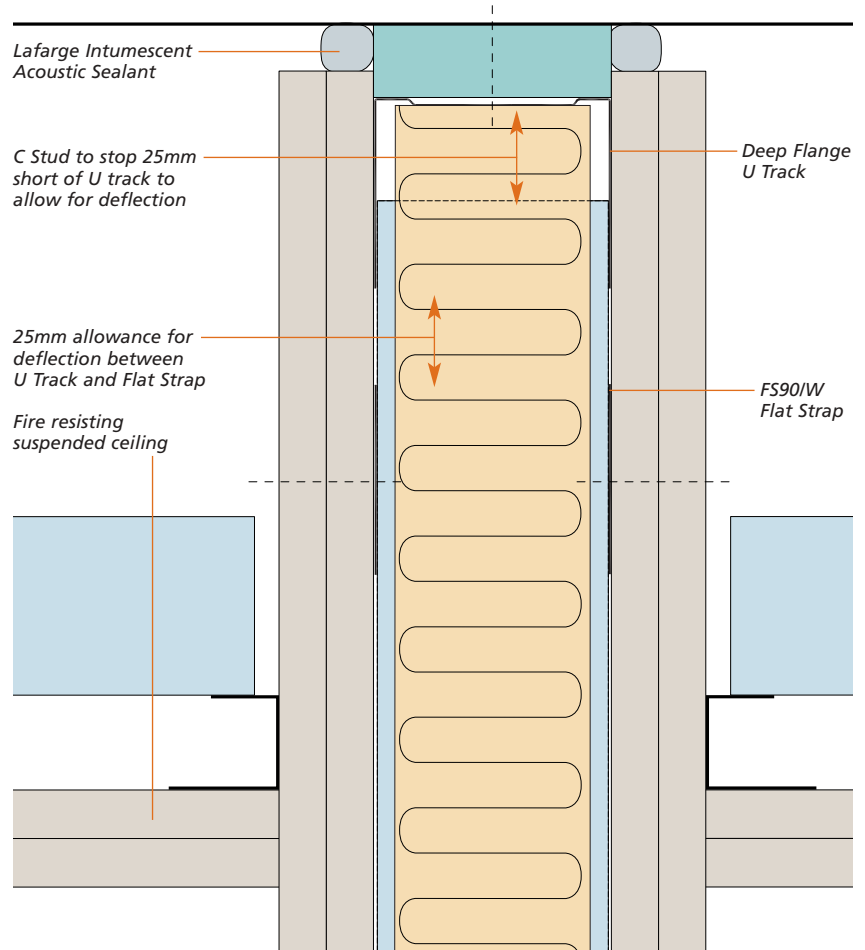


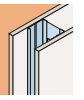
Application details

Alternative deflection heads

The top detail is used where there is a fire resisting suspended ceiling. The detail is similar to the previous page, but the Rockwool insulation and metal angles are not needed for fire resistance, which is provided by the ceiling.

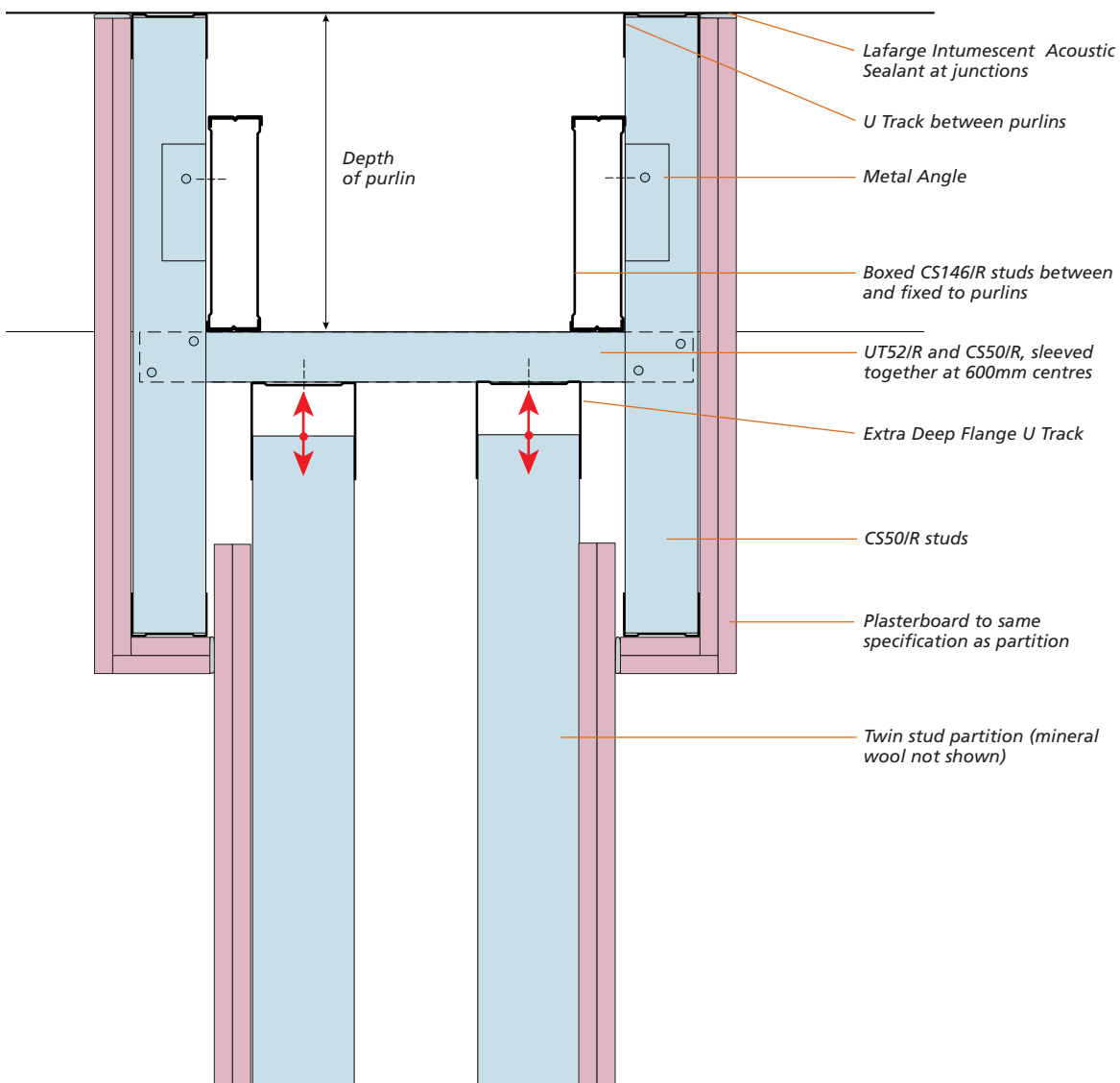
Deflection head with fire resisting suspended ceiling

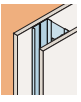




Deflection head detail with partition running at right angles to purlins

The detail shows how the performance of the partition is maintained, whilst also allowing for deflection. Rock mineral wool should be specified to fill the entire cavity head detail.



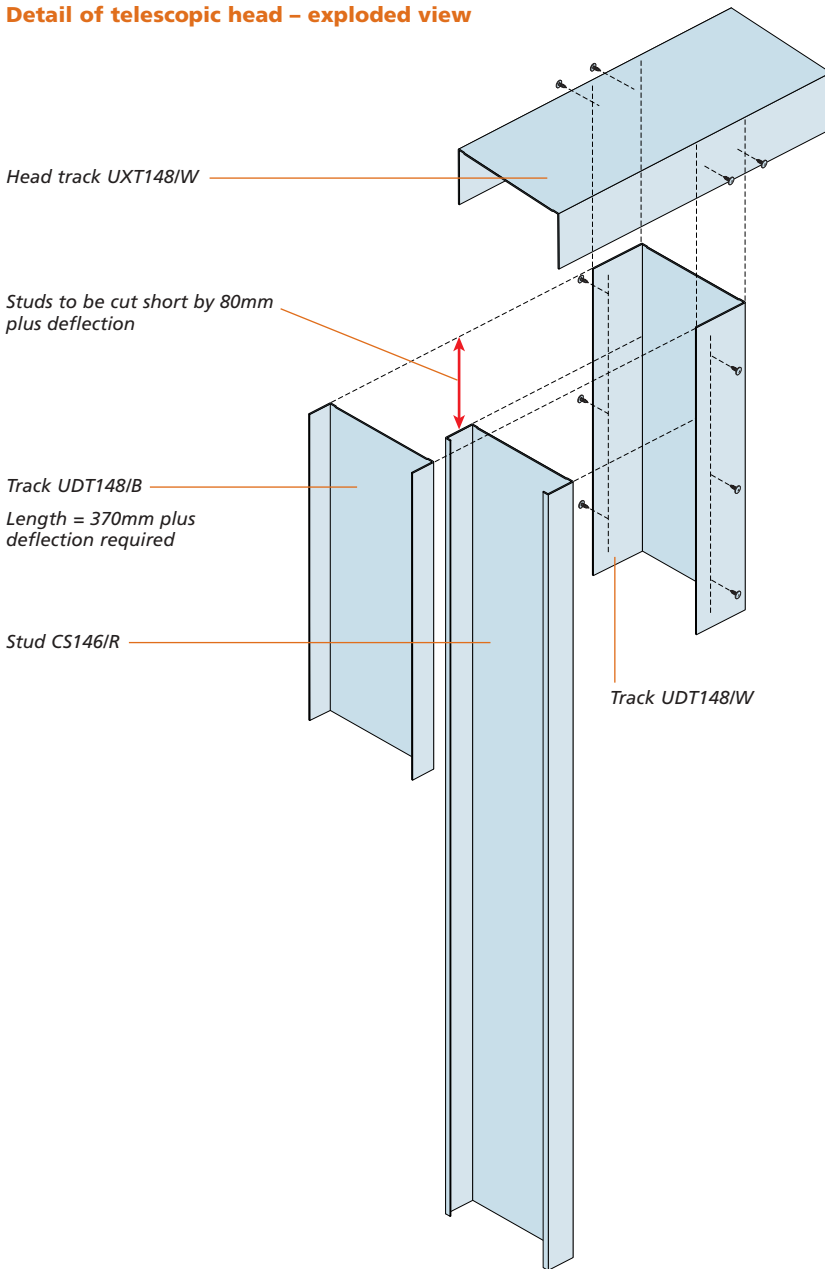


Application details

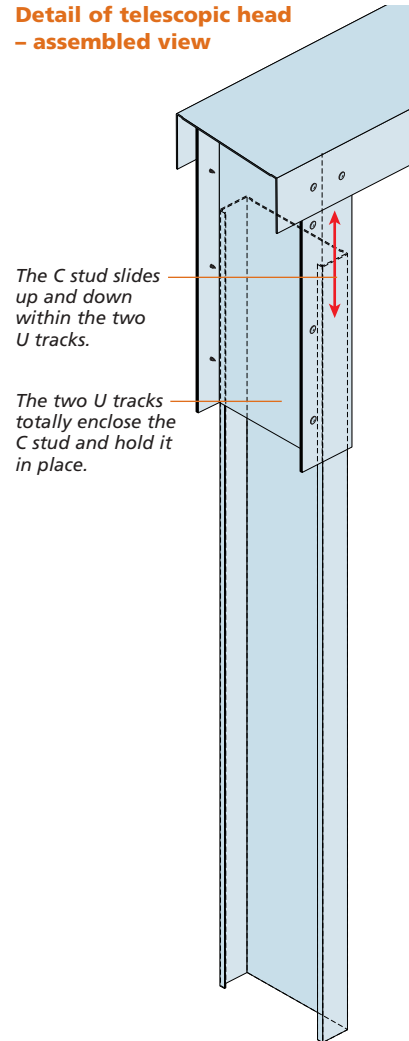
Telescopic deflection head

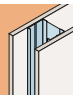
The telescopic deflection head is for use where deflection is greater than 40mm. The detail can allow for deflection up to 150mm. A typical arrangement for enclosing the telescopic head and maintain the fire performance is shown on the right.

Detail of telescopic head – exploded view



Detail of telescopic head – assembled view





Movement control joints for partitions

Movement control joints may be required to relieve normal structural movement without loading the partition. Movement control joints are required in partitions at intervals not exceeding 10m, where the partition crosses or abuts a structural movement joint, and where partitions of dissimilar materials meet in the same plane.

At movement joints, leave a 12.5mm gap in the U Tracks at head and base. Fix a C Stud on one side, 10mm from the gap, and line the web with two layers of 15mm Lafarge Firecheck wallboards. Place another stud, web facing web on the opposite side of the gap, as shown. Board the partition, leaving a continuous 12.5mm gap between boards along the line of the movement joint.

Cut Movement Control Joint to length; butt joint lengths end to end where necessary. Attach to the plasterboard surface with 13mm galvanised or sherardized or zinc electro-plated staples at 150mm centres. Apply Lafarge Fast Set in two coats, feathering out the edges of the second coat. After finishing, remove the masking strip from the centre of the joint.

Wind loading

Cormet Metal Stud Partitions are non-loadbearing but can accept a degree of wind loading, for example when used in buildings with large or multiple external doors. Information can be provided on specifications to suit individual requirements, including the provision of deflection heads. As a guide, a 7.6m high partition consisting of 146mm Cormet Metal Studs with two layers of 12.5mm Lafarge dBcheck wallboard resists a pressure of 200N/m², with a deflection limit of L/240 (where L is the partition height in mm)

Electrical services

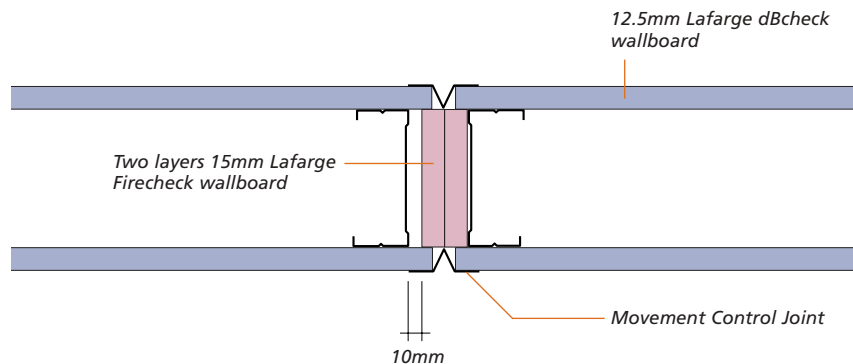
The installation of electrical services should be carried out in accordance with the recommendations of the Institution of Electrical Engineers. The cut-outs in the studs can be used for routing electrical and other small services. Cables should be protected by conduit or other suitable precautions taken to prevent abrasion when they pass through the metal frame.

Table 3.12 Wall grades by categories of duty

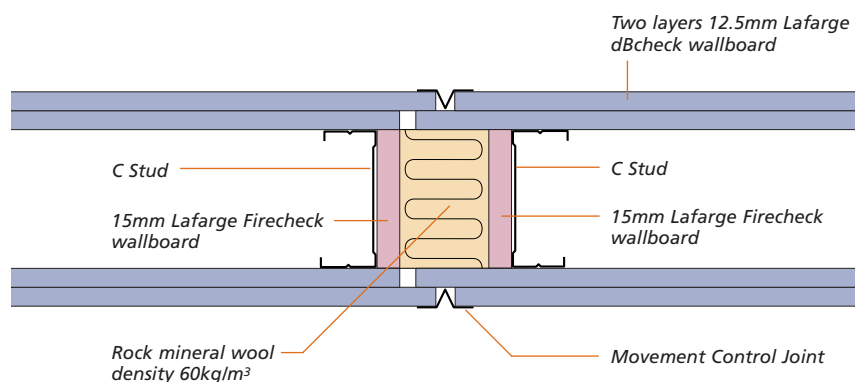
BS 5234 : Part 2 : 1992

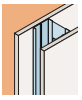
Grade	Category of duty	Examples
LIGHT DUTY	Adjacent space only accessible to persons with high incentive to exercise care. Small chance of accident occurring or of misuse.	Domestic accommodation
MEDIUM DUTY	Adjacent space moderately used primarily by persons with some incentive to exercise care. Some chance of accident occurring and of misuse.	Office accommodation
HEAVY DUTY	Adjacent space frequently used by public and others with little incentive to exercise care. Chances of accident occurring and of misuse.	Public circulation areas Industrial areas
SEVERE DUTY	Adjacent space intensively used by public and others with little incentive to exercise care. Prone to vandalism and Heavy abnormally rough use.	Major circulation areas industrial areas

Movement Control Joint 30 minute fire rating



Movement Control Joint 60 minute fire rating





Application details

Services

Duct walls provide ducts up to 600mm wide for extensive service runs, for example to accommodate plumbing and drainage stacks and concealed cisterns in sanitary installations. They are constructed from either two rows of C Studs, cross braced at 600mm centres with C Studs or I studs with no braces.

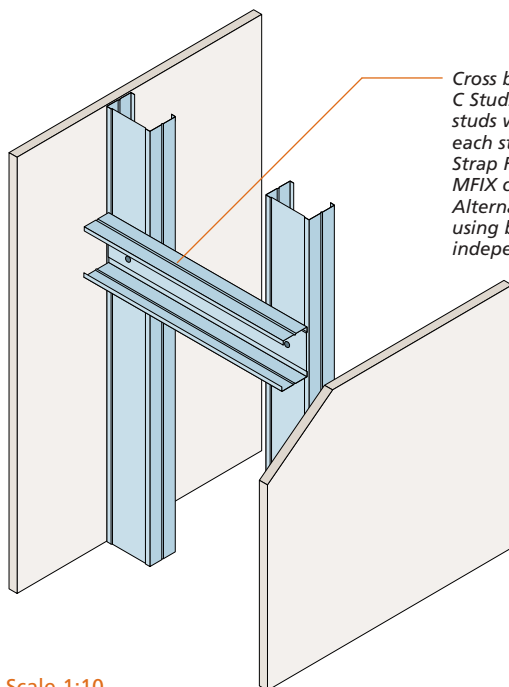
Ducts passing through a partition should be supported independently and should not load the plasterboard lining. Seal around ducts with Lafarge Intumescent Acoustic Sealant.

Removable chevrons in the web of the C Studs allow for easy routing of the services. Positioned 300mm from each end of the C Studs and at 600mm centres, they can be folded down to allow service runs to pass through.

Table 3.13 Sizes of chevrons

Stud size (mm)	Chevron size (mm)
50	25 x 75
60	38 x 100
70	38 x 100
146	38 x 100

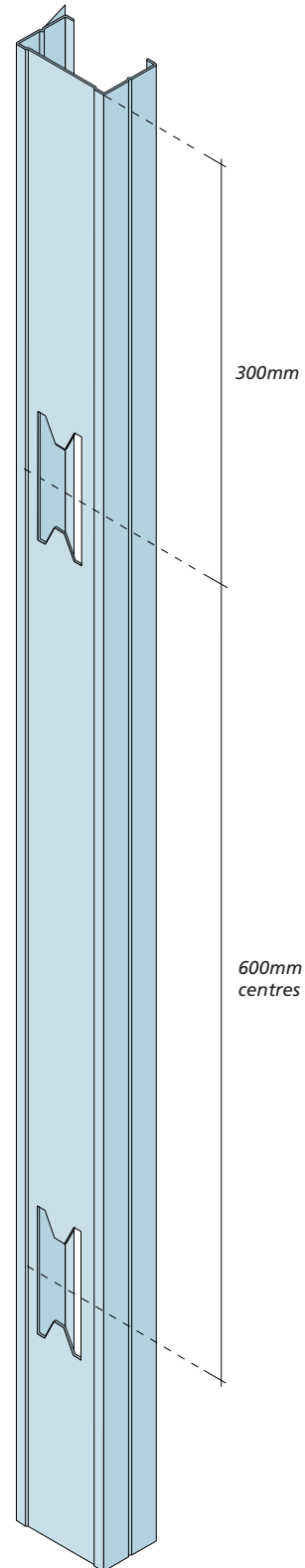
Duct wall to accommodate services

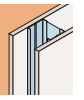


Cross brace formed from section of C Studs, screw fixed to vertical studs with two Pan Head Screws to each stud at 1200mm centres. Flat Strap FS90/W and Fixing Channel MFIX can also be used as spacers. Alternatively, form the duct by using back-to-back Shaftwall or independent I studs.

Scale 1:10

C Stud services chevron fold-out





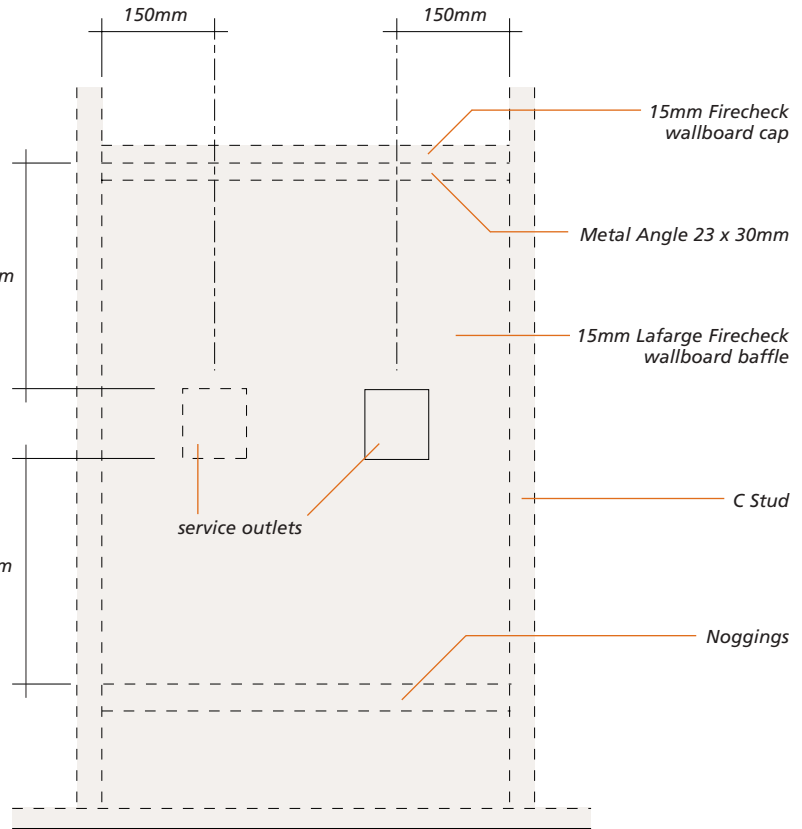
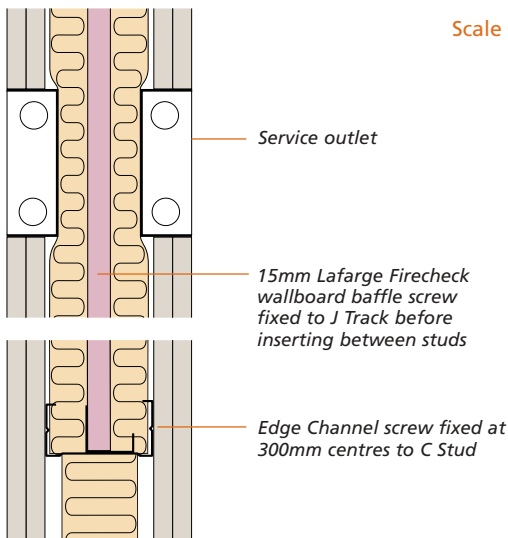
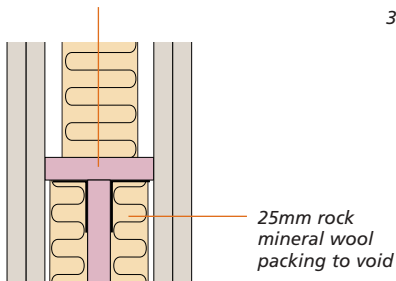
Application details

Service outlets

Service outlets should be offset so that they do not lie back-to-back. Use Fixing Channel or noggings to support outlets as necessary, and seal around them with Lafarge Intumescent Acoustic Sealant. To maintain fire performance, form a baffle with 15mm Lafarge Firecheck wallboard extending at least 300mm above and below the outlets and secured to noggings in the centre of the cavity.

Services outlets (section)

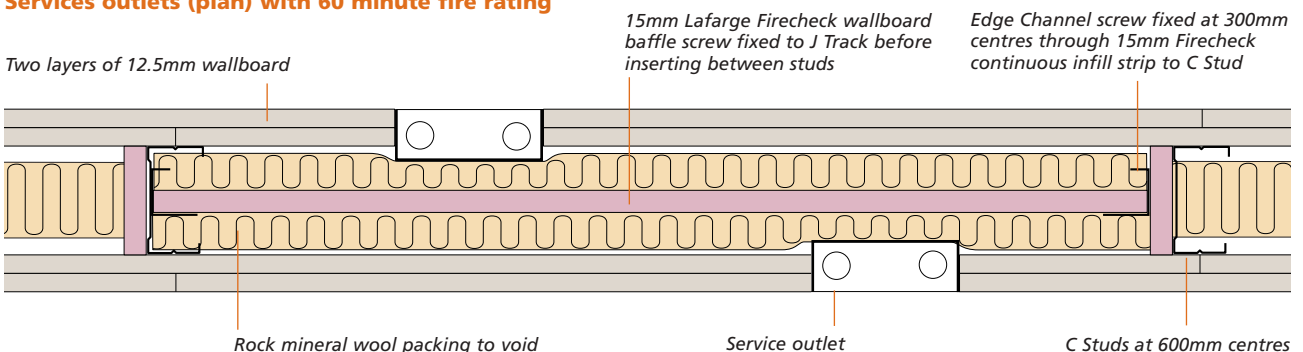
15mm Lafarge Firecheck wallboard cap screw fixed to 23 x 30mm Metal Angles

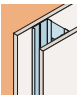


Scale 1:10

Services outlets (plan) with 60 minute fire rating

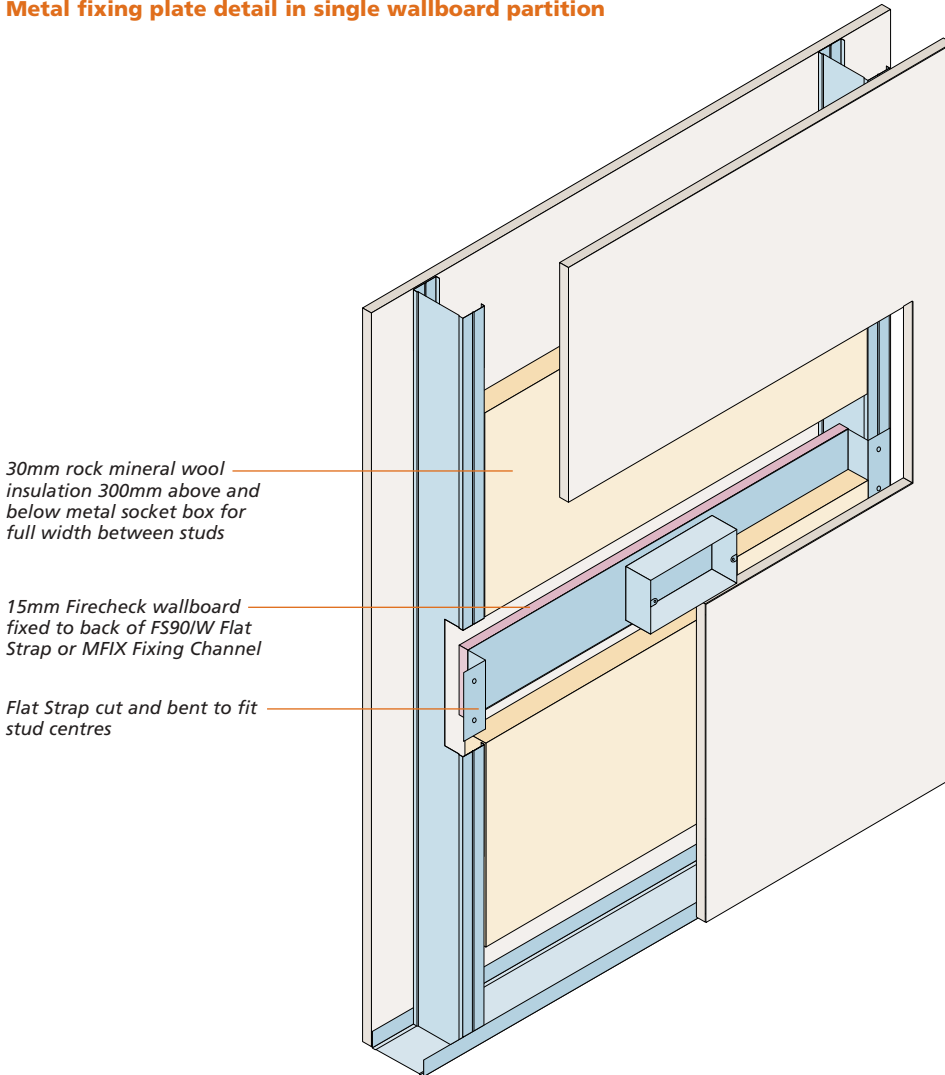
Two layers of 12.5mm wallboard



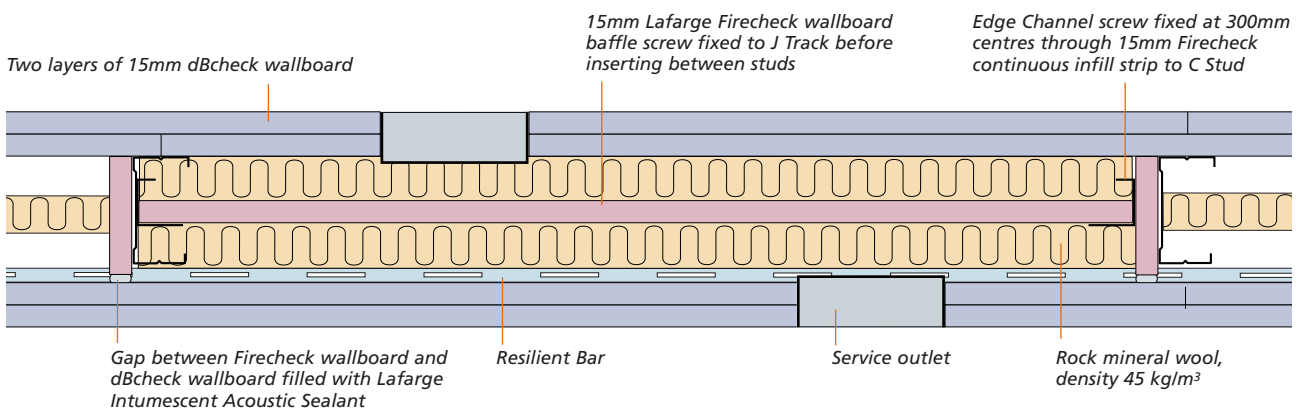


Application details

Metal fixing plate detail in single wallboard partition



Services detail in partition with Resilient Bar





Cormet Resilient Bar

Where the Resilient Bar is to be fixed to timber or metal studs the following centres apply.

For single layer boarding fix Resilient Bar at 400mm centres.

For double layer board fix Resilient Bar at 600mm centres.

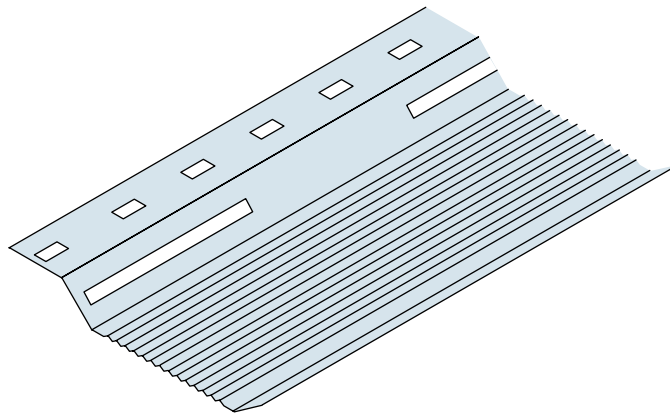
Fix initial Resilient Bar 50mm down from the ceiling, last bar 50mm from floor.

Screw fix the Resilient Bars to the Cormet Studs using 25mm Drywall Self Tapping Screws.

Screw fix the wallboard to the Resilient Bar only, ensuring the screw does not touch the metal substrate.

See table 4.2 on page 174 for screw lengths for fixing plasterboard to Resilient Bars.

Cormet Resilient Bar Ref: RB3000



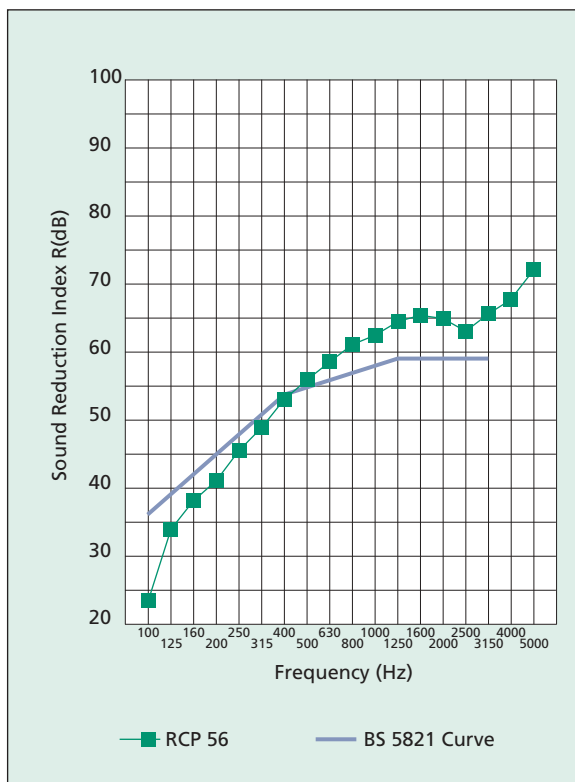
System Description

Studs: 70mm width at 600mm centres

Facings: inner layer Lafarge 19mm Plank fixed with long edges horizontally

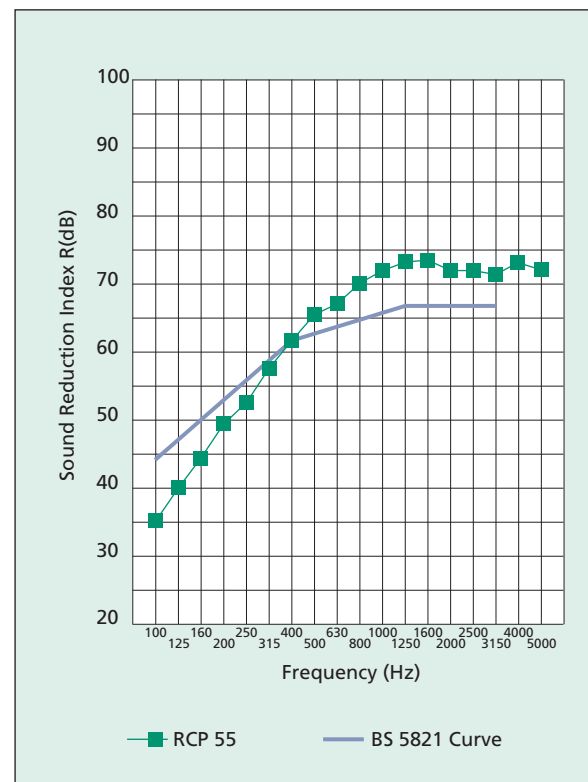
Facings: outer layer 12.5mm Lafarge Standard wallboard each side

Insulation: 50mm glass mineral wool density 16 kg/m³



System reference RCP 56 (without Resilient Bar)

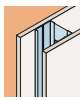
R_w dB 55



System reference RCP 55 (with Resilient Bar)

R_w dB 63

Note superior performance with Resilient Bar



Performance tables

Partitions: Metal Stud

Table 3.14 Cormet Partitions – 50mm C Studs, non-loadbearing

System reference	Specification	Weight (kg/m ²)	Maximum height (m)*	Normal thickness (mm)	Fire resistance (minutes)	Sound insulation (R _v dB)	BS 5234 Grade
RCP 01	Studs: 50mm width at 600mm centres Facings: one layer 12.5mm Lafarge Echeck wallboard both sides	19	2.5	75	30	34	Medium
RCP 02	As RCP 01 with 25mm glass mineral wool insulation density 19.5 kg/m ³	20	2.5	75	30	40	Medium
RCP 11	Studs: 50mm width at 600mm centres, boxed** Facings: one layer 12.5mm Lafarge Echeck wallboard both sides	20	3.0	76	30	33	Medium
RCP 03	Studs: 50mm width at 600mm centres Facings: one layer 12.5mm Lafarge Firecheck wallboard or Megadeco wallboard both sides Insulation: 25mm glass mineral wool density 19.5 kg/m ³	22	2.5	75	60	43	Medium
RCP 04	Studs: 50mm width at 600mm centres Facings: one layer 15mm Lafarge Firecheck wallboard or Megadeco wallboard both sides	25	2.8	80	60	37	Heavy
RCP 13	As RCP 04 with 25mm glass mineral wool density 19.5 kg/m ³	26	2.8	80	60	44	Heavy
RCP 05	Studs: 50mm width at 600mm centres Facings: two layers 12.5mm Lafarge Echeck wallboard both sides	37	3.4	100	60	43	Severe
RCP 06	As RCP 05 with 25mm glass mineral wool insulation density 19.5 kg/m ³	38	3.4	100	60	49	Severe

(continued next page)

* With studs at 400mm centres, maximum height can be increased by 0.30m for single layer boarding and 0.60m for double layer boarding. All maximum heights based on deflection of L/240 at 200 Pa U.D.L. For partitions at 4.2m and above, U Track Deep Flange should be used at the partition head.

** 50mm I Studs ref IS50/R may be used as an alternative

Rock mineral wool density 33kg/m³ may be used in lieu of glass mineral wool as specified.

At the time of publication the exact implications on board weights resulting from changes to Building Regulations Approved Document E for England and Wales are not clear. For this reason systems in this manual that may be specified in dwellings have been illustrated with Lafarge Echeck Wallboard. Echeck Wallboard has a board weight that meets the requirements of the approved document sections 1 and 2. If in doubt contact Technical Enquiryline.



Performance tables

Table 3.14 Cormet Partitions – 50mm C Studs, non-loadbearing (continued)

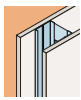
System reference	Specification	Weight (kg/m ²)	Maximum height (m)*	Normal thickness (mm)	Fire resistance (minutes)	Sound insulation (R _v dB) BS 5234 Grade
RCP 07	Studs: 50mm width at 600mm centres, boxed** Facings: two layers 12.5mm Lafarge Echeck wallboard both sides	38	3.7	101	60	44 Severe
RCP 08	As RCP 07 with 25mm glass mineral wool insulation density 19.5 kg/m ³	39	3.7	101	60	48 Severe
RCP 09	Studs: 50mm width at 600mm centres Facings: inner layer 12.5mm Lafarge Echeck wallboard, outer layer 12.5mm Lafarge Firecheck wallboard or Megadeco wallboard both sides	39	3.4	100	90	45 Severe
RCP 10	Studs: 50mm width at 600mm centres Facings: inner layer 12.5mm Lafarge Firecheck wallboard, outer layer 12.5mm Lafarge Firecheck wallboard or Megadeco wallboard both sides	41	3.4	100	120	45 Severe
RCP 16	Studs: 50mm width at 600mm centres Facings: inner layer 12.5mm Lafarge Firecheck wallboard, outer layer 12.5mm Lafarge Firecheck wallboard or Megadeco wallboard both sides Insulation: 25mm glass mineral wool density min. 16 kg/m ³	43	3.6	100	120	52 Severe
RCP 12	Studs: two 50mm studs at 600mm centres, set 40mm apart, braced at 800mm centres with Flat Strap Facings: inner layer 15mm Lafarge Firecheck wallboard, outer layer 15mm Lafarge Firecheck wallboard or Megadeco wallboard both sides	50	4.8	200	180	52 —

* With studs at 400mm centres, maximum height can be increased by 0.30m for single layer boarding and 0.60m for double layer boarding. All maximum heights based on deflection of L/240 at 200 Pa U.D.L.
For partitions at 4.2m and above, U Track Deep Flange should be used at the partition head.

** 50mm I Studs ref IS50/R may be used as an alternative

Rock mineral wool density 33kg/m³ may be used in lieu of glass mineral wool as specified.

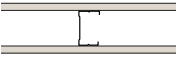
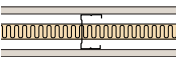
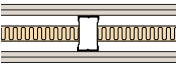
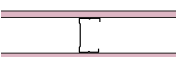
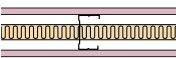
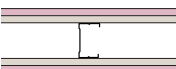
At the time of publication the exact implications on board weights resulting from changes to Building Regulations Approved Document E for England and Wales are not clear. For this reason systems in this manual that may be specified in dwellings have been illustrated with Lafarge Echeck Wallboard. Echeck Wallboard has a board weight that meets the requirements of the approved document sections 1 and 2. If in doubt contact Technical Enquiryline.



Performance tables

Partitions: Metal Stud

Table 3.15 Cormet Partitions – 60mm C Studs, non-loadbearing

System reference	Specification	Weight (kg/m ²)	Maximum height (m)*	Normal thickness (mm)	Fire resistance (minutes)	Sound insulation (R _v dB) BS 5234 Grade
RCP 21 	Studs: 60mm width at 600mm centres Facings: one layer 12.5mm Lafarge Echeck wallboard both sides	19	2.7	85	30	37 Medium
RCP 22 	As RCP21 with 25mm glass mineral wool insulation density 19.5 kg/m ³	20	2.7	85	30	40 Medium
RCP 84 	Studs: 60mm width at 400mm centres boxed* Facings: inner layer 9.5mm Lafarge Standard wallboard, outer layer 9.5mm Lafarge Standard wallboard or Predeco wallboard both sides, with Lafarge Intumescent Acoustic Sealant between boards Insulation: 30mm rock mineral wool insulation density 33 kg/m ³	45	3.6	99	60	46 Severe
RCP 23 	Studs: 60mm width at 600mm centres Facings: one layer 15mm Lafarge Firecheck wallboard or Megadeco wallboard both sides	25	3.0	90	60	38 Heavy
RCP 24 	As RCP 23 with 25mm glass mineral wool insulation density 19.5 kg/m ³	26	3.0	90	60	43 Heavy
RCP 26 	Studs: 60mm width at 600mm centres Facings: inner layer 12.5mm Lafarge Echeck wallboard, outer layer 12.5mm Lafarge Firecheck wallboard or Megadeco wallboard both sides	39	4.2	110	90	46 Severe

(continued next page)

* With studs at 400mm centres, maximum height can be increased by 0.3m for single layer boarding and 0.6m for double layer boarding.

** 60mm I studs ref IS60/B may be used as an alternative.

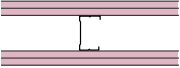
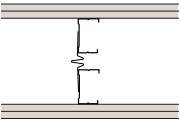
Rock mineral wool density 33kg/m³ may be used in lieu of glass mineral wool as specified.

At the time of publication the exact implications on board weights resulting from changes to Building Regulations Approved Document E for England and Wales are not clear. For this reason systems in this manual that may be specified in dwellings have been illustrated with Lafarge Echeck Wallboard. Echeck Wallboard has a board weight that meets the requirements of the approved document sections 1 and 2. If in doubt contact Technical Enquiryline.



Performance tables

Table 3.15 Cormet Partitions – 60mm C Studs, non-loadbearing (continued)

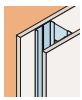
System reference	Specification	Weight (kg/m ²)	Maximum height (m)*	Normal thickness (mm)	Fire resistance (minutes)	Sound insulation (R _v dB) BS 5234 Grade
RCP 25 	Studs: 60mm width at 600mm centres Facings: inner layer 12.5mm Lafarge Firecheck wallboard, outer layer 12.5mm Lafarge Firecheck wallboard or Megadeco wallboard both sides	41	4.2	110	120	46 Severe
RCP 86 	Studs: two 60mm studs at 600mm centres, set 30mm apart, braced at 800mm centres with Cormet V Brace Facings: two layers 12.5mm Lafarge Echeck wallboard both sides	40	4.8	200	60	50 —

* With studs at 400mm centres, maximum height can be increased by 0.3m for single layer boarding and 0.6m for double layer boarding.

** 60mm I studs ref IS60/B may be used as an alternative.

Rock mineral wool density 33kg/m³ may be used in lieu of glass mineral wool as specified.

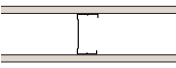
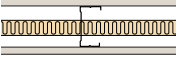
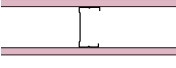
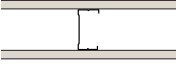
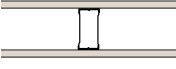
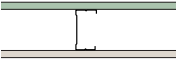
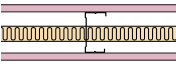
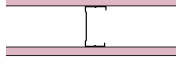
At the time of publication the exact implications on board weights resulting from changes to Building Regulations Approved Document E for England and Wales are not clear. For this reason systems in this manual that may be specified in dwellings have been illustrated with Lafarge Echeck Wallboard. Echeck Wallboard has a board weight that meets the requirements of the approved document sections 1 and 2. If in doubt contact Technical Enquiryline.



Performance tables

Partitions: Metal Stud

Table 3.16 Cormet Partitions – 70mm C Studs, non-loadbearing

System reference	Specification	Weight (kg/m ²)	Maximum height (m)*	Normal thickness (mm)	Fire resistance (minutes)	Sound insulation (R _v dB) BS 5234 Grade
RCP 41 	Studs: 70mm width at 600mm centres Facings: one layer 12.5mm Lafarge Echeck wallboard both sides	19	3.6	95	30	36 Medium
RCP 42 	As RCP 41 with 25mm glass mineral wool insulation density 19.5 kg/m ³	20	3.6	95	30	42 Medium
RCP 58 	Studs: 70mm width at 600mm centres Facings: one layer 12.5mm Lafarge Firecheck wallboard or Megadeco wallboard both sides	23	3.6	95	30	39 Medium
RCP 52 	Studs: 70mm width at 600mm centres Facings: one layer 15mm Lafarge Standard wallboard or Predeco wallboard both sides	23	3.8	100	30	39 Medium
RCP 51 	Studs: 70mm width at 600mm centres, boxed** Facings: one layer 12.5mm Lafarge Echeck wallboard both sides	20	4.1	96	30	35 Medium
RCP 59 	Studs: 70mm width at 400mm centres Facings: one layer 12.5mm Lafarge Moisturecheck wallboard one side, one layer 12.5mm Lafarge Standard wallboard or Predeco wallboard other side	20	3.6	95	30	37 Medium Heavy †
RCP 49 	Studs: 70mm width at 600mm centres Facings: one layer 12.5mm Lafarge Firecheck wallboard or Megadeco wallboard both sides Insulation: 25mm glass mineral wool density 19.5 kg/m ³	22	3.6	95	60	45 Medium Heavy †
RCP 43 	Studs: 70mm width at 600mm centres Facings: one layer 15mm Lafarge Firecheck wallboard or Megadeco wallboard both sides	25	3.8	100	60	39 Heavy Severe †

(continued next page)

† When Megadeco wallboard is used both sides

* With studs at 400mm centres, maximum height can be increased by 0.30m for single layer boarding and 0.60m for double layer boarding. All maximum heights based on deflection of LI240 at 200 Pa U.D.L. For partitions at 4.2m and above, U Track Deep Flange should be used at the partition head.

** 70mm I Studs ref IS70/B may be used as an alternative

Rock mineral wool density 33kg/m³ may be used in lieu of glass mineral wool as specified.

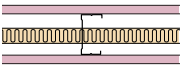


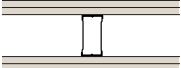
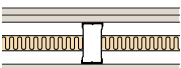
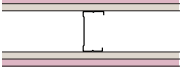
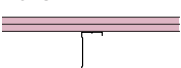
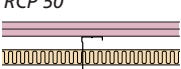
At the time of publication the exact implications on board weights resulting from changes to Building Regulations Approved Document E for England and Wales are not clear. For this reason systems in this manual that may be specified in dwellings have been illustrated with Lafarge Echeck Wallboard. Echeck Wallboard has a board weight that meets the requirements of the approved document sections 1 and 2. If in doubt contact Technical Enquiryline.



Performance tables

Partitions: Metal Stud

Table 3.16 Cormet Partitions – 70mm C Studs, non-loadbearing (continued)

System reference	Specification	Weight (kg/m ²)	Maximum height (m)*	Normal thickness (mm)	Fire resistance (minutes)	Sound insulation (R _v dB) BS 5234 Grade
RCP 44 	As RCP 43 with 25mm glass mineral wool insulation density 19.5 kg/m ³	26	3.8	100	60	47 Heavy Severe †
RCP 45 	Studs: 70mm width at 600mm centres Facings: two layers 12.5mm Lafarge Echeck wallboard both sides	37	4.6	120	60	46 Severe
RCP 46 	As RCP 45 with 25mm glass mineral wool insulation density 19.5 kg/m ³	38	4.6	120	60	49 Severe
RCP 47 	Studs: 70mm width at 600mm centres, boxed** Facings: two layers 12.5mm Lafarge Echeck wallboard both sides	39	4.8	121	60	46 Severe
RCP 48 	As RCP 47 with 25mm glass mineral wool insulation density 19.5 kg/m ³	40	4.8	121	60	49 Severe
RCP 53 	Studs: 70mm width at 600mm centres Facings: inner layer 12.5mm Lafarge Echeck wallboard, outer layer 12.5mm Lafarge Firecheck wallboard or Megadeco wallboard both sides	39	4.6	120	90	46 Severe
RCP 54 	Studs: 70mm width at 600mm centres Facings: inner layer 12.5mm Lafarge Firecheck wallboard, outer layer 12.5mm Lafarge Firecheck wallboard or Megadeco wallboard both sides	41	4.6	120	120	48 Severe
RCP 50 	As RCP 54 with 25mm glass mineral wool insulation density 19.5 kg/m ³	42	4.6	120	120	51 Severe

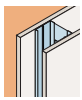
† When Megadeco wallboard is used both sides

* With studs at 400mm centres, maximum height can be increased by 0.30m for single layer boarding and 0.60m for double layer boarding. All maximum heights based on deflection of L/240 at 200 Pa U.D.L. For partitions at 4.2m and above, U Track Deep Flange should be used at the partition head.

** 70mm I Studs ref IS70/B may be used as an alternative

Rock mineral wool density 33kg/m³ may be used in lieu of glass mineral wool as specified.

At the time of publication the exact implications on board weights resulting from changes to Building Regulations Approved Document E for England and Wales are not clear. For this reason systems in this manual that may be specified in dwellings have been illustrated with Lafarge Echeck Wallboard. Echeck Wallboard has a board weight that meets the requirements of the approved document sections 1 and 2. If in doubt contact Technical Enquiryline.



Performance tables

Partitions: Metal Stud

Table 3.17 Cormet Partitions – 90mm C Studs, non-loadbearing

System reference	Specification	Weight (kg/m ²)	Maximum height (m)*	Normal thickness (mm)	Fire resistance (minutes)	Sound insulation (R _v dB)	BS 5234 Grade
RCP 121	Studs: 90mm width at 600mm centres Facings: one layer 12.5mm Lafarge Echeck wallboard both sides	20	3.9	115	30	38	Medium
RCP 122	As RCP 121 with 25mm glass mineral wool insulation density 19.5 kg/m ³	21	3.9	115	30	42	Medium
RCP 123	Studs: 90mm width at 600mm centres Facings: one layer 15mm Lafarge Standard wallboard or Predeco wallboard both sides	24	4.2	120	30	39	Medium
RCP 125	Studs: 90mm width at 600mm centres Facings: one layer 12.5mm Lafarge Firecheck wallboard wallboard both sides Insulation: 25mm glass mineral wool density 19.5 kg/m ³	22	3.9	115	60	43	Medium
RCP 127	Studs: 90mm width at 600mm centres Facings: one layer 15mm Lafarge Firecheck wallboard wallboard both sides	26	4.4	120	60	40	Heavy
RCP 128	As RCP 127 with 25mm glass mineral wool insulation density 19.5 kg/m ³	27	4.4	120	60	47	Heavy
RCP 129	Studs: 90mm width at 600mm centres Facings: two layers 12.5mm Lafarge Echeck wallboard both sides	38	5.2	140	60	47	Severe

(continued next page)

* With studs at 400mm centres, maximum height can be increased by 0.30m for single layer boarding and 0.60m for double layer boarding. All maximum heights based on deflection of L/240 at 200 Pa U.D.L.
For partitions at 4.2m and above, U Track Deep Flange should be used at the partition head.

** 90mm I Studs ref IS90/B may be used as an alternative

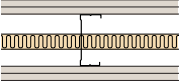
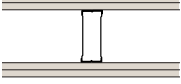
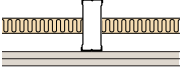
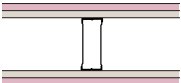
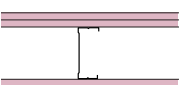
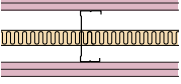
Rock mineral wool density 33kg/m³ may be used in lieu of glass mineral wool as specified.

At the time of publication the exact implications on board weights resulting from changes to Building Regulations Approved Document E for England and Wales are not clear. For this reason systems in this manual that may be specified in dwellings have been illustrated with Lafarge Echeck Wallboard. Echeck Wallboard has a board weight that meets the requirements of the approved document sections 1 and 2. If in doubt contact Technical Enquiryline.



Performance tables

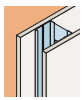
Table 3.17 Cormet Partitions – 90mm C Studs, non-loadbearing (continued)

System reference	Specification	Weight (kg/m ²)	Maximum height (m)*	Normal thickness (mm)	Fire resistance (minutes)	Sound insulation (R _v dB)	BS 5234 Grade
RCP 130 	As RCP 129 with 25mm glass mineral wool insulation density 19.5 kg/m ³	39	5.2	140	60	52	Severe
RCP 131 	Studs: 90mm width at 600mm centres, boxed** Facings: two layers 12.5mm Lafarge Echeck wallboard both sides	40	5.4	141	60	46	Severe
RCP 132 	As RCP 131 with 25mm glass mineral wool insulation density 19.5 kg/m ³	41	5.4	141	60	49	Severe
RCP 133 	Studs: 90mm width at 600mm centres, boxed** Facings: inner layer 12.5mm Lafarge Echeck wallboard, outer layer 12.5mm Lafarge Firecheck wallboard both sides	42	5.4	141	90	47	Severe
RCP 134 	Studs: 90mm width at 600mm centres Facings: inner layer 12.5mm Lafarge Firecheck wallboard, outer layer 12.5mm Lafarge Firecheck wallboard both sides	42	5.2	140	120	49	Severe
RCP 135 	As RCP 134 with 25mm glass mineral wool insulation density 19.5 kg/m ³	43	5.2	140	120	54	Severe

* With studs at 400mm centres, maximum height can be increased by 0.30m for single layer boarding and 0.60m for double layer boarding. All maximum heights based on deflection of L/240 at 200 Pa U.D.L. For partitions at 4.2m and above, U Track Deep Flange should be used at the partition head.

** 90mm I Studs ref IS90/B or 90mm C studs ref CS90/W unboxed may be used as an alternative Rock mineral wool density 33kg/m³ may be used in lieu of glass mineral wool as specified.

At the time of publication the exact implications on board weights resulting from changes to Building Regulations Approved Document E for England and Wales are not clear. For this reason systems in this manual that may be specified in dwellings have been illustrated with Lafarge Echeck Wallboard. Echeck Wallboard has a board weight that meets the requirements of the approved document sections 1 and 2. If in doubt contact Technical Enquiryline.



Performance tables

Partitions: Metal Stud

Table 3.18 Cormet Partitions – 146mm C Studs, non-loadbearing

System reference	Specification	Weight (kg/m ²)	Maximum height (m)*	Normal thickness (mm)	Fire resistance (minutes)	Sound insulation (R _v dB) BS 5234 Grade
RCP 61	Studs: 146mm width at 600mm centres Facings: one layer 12.5mm Lafarge Echeck wallboard both sides	20	6.2	171	30	Medium
RCP 63	Studs: 146mm width at 600mm centres Facings: one layer 12.5mm Lafarge Firecheck wallboard or Megadeco wallboard both sides Insulation: 25mm glass mineral wool density 19.5 kg/m ³	23	6.2	171	60	Medium Heavy †
RCP 62	Studs: 146mm width at 600mm centres Facings: one layer 15mm Lafarge Firecheck wallboard or Megadeco wallboard both sides	26	6.5	176	60	Heavy Severe †
RCP 64	Studs: 146mm width at 600mm centres Facings: two layers 12.5mm Lafarge Echeck wallboard both sides	38	7.6	196	60	Severe
RCP 65	Studs: 146mm width at 600mm centres, boxed in Deep Flange track Facings: two layers 12.5mm Lafarge Echeck wallboard both sides	40	9.2	197	60	Severe
RCP 67	Studs: 146mm width at 600mm centres Facings: two layers 12.5mm Lafarge Echeck wallboard both sides Insulation: 25mm glass mineral wool density 19.5 kg/m ³	39	7.6	196	60	Severe

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† When Megadeco wallboard is used both sides

* With studs at 400mm centres, maximum height can be increased by 0.30m for single layer boarding and 0.60m for double layer boarding. All maximum heights based on deflection of L/240 at 200 Pa U.D.L. For partitions at 4.2m and above, U Track Deep Flange should be used at the partition head.

** As an alternative, CS146/Y studs may be used unboxed

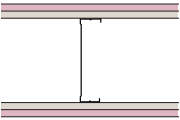
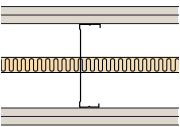
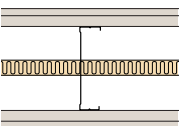
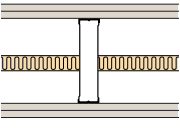
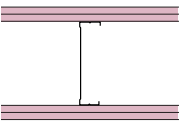
Rock mineral wool density 33kg/m³ may be used in lieu of glass mineral wool as specified.

At the time of publication the exact implications on board weights resulting from changes to Building Regulations Approved Document E for England and Wales are not clear. For this reason systems in this manual that may be specified in dwellings have been illustrated with Lafarge Echeck Wallboard. Echeck Wallboard has a board weight that meets the requirements of the approved document sections 1 and 2. If in doubt contact Technical Enquiryline.



Performance tables

Table 3.18 Cormet Partitions – 146mm C Studs, non-loadbearing (continued)

System reference	Specification	Weight (kg/m ²)	Maximum height (m)*	Normal thickness (mm)	Fire resistance (minutes)	Sound insulation (R _v dB) BS 5234 Grade
RCP 66 	Studs: 146mm width at 600mm centres Facings: inner layer 12.5mm Lafarge Echeck wallboard, outer layer 12.5mm Lafarge Firecheck wallboard or Megadeco wallboard both sides	40	7.6	196	90	50 Severe
RCP 68 	Studs: 146mm width at 600mm centres Facings: inner layer 15mm Lafarge Standard wallboard, outer layer 15mm Lafarge Standard wallboard or Predeco wallboard both sides Insulation: 25mm glass mineral wool density 19.5 kg/m ³	47	8.2	206	90	53 Severe
RCP 69 	Studs: 146mm width at 600mm centres Facings: inner layer 19mm Lafarge Plank with long edges horizontal, outer layer 12.5mm Lafarge Echeck wallboard both sides Insulation: 25mm glass mineral wool density 19.5 kg/m ³	48	7.9	209	90	56 Severe
RCP 70 	Studs: 146mm width at 600mm centres, boxed in Deep Flange track** Facings: two layers 12.5mm Lafarge Echeck wallboard both sides Insulation: 30mm rock mineral wool density 33 kg/m ³	41	9.2	197	60	49 Severe
RCP 71 	Studs: 146mm width at 600mm centres, in Deep Flange track Facings: inner layer 12.5mm Lafarge Firecheck wallboard, outer layer 12.5mm Lafarge Firecheck wallboard or Megadeco wallboard both sides	42	7.6	196	120	50 Severe

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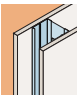
† When Megadeco wallboard is used both sides

* With studs at 400mm centres, maximum height can be increased by 0.30m for single layer boarding and 0.60m for double layer boarding. All maximum heights based on deflection of L/240 at 200 Pa U.D.L.
For partitions at 4.2m and above, U Track Deep Flange should be used at the partition head.

** As an alternative, CS146IY studs may be used unboxed

Rock mineral wool density 33kg/m³ may be used in lieu of glass mineral wool as specified.

At the time of publication the exact implications on board weights resulting from changes to Building Regulations Approved Document E for England and Wales are not clear. For this reason systems in this manual that may be specified in dwellings have been illustrated with Lafarge Echeck Wallboard. Echeck Wallboard has a board weight that meets the requirements of the approved document sections 1 and 2. If in doubt contact Technical Enquiryline.



Performance tables

Table 3.18 Cormet Partitions – 146mm C Studs, non-loadbearing (continued)

System reference	Specification	Weight (kg/m ²)	Maximum height (m)*	Normal thickness (mm)	Fire resistance (minutes)	Sound insulation (R _v dB) BS 5234 Grade
RCP 76	<p>Studs: 146mm width at 600mm centres</p> <p>Facings: inner layer 12.5mm Lafarge Firecheck wallboard, outer layer 12.5mm Lafarge Firecheck wallboard or Megadeco wallboard both sides</p> <p>Insulation: 25mm glass mineral wool density min. 16 kg/m³</p>	45	7.6	196	120	56 Severe
RCP 72	<p>Studs: 146mm width at 600mm centres</p> <p>Facings: inner layer 19mm Lafarge Plank with long edges horizontal, outer layer 12.5mm Lafarge Firecheck wallboard or Megadeco wallboard both sides</p> <p>Insulation: 25mm glass mineral wool density 19.5 kg/m³</p>	50	7.6	209	120	58 Severe
RCP 73	<p>Studs: 146mm width at 600mm centres, boxed in Deep Flange track**</p> <p>Facings: inner layer 19mm Lafarge Plank with long edges horizontal, outer layer 12.5mm Lafarge Firecheck wallboard or Megadeco wallboard both sides</p> <p>Insulation: 25mm glass mineral wool density 19.5 kg/m³</p>	52	9.2	209	120	55 Severe
RCP 74	<p>Studs: 146mm width at 600mm centres, boxed in Deep Flange track**</p> <p>Facings: inner layer 19mm Lafarge Plank with long edges horizontal, outer layer 12.5mm Lafarge Firecheck wallboard or Megadeco wallboard both sides, one side on Resilient Bar at 600mm vertical centres</p> <p>Insulation: 25mm glass mineral wool density 19.5 kg/m³</p>	53	7.2	221	120	60 —

* With studs at 400mm centres, maximum height can be increased by 0.30m for single layer boarding and 0.60m for double layer boarding.

All maximum heights based on deflection of L/240 at 200 Pa U.D.L.

For partitions at 4.2m and above, U Track Deep Flange should be used at the partition head.

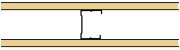

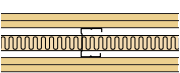


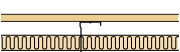

** As an alternative, CS146/Y studs may be used unboxed

Rock mineral wool density 33kg/m³ may be used in lieu of glass mineral wool as specified



Partitions: Metal Stud

Table 3.19 Cormet Toughcheck Partitions

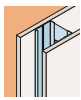
		Weight (kg/m ²)	Maximum height (m)*	Normal thickness (mm)	Fire resistance (minutes)	Sound insulation (R _v dB) BS 5234 Grade
RRP 401	 <p>Studs: 50mm width at 600mm centres Facings: one layer 12.5mm Lafarge Toughcheck wallboard both sides</p>	25	2.5	75	60	39 Heavy
RRP 402	 <p>As RRP 401 with 25mm glass mineral wool insulation density 19.5 kg/m³</p>	26	2.5	75	60	44 Heavy
RRP 51	 <p>Studs: 50mm width at 600mm centres Facings: two layers 12.5mm Lafarge Toughcheck wallboard both sides Insulation: 25mm glass mineral wool density min.16 kg/m³</p>	46	3.6	100	120	55 Severe
RRP 421	 <p>Studs: 60mm width at 600mm centres Facings: one layer 12.5mm Lafarge Toughcheck wallboard both sides</p>	26	2.7	85	60	39 Heavy
RRP 49	 <p>Studs: 70mm width at 600mm centres Facings: one layer 12.5mm Lafarge Toughcheck wallboard both sides</p>	27	3.6	95	60	39 Heavy
RRP 55	 <p>As RRP 49 with 25mm glass mineral wool insulation density 19.5 kg/m³</p>	28	3.6	95	60	47 Heavy
RRP 45	 <p>Studs: 70mm width at 600mm centres Facings: inner layer 12.5mm Lafarge Echeck wallboard, outer layer 12.5mm Lafarge Toughcheck wallboard both sides</p>	48	4.6	120	90	49 Severe

(continued next page)

* With studs at 400mm centres, maximum height can be increased by 0.30m for single layer boarding and 0.60m for double layer boarding. All maximum heights based on deflection of L/240 at 200 Pa U.D.L.
For partitions at 4.2m and above, U Track Deep Flange should be used at the partition head.

Rock mineral wool density 33kg/m³ may be used in lieu of glass mineral wool as specified.

At the time of publication the exact implications on board weights resulting from changes to Building Regulations Approved Document E for England and Wales are not clear. For this reason systems in this manual that may be specified in dwellings have been illustrated with Lafarge Echeck Wallboard. Echeck Wallboard has a board weight that meets the requirements of the approved document sections 1 and 2. If in doubt contact Technical Enquiryline.



Performance tables

Table 3.19 Cormet Toughcheck Partitions (continued)

System reference	Specification	Weight (kg/m ²)	Maximum height (m)*	Normal thickness (mm)	Fire resistance (minutes)	Sound insulation (R _v dB) BS 5234 Grade
RRP 46	As RRP 45 with 25mm glass mineral wool insulation density 19.5 kg/m ³	49	4.6	120	90	54 Severe
RRP 52	Studs: 70mm width at 600mm centres Facings: two layers 12.5mm Lafarge Toughcheck wallboard both sides	47	4.8	120	90	53 Severe
RRP 442	Studs: CS70/B 0.7mm metal thickness, 70mm width at 600mm centres Facings: two layers 12.5mm Lafarge Toughcheck wallboard both sides Insulation: 40mm rock mineral wool density 38 kg/m ³	54	4.8	120	120	53 Severe
RRP 48	As RRP 47 with 25mm glass mineral wool insulation density 19.5 kg/m ³	53	4.8	120	120	52 Severe
RRP 53	Studs: 146mm width at 600mm centres Facings: two layers 12.5mm Lafarge Toughcheck wallboard both sides	56	7.8	196	120	54 Severe
RRP 54	Studs: 146mm width at 600mm centres Facings: two layers 12.5mm Lafarge Toughcheck wallboard both sides Insulation: 25mm glass mineral wool density min.16 kg/m ³	57	7.8	196	120	58 Severe

* With studs at 400mm centres, maximum height can be increased by 0.30m for single layer boarding and 0.60m for double layer boarding.
All maximum heights based on deflection of L/240 at 200 Pa U.D.L.
For partitions at 4.2m and above, U Track Deep Flange should be used at the partition head.
Rock mineral wool density 33kg/m³ may be used in lieu of glass mineral wool as specified.



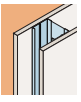
Performance tables

Partitions: Metal Stud

Table 3.20 Cormet Sound Resistant Partitions

System reference	Specification	Weight (kg/m ²)	Maximum height (m)*	Normal thickness (mm)	Fire resistance (minutes)	Sound insulation (R _v dB)	BS 5234 Grade
RSP 01	Studs: 50mm width at 600mm centres Facings: one layer 15mm Lafarge dBcheck wallboard both sides	26	2.8	80	30	40	Heavy
RSP 26	Studs: 50mm width at 600mm centres Facings: one layer 12.5mm Lafarge dBcheck wallboard both sides	22	2.5	75	30	38	Medium
RSP 02	Studs: 50mm width at 600mm centres Facings: one layer 12.5mm Lafarge dBcheck wallboard both sides Insulation: 25mm glass mineral wool density 19.5 kg/m ³	22	2.5	75	30	44	Medium
RSP 03	Studs: 50mm width at 600mm centres Facings: two layers 12.5mm Lafarge dBcheck wallboard both sides	43	3.4	100	60	48	Severe
RSP 04	Studs: 50mm width at 600mm centres Facings: two layers 15mm Lafarge dBcheck wallboard both sides	51	3.7	110	90	48	Severe
RSP 05	Studs: 50mm width at 600mm centres Facings: two layers 15mm Lafarge dBcheck wallboard both sides Insulation: 25mm glass mineral wool density 19.5 kg/m ³	52	3.7	110	90	55	Severe
RSP 27	Studs: 50mm width at 600mm centres Facings: two layers 12.5mm Lafarge dBcheck wallboard both sides Insulation: 25mm glass mineral wool density 19.5 kg/m ³	48	3.4	100	60	54	Severe
RSP 06	Studs: 70mm width at 600mm centres Facings: one layer 12.5mm Lafarge dBcheck wallboard both sides	22	3.6	95	30	40	Medium
RSP 28	Studs: 70mm width at 600mm centres Facings: one layer 12.5mm Lafarge dBcheck wallboard both sides Insulation: 25mm glass mineral wool density 19.5 kg/m ³	23	3.6	95	30	47	Medium

(continued next page)



Performance tables

Partitions: Metal Stud

Table 3.20 Lafarge Sound Resistant Partitions (continued)

System reference	Specification	Weight (kg/m ²)	Maximum height (m)*	Normal thickness (mm)	Fire resistance (minutes)	Sound insulation (R _v dB) BS 5234 Grade
RSP 07	Studs: 70mm width at 600mm centres Facings: one layer 15mm Lafarge dBcheck wallboard both sides	26	3.8	100	30	42 Heavy
RSP 08	Studs: 70mm width at 600mm centres Facings: one layer 15mm Lafarge dBcheck wallboard both sides Insulation: 25mm glass mineral wool density 19.5 kg/m ³	27	3.8	100	30	48 Heavy
RSP 09	Studs: 70mm width at 600mm centres Facings: two layers 12.5mm Lafarge dBcheck wallboard both sides	43	4.6	120	60	52 Severe
RSP 10	Studs: 70mm width at 600mm centres, boxed** Facings: two layers 12.5mm Lafarge dBcheck wallboard both sides	45	5.2	120	60	48 Severe
RSP 11	Studs: 70mm width at 600mm centres Facings: two layers 12.5mm Lafarge dBcheck wallboard both sides Insulation: 25mm glass mineral wool density 19.5 kg/m ³	44	4.6	120	60	56 Severe
RSP 12	Studs: 70mm width at 600mm centres Facings: two layers 15mm Lafarge dBcheck wallboard both sides	51	4.9	130	90	52 Severe
RSP 13	Studs: 70mm width at 600mm centres Facings: two layers 15mm Lafarge dBcheck wallboard both sides Insulation: 25mm glass mineral wool density 19.5 kg/m ³	54	4.9	130	90	57 Severe
RSP 14	Studs: 146mm width at 600mm centres Facings: two layers 12.5mm Lafarge dBcheck wallboard both sides	43	7.6	196	60	53 Severe

(continued next page)

**As an alternative, CS70/Y studs may be used unboxed



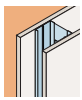
Performance tables

Table 3.20 Lafarge Sound Resistant Partitions (continued)

System reference	Specification	Weight (kg/m ²)	Maximum height (m)*	Normal thickness (mm)	Fire resistance (minutes)	Sound insulation (R _v dB) BS 5234 Grade
RSP 15	<p>Studs: 146mm width at 600mm centres</p> <p>Facings: two layers 12.5mm Lafarge dBcheck wallboard both sides</p> <p>Insulation: 25mm glass mineral wool density 19.5 kg/m³</p>	44	7.6	196	60	Severe
RSP 16	<p>Studs: 146mm width at 600mm centres</p> <p>Facings: two layers 15mm Lafarge dBcheck wallboard both sides</p>	51	7.9	206	90	Severe
RSP 17	<p>Studs: 146mm width at 600mm centres</p> <p>Facings: two layers 15mm Lafarge dBcheck wallboard both sides</p> <p>Insulation: 25mm glass mineral wool density 19.5 kg/m³</p>	52	7.9	206	90	Severe
RSP 18	<p>Studs: 60mm width I Studs at 300mm centres staggered in 72mm U Track</p> <p>Facings: two layers 12.5mm Lafarge dBcheck wallboard both sides</p> <p>Insulation: 25mm glass mineral wool density 19.5 kg/m³</p>	44	3.9	120	60	Severe
RSP 19	<p>Studs: 60mm width I Studs at 300mm centres staggered in 72mm U Track</p> <p>Facings: two layers 15mm Lafarge dBcheck wallboard both sides</p> <p>Insulation: 25mm glass mineral wool density 19.5 kg/m³</p>	53	3.9	130	90	Severe
RSP 20	<p>Studs: 146mm width C Studs at 600mm centres</p> <p>Facings: inner layer 19mm Lafarge Plank fixed with long edges horizontally, outer layer 12.5mm dBcheck wallboard both sides</p> <p>Insulation: 25mm glass mineral wool density 19.5 kg/m³</p>	54	7.0	209	90	Severe

(continued next page)

* With studs at 400mm centres, maximum height can be increased by 0.30m for single layer boarding and 0.60m for double layer boarding.
All maximum heights based on deflection of L/240 at 200 Pa U.D.L.
For partitions at 4.2m and above, U Track Deep Flange should be used at the partition head.
Rock mineral wool density 33kg/m³ may be used in lieu of glass mineral wool as specified



Performance tables

Partitions: Metal Stud

Table 3.20 Lafarge Sound Resistant Partitions (continued)

System reference	Specification	Weight (kg/m ²)	Maximum height (m)*	Normal thickness (mm)	Fire resistance (minutes)	Sound insulation (R _v dB) BS 5234 Grade
RSP 21	<p>Studs: two 50mm C Studs at 600mm centres, braced horizontally every 2.4m with Cormet Flat strap</p> <p>Facings: inner layer 19mm Lafarge Plank fixed with long edges horizontally, outer layer 12.5mm dBcheck wallboard both sides</p> <p>Insulation: 25mm glass mineral wool density 19.5 kg/m³</p>	55	4.2	200	90	64 Severe
RSP 38	<p>Studs: two 50mm C Studs at 600mm centres, braced horizontally every 2.4m with Cormet V Brace</p> <p>Facings: two layers 15mm dBcheck wallboard both sides</p> <p>Insulation: 25mm glass mineral wool density 19.5 kg/m³</p>	55	4.2	200	90	63 Severe
RSP 22	<p>Studs: two 90mm CS90/W C Studs at 600mm centres, braced at every 3m with Cormet V Brace and MFIX Fixing Channel</p> <p>Facings: two layers 12.5mm dBcheck wallboard both sides</p> <p>Insulation: 100mm glass mineral wool density 10.5 kg/m³</p>	47	8.5	300	60	67 Severe
RSP 23	<p>Studs: two 90mm CS90/W C Studs at 600mm centres, braced at every 3m with Cormet V Brace and MFIX Fixing Channel</p> <p>Facings: two layers 15mm dBcheck wallboard both sides</p> <p>Insulation: 100mm glass mineral wool density 10.5 kg/m³</p>	55	9.5	300	90	69 Severe
RSP 24	<p>Studs: two 90mm CS90/W C Studs at 600mm centres, braced at every 3m with Cormet V Brace and MFIX Fixing Channel</p> <p>Facings: inner layer 19mm Lafarge Plank fixed with long edges horizontally, outer layer 12.5mm dBcheck wallboard both sides</p> <p>Insulation: 100mm glass mineral wool density 10.5 kg/m³</p>	58	10.0	300	90	69 Severe

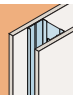
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* With studs at 400mm centres, maximum height can be increased by 0.30m for single layer boarding and 0.60m for double layer boarding.

All maximum heights based on deflection of L/240 at 200 Pa U.D.L.

For partitions at 4.2m and above, U Track Deep Flange should be used at the partition head.

Rock mineral wool density 33kg/m³ may be used in lieu of glass mineral wool as specified



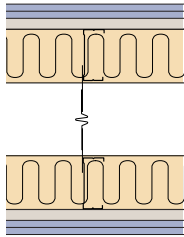
Performance tables

Table 3.20 Lafarge Sound Resistant Partitions (continued)

System reference

Specification

RSP 25

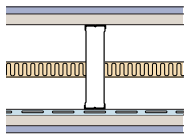


Studs: two 90mm CS90/W C Studs at 600mm centres, braced at every 3m with extended Cormet V Braces and MFIX Fixing Channel

Facings: inner layer 19mm Lafarge Plank fixed with long edges horizontally, middle and outer layers 12.5mm dBcheck wallboard both sides

Insulation: two 100mm glass mineral wool quilts density 10.5 kg/m³

RSP 32

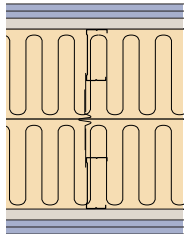


Studs: 146mm width at 600mm centres, boxed in deep flange track**

Facings: inner layer 19mm Lafarge Plank with long edges horizontal, outer layer 12.5mm Lafarge dBcheck wallboard both sides, one side on Resilient Bar at 600mm vertical centres

Insulation: 25mm glass mineral wool density 19.5 kg/m³

RSP 33

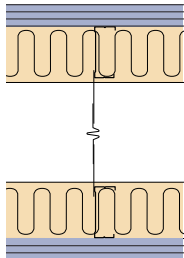


Studs: two 90mm CS90/W C Studs at 600mm centres, in UT92/W tracks set 122mm apart. Braced at 2m centres with extended Cormet V Braces and MFIX Fixing Channel

Facings: inner layer 19mm Lafarge Plank, middle and outer layers 15mm Lafarge dBcheck wallboard both sides

Insulation: two 150mm glass mineral wool quilts density 10.5 kg/m³

RSP 37



Studs: two 90mm CS90/W C Studs at 600mm centres, in UT92/W tracks set 122mm apart. Braced at 2m centres with extended Cormet V Braces and MFIX Fixing Channel

Facings: three layers of 15mm Lafarge dBcheck wallboard both sides

Insulation: two 100mm glass mineral wool quilts density 10.5 kg/m³

Weight (kg/m ²)	Maximum height (m)*	Normal thickness (mm)	Fire resistance (minutes)	Sound insulation (R _v dB)	BS 5234 Grade
79	10.5	400	120	72	Severe
57	7.2	221	90	66	Severe
85	12.0	400	180	73	Severe
82	12.0	450	120	71	Severe

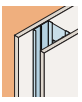
* With studs at 400mm centres, maximum height can be increased by 0.30m for single layer boarding and 0.60m for double layer boarding.

All maximum heights based on deflection of L/240 at 200 Pa U.D.L.

For partitions at 4.2m and above, U Track Deep Flange should be used at the partition head.

** As an alternative, use 146mm C studs, CS146/Y unboxed

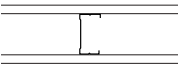
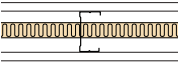
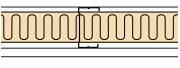
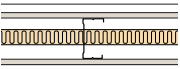
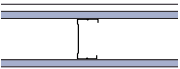
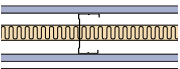
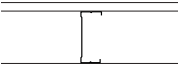
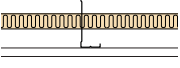
Rock mineral wool density 33kg/m³ may be used in lieu of glass mineral wool as specified



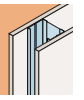
Performance tables

Partitions: Metal Stud

Table 3.21 Cormet Megadeco Partitions

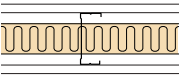
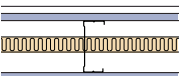
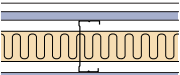
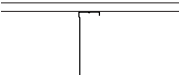
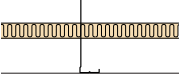
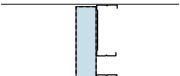
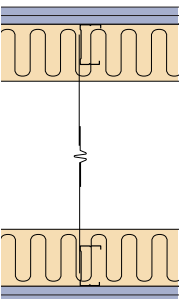
System reference	Specification	Weight (kg/m ²)	Maximum height (m)*	Normal thickness (mm)	Fire resistance (minutes)	Sound insulation (R _v dB) BS 5234 Grade
RMP 01 	Studs: 70mm width at 600mm centres Facings: one layer 15mm Lafarge Megadeco wallboard both sides	28	3.8	100	60	40 Medium
RMP 03 	Studs: 70mm width at 600mm centres Facings: one layer 15mm Lafarge Megadeco wallboard both sides Insulation: 25mm glass mineral wool density 19.5 kg/m ³	29	3.8	100	60	49 Medium
RMP 04 	Studs: 70mm width at 600mm centres Facings: one layer 15mm Lafarge Megadeco wallboard both sides Insulation: 50mm glass mineral wool density 16 kg/m ³	30	3.8	100	60	50 Medium
RMP 50 	Studs: 70mm width at 600mm centres Facings: inner layer 9.5mm Lafarge Standard wallboard, outer layer 15mm Lafarge Megadeco wallboard both sides Insulation: 25mm glass mineral wool density 19.5 kg/m ³	41	4.6	120	90	56 Severe
RMP 09 	Studs: 70mm width at 600mm centres Facings: inner layer 12.5mm Lafarge dBcheck wallboard, outer layer 12.5mm Lafarge Megadeco wallboard both sides	46	4.6	120	90	52 Severe
RMP 11 	Studs: 70mm width at 600mm centres Facings: inner layer 12.5mm Lafarge dBcheck wallboard, outer layer 12.5mm Lafarge Megadeco wallboard both sides Insulation: 25mm glass mineral wool density 19.5 kg/m ³	47	4.6	120	90	56 Severe
RMP 127 	Studs: 90mm width at 600mm centres Facings: one layer 15mm Lafarge Megadeco wallboard both sides	28	4.2	120	60	42 Medium
RMP 128 	Studs: 90mm width at 600mm centres Facings: one layer 15mm Lafarge Megadeco wallboard both sides Insulation: 25mm glass mineral wool density 19.5 kg/m ³	29	4.2	120	60	50 Medium

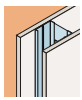
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Performance tables

Table 3.21 Cormet Megadeco Partitions (continued)

System reference	Specification	Weight (kg/m ²)	Maximum height (m)*	Normal thickness (mm)	Fire resistance (minutes)	Sound insulation (R _v dB) BS 5234 Grade
RMP 138 	Studs: 90mm width at 600mm centres Facings: one layer 15mm Lafarge Megadeco wallboard both sides Insulation: 50mm glass mineral wool density 16 kg/m ³	30	4.2	120	60	51 Medium
RMP 130 	Studs: 90mm width at 600mm centres Facings: inner layer 12.5mm Lafarge dBcheck wallboard, outer layer 12.5mm Lafarge Megadeco wallboard both sides Insulation: 25mm glass mineral wool density 19.5 kg/m ³	45	4.8	140	90	57 Severe
RMP 140 	Studs: 90mm width at 600mm centres Facings: inner layer 15mm Lafarge dBcheck wallboard, outer layer 15mm Lafarge Megadeco wallboard both sides Insulation: 50mm glass mineral wool density 16 kg/m ³	46	5.0	150	60	58 Medium
RMP 62 	Studs: 146mm width at 600mm centres Facings: one layer 15mm Lafarge Megadeco wallboard both sides	38	6.5	176	60	42 Severe
RMP 75 	Studs: 146mm width at 600mm centres Facings: one layer 15mm Lafarge Megadeco wallboard both sides Insulation: 25mm glass mineral wool density 19.5 kg/m ³	39	6.5	176	60	52 Severe
RMP 85 	Studs: two 90mm studs at 600mm centres, set 40mm apart, braced at 1200mm centres with UT90/R U Track Facings: one layer 15mm Lafarge Megadeco wallboard both sides Insulation: 50mm glass mineral wool density 16 kg/m ³	33	7.0	250	60	55 Severe
RMP 37 	Studs: two 70mm Y studs at 600mm centres, set 320mm apart, braced at 1200mm centres with Cormet V Brace Facings: two inner layers 15mm Lafarge dBcheck wallboard, outer layer 15mm Lafarge Megadeco wallboard both sides Insulation: two layers 100mm glass mineral wool density 10.5 kg/m ³	85	14.0	550	120	67 Severe



Specification clauses

Cormet Metal Stud Partitions

Scope

Metal stud partitions and separating walls within commercial buildings where maximum height may exceed board lengths and/or where fire and acoustic performance may be required.

Additional clauses

- Add general clauses if required for:
- Expansion/movement joints
- Health and safety
- Storage of Materials
- Site conditions and workmanship

Key

- Recommended**
Apply this clause in all situations.
- Either/or**
Apply either this clause or the other depending on requirement/preference.
- If required**
Apply this clause only if required.
- * Choice of product.

Lafarge Plasterboard recommend the use of detailed specification clauses as shown.

Selection of the appropriate system and subsequent specification clause is made easier by the use of Lafarge SELECT 2 at www.lafargeplasterboard.co.uk.

Alternatively, Cormet Metal Stud Partitions can be incorporated into the N.B.S.(National Building Specification) work schedule K31 Plasterboard fixed partitions/inner walls/linings. See www.lafargeplasterboard.co.uk/nbssearch/index.asp

For further details please contact our Technical Enquiryline 01275 377789.

- Cormet Metal Stud Partition system reference**
*RCP.....*RRP.....*RSP.....*RMP.....
Partition nominal thickness mm Partition height mm
- Location**
- Damp proof course**
To be installed under full width of partition.
Type By
- Timber sole plate**
Treated softwood sole plate width mm x 38mm deep fixed to substrate at maximum 600mm centres, where specified, using suitable proprietary fixings.
- Metal framing components**
Framing components to be hot dipped galvanised steel to BS EN 10143: 1993 and BS EN 10142: 1990 and Amendment A1: 1995 designated DX51D and Z275 NAO. Sections rolled to BS 2994: 1987. C Studs and Tracks also rolled to BS 7364: 1990.
- Studs**
Cormet C Studs reference, metal thickness mm, width mm at maximum mm centres, installed into U Tracks.
 Staggered from side to side held in place using ISC10 Clips.
- Floor and head tracks**
Cormet U Tracks reference U....., metal thickness mm, width mm fixed at maximum 600mm centres to substrate using suitable propriety fixings. *Fix 2/no. tracks, set mm apart. Stud and tracks to BS 7364 : 1990.
- Cross bracing**
Brace C Studs using Cormet Fixing Channel MFIX fixed with Wafer Head Screws 14 WHSD25 at mm centres.
- Support to horizontal joints**
Cormet Fixing Channel, MFIX, fixed to faces of stud to coincide with horizontal joints in (*outer layers of) boards. Fix with Wafer head screws 14 WHSD25 or use Cormet Fixing Strap F550/R fixed between inner and outer layers of board, to coincide with horizontal joints in outer layer of board.
- Insulation**
Type.....by.....Thickness mm Density..... kg/m³
Insulation Hold
Cormet Insulation Hold Strip to be screw fixed horizontally 150mm down from head and at subsequent 1200mm vertical centres.
- Acoustic Sealant**
Apply a 6mm continuous bead of Lafarge Intumescent Acoustic Sealant around the perimeter of the framing.
- Resilient Bars**
Cormet RB3638 Resilient Bars fixed horizontally to one side of framing studs at mm centres.
- Boarding**
 - Facings: *One/*two/*inner layer(s) Lafarge.....wallboard to BS 1230: Part 1: 1985, thickness mm to both sides of framework.
 - Facings: Outer layer Lafarge.....wallboard to BS 1230: Part1: 1985, thickness mm to both sides of framework. All board joints to be staggered between layers.
- Fixings**
Lafarge Grabber Drywall Screws at 300mm centres, Type: *Self Tapping, *Robust, *Checkpoint, *Self Drilling
Length mm for inner layer of board
Length mm for outer layer of board*
- Finishing**
 - Lafarge Taping and Jointing System
 - Lafarge Supreme Skim Plaster
- Finished partition tolerances**
Finished system to comply with tolerances in BS 8212: 1995 section 3.3.
- Materials and Installation**
All materials unless otherwise indicated shall be supplied by Lafarge Plasterboard Ltd, and shall be installed in accordance with their current literature and in accordance with BS 8212: 1995.

See tables 3.14 to 3.21 for partition thickness.

Required on new concrete slabs and screed. Must be full width of partition.

May be required where floor is uneven. Must be same width as metal U Track.

See table 3.11 for stud and track references.

Staggered Stud systems only.

*For twin frame partitions only. Delete as appropriate.

For twin frame partitions only. See tables 3.16 to 3.21 for centres.

Required where partition height exceeds board lengths*. For double layer partitions fixing channel needs to coincide with outer layer only. Delete as appropriate.

See tables 3.14 to 3.21 for types of insulation.

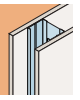
Required to meet the sound insulation values as shown in tables 3.14 to 3.21.

For system RCP74.

See tables 3.14 to 3.21 for board types and layers.

See table 8.2 for screw lengths.

See Section 7 for full specification.



Installation



1

Step one

From a fixed point mark out the line of partition. Fix U Track to timber or concrete floor along the setting out line of the partition at 600mm centres using suitable fixings.

If applying the U Tracks direct to new concrete which has not completely dried out, a damp proofing membrane should be used. On uneven floors a timber sole plate may be required.



4

Step four

Place ceiling U Track onto end wall C Stud. Using a C Stud and spirit level, plumb opposite end of ceiling U Track with floor U Track and screw-fix into position at 600mm centres.

Fix remaining end wall C Stud.



2

Step two

Cut U Track (and C Studs) to length as necessary using Lafarge tin snips.

C Studs to be cut 5mm shorter than floor to ceiling height.



5

Step five

Mark floor and ceiling at centres as specified below for the location of intermediate C Studs:

At max. 400mm centres for 9.5mm plasterboard or 600mm centres for 12.5 mm plasterboard. Arrange the framing so that plasterboard widths of less than 300mm are avoided.

See step 9 for installation of intermediate studs.



3

Step three

Install a C Stud, using a spirit level to plumb on end wall; screw fix at 600mm centres using suitable fixings.

Note: Fix opposite end wall C Stud only after ceiling U Track has been installed.



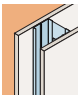
6

Step six

Use extra C Studs at openings, corners, T junctions and stop ends as shown in details. These extra studs must be fixed to head and floor U Tracks with Lafarge Wafer Head Self Tapping Screws or crimping tool.

Note: The door frame background metal construction details shown above, form one of three possible alternatives.

3



Installation



7

Step seven

Form the door header by using a piece of U Track. The length should be equal to the width of the door frame plus a minimum of 300mm in order to allow 150mm at each end to be cut and folded down.



10

Step ten

Form as required, one of the following alternative timber background constructions for fixing door frames:

(a) Fix a 38mm x 38mm timber insert into back of door frame C Studs and header. Secure using Lafarge Drywall High Thread Screws through face of C Stud into the timber.

(b) Fix a timber subframe to the face of the door frame C Studs and header using Lafarge Drywall Self Tapping Screws.



8

Step eight

Secure header onto C Studs using a crimping tool or Lafarge Wafer Head Self Tapping Screws.

This detail applies to all door frame assembly alternatives. See step 5.



11

Step eleven

Install door frame into position and secure by screwing through the door frame into one of the alternative background constructions above using Lafarge Drywall High Thread Screws. Ensure that the screws penetrate each of the components forming the background constructions.



9

Step nine

Install all intermediate C Studs.

Cut C Studs 5mm shorter than the floor to ceiling height to allow for floor variations. Insert the C Studs into the U Tracks and twist to lock. The intermediate C Studs should all face the same way. They should not be fixed to U Tracks in order to allow for adjustment when fixing plasterboards.



12

Step twelve

Install plasterboard to one side of the partition. Cut plasterboard 5mm to 8mm shorter than the floor-to-ceiling height, butt firmly against the ceiling and fix with Lafarge Drywall Self-Tapping Screws at 300mm centres.

Note: Use Toughcheck Drywall Screws for Toughcheck Partitions and Checkpoint Self Tapping Screws for Sound Resistant Partitions.