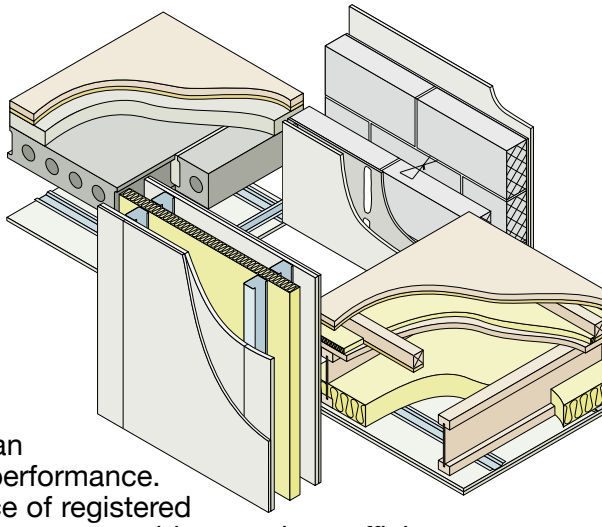
July 2024 Update Pack



Dear Colleague,

Thank you for downloading this July 2024 update.

The bedrock of the robustdetails® scheme is the confidence we can have in the Details that they will provide the required acoustic performance. This is made possible by continually monitoring the performance of registered Details on site. However, some Details have such low use that we are not able to gather sufficient test data to give that confidence. Therefore, these low-use Details have had to be withdrawn from the Handbook and can no longer be selected for registrations. Alternative compatible patterns have been recommended on each Detail cover sheet.

A new cavity masonry wall type has been approved and added to the Handbook. This uses aircrete blocks and gypsum board finish, and the min.100mm cavity is filled with Superglass Superwhite 34 blown glass mineral wool.

And finally, a new floating floor treatment has been added within Appendix A3. This is the JCW Soundboard One Platform Floor Board system, and can be used as an alternative to FFT1 and FFT2 on the timber and light steel separating floors.

Please update your September 2023, 4th Edition Handbook as follows:

1. Remove and replace **all pages** of the Introduction.
2. Remove and replace **page 5/6** of E-WM-23, E-WM-27 and E-WM-33.
3. Add new E-WM-35 to the end of **Separating Walls, Masonry**.
4. Remove **all pages** of E-WT-3 and E-WT-4, and replace with **new cover sheets**.
5. Remove and replace **page 5/6** of E-FT-1.
6. Remove **all pages** of E-FT-2 and replace with **new cover sheet**.
7. Remove and replace **page 1/2** of E-FT-3.
8. Remove **all pages** of E-FT-4 and replace with **new cover sheet**.
9. Remove and replace **page 1/2** of E-FT-6.
10. Remove **all pages** of E-FT-7 and E-FT-8, and replace with **new cover sheets**.
11. Remove and replace **page 5/6** of E-FS-2.
12. Remove and replace **page 1/2** of Appendix A1.
13. Remove and replace **pages 1/2, 5/6 and 9/10** of Appendix A2.
14. Remove and replace **pages 1/2** of Appendix A3.
15. Add the new **page 5** to Appendix A3.

Yours sincerely

John Thompson

Chief Executive,
Robust Details Limited

Changes to the fourth edition following July 2024 update

Section	Page	Amendment
Introduction		
Special note for N.I.	2	E-WT-4 and E-FT-2 removed.
Table 1	3	New wall types added: Aircrete with Superglass Superwhite 34 insulation.
Table 1	4	E-WT-3 and E-WT-4 removed.
Table 2	5	E-FT-3 reference to Prestoplan PresWeb removed.
		E-FT-2, E-FT-4, E-FT-7 and E-FT-8 removed
Table 3a	6	E-WM-22 moved to lightweight aggregate section.
		E-WM-35 added.
Table 3b	7	E-FT-2, E-FT-4, E-FT-7, E-FT-8, E-WT-3 and E-WT-4 removed.
Table 4	8	E-WM-35 added.
		E-WT-3 and E-WT-4 removed.
Table 5	8	E-FT-2, E-FT-4, E-FT-7 and E-FT-8 removed.
Table 6a	9	E-WM-35 added with allowable combinations.
		E-WT-3 and E-WT-4 removed.
Table 6a	10	Prestoplan PresPeak 60 removed.
Table 6b	11	E-FT-2, E-FT-4, E-FT-7 and E-FT-8 removed.
Table 7	12	British Gypsum GypFloor removed.
		JCW Soundboard One added.
		E-FT-2, E-FT-4, E-FT-7 and E-FT-8 removed.
Separating Wall – Masonry		
E-WM-23		
Contact details	6	Superglass contact details updated.
E-WM-27		
Contact details	6	Superglass contact details updated.
E-WM-33		
Contact details	6	Superglass contact details updated.
E-WM-35		
All	All	New wall type added: Aircrete with Superglass Superwhite 34 insulation.
Separating Wall – Timber		
E-WT-3		
All	All	Robust Detail removed due to low use.
E-WT-4		
All	All	Robust Detail removed due to low use.

Section	Page	Amendment
Separating Floor – Timber		
E-FT-1		
Floating Floor	5	JCW Soundboard One added as an option to FFT1 and FFT2.
E-FT-2		
All	All	Robust Detail removed due to low use.
E-FT-3		
Joist type	1	Prestoplan PresWeb removed from list in the Important box.
	7	JCW Soundboard One added as an option to FFT1 and FFT2.
E-FT-4		
All	All	Robust Detail removed due to low use.
E-FT-6		
Joist type	1	Prestoplan PresWeb removed from list in the Important box.
E-FT-7		
All	All	Robust Detail removed due to low use.
E-FT-8		
All	All	Robust Detail removed due to low use.
Separating Floor – Steel		
E-FS-2		
Floating Floor	5	JCW Soundboard One added as an option to FFT1.
Appendix A1		
Movement joints.	2	80mm wide closed-cell polyethylene filler strip added as alternative filler option.
Appendix A2		
Contents	1	Prestoplan PresPeak 60 spandrel panel removed.
Prestoplan PresPeak 60	5	Detail removed, and note added to explain system is no longer in production.
NTSROOF	10	Revised descriptions to items a, e and f. Item k reference removed.
Appendix A3		
Contents	1	JCW Soundboard One added.
British Gypsum GypFloor SB	2	Detail removed, and note added to explain system is no longer in production.
JCW Soundboard One	5	New floating floor option added for timber and light steel frame separating floors.

Introduction

This Handbook contains the separating wall and separating floor constructions that have achieved the status of Robust Details for Part E of the Building Regulations (England and Wales) and Part G of the Building Regulations (Northern Ireland), “Resistance to the passage of sound”.

The Robust Details have undergone an extensive sound insulation testing regime, robust design analysis and independent audit and have satisfied the Robust Details Limited Management Board that they should provide a level of sound insulation compliant with Part E (England and Wales) and Part G (Northern Ireland).

The use of the robustdetails® scheme provides an alternative to pre-completion testing for demonstrating compliance with the performance standards for new build dwellings. Every dwelling built using the robustdetails® scheme needs to be registered with Robust Details Limited and a plot registration fee paid. Further information on the scheme (including how to apply for new Robust Details) is available on the Robust Details Limited web site at:

www.robustdetails.com

or from:

Robust Details Limited
Unit 14, Shenley Pavilions
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Each Robust Detail includes materials and construction details for the separating wall/floor and its key interfaces with other elements and should be read in conjunction with Appendix A. The final page of each Robust Detail is a checklist, which should be photocopied and used by the site manager/supervisor to confirm that the separating wall/floor has been built correctly. The building control body may ask to see the checklist.

It is important that separating walls/floors and their associated junctions and flanking conditions are constructed entirely in accordance with the relevant Robust Detail; otherwise the building control body may require pre-completion testing to be carried out.

The tables on pages 5, 6 and 7 show which robustdetails® separating floors and walls can be used in flats/apartments.

Note:

The contents of this Handbook relate only to compliance with specific aspects of Part E (England and Wales) and Part G (Northern Ireland). Building work will also have to comply with all other relevant legislation and Parts of the Building Regulations.

Where sound testing is required on a wall or floor, the user should seek expert acoustic advice prior to construction commencing.

Terms and Conditions:

Please refer to www.robustdetails.com for full terms and conditions.

Introduction

Special note for Robust Details constructed in Northern Ireland

Members of an expert panel convened to advise NI Government on the subject, consider that the following Robust Details will integrate most readily with NI standards and methods of construction.

Other Robust Details may be suitable for use in NI, however, it is recommended that Building Control be consulted to ensure full compatibility with other NI Regulations and Standards.

Masonry walls	**E-WM-1**
	E-WM-2
	E-WM-3
	E-WM-4
	E-WM-11
	E-WM-16
	E-WM-18
	E-WM-19
	E-WM-21

Timber walls	**E-WT-1**
	E-WT-2

Timber floors	**E-FT-1**
	E-FT-3
	E-FT-5
	E-FT-6

Steel floors	**E-FS-1**

Concrete floors	**E-FC-1**
	E-FC-2
	E-FC-4
	E-FC-5
	E-FC-6
	E-FC-8
	E-FC-9
	E-FC-10
	E-FC-11
	E-FC-12
	E-FC-13
	E-FC-14

Note:

Refer to Tables 3a, 3b and 3c in the Introduction for valid combinations of the Robust Details walls and floors.

Introduction

List of Robust Details

Table 1 – Separating walls

E-WM-1	masonry – dense aggregate blockwork (wet plaster)
E-WM-2	masonry – lightweight aggregate blockwork (wet plaster)
E-WM-3	masonry – dense aggregate blockwork (render and gypsum-based board)
E-WM-4	masonry – lightweight aggregate blockwork (render and gypsum-based board)
E-WM-5	masonry – Besblock "Star Performer" cellular blockwork (render and gypsum-based board)
E-WM-6	masonry – aircrete blockwork (render and gypsum-based board)
E-WM-7	Suspended from further registrations
E-WM-8	Suspended from further registrations
E-WM-9	masonry – solid dense aggregate blockwork (render and gypsum-based board)
E-WM-10	masonry – aircrete thin joint blockwork with specified wall ties (render and gypsum-based board finish)
E-WM-11	masonry – lightweight aggregate blockwork (render and gypsum-based board) 100mm minimum cavity
E-WM-12	masonry – Plasmor "Aglite Ultima" lightweight aggregate blockwork (render and gypsum-based board)
E-WM-13	masonry – aircrete thin joint - untied blockwork (render and gypsum-based board)
E-WM-14	Suspended from further registrations
E-WM-15	Suspended from further registrations
E-WM-16	masonry – dense aggregate blockwork (render and gypsum-based board) with 100mm minimum cavity
E-WM-17	masonry – lightweight aggregate blockwork Saint Gobain-Isover RD Party Wall Roll (gypsum-based board)
E-WM-18	masonry – dense aggregate blockwork (wet plaster) with 100mm minimum cavity
E-WM-19	masonry – dense or lightweight aggregate blockwork (render and gypsum-based board) with 100mm minimum cavity and MONARFLOOR® BRIDGESTOP® system
E-WM-20	masonry – lightweight aggregate blockwork Saint Gobain – Isover RD Party Wall Roll (gypsum-based board) with 100mm minimum cavity
E-WM-21	masonry – lightweight aggregate blockwork (wet plaster) with 100mm minimum cavity
E-WM-22	masonry – lightweight aggregate blockwork – Knauf Earthwool Masonry Party Wall Slab or Superglass Party Wall Roll or URSA Cavity Batt 35 or URSA PARTY WALL ROLL (gypsum-based board) with 100mm minimum cavity
E-WM-23	masonry – aircrete blockwork Superglass Party Wall Roll (gypsum-based board) 100mm min cavity
E-WM-24	masonry – aircrete blockwork Saint Gobain – Isover RD Party Wall Roll (gypsum-based board) with 100mm minimum cavity
E-WM-25	masonry – Porotherm clay blockwork (Ecoparge and gypsum-based board) with 100mm minimum insulated cavity
E-WM-26	masonry – Besblock "Star Performer" cellular blockwork (gypsum-based board) with 100mm minimum insulated cavity
E-WM-27	masonry – lightweight aggregate blockwork Superglass Party Wall Roll (gypsum-based board) with minimum 75mm cavity
E-WM-28	masonry – lightweight aggregate blockwork Knauf Supafil® Party Wall (gypsum-based board) with minimum 100mm cavity
E-WM-29	masonry – Porotherm clay blockwork (Ecoparge and gypsum-based board) with 75mm minimum insulated cavity
E-WM-30	masonry – aircrete blockwork Knauf Supafil® Party Wall (gypsum-based board) with 100mm min cavity
E-WM-31	masonry – H+H – Celcon Vertical Wall Panels (gypsum-based board) with 100mm minimum insulated cavity
E-WM-32	masonry – lightweight aggregate blockwork Knauf Earthwool Masonry Party Wall Slab (gypsum-based board) with minimum 75mm cavity
E-WM-33	masonry – lightweight aggregate blockwork Superglass Superwhite 34 (gypsum-based board) with 100mm minimum cavity
E-WM-34	masonry – Plasmor "Aglite Ultima' lightweight aggregate blockwork (gypsum-based board) with full-fill cavity insulation
E-WM-35	masonry – aircrete blockwork Superglass Superwhite 34 (gypsum-based board) with 100mm minimum cavity

See over for timber and steel frame walls

List of Robust Details

Table 1 (continued) – Separating walls

E-WT-1	timber frame – without sheathing board
E-WT-2	timber frame – with sheathing board
E-WT-3	Suspended from further registrations
E-WT-4	Suspended from further registrations
E-WS-1	steel frame – twin metal frame
E-WS-2	steel frame – British Gypsum Gypwall QUIET IWL
E-WS-3	steel frame – modular steel frame housing
E-WS-4	steel frame – twin metal frame - 250mm between linings
E-WS-5	steel frame – twin metal frame
E-WS-6	steel frame – modular steel frame volumetric housing

Introduction

List of Robust Details

Table 2 – Separating floors

E-FC-1	precast concrete plank with directly applied screed and floating floor treatment
E-FC-2	in-situ concrete slab and floating floor treatment
E-FC-3	Suspended from further registrations
E-FC-4	precast concrete plank and Thermal Economics IsoRubber Base system and floating screed
E-FC-5	precast concrete plank and Cellecta Yelo*fon* HD10+ system and floating screed
E-FC-6	beam and block with concrete topping Regupol E48 system and floating screed
E-FC-7	beam and block with concrete topping and floating floor treatment
E-FC-8	precast concrete plank with floating screed and bonded resilient floor covering
E-FC-9	precast concrete plank with directly applied screed and Thermal Economics IsoRubber top bonded resilient floor covering
E-FC-10	in-situ concrete slab with Thermal Economics IsoRubber top bonded resilient floor covering
E-FC-11	precast concrete plank and Icopal-MONARFLOOR® Tranquilt and floating screed
E-FC-12	precast concrete plank and Thermal Economics IsoRubber Base HP3 system and floating screed
E-FC-13	precast concrete plank and InstaCoustic InstaLay 65 system and floating screed
E-FC-14	precast concrete plank and Thermal Economics IsoRubber Base system and floating screed
E-FC-15	precast concrete plank and Regupol Quietlay layer and floating screed
E-FC-16	precast concrete plank with directly applied screed and Thermal Economics IsoRubber CC3 bonded resilient floor covering
E-FC-17	precast concrete plank and Cellecta YELO*fon*® HD10+ system and floating screed and Cellecta ULTRA ceiling treatment
E-FC-18	in-situ concrete slab with floating screed or bonded resilient floor covering
E-FC-19	precast concrete plank and Cellecta RUBBER*fon* Impact 6 system and floating screed
E-FT-1	timber I-joists and floating floor treatment
E-FT-2	Suspended from further registrations
E-FT-3	MiTek Posi-Joist, WOLF easi-joist, ITW Gang-Nail Ecojoist or ITW Alpine SpaceJoist metal web timber joist and floating floor treatment
E-FT-4	Suspended from further registrations
E-FT-5	Cellecta ScreedBoard® 28 system on timber I-joists
E-FT-6	Cellecta ScreedBoard® 28 system on metal web joists
E-FT-7	Suspended from further registrations
E-FT-8	Suspended from further registrations
E-FS-1	steel deck and in-situ concrete and floating floor treatment
E-FS-2	UltraBEAM metal joists and floating floor treatment
E-FS-3	Cellecta ScreedBoard® 28 system on metal joists

Table 3a – Combinations of Robust Details separating walls and floors for flats/apartments in **loadbearing masonry** constructions

Separating walls		Separating floors					
		E-FC-1 E-FC-11 E-FC-12 E-FC-13 E-FC-14	E-FC-15 E-FC-16 E-FC-17 E-FC-19	E-FC-4	E-FC-5	E-FC-6 E-FC-7	E-FC-8 E-FC-9 E-FC-10
E-WM-1 E-WM-3	E-WM-16 E-WM-18	✔		✔	✔	✔	✔
E-WM-2 E-WM-4 E-WM-5 E-WM-11 E-WM-20 E-WM-21	E-WM-22 E-WM-26 E-WM-27 E-WM-28 E-WM-32 E-WM-33	✔		✔	✔	F	✔
E-WM-6 E-WM-10 E-WM-13 E-WM-35	E-WM-23 E-WM-24 E-WM-30	F		✔	✔ see note 1	F	✔
E-WM-12	E-WM-34	F		✔	F	F	F
E-WM-17		✔ see note 2		✔	✔ see note 2	F	✔ see note 2
E-WM-25	E-WM-29	F		F	F	F	F

Key

F Only the separating floor requires pre-completion sound testing.

1 Where this combination is selected, 200mm (min) thick precast concrete planks and ceiling treatment CT5 must be used.

2 This combination can only be selected where the separating wall construction does not include Plasmor Aglite Ultima blocks (1050 kg/m³).

Combining robustdetails® loadbearing masonry walls and floors with robustdetails® lightweight framed separating walls

Upper storeys of blocks of flats may be constructed using lightweight steel or timber frame, where the lower storeys are loadbearing masonry.

The lightweight separating walls built directly off the uppermost concrete separating floors may be registered as Robust Details provided:

- the lightweight walls are in vertical alignment with the masonry walls below, such that they can follow the principles of the ground floor junction shown for the relevant robustdetails® separating wall;
- the external (flanking) wall construction above the separating floor meets the requirements on page 2 of the relevant robustdetails® separating wall, and has 2 layers of gypsum-based board;
- the junction between the bottom rail (or sole plate) is well sealed;
- all other relevant requirements in the Handbook are strictly followed.

The separating floor may be registered as a Robust Detail provided:

- the floor is constructed in accordance with the requirements of the published Detail;
- the external (flanking) wall below the precast concrete floor satisfies the requirements of detail 1 on page 2 of the relevant robustdetails® separating floor;
- all other relevant requirements in the Handbook are strictly followed.

Table 3b – Combinations of Robust Details separating walls and floors for flats/apartments in **timber frame** constructions

Separating walls	Separating floors	
	E-FT-1 E-FT-3 E-FT-5 E-FT-6	E-FC-2
E-WT-1	✔	W see note 1
E-WT-2	✔	W see note 1

Table 3c – Combinations of Robust Details separating walls and floors for flats/apartments in **reinforced concrete** and **steel frame** constructions

Separating walls	Separating floors					
	E-FC-2	E-FC-10	E-FC-18	E-FS-1	E-FS-2	E-FS-3
E-WS-1	W see note 1	W	W see note 1	W see note 1	✔	✔
E-WS-2	✔	W	✔ see note 2	W	W	W
E-WS-3	W	W	W	W	W	W
E-WS-4	W see note 1	W	W see note 1	W see note 1	✔	✔
E-WS-5	✔	✔	✔	W	W	W

Key for Table 3b and Table 3c

F Only the separating floor requires pre-completion sound testing.

W Only the separating wall requires pre-completion sound testing.

1 Lightweight steel and timber frame walls may be constructed above in-situ poured concrete floors. The lightweight walls built directly off the concrete floors may be registered as Robust Details provided:

- they meet all other requirements of the Robust Detail, including flanking constructions;
- the principles of the raft foundation junction are followed. As such, the concrete of the floor must have a mass of 365 kg/m^2 (min), and a floating floor treatment must be provided to shield the base of the wall, as shown in the Separating Wall junction in the floor Robust Detail;
- Walls constructed to the soffit of in-situ poured concrete floors cannot be registered as Robust Details and may be subject to pre-completion sound testing.

2 A floating screed must be installed up to the separating wall as shown in the separating floor detail.

See also notes relating to Combining loadbearing masonry and lightweight framed separating walls included under Table 3a.

Table 4 – Combining Robust Details separating walls with non-Robust Details separating floors in flats/apartments

Loadbearing masonry

E-WM-1	F1	E-WM-22	F1
E-WM-2	F1	E-WM-23	F1
E-WM-3	F1	E-WM-24	F1
E-WM-4	F1	E-WM-25	F1
E-WM-5	F1	E-WM-26	F1
E-WM-6	F1	E-WM-27	F1
E-WM-10	F1	E-WM-28	F1
E-WM-11	F1	E-WM-29	F1
E-WM-12	F1	E-WM-30	F1
E-WM-13	F1	E-WM-31	F1
E-WM-16	F1	E-WM-32	F1
E-WM-17	F1	E-WM-33	F1
E-WM-18	F1	E-WM-34	F1
E-WM-20	F1	E-WM-35	F1
E-WM-21	F1		

Timber frame

E-WT-1	F2
E-WT-2	F2

Light steel frame

E-WS-1	F3
E-WS-2	F4
E-WS-3	F3
E-WS-4	F3
E-WS-5	F4

Key

F1 Only the separating floor requires pre-completion testing provided the floor does not bridge the separating wall cavity. Otherwise both the wall and floor need testing.

F2 Only the separating floor requires pre-completion testing provided the floor is timber-based and does not bridge the separating wall cavity. Otherwise both the wall and floor need testing.

F3 Only the separating floor requires pre-completion testing provided the wall is being used in a lightweight steel frame flat/apartment and the floor does not bridge the separating wall cavity. Otherwise both the wall and floor need testing.

F4 Only the separating floor requires pre-completion testing provided the wall is being used in a concrete frame building and the floor has the required floor treatment (see notes under Table 3c). Otherwise both the wall and floor need testing.

Table 5 – Combining Robust Details separating floors with non-Robust Details separating walls in flats/apartments

Loadbearing masonry

E-FC-1	W1	E-FC-11	W1
E-FC-4	W2	E-FC-12	W1
E-FC-5	W2	E-FC-13	W1
E-FC-6	W1	E-FC-14	W1
E-FC-7	W1	E-FC-15	W1
E-FC-8	W2	E-FC-16	W1
E-FC-9	W2	E-FC-17	W1
E-FC-10	W2	E-FC-19	W1

Timber frame

E-FT-1	W3
E-FT-3	W3
E-FT-5	W3
E-FT-6	W3

RC frame

E-FC-2	W4
E-FC-10	W4
E-FC-18	W4

Light steel frame

E-FS-1	W4
E-FS-2	W5
E-FS-3	W5

Key

W1 Only the separating wall requires pre-completion testing provided the wall is constructed using aggregate blocks specified for the inner leaf in the floor Robust Detail. Otherwise both the floor and wall need testing.

W2 Only the separating wall requires pre-completion testing provided the wall is constructed using blocks specified for the inner leaf in the floor Robust Detail. Otherwise both the floor and wall need testing.

W3 Only the separating wall requires pre-completion testing if used with timber frame supporting walls and twin leaf timber frame separating walls. Otherwise both the floor and wall need testing.

W4 Only the separating wall requires pre-completion testing provided the external wall meets the specification given in the separating floor Robust Detail. Otherwise both the floor and wall need testing.

W5 Only the separating wall requires pre-completion testing if used with steel frame supporting walls and twin leaf steel frame separating walls. Otherwise both the floor and wall need testing.

For any construction that requires a separating element to be tested, the user should seek expert acoustic advice on the design and potential acoustic performance.

Table 6a – Robust Detail separating walls which can be used together with the specific flanking constructions contained in Appendix A2

		BRIDGESTOP® system	Smartroof system	Wall Cap RDA2	RoofSpace I-Roof	Space4 system	Donaldson Timber Single Leaf Spandrel	**NTS**ROOF *RAPID FIT SYSTEM*	Nu-Span Spantherm
Masonry walls	E-WM-1	✔		✔		✔		✔	✔
	E-WM-2	✔		✔		✔		✔	✔
	E-WM-3	✔	✔	✔	✔	✔		✔	✔
	E-WM-4	✔	✔	✔	✔	✔		✔	✔
	E-WM-5	✔	✔	✔	✔	✔		✔	✔
	E-WM-6		✔	✔	✔				✔
	E-WM-9								
	E-WM-10		✔	✔	✔				✔
	E-WM-11	✔	✔	✔	✔	✔		✔	✔
	E-WM-12	✔	✔	✔	✔	✔		✔	✔
	E-WM-13		✔	✔	✔				✔
	E-WM-16	✔	✔	✔	✔	✔		✔	✔
	E-WM-17	✔	✔	✔	✔	✔		✔	✔
	E-WM-18	✔		✔		✔		✔	✔
	E-WM-19	✔ see note 1				✔		✔	
	E-WM-20	✔	✔	✔	✔	✔		✔	✔
	E-WM-21	✔		✔		✔		✔	✔
	E-WM-22	✔	✔	✔	✔	✔		✔	✔
	E-WM-23	✔ see note 1	✔	✔	✔				✔
	E-WM-24	✔ see note 1	✔	✔	✔				✔
	E-WM-25			✔					✔
	E-WM-26	✔	✔	✔	✔	✔		✔	✔
	E-WM-27	✔	✔	✔	✔	✔		✔	✔
	E-WM-28	✔	✔	✔	✔	✔		✔	✔
	E-WM-29			✔					✔
	E-WM-30	✔ see note 1	✔	✔	✔				✔
	E-WM-31		✔	✔	✔				✔
	E-WM-32	✔	✔	✔	✔	✔		✔	✔
	E-WM-33	✔	✔	✔	✔	✔		✔	✔
	E-WM-34	✔	✔	✔	✔	✔		✔	✔
	E-WM-35	✔ see note 1	✔	✔	✔				✔

Key

1 When constructing these walls off raft foundations, the raft must have insitu concrete with 150mm minimum thickness.

See over for timber and steel frame walls

Table 6a (continued) – Robust Detail separating walls which can be used together with the specific flanking constructions contained in Appendix A2

		Smartroof system	Kingspan TEK	Wall Cap RDA2	RoofSpace I-Roof	Space4 system	Donaldson Timber Single Leaf Spandrel	**NTS**ROOF *RAPID FIT SYSTEM*	Lightweight external cladding systems	Nu-Span Spantherm
Timber walls	E-WT-1	✔	✔	✔	✔		✔	✔	✔	✔
	E-WT-2	✔	✔	✔	✔	✔	✔	✔	✔	✔
Steel walls	E-WS-1				✔					✔
	E-WS-2									
	E-WS-3									
	E-WS-4			✔						✔
	E-WS-5									

Table 6b – Robust Detail separating floors which can be used together with the specific flanking constructions contained in Appendix A2

		BRIDGESTOP® system	Kingspan TEK	Wall Cap RDA2	Private stairs
Concrete floors	E-FC-1			✔	
	E-FC-2				
	E-FC-4			✔	✔
	E-FC-5			✔	✔
	E-FC-6			✔	
	E-FC-7			✔	
	E-FC-8			✔	✔
	E-FC-9			✔	
	E-FC-10			✔ see note 1	
	E-FC-11			✔	✔
	E-FC-12			✔	✔
	E-FC-13			✔	✔
	E-FC-14			✔	✔
	E-FC-15			✔	✔
	E-FC-16			✔	
	E-FC-17			✔	✔
	E-FC-18				
	E-FC-19			✔	✔
Timber floors	E-FT-1			✔	
	E-FT-3			✔	
	E-FT-5			✔	
	E-FT-6			✔	
Steel-concrete and steel floors	E-FS-1				
	E-FS-2			✔	
	E-FS-3			✔	

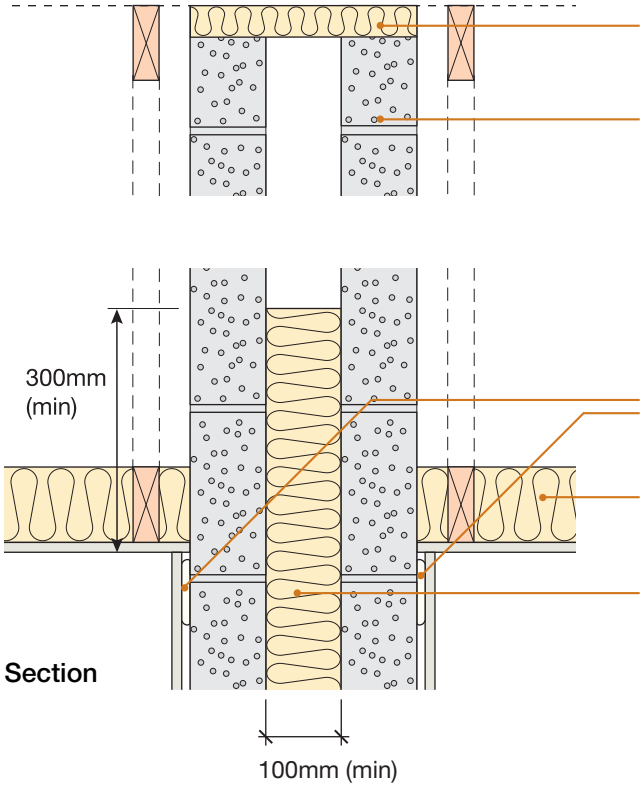
Key

1 Applies only to loadbearing masonry constructions.

Table 7 – Robust Detail separating floors which can be used together with alternative products contained in Appendix A3

		Insumate insulation tray	Cellecta HiDECK Structural	JCW Soundboard One
Concrete floors	E-FC-1			
	E-FC-2			
	E-FC-4			
	E-FC-5			
	E-FC-6			
	E-FC-7			
	E-FC-8			
	E-FC-9			
	E-FC-10			
	E-FC-11			
	E-FC-12			
	E-FC-13			
	E-FC-14			
	E-FC-15			
	E-FC-16			
	E-FC-17			
	E-FC-18			
	E-FC-19			
Timber floors	E-FT-1	✔	✔	✔
	E-FT-3	✔	✔	✔
	E-FT-5			
	E-FT-6			
Steel-concrete and steel floors	E-FS-1			
	E-FS-2		✔	✔
	E-FS-3			

7. Roof junction – pitched roof without room-in-roof



Junction between separating wall and roof filled with flexible closer

Cavity masonry separating wall continuous to underside of roof. Alternatively use spandrel panel – see Appendix A

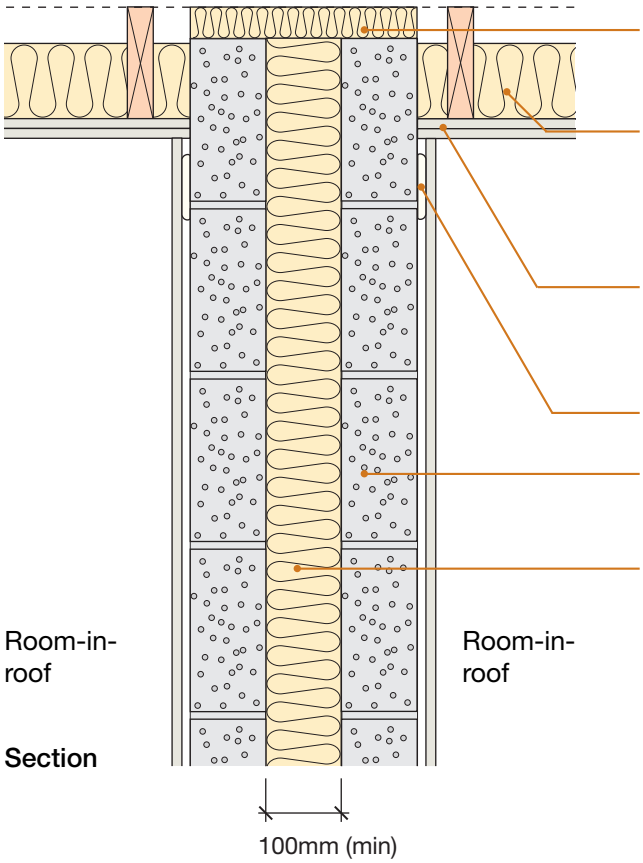
External wall cavity closed at eaves level with a suitable flexible material (e.g. mineral wool). If a rigid material is used, then it should only be bonded to one leaf

Continuous horizontal ribbon of adhesive

100mm (min) mineral wool insulation – 10 kg/m³ (min)

100mm Superglass Party Wall Rolls (no gaps to remain)

8. Roof junction – pitched roof with room-in-roof



Junction between separating wall and roof filled with flexible closer

100mm (min) mineral wool insulation minimum density 10 kg/m³ or 60mm (min) foil faced PUR or PIR insulation, minimum density 30 kg/m³ (See Appendix A)

2 layers of nominal 8 kg/m² gypsum-based board. Where used rigid insulation may be placed between and/or directly beneath rafters

Continuous horizontal ribbon of adhesive

Cavity masonry separating wall continuous to underside of roof covering

100mm Superglass Party Wall Rolls (no gaps to remain)

External wall cavity closed at eaves level with a suitable flexible material (e.g. mineral wool). If a rigid material is used, then it should only be bonded to one leaf

CHECKLIST (to be completed by site manager/supervisor)

Company:

Site:

Plot: Site manager/supervisor:

Ref.	Item	Yes (✔)	No (✔)	Inspected (initials & date)
1.	Is separating wall cavity at least 100mm?			
2.	Is external (flanking) wall cavity at least 50mm?			
3.	Is external (flanking) wall inner leaf aircrete (450 to 800 kg/m^3)?			
4.	Are separating wall blocks aircrete (600 to 800 kg/m^3)?			
5.	Is cavity free from droppings and debris?			
6.	Are separating wall ties to Approved Document E “Tie type A” (see Appendix A)? For thin joint, are wall ties Ancon Staifix HRT4 or Clan PWT4 installed at no more than 2.5 ties per square metre?			
7.	Are cavity stops installed where specified in the Robust Detail?			
8.	Are joints fully filled?			
9.	Is 100mm Superglass Party Wall Roll used?			
10.	Are insulation rolls tightly butted together?			
11.	Are voids around floor joists, chases, etc. fully filled/sealed?			
12.	Where there is a separating floor (e.g. flats/apartments) has the resilient flanking strip been installed?			
13.	Are all junctions of wall and ceiling boards sealed with tape or caulked with sealant?			
14.	Is separating wall satisfactorily complete?			

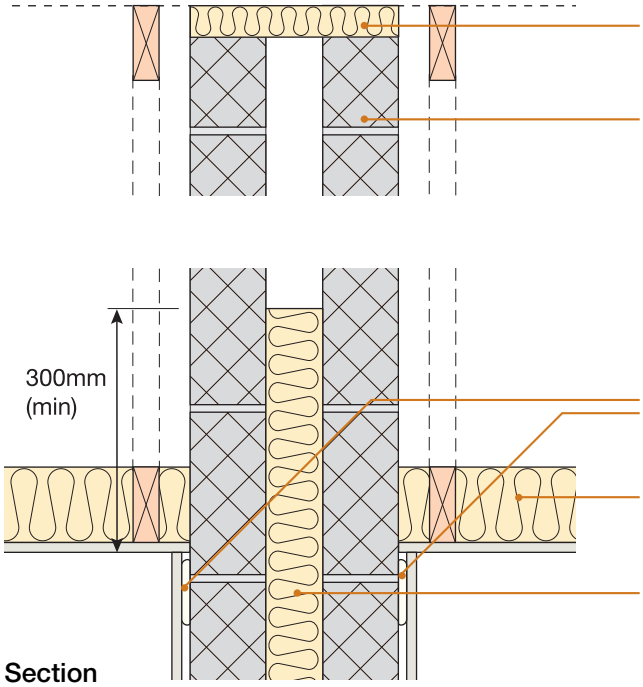
Contact details for technical assistance from Superglass, manufacturer of the Party Wall Roll:

Telephone: 0808 1645 134 **E-mail:** technical.stirling@etexgroup.com

Notes (include details of any corrective action)

Site manager/supervisor signature . . . . . .

7. Roof junction – pitched roof without room-in-roof



Section

Junction between separating wall and roof filled with flexible closer

Cavity masonry separating wall continuous to underside of roof. Alternatively use spandrel panel – see Appendix A

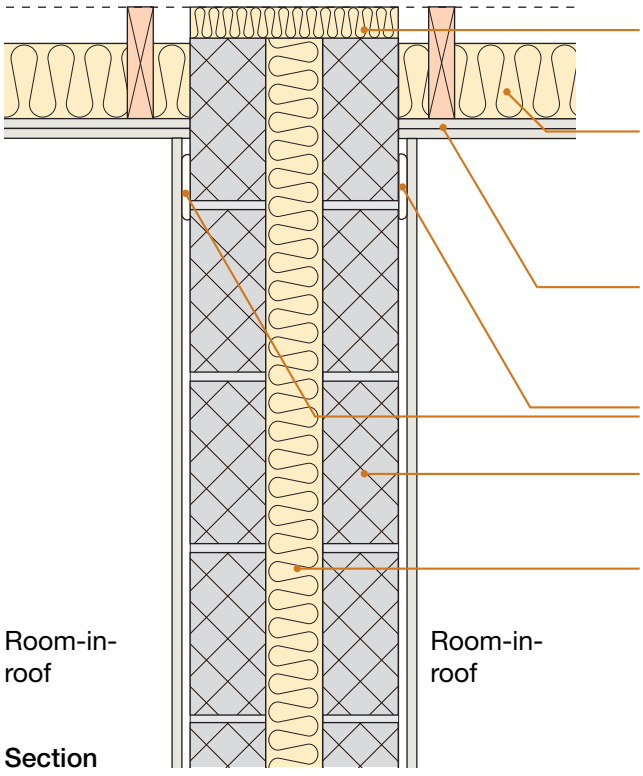
External wall cavity closed at eaves level with a suitable flexible material (e.g. mineral wool). If a rigid material is used, then it should only be bonded to one leaf

Continuous horizontal ribbon of adhesive

100mm (min) mineral wool insulation – 10 kg/m³ (min)

Superglass Party Wall Roll (no gaps to remain)

8. Roof junction – pitched roof with room-in-roof



Section

Junction between separating wall and roof filled with flexible closer

100mm (min) mineral wool insulation minimum density 10 kg/m³ or 60mm (min) foil faced PUR or PIR insulation, minimum density 30 kg/m³ (See Appendix A)

2 layers of nominal 8 kg/m² gypsum-based board. Where used rigid insulation may be placed between and/or directly beneath rafters

Continuous horizontal ribbon of adhesive

Cavity masonry separating wall continuous to underside of roof covering

Superglass Party Wall Roll (no gaps to remain)

External wall cavity closed at eaves level with a suitable flexible material (e.g. mineral wool). If a rigid material is used, then it should only be bonded to one leaf

CHECKLIST (to be completed by site manager/supervisor)

Company:

Site:

Plot: Site manager/supervisor:

Ref.	Item	Yes (✔)	No (✔)	Inspected (initials & date)
1.	Is separating wall cavity at least 75mm?			
2.	Is external (flanking) wall cavity at least 50mm?			
3.	Are separating wall blocks lightweight aggregate (1350 to 1600 kg/m^3)?			
4.	Is cavity free from droppings and debris?			
5.	Are separating wall ties to Approved Document E “Tie type A” (see Appendix A)?			
6.	Are cavity stops installed where specified in the Robust Detail?			
7.	Are joints fully filled?			
8.	Is Superglass Party Wall Roll used?			
9.	Are insulation rolls tightly butted together?			
10.	Are voids around floor joists, chases, etc. fully filled/sealed?			
11.	Where there is a separating floor (e.g. flats/apartments) has the resilient flanking strip been installed?			
12.	Are all junctions of wall and ceiling boards sealed with tape or caulked with sealant?			
13.	Is separating wall satisfactorily complete?			

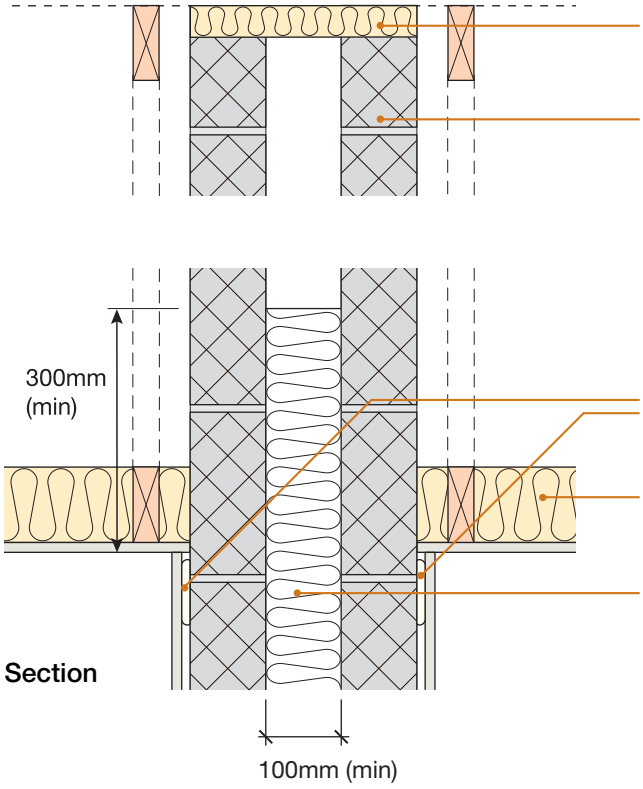
Contact details for technical assistance from Superglass, manufacturer of the Party Wall Roll:

Telephone: 0808 1645 134 **E-mail:** technical.stirling@etexgroup.com

Notes (include details of any corrective action)

Site manager/supervisor signature . . . . . .

7. Roof junction – pitched roof without room-in-roof



Junction between separating wall and roof filled with flexible closer

Cavity masonry separating wall continuous to underside of roof. Alternatively use spandrel panel – see Appendix A

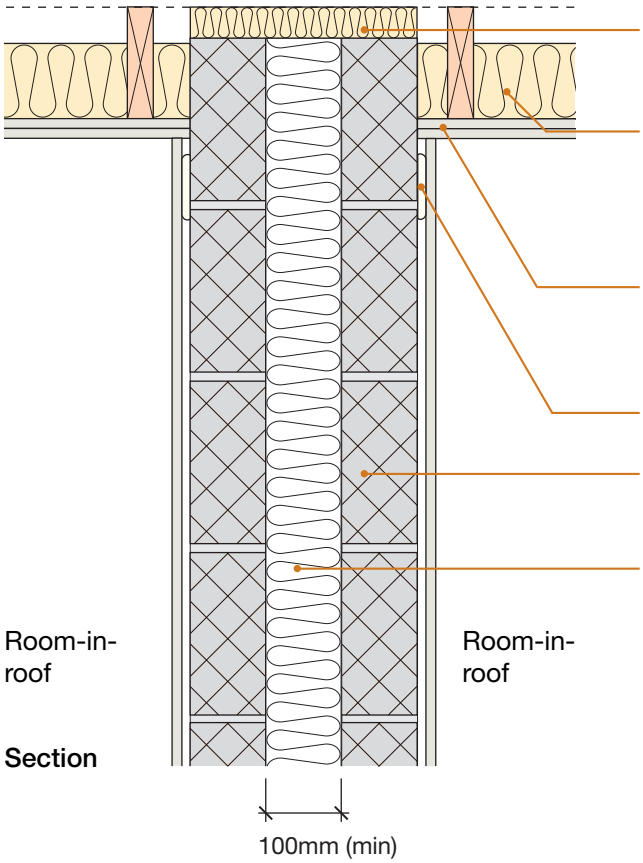
External wall cavity closed at eaves level with a suitable flexible material (e.g. mineral wool). If a rigid material is used, then it should only be bonded to one leaf

Continuous horizontal ribbon of adhesive

100mm (min) mineral wool insulation – 10 kg/m³ (min)

Superglass Superwhite 34

8. Roof junction – pitched roof with room-in-roof



Junction between separating wall and roof filled with flexible closer

100mm (min) mineral wool insulation minimum density 10 kg/m³ or 60mm (min) foil faced PUR or PIR insulation, minimum density 30 kg/m³ (See Appendix A)

2 layers of nominal 8 kg/m² gypsum-based board. Where used rigid insulation may be placed between and/or directly beneath rafters

Continuous horizontal ribbon of adhesive

Cavity masonry separating wall continuous to underside of roof covering

Superglass Superwhite 34

External wall cavity closed at eaves level with a suitable flexible material (e.g. mineral wool). If a rigid material is used, then it should only be bonded to one leaf

CHECKLIST (to be completed by site manager/supervisor)

Company:

Site:

Plot: Site manager/supervisor:

Ref.	Item	Yes (✔)	No (✔)	Inspected (initials & date)
1.	Is separating wall cavity at least 100mm?			
2.	Is external (flanking) wall cavity at least 50mm?			
3.	Are separating wall blocks lightweight aggregate (1350 to 1600 kg/m^3)?			
4.	Is cavity free from droppings and debris?			
5.	Are separating wall ties to Approved Document E “Tie type A” (see Appendix A)?			
6.	Are cavity stops installed where specified in the Robust Detail?			
7.	Are joints fully filled?			
8.	Is Superglass Superwhite 34 installed to a maximum density of 28.75 kg/m^3, and was it by an approved installer?			
9.	Are all injection holes drilled through the mortar joints, and made good by fully filling with mortar?			
10.	Are voids around floor joists, chases, etc. fully filled/sealed?			
11.	Where there is a separating floor (e.g. flats/apartments) has the resilient flanking strip been installed?			
12.	Are all junctions of wall and ceiling boards sealed with tape or caulked with sealant?			
13.	Is separating wall satisfactorily complete?			

Contact details for technical assistance from Superglass, manufacturer of Superglass Superwhite 34:

Telephone: 0808 1645 134 **E-mail:** technical.stirling@etexgroup.com

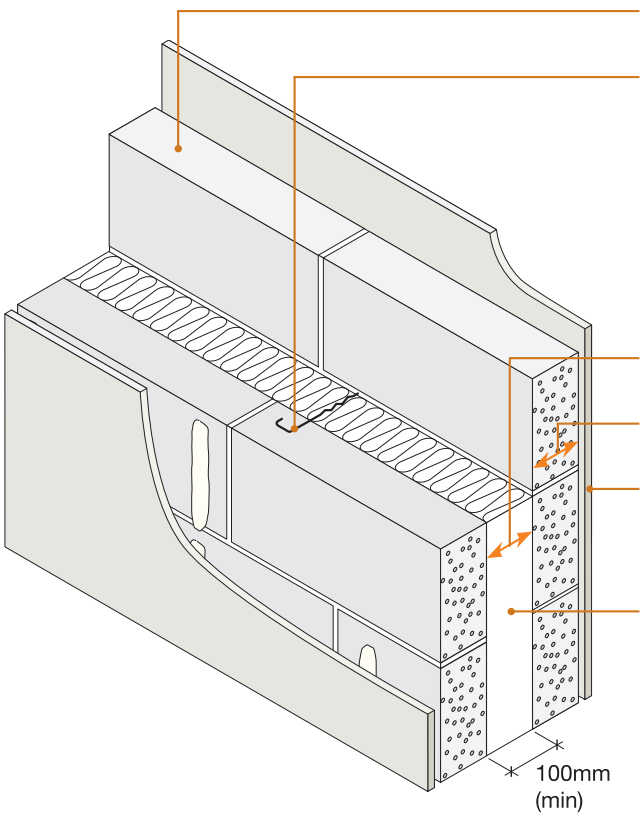
Notes (include details of any corrective action)

Site manager/supervisor signature . . . . . .

Separating Wall – Cavity Masonry

E-WM-35

Aircrete blocks - standard and thin joint ■
Superglass Superwhite 34 blown glass mineral wool insulation ■
Gypsum-based board (nominal 8 kg/m²) on dabs ■



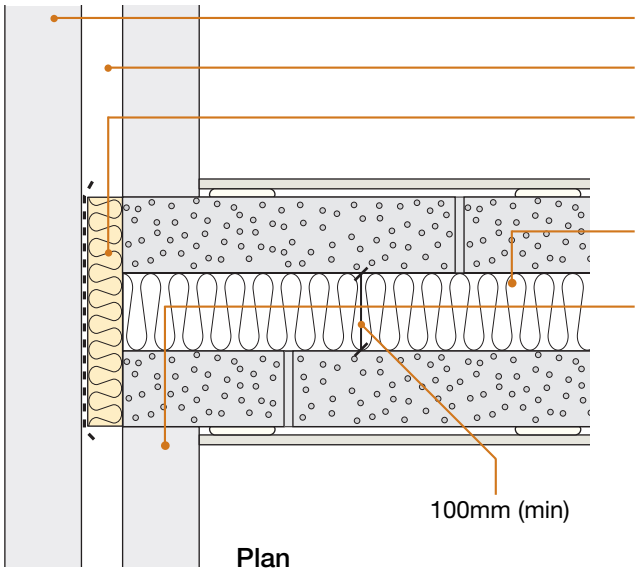
Block density	600 to 800 kg/m³
Wall ties	Approved Document E 'Tie type A' (see Appendix A) For thin joint, wall ties must be Ancon Building Products Staifix HRT4 or Clan PWT4 installed at no more than 2.5 ties per square metre
Cavity width	100mm (min)
Block thickness	100mm (min), each leaf
Wall finish	Gypsum-based board (nominal 8 kg/m²) mounted on dabs
Insulation	Superglass Superwhite 34 blown glass mineral wool insulation
External (flanking) wall	Masonry (both leaves) with 50mm (min) cavity – clear, fully filled or partially filled with insulation

IMPORTANT
Movement joints are not allowed in this wall type

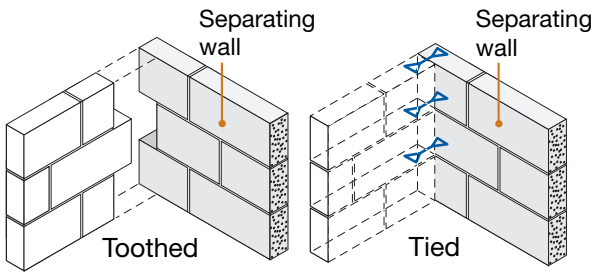
DO

- Keep cavity and wall ties free from mortar droppings and debris
- Fully fill all blockwork joints with mortar
- Make sure there is no connection between the two leaves except for wall ties, insulation and foundation
- Ensure that only solid blocks (i.e. not hollow or cellular) are used in the construction of separating and flanking walls
- Superglass Superwhite 34 is only to be installed by contractors approved by Superglass Insulation; and must not exceed 28.75 kg/m³ density once installed
- Ensure all injection holes are drilled through mortar joints, and made good by fully filling with mortar
- Keep any chases for services to a minimum and fill well with mortar. Stagger chases on each side of the wall to avoid them being back to back
- Refer to Appendix A

1. External (flanking) wall junction



Plan



Masonry outer leaf

External wall cavity (min 50mm)

Close external wall cavity with a flexible cavity stop. (Optional if external wall cavity is fully filled with built in mineral wool insulation)

Superglass Superwhite 34

Inner leaf where there is no separating floor e.g. for houses

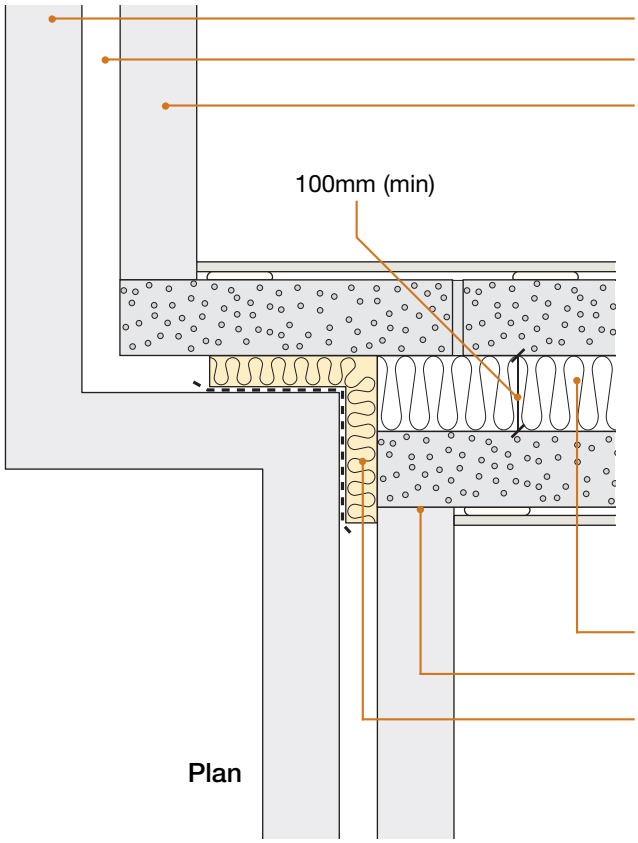
- 100mm (min) aircrete block (450 kg/m³ to 800 kg/m³)
- internal finish – 13mm plaster or nominal 8 kg/m² gypsum-based board

Inner leaf where there is a separating floor e.g. for flats/apartments

- if using robustdetails® for floor, refer to Table 3a in introduction to select an acceptable robustdetails® separating floor. Then refer to separating floor Robust Detail to identify acceptable inner leaf construction
- if using floor requiring pre-completion testing, seek specialist advice

Tooth or tie walls together

2. Staggered external (flanking) wall junction



Plan

Masonry outer leaf

External wall cavity (min 50mm)

Inner leaf where there is no separating floor e.g. for houses

- 100mm (min) aircrete block (450 kg/m³ to 800 kg/m³)
- internal finish – 13mm plaster or nominal 8 kg/m² gypsum-based board

Inner leaf where there is a separating floor e.g. for flats/apartments

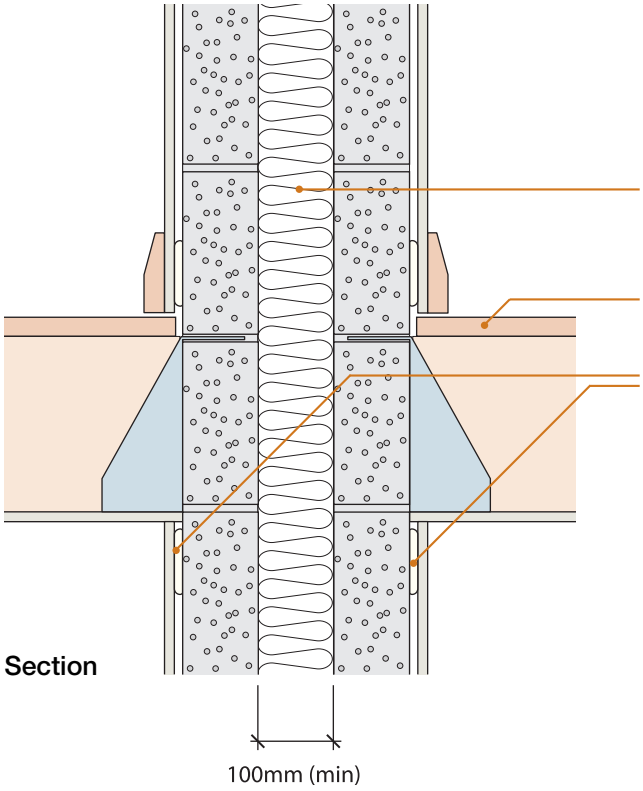
- if using robustdetails® for floor, refer to Table 3a in introduction to select an acceptable robustdetails® separating floor. Then refer to separating floor Robust Detail to identify acceptable inner leaf construction
- if using floor requiring pre-completion testing, seek specialist advice

Superglass Superwhite 34

Tooth or tie walls together

Close external wall cavity with a flexible cavity stop. (Optional if external wall cavity is fully filled with built in mineral wool insulation)

3. Internal floor junction: timber floor supported on joist hangers

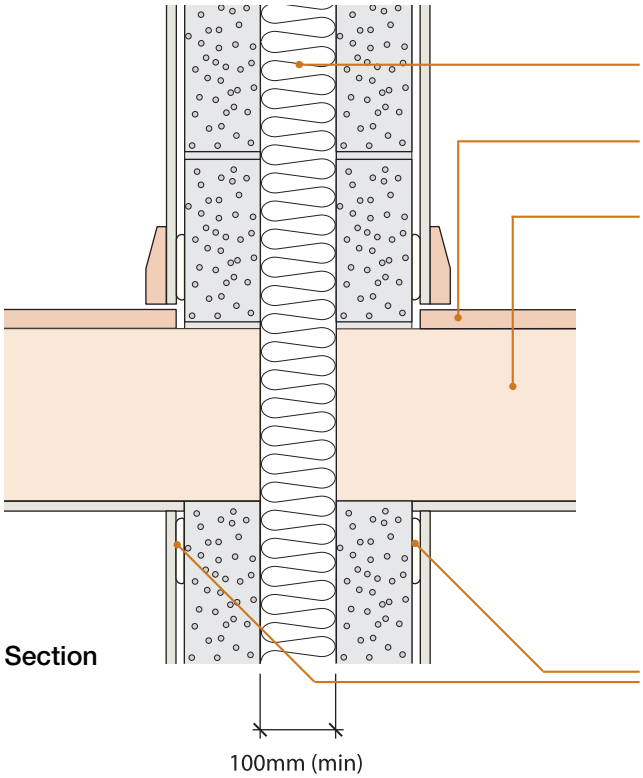


Superglass Superwhite 34

Floor to comply with Building Regulations Requirement E2

Continuous horizontal ribbon of adhesive

4. Internal floor junction: timber floor joists built in, beam and block or precast concrete



Superglass Superwhite 34

Floor to comply with Building Regulations Requirement E2

Internal floors should not be continuous between dwellings

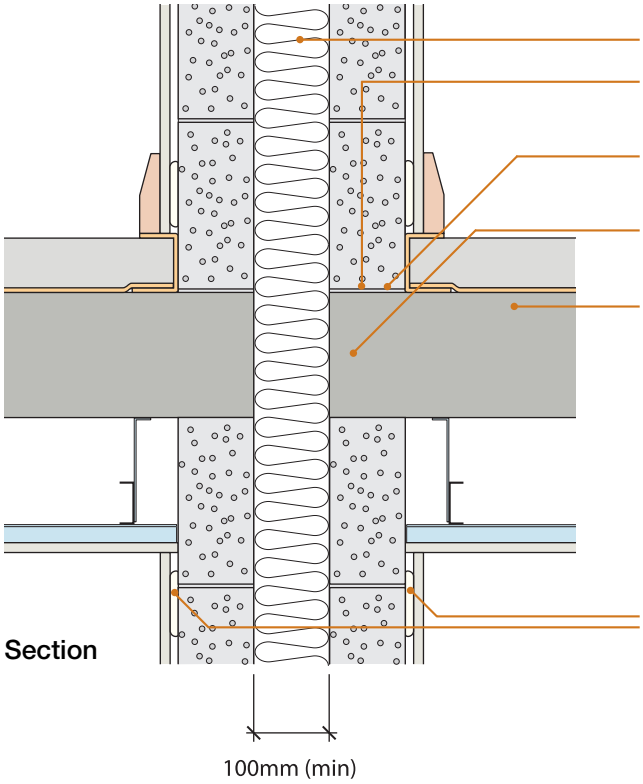
Floor construction:

- timber joists built in with:
  - all voids around the joists filled with mortar
  - the joint interface between the joist and the mortar sealed with flexible sealant (see Appendix A for full specification), or
- beam and block floor with all voids filled with mortar, or
- concrete planks with all voids between planks and blockwork filled with mortar or flexible sealant

Continuous horizontal ribbon of adhesive

Sketch shows timber joists built in

5. Separating floor junction



Superglass Superwhite 34

Separating wall must not be continuous between storeys

Concrete planks with all voids between planks and blockwork filled with mortar or flexible sealant

Separating floor must not be continuous between dwellings

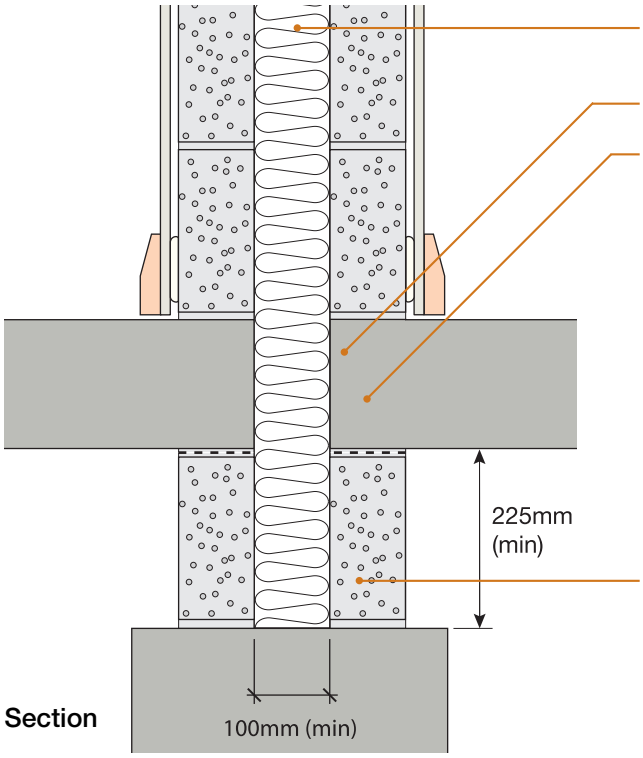
Separating floor:

- if using robustdetails® for floor, refer to Table 3a in Introduction and see separating floor Robust Detail for floating floor and ceiling options
- at least one storey of the separating wall flanking the separating floor must be built in aircrete of minimum density 680 kg/m^3
- if using floor requiring pre-completion testing, seek specialist advice

Continuous horizontal ribbon of adhesive

Sketch shows E-FC-4 type separating floor and CT0 type ceiling

6. Ground floor junction: timber floor, beam and block, precast concrete plank, cast in-situ suspended concrete slab or ground bearing concrete slab



Alternatively if using continuous raft foundation, refer to Appendix A2.

Superglass Superwhite 34

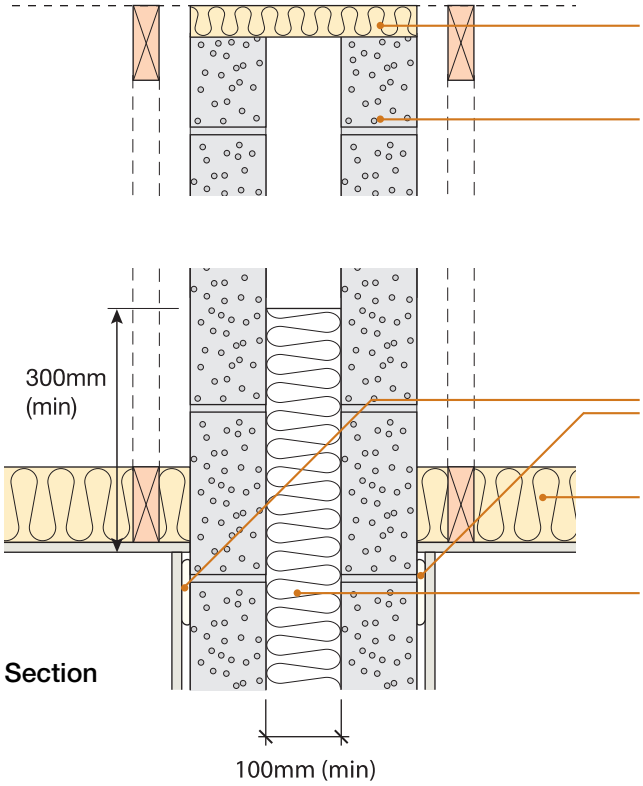
Ground floor not continuous between dwellings

Ground floor construction:

- timber joists built in with:
  - all voids around the joists filled with mortar
  - the joint interface between the joist and the mortar sealed with flexible sealant (see Appendix A for full specification), or
- beam and block floor with all voids filled with mortar, or
- concrete planks with all voids between planks and blockwork filled with mortar or flexible sealant, or
- ground bearing slab

Cavity separating wall continuous to foundation, cavity fill may be provided below minimum clear cavity indicated. Solid walls which support separating walls are only acceptable where each ground floor (not timber joists) is built into one side of the separating wall and breaks the vertical continuity of the wall and the minimum clear cavity indicated is maintained.

7. Roof junction – pitched roof without room-in-roof



Junction between separating wall and roof filled with flexible closer

Cavity masonry separating wall continuous to underside of roof. Alternatively use spandrel panel – see Appendix A

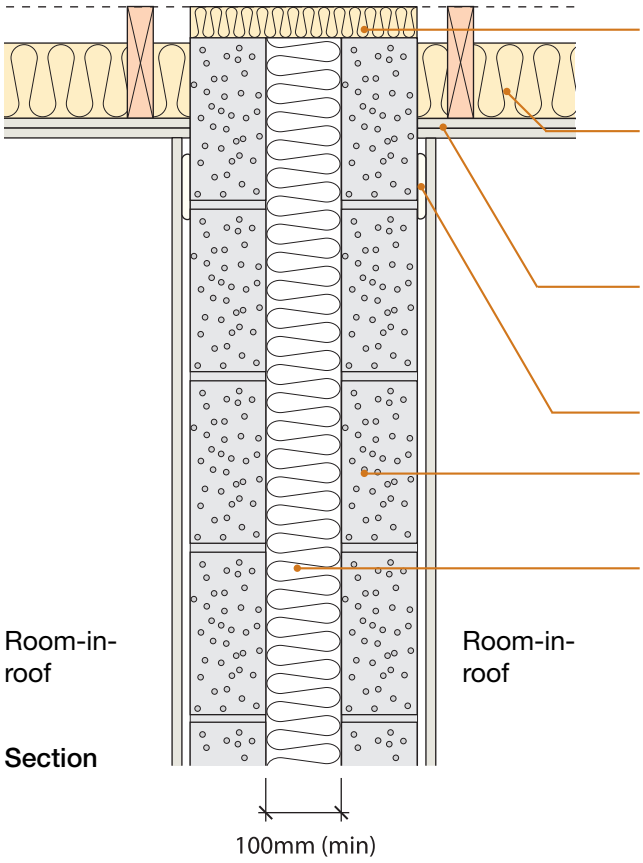
External wall cavity closed at eaves level with a suitable flexible material (e.g. mineral wool). If a rigid material is used, then it should only be bonded to one leaf

Continuous horizontal ribbon of adhesive

100mm (min) mineral wool insulation – 10 kg/m³ (min)

Superglass Superwhite 34

8. Roof junction – pitched roof with room-in-roof



Junction between separating wall and roof filled with flexible closer

100mm (min) mineral wool insulation minimum density 10 kg/m³ or 60mm (min) foil faced PUR or PIR insulation, minimum density 30 kg/m³ (See Appendix A)

2 layers of nominal 8 kg/m² gypsum-based board. Where used rigid insulation may be placed between and/or directly beneath rafters

Continuous horizontal ribbon of adhesive

Cavity masonry separating wall continuous to underside of roof covering

Superglass Superwhite 34

External wall cavity closed at eaves level with a suitable flexible material (e.g. mineral wool). If a rigid material is used, then it should only be bonded to one leaf

CHECKLIST (to be completed by site manager/supervisor)

Company:

Site:

Plot: Site manager/supervisor:

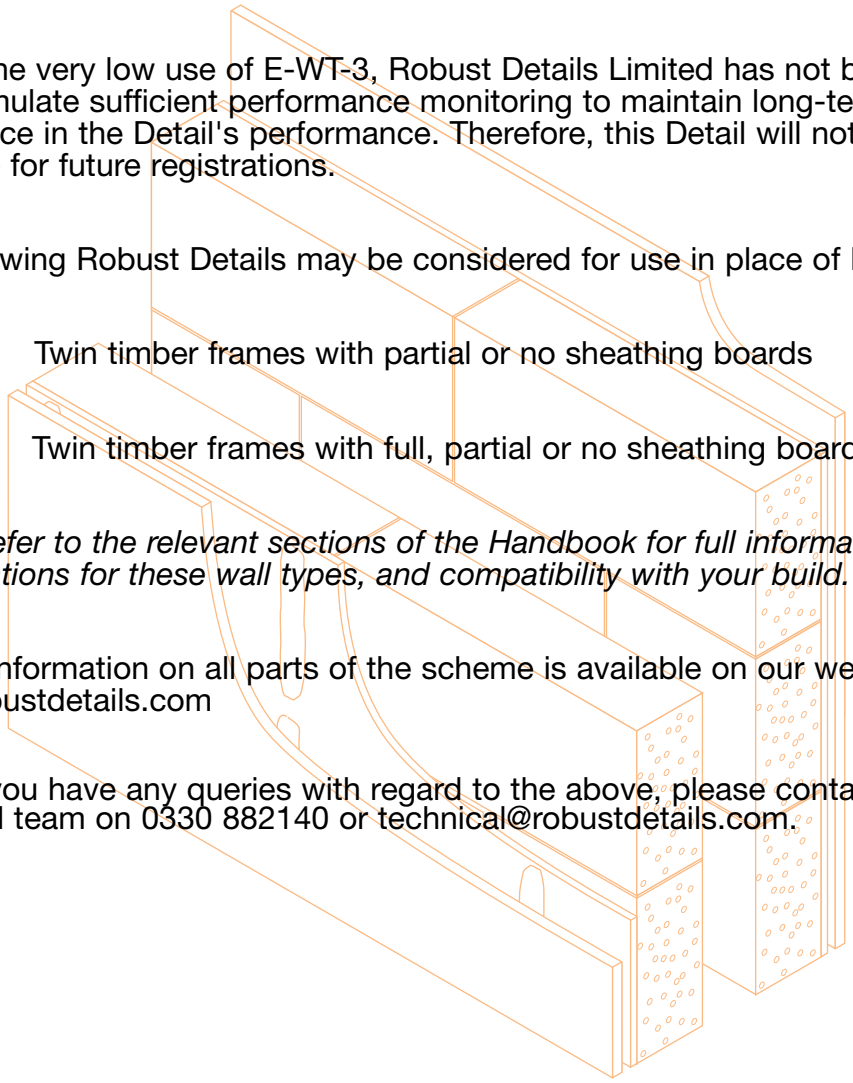
Ref.	Item	Yes (✔)	No (✔)	Inspected (initials & date)
1.	Is separating wall cavity at least 100mm?			
2.	Is external (flanking) wall cavity at least 50mm?			
3.	Are separating wall blocks aircrete (600 to 800 kg/m^3)?			
4.	Is cavity free from droppings and debris?			
5.	Are separating wall ties to Approved Document E "Tie type A" (see Appendix A)? For thin joint, are wall ties Ancon Staifix HRT4 or Clan PWT4 installed at no more than 2.5 ties per square metre?			
6.	Are cavity stops installed where specified in the Robust Detail?			
7.	Are joints fully filled?			
8.	Is Superglass Superwhite 34 installed to a maximum density of 28.75 kg/m^3, and was it by an approved installer?			
9.	Are all injection holes drilled through the mortar joints, and made good by fully filling with mortar?			
10.	Are voids around floor joists, chases, etc. fully filled/sealed?			
11.	Where there is a separating floor (e.g. flats/apartments) has the resilient flanking strip been installed?			
12.	Are all junctions of wall and ceiling boards sealed with tape or caulked with sealant?			
13.	Is separating wall satisfactorily complete?			

Contact details for technical assistance from Superglass Insulation Ltd, manufacturer of Superglass Superwhite 34 **Telephone:** 0808 1645 134 **E-mail:** technical.stirling@etexgroup.com

Notes (include details of any corrective action)

Site manager/supervisor signature . . . . . .

Important information regarding current status of E-WT-3



Due to the very low use of E-WT-3, Robust Details Limited has not been able to accumulate sufficient performance monitoring to maintain long-term confidence in the Detail's performance. Therefore, this Detail will not be available for future registrations.

The following Robust Details may be considered for use in place of E-WT-3:

E-WT-1 Twin timber frames with partial or no sheathing boards

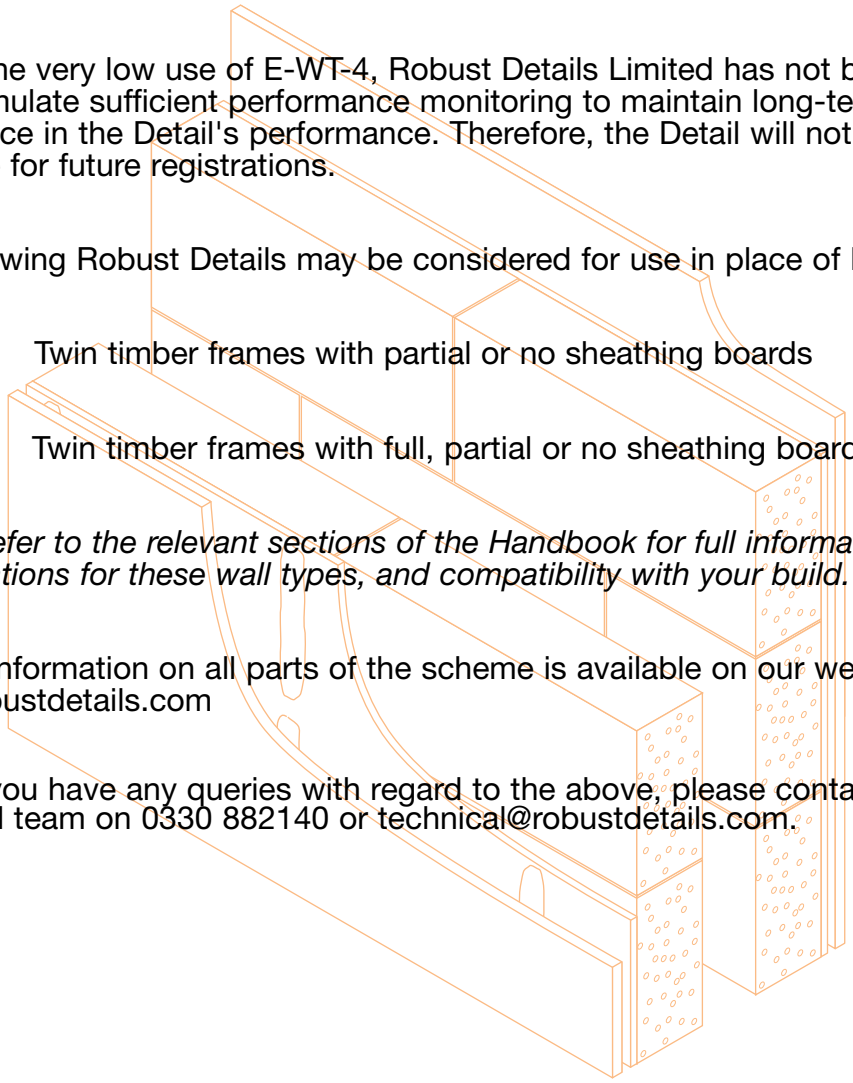
E-WT-2 Twin timber frames with full, partial or no sheathing boards

Please refer to the relevant sections of the Handbook for full information and specifications for these wall types, and compatibility with your build.

Further information on all parts of the scheme is available on our website www.robustdetails.com

Should you have any queries with regard to the above, please contact RDL's technical team on 0330 882140 or technical@robustdetails.com.

Important information regarding current status of E-WT-4



Due to the very low use of E-WT-4, Robust Details Limited has not been able to accumulate sufficient performance monitoring to maintain long-term confidence in the Detail's performance. Therefore, the Detail will not be available for future registrations.

The following Robust Details may be considered for use in place of E-WT-4:

E-WT-1 Twin timber frames with partial or no sheathing boards

E-WT-2 Twin timber frames with full, partial or no sheathing boards

Please refer to the relevant sections of the Handbook for full information and specifications for these wall types, and compatibility with your build.

Further information on all parts of the scheme is available on our website www.robustdetails.com

Should you have any queries with regard to the above, please contact RDL's technical team on 0330 882140 or technical@robustdetails.com.

6. Floating floor treatment for E-FT-1

Floating floor treatment:

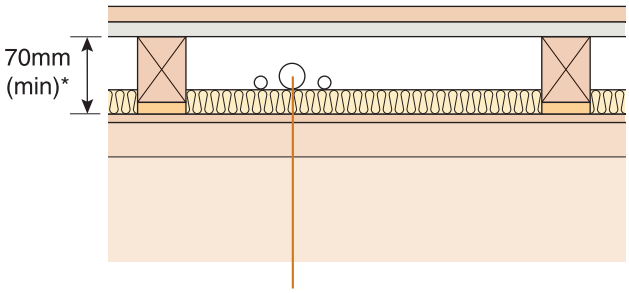
a) Must achieve a minimum laboratory performance of rd$\Delta R_w + C_{tr}$ = 13dB and rdΔL_w = 15dB - see Appendix C.

b) Must be installed in accordance with the manufacturer's instructions.

c) Require 5mm (min) resilient flanking strips around the perimeter of the flooring board to isolate floor from walls and skirting.

d) For further guidance on floating floor treatments and flanking strips, please refer to Appendix A.

* Note - void dimension indicated is when floor is loaded to 25 kg/m^2.



Services, where required, may be located above or below quilt

FFT1 – Resilient composite deep batten system for E-FT-1

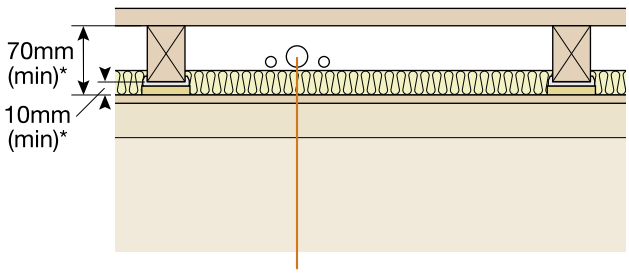
- 18 mm (min) t&g flooring board
- gypsum-based board nominal 13.5 kg/m^2
- FFT1 resilient composite deep battens
- resilient layer must be continuous and pre-bonded to batten
- battens may have the resilient layer at the top or the bottom
- mineral wool quilt laid between battens
  – 13mm (min) 33-36 kg/m^3, or
  – 25mm (min) 10-36 kg/m^3
  or Cellecta MICRO 15
- ensure any services do not bridge the resilient layer

Cellecta HiDECK Structural system

- refer to Appendix A3

JCW Soundboard One system

- refer to Appendix A3



Services, where required, may be located above or below quilt

FFT2 – Resilient cradle and batten system for E-FT-1
Ensure cradles are aligned over joist positions

- 18 mm (min) t&g flooring board
- cradle and batten
- mineral wool quilt laid between battens
  – 13mm (min) 33-36 kg/m^3, or
  – 25mm (min) 10-36 kg/m^3
  or Cellecta MICRO 15
- ensure any services do not bridge the resilient layer

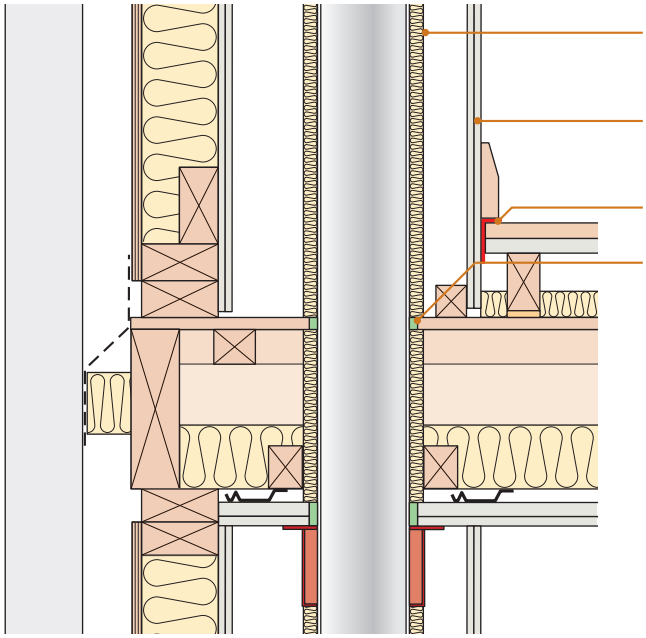
Cellecta HiDECK Structural system

- refer to Appendix A3

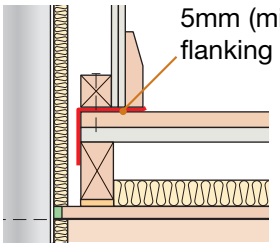
JCW Soundboard One system

- refer to Appendix A3

7. Services – pipes through separating floor

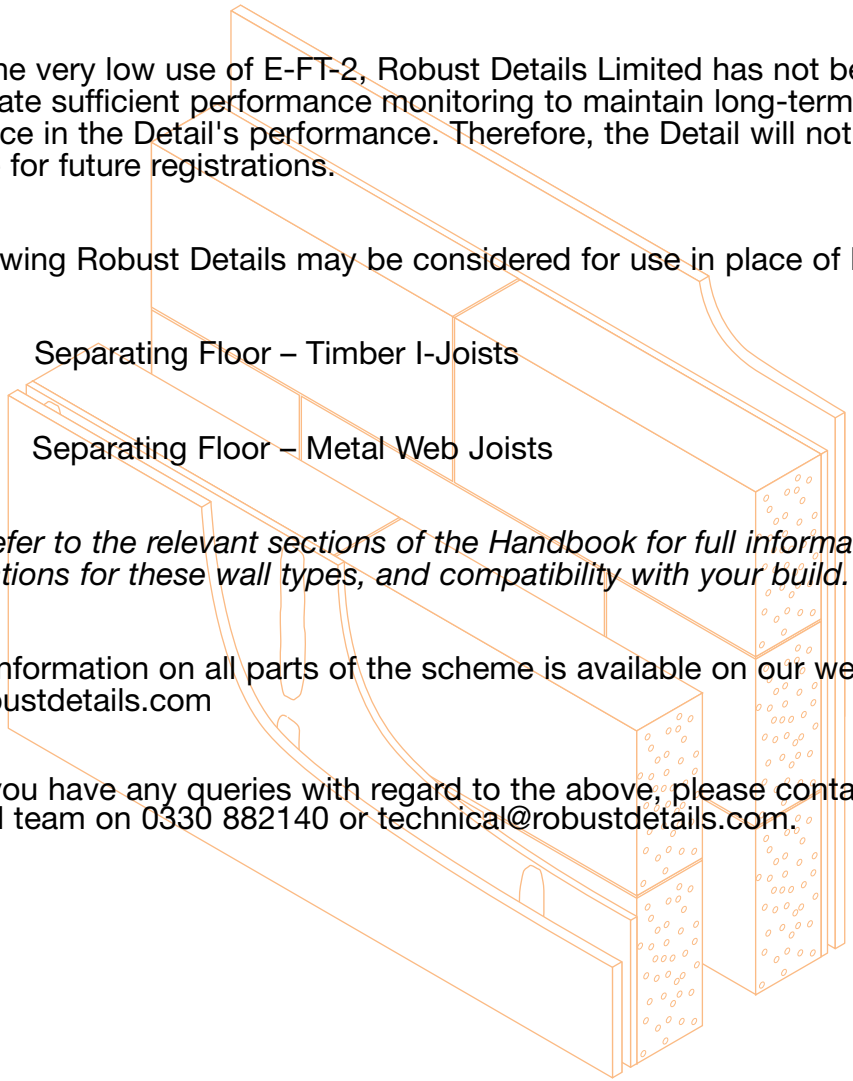


Section



Alternative detail

Important information regarding current status of E-FT-2



Due to the very low use of E-FT-2, Robust Details Limited has not been able to accumulate sufficient performance monitoring to maintain long-term confidence in the Detail's performance. Therefore, the Detail will not be available for future registrations.

The following Robust Details may be considered for use in place of E-FT-2:

E-FT-1 Separating Floor – Timber I-Joists

E-FT-3 Separating Floor – Metal Web Joists

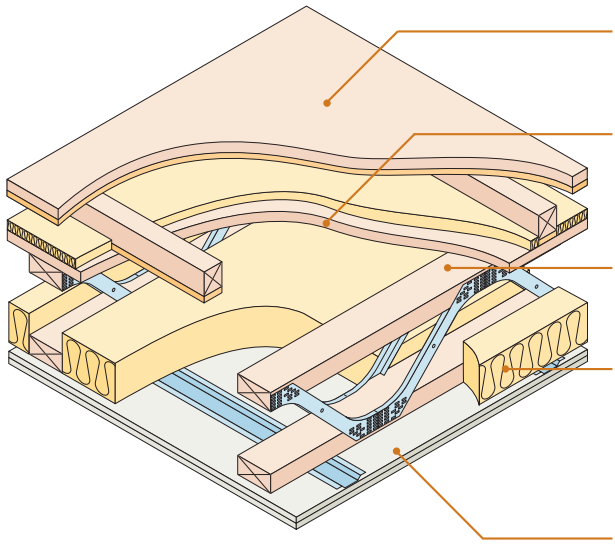
Please refer to the relevant sections of the Handbook for full information and specifications for these wall types, and compatibility with your build.

Further information on all parts of the scheme is available on our website www.robustdetails.com

Should you have any queries with regard to the above, please contact RDL's technical team on 0330 882140 or technical@robustdetails.com.

Separating Floor – Metal Web Joists E-FT-3

Timber flange and metal web joists ■
Use with timber frame walls only ■



Floating floor	See section 10 for suitable floating floor treatment
Floor decking	18mm thick (min) wood based board, density min 600 kg/m^3
Joists	253mm (min) metal web joists (see joist type below)
Absorbent material	100mm (min) mineral wool quilt insulation (10–36 kg/m^3) or Cellecta MICRO 50 between joists
Ceiling	See section 9 for suitable ceiling treatment

Joist type

IMPORTANT

Only the following metal web joists may be used in E-FT-3:

- MiTek Posi-Joist
- WOLF easi-joist
- ITW Gang-Nail Ecojoist
- ITW Alpine SpaceJoist

Notes:

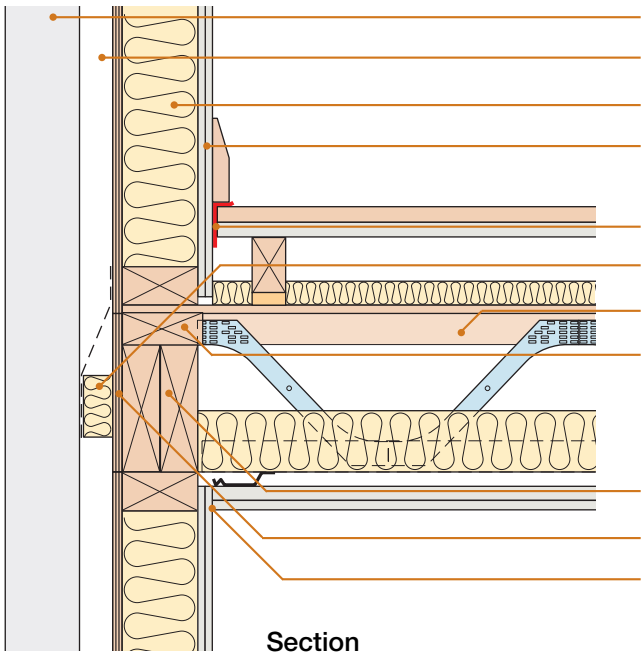
Although single header and sole plates are indicated, increasing the number of header and sole plates would be acceptable, however, all dimension specifications within this Robust Detail must be adhered to.

Metal web joists can be **top chord/flange** supported or **fully built-in** and supported on the panel and this is permitted, however, all dimension specifications within this Robust Detail must be adhered to.

DO

- Ensure correct metal web joists are being used (see joist type)
- Lay quilt between joists ensuring no gaps remain
- Ensure floating floor treatment is suitable and is installed in accordance with the manufacturer's instructions (See page 7)
- Ensure quilt within floating floor is laid between and not under flooring battens
- Install resilient flanking strips around the perimeter of the flooring board to isolate floor from walls and skirtings
- Ensure resilient ceiling bars are fixed at right angles to the joists
- Ensure timber floor ceiling treatment is fixed correctly (see page 6)
- Stagger joints in ceiling layers
- Refer to Appendix A

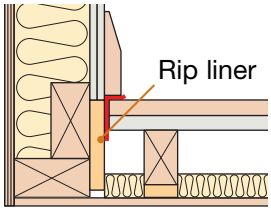
1. External (flanking) wall junction (top chord supported)



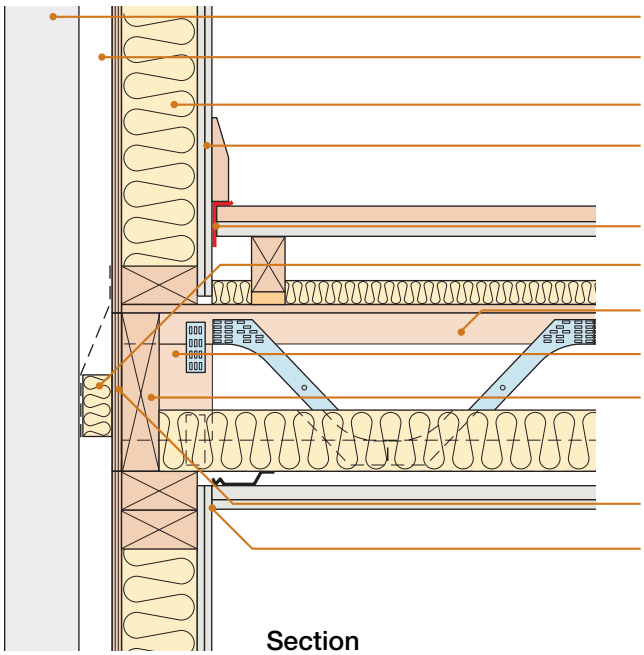
- Masonry outer leaf
- External wall cavity (min 50mm)
- Mineral wool insulation 10 kg/m³ (min)
- Two layers gypsum-based board nominal 8 kg/m² each layer
- 5mm (min) resilient flanking strip
- Close cavity with a cavity stop (see Appendix A)
- Joists may span in either direction
- Softwood timber infill between supporting top chords/flanges of joists built into frame to support floor (Bottom chord not built into frame)
- Ring beams packed to stud width
- Site fixed sheathing board for depth of floor
- Seal all perimeter joints with tape or caulk with sealant

Section

Alternative detail



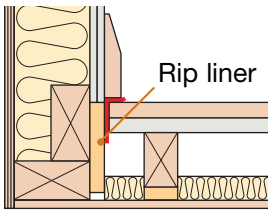
2. External (flanking) wall junction (fully built-in)



- Masonry outer leaf
- External wall cavity (min 50mm)
- Mineral wool insulation 10 kg/m³ (min)
- Two layers gypsum-based board nominal 8 kg/m² each layer
- 5mm (min) resilient flanking strip
- Close cavity with a cavity stop (see Appendix A)
- Joists may span in either direction
- Trimmable blocking to end of joist
- Close spaces between floor joists with full depth timber blocking or continuous header joist where joists are at right angles to the wall
- Site fixed sheathing board for depth of floor
- Seal all perimeter joints with tape or caulk with sealant

Section

Alternative detail



10. Floating floor treatment for E-FT-3

Floating floor treatment:

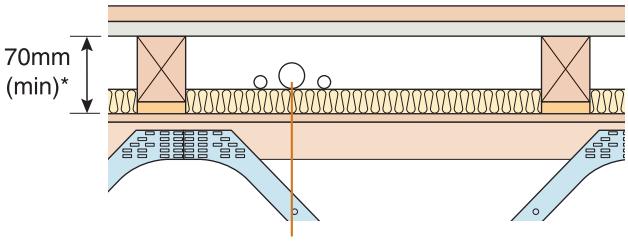
a) Must achieve a minimum laboratory performance of rd$\Delta R_w + C_{tr}$=13dB and rdΔL_w=15dB - see Appendix C.

b) Must be installed in accordance with the manufacturer's instructions.

c) Require 5mm (min) resilient flanking strips around the perimeter of the flooring board to isolate floor from walls and skirting.

d) For further guidance on floating floor treatments and flanking strips, please refer to Appendix A.

* Note - void dimension indicated is when floor is loaded to 25 kg/m^2.



Services, where required, may be located above or below quilt

FFT1 – Resilient composite deep batten system for E-FT-3

- 18 mm (min) t&g flooring board
- gypsum-based board nominal 13.5 kg/m^2
- FFT1 resilient composite deep battens
- battens may have the resilient layer at the top or the bottom
- mineral wool quilt laid between battens
  – 13mm (min) 33-36 kg/m^3, or
  – 25mm (min) 10-36 kg/m^3
  or Cellecta MICRO 15
- ensure any services do not bridge the resilient layer

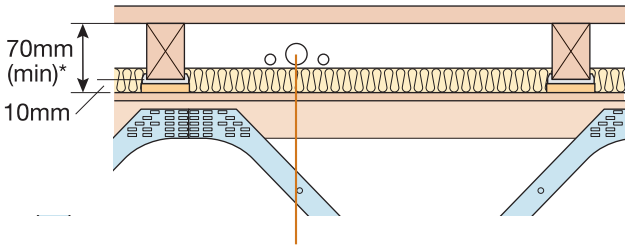
* Note - Services may run within the floor zone (see Appendix A)

Cellecta HiDECK Structural system

- refer to Appendix A3

JCW Soundboard One system

- refer to Appendix A3



Services, where required, may be located above or below quilt

FFT2 – Resilient cradle and batten system for E-FT-3
Ensure cradles are aligned over joist positions

- 18 mm (min) t&g flooring board
- cradle and batten
- mineral wool quilt laid between battens
  – 13mm (min) 33-36 kg/m^3, or
  – 25mm (min) 10-36 kg/m^3
  or Cellecta MICRO 15
- ensure any services do not bridge the resilient layer

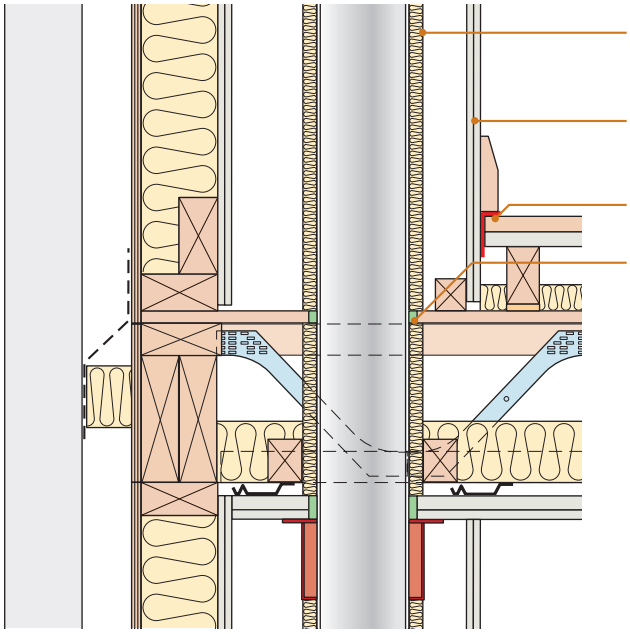
Cellecta HiDECK Structural system

- refer to Appendix A3

JCW Soundboard One system

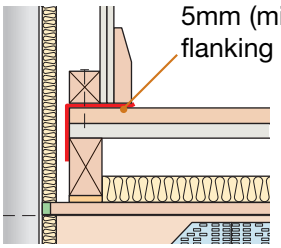
- refer to Appendix A3

11. Services – pipes through separating floor



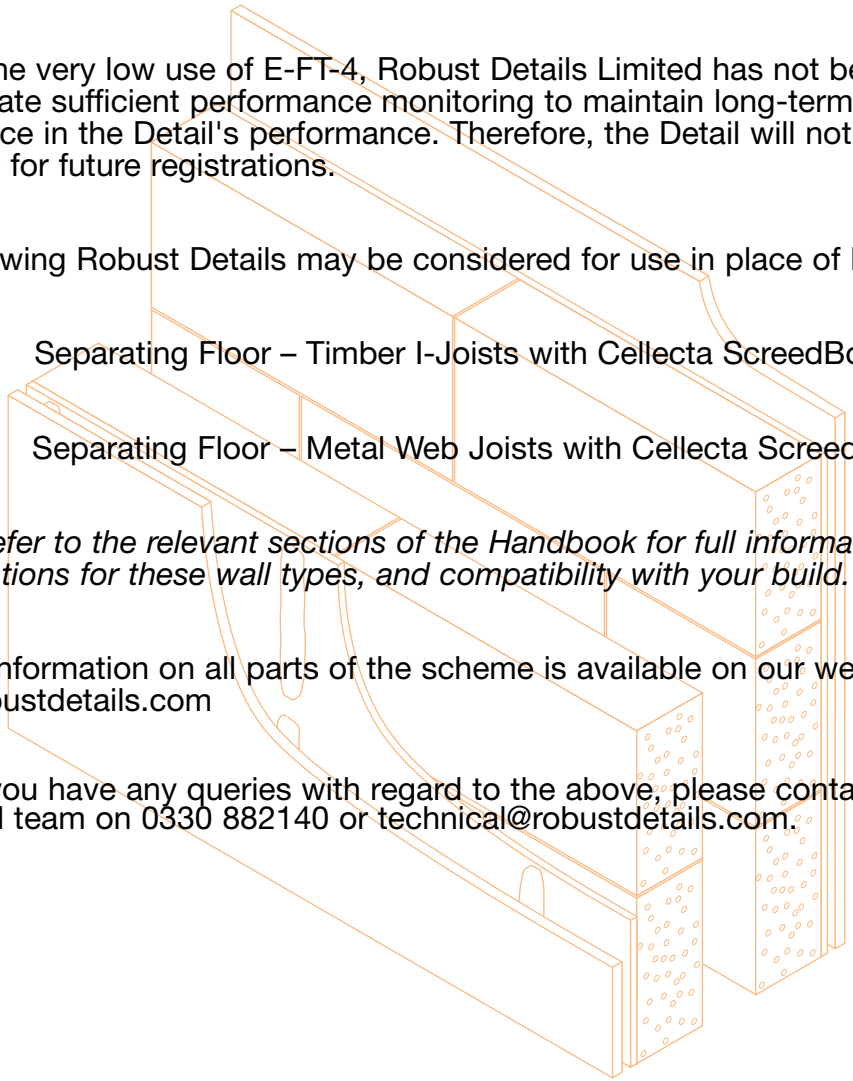
Section

Sketch shows top chord supported external (flanking) wall junction detail, for fully built-in arrangement see section 2



Alternative detail

Important information regarding current status of E-FT-4



Due to the very low use of E-FT-4, Robust Details Limited has not been able to accumulate sufficient performance monitoring to maintain long-term confidence in the Detail's performance. Therefore, the Detail will not be available for future registrations.

The following Robust Details may be considered for use in place of E-FT-4:

E-FT-5 Separating Floor – Timber I-Joists with Cellecta ScreedBoard® 28

E-FT-6 Separating Floor – Metal Web Joists with Cellecta ScreedBoard® 28

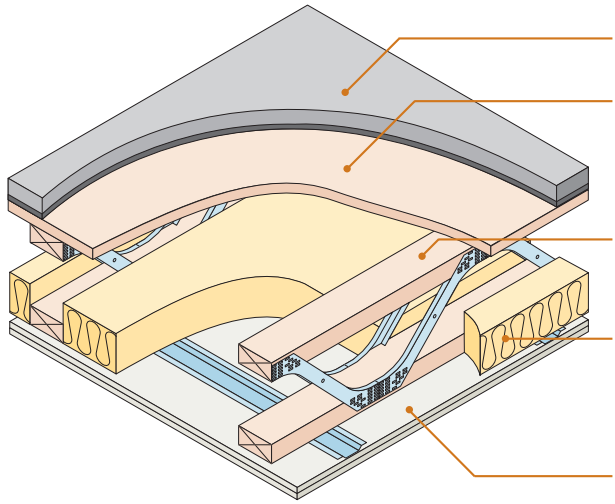
Please refer to the relevant sections of the Handbook for full information and specifications for these wall types, and compatibility with your build.

Further information on all parts of the scheme is available on our website www.robustdetails.com

Should you have any queries with regard to the above, please contact RDL's technical team on 0330 882140 or technical@robustdetails.com.

Separating Floor – Metal Web Joists E-FT-6

Cellecta® ScreedBoard® 28 on timber sub-floor ■
Timber flange and metal web joists ■
Use with timber frame walls only ■



Floating floor	*Cellecta*® ScreedBoard® 28
Floor decking	18mm thick (min) wood based board, density min 600 kg/m³
Joists	253mm (min) metal web joists (see joist type below)
Absorbent material	100mm (min) mineral wool quilt insulation (10–36 kg/m³) between joists
Ceiling	See section 9 for suitable ceiling treatment

Joist type

IMPORTANT

Only the following metal web joists may be used in E-FT-6:

- MiTek Posi-Joist
- WOLF easi-joist
- ITW Gang-Nail Ecojoist
- ITW Alpine SpaceJoist

Notes:

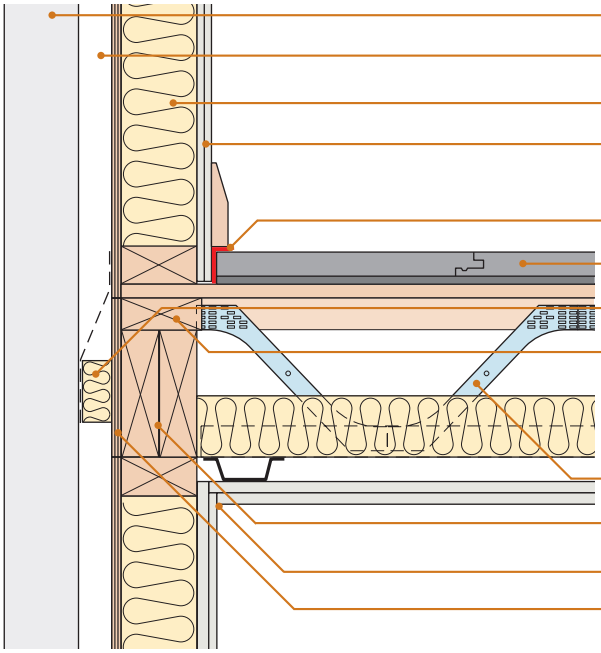
Although single header and sole plates are indicated, increasing the number of header and sole plates would be acceptable, however, all dimension specifications within this Robust Detail must be adhered to.

Metal web joists can be **top chord/flange** supported or **fully built-in** and supported on the panel and this is permitted, however, all dimension specifications within this Robust Detail must be adhered to.

DO

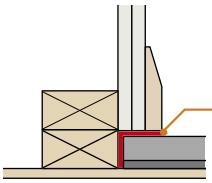
- Ensure correct metal web joists are being used (see joist type)
- Lay quilt (min 100mm thick) between joists ensuring no gaps remain
- Apply *Cellecta*® SB adhesive to all ScreedBoard® 28 decking joints
- Install *Cellecta*® YELO*fon*® FS50 flanking angle around the perimeter of the ScreedBoard® 28 to isolate floor from walls and skirtings
- Ensure resilient ceiling bars are fixed at right angles to the joists
- Ensure timber floor ceiling treatment is fixed correctly (see section 9)
- Stagger joints in ceiling layers
- Refer to Appendix A

1. External (flanking) wall junction (top chord supported)



- Masonry outer leaf
- External wall cavity (min 50mm)
- Mineral wool insulation 10 kg/m³ (min)
- Two layers gypsum-based board nominal 8 kg/m² each layer
- YELO*fon*® FS50 flanking angle
- ScreedBoard® 28
- Close cavity with a cavity stop (see Appendix A)
- Softwood timber infill between supporting top chords/flanges of joists built into frame to support floor (Bottom chord not built into frame)
- Joists may span in either direction
- Ring beams packed to stud width
- Seal all perimeter joints with tape or caulk with sealant
- Site fixed sheathing board for depth of floor

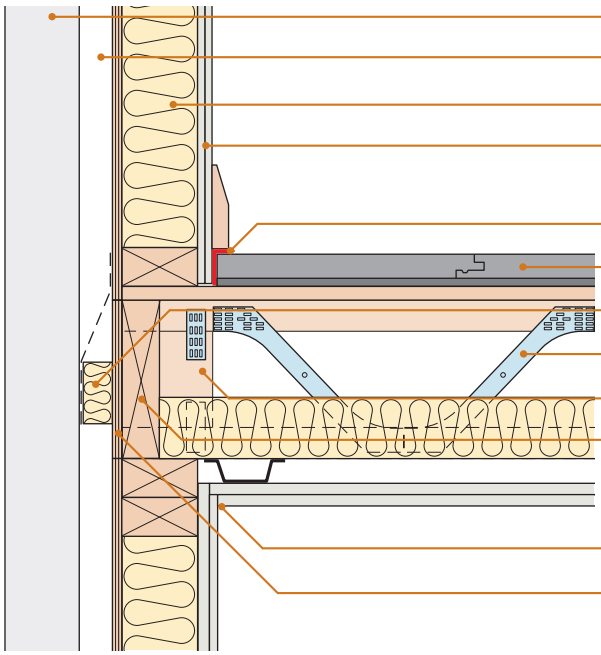
Section



- YELO*fon*® FS50 flanking angle

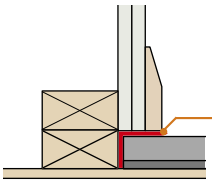
Alternative detail

2. External (flanking) wall junction (fully built-in)



- Masonry outer leaf
- External wall cavity (min 50mm)
- Mineral wool insulation 10 kg/m³ (min)
- Two layers gypsum-based board nominal 8 kg/m² each layer
- YELO*fon*® FS50 flanking angle
- ScreedBoard® 28
- Close cavity with a cavity stop (see Appendix A)
- Joists may span in either direction
- Trimmable blocking to end of joist
- Close spaces between floor joists with full depth timber blocking or continuous header joist where joists are at right angles to the wall
- Seal all perimeter joints with tape or caulk with sealant
- Site fixed sheathing board for depth of floor

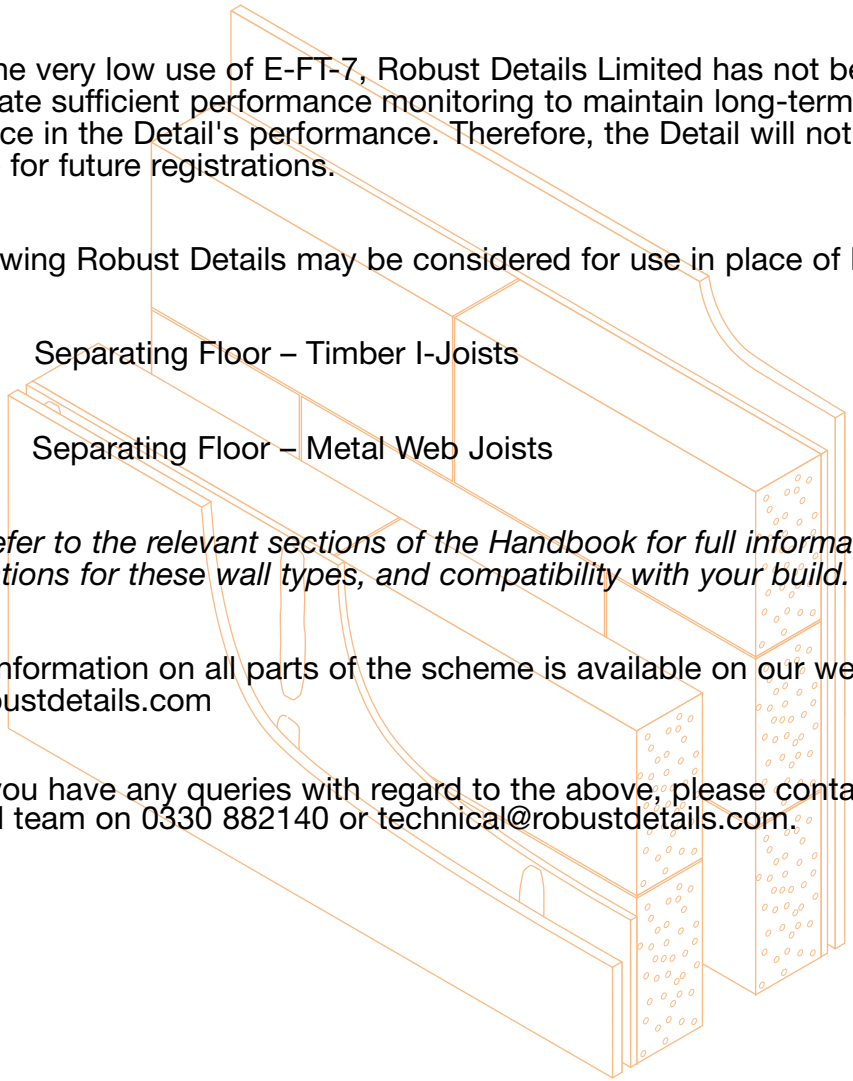
Section



- YELO*fon*® FS50 flanking angle

Alternative detail

Important information regarding current status of E-FT-7



Due to the very low use of E-FT-7, Robust Details Limited has not been able to accumulate sufficient performance monitoring to maintain long-term confidence in the Detail's performance. Therefore, the Detail will not be available for future registrations.

The following Robust Details may be considered for use in place of E-FT-7:

E-FT-1 Separating Floor – Timber I-Joists

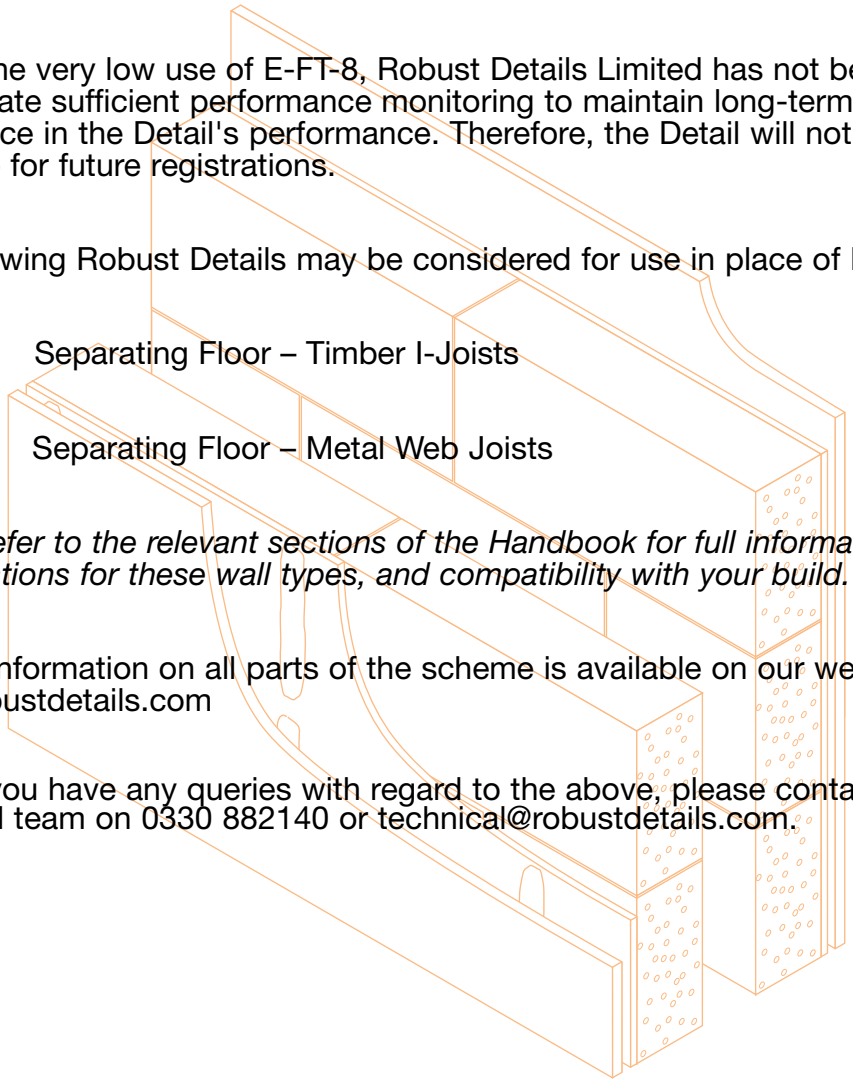
E-FT-3 Separating Floor – Metal Web Joists

Please refer to the relevant sections of the Handbook for full information and specifications for these wall types, and compatibility with your build.

Further information on all parts of the scheme is available on our website www.robustdetails.com

Should you have any queries with regard to the above, please contact RDL's technical team on 0330 882140 or technical@robustdetails.com.

Important information regarding current status of E-FT-8



Due to the very low use of E-FT-8, Robust Details Limited has not been able to accumulate sufficient performance monitoring to maintain long-term confidence in the Detail's performance. Therefore, the Detail will not be available for future registrations.

The following Robust Details may be considered for use in place of E-FT-8:

E-FT-1 Separating Floor – Timber I-Joists

E-FT-3 Separating Floor – Metal Web Joists

Please refer to the relevant sections of the Handbook for full information and specifications for these wall types, and compatibility with your build.

Further information on all parts of the scheme is available on our website www.robustdetails.com

Should you have any queries with regard to the above, please contact RDL's technical team on 0330 882140 or technical@robustdetails.com.

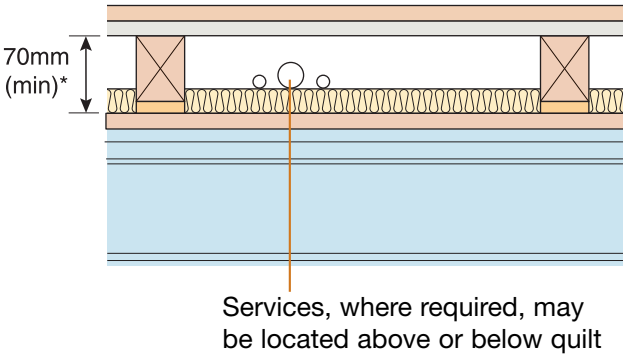
6. Floating floor treatment for E-FS-2

Floating floor treatment:

a) Must achieve a minimum laboratory performance of rd $\Delta R_w + C_{tr} = 13$dB and rd $\Delta L_w = 15$dB - see Appendix C.

b) Must be installed in accordance with the manufacturer's instructions.

c) Require 5mm (min) resilient flanking strips around the perimeter of the flooring board to isolate floor from walls and skirting.



d) For further guidance on floating floor treatments and flanking strips, please refer to Appendix A.

* Note - void dimension indicated is when floor is loaded to 25 kg/m^2.

FFT1 – Resilient composite deep batten system

- 22 mm (min) t&g flooring board
- gypsum-based board nominal 13.5 kg/m^2
- FFT1 resilient composite deep battens
- resilient layer must be continuous and pre-bonded to batten
- battens may have the resilient layer at the top or the bottom
- mineral wool quilt laid between battens
  – 13mm (min) 33-36 kg/m^3, or
  – 25mm (min) 10-36 kg/m^3
  or Cellecta MICRO 15
- ensure any services do not bridge the resilient layer

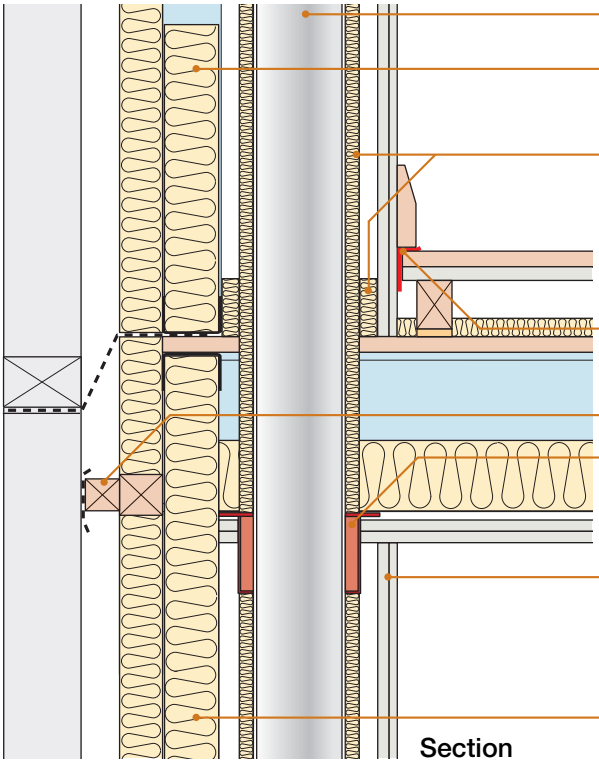
Cellecta HiDECK Structural system

- refer to Appendix A3

JCW Sounboard One system

- refer to Appendix A3

7. Services – pipes through separating floor



Section

Service pipe

Mineral wool insulation batts, 33-60 kg/m^3, between studs of steel frame

25mm mineral fibre quilt insulation (10-36kg/m^3) installed around the complete perimeter of the service pipe. Where the service pipe penetrates the separating floor, all voids are to be packed with insulation quilt

5mm (min) resilient flanking strips installed at perimeter and turned under skirting board

Close cavity with a cavity stop (see Appendix A)

Proprietary fire collar fitted around pipe and fixed to underside of steel joists

2 layers of gypsum-based board nominal 20 kg/m^2 combined fixed to 45mm metal frame stud forming duct. Joints to be staggered and taped

Mineral wool insulation batts, 33-60 kg/m^3, between studs to 600mm (min) below ceiling level

CHECKLIST (to be completed by site manager/supervisor)

Company:

Site:

Plot: Site manager/supervisor:

Ref.	Item	Yes (✔)	No (✔)	Inspected (initials & date)
1.	Are UltraBEAM metal joists at least 225mm deep?			
2.	Has the specified quilt been fitted between the joists?			
3.	Are resilient ceiling bars fitted at right angles to the joists?			
4.	Has ceiling system been fitted in accordance with the manufacturer's instructions?			
5.	Has floating floor treatment been fitted in accordance with the manufacturer's instructions?			
6.	Has the specified quilt been fitted between the floor battens?			
7.	Is ceiling treatment fixed to the resilient bars with correct screws?			
8.	Are all joints sealed with tape or caulked with sealant?			
9.	Are vertical service pipes wrapped in quilt and boxed in with two layers of gypsum-based board combined nominal mass per unit area of 20 kg/m^2?			
10.	Have all resilient flanking strips been fitted?			
11.	Is separating floor satisfactorily complete?			

Contact details for technical assistance from Hadley Group, manufacturer of UltraBEAM metal joists:

Telephone: 0121 555 1300 **Fax:** 0121 555 1301 **E-mail:** info@hadleygroup.co.uk

Notes (include details of any corrective action)

Site manager/supervisor signature . . . . . .

Appendix A1 – Additional Guidance

Contents

Wall ties in cavity masonry separating walls

Cavity masonry separating wall Robust Details must have no greater than a type A connection of one leaf to the other. This is achieved by using wall ties specifically tested for type A status over the cavity width being built, positioned 900mm horizontally (staggered) and 450mm vertically to give 2.5 ties/m^2. If a greater number of ties is required, check with the tie manufacturer that a type A connection can still be achieved.

Special consideration should be given in respect of movement joints, where de-bonded ties should be used across the movement joint to allow fewer wall ties across the cavity (see Movement Joints section on page 2).

Approved Document E clause 2.19 describes the requirements for Tie Type A (separating walls) as follows:

> ***Tie type A***
> Connect the leaves of a masonry cavity wall only where necessary by butterfly ties as described in BS 1243: 1978 Metal ties for cavity wall construction, and spaced as required for structural purposes (BS 5628-3: 2001 Code of practice for use of masonry. Materials and components, design and workmanship, which limits this tie type and spacing to cavity widths of 50mm to 75mm with a minimum masonry leaf thickness of 90mm). Alternatively, use wall ties with an appropriate measured dynamic stiffness for the cavity width. The specification for wall ties of dynamic stiffness, $k_X$mm in MN/m with a cavity width of X mm and *n* ties/m^2 is $n.k_X\text{mm} < 4.8$ MN/m^3.
>
> When using wall ties for masonry separating walls the specifier should ensure that the wall tie manufacturer has a test report that demonstrates compliance with the required ADE criteria.

Wall ties in cavity masonry external walls

In relation to the wall tie requirements for external walls tie “Type A” may be used if it satisfies the requirements of Building Regulation Part A – Structure. However, where tie “Type A” does not meet these requirements for external walls tie “type B” wall ties should be used.

Approved Document E clause 2.20 describes the requirements for Tie Type B (external walls).

Appendix A1 – Additional Guidance

Cavity stops

The flexible cavity stops at the junction of the separating wall and the external (flanking) wall are shown in the Robust Details as a single piece of material (diagram a). It is acceptable for these to be provided as two separate pieces (diagram b), or three separate pieces (diagram c).

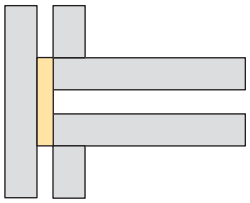


Diagram a

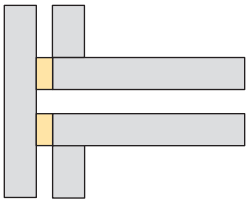


Diagram b

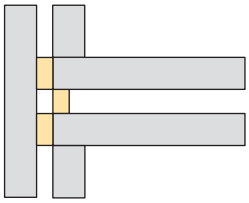


Diagram c

The following types of cavity stop may be used:

- single mineral wool batt cavity stops
- dual rigid cavity stops on either side of the external wall cavity (not for masonry separating walls)
- single rigid cavity stop attached to one leaf of the separating wall only (not for masonry separating walls)
- flexible single cavity stop such as the mineral wool “tubular style”
- flexible double cavity stops such as the mineral wool “tubular style” where one is fitted in line with each leaf of the separating wall.

Single rigid cavity stops which structurally couple both leaves of the separating wall are not permitted.

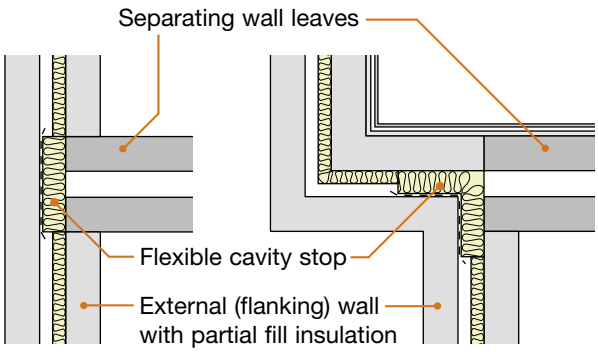


Diagram d

Partial fill insulation should be installed up to the cavity stop.

Cavity trays

The cavity trays shown above the cavity stops are included for illustrative purposes only and not for acoustic reasons.

Movement joints in cavity masonry separating walls

Separating walls with a gypsum-based board finish

Where possible, movement joints should be avoided in separating walls with a gypsum-based board finish. Where they are essential, they should be formed as follows:

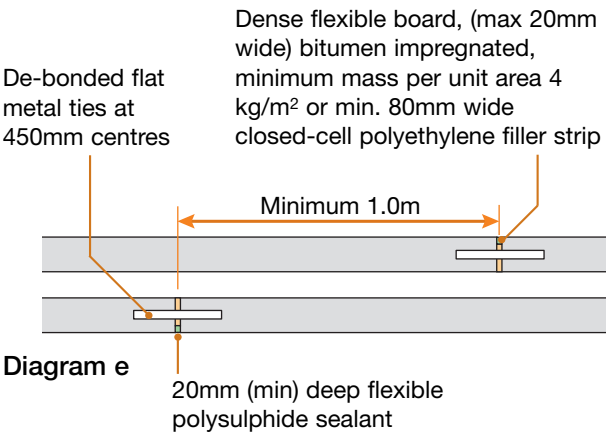


Diagram e

Where possible, movement joints should be located in bathrooms or other minor rooms or behind cupboards, etc.

Separating walls with wet plaster finish

Movement joints are not acceptable in robustdetails® separating walls with a wet plaster finish unless they are strategically placed behind internal wall junctions or service pipe casings.

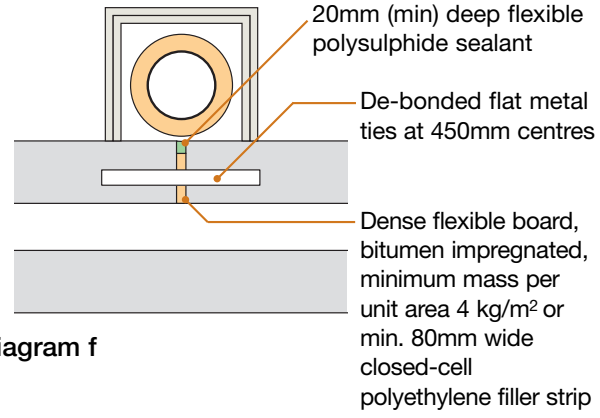


Diagram f

The movement joints must also be staggered and spaced not less than 1m apart, as shown in Diagram d above.

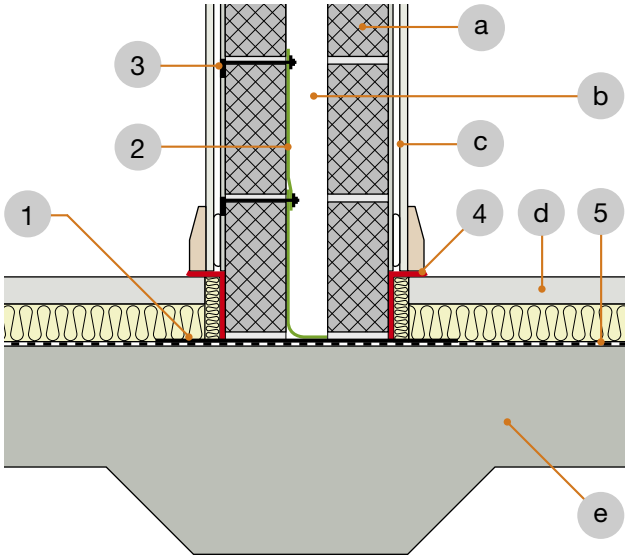
Appendix A2 – Specific Flanking Conditions

Contents

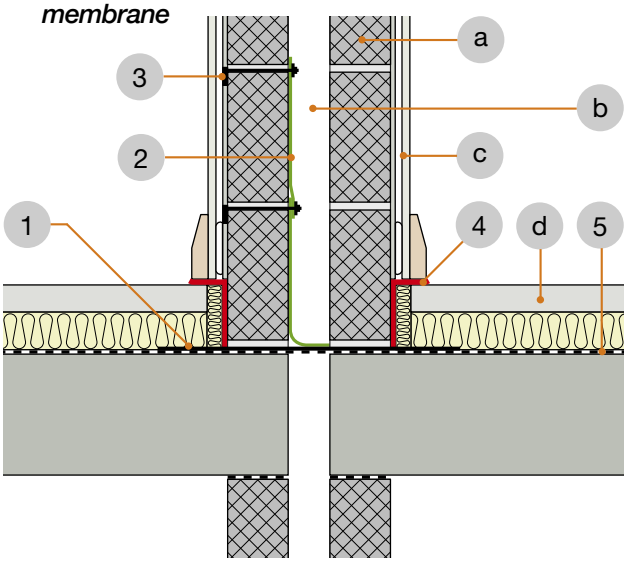
Appendix A2 – Specific Flanking Conditions

Icopal-MONARFLOOR® BRIDGESTOP® System for robustdetails® cavity masonry walls. Refer to Table 6 in Introduction.

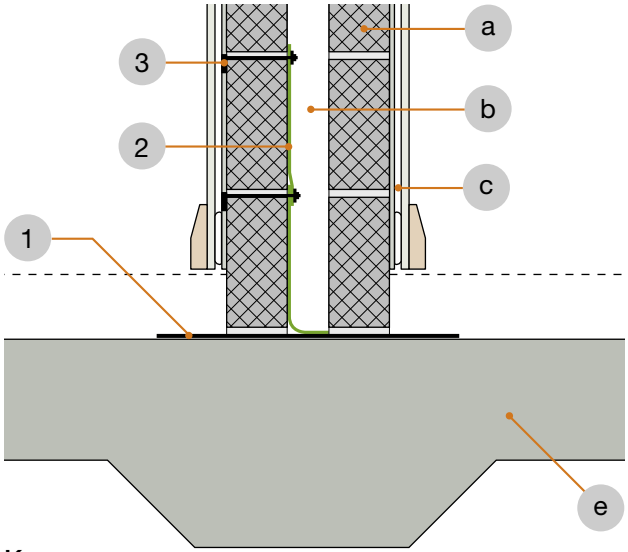
1. Separating wall – direct support on raft



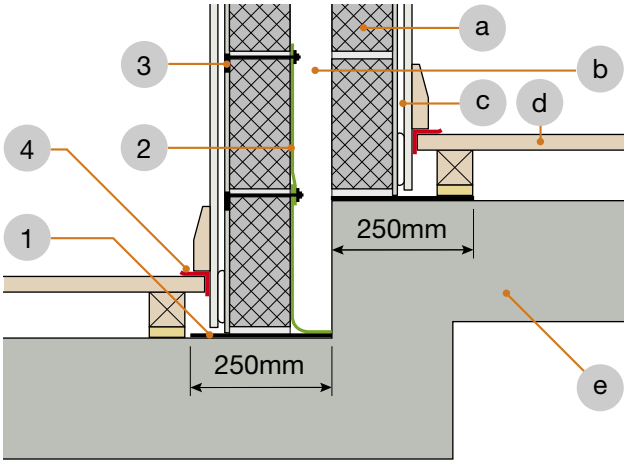
2. Separating wall – suspended floor with gas membrane



3. Insulated raft foundation



4. Stepped foundation



Key

1 500mm wide (or 250mm where shown) MONARFLOOR® BRIDGESTOP® 3mm HP Acoustic Membrane laid under the party wall over the dpm. This is an integral part of the system.

2 MONARFLOOR® BRIDGESTOP® Quilt in two lifts to prevent mortar droppings touching both masonry leaves.

3 MONARFLOOR® BRIDGESTOP® Tie to penetrate at max 450mm centres. Ties are reversible. May also be used as render depth marker.

4 MONARFLOOR® 6mm Flanking Band forming a 90° angle to isolate floating floor treatment from separating wall blocks, lining and skirting board.

5 Continuous dpm over the raft where ground gasses are an issue. Contact Icopal for specification.

a Min 100mm block (with appropriate Type A wall ties) dependent on Robust Detail being used. Refer to Table 6a in the Introduction.

b Min 75mm or 100mm cavity width dependent on Robust Detail being used.

c Wall finish dependent on Robust Detail used.

d Floating screed on insulation; or timber floating floor types FFT2 resilient cradle and batten, FFT3 resilient batten, or FFT4 deep platform system.

e 150mm (min) thick insitu concrete 365kg/m² (min) mass per unit area or Insulslab SFRC.

Contact details for Icopal-MONARFLOOR®:

Telephone: 0161 866 6540
Fax: 0161 865 8433
E-mail: acoustics.uk@icopal.com

BRIDGESTOP® is the subject of Patent Application ref GB2429719

Appendix A2 – Specific Flanking Conditions

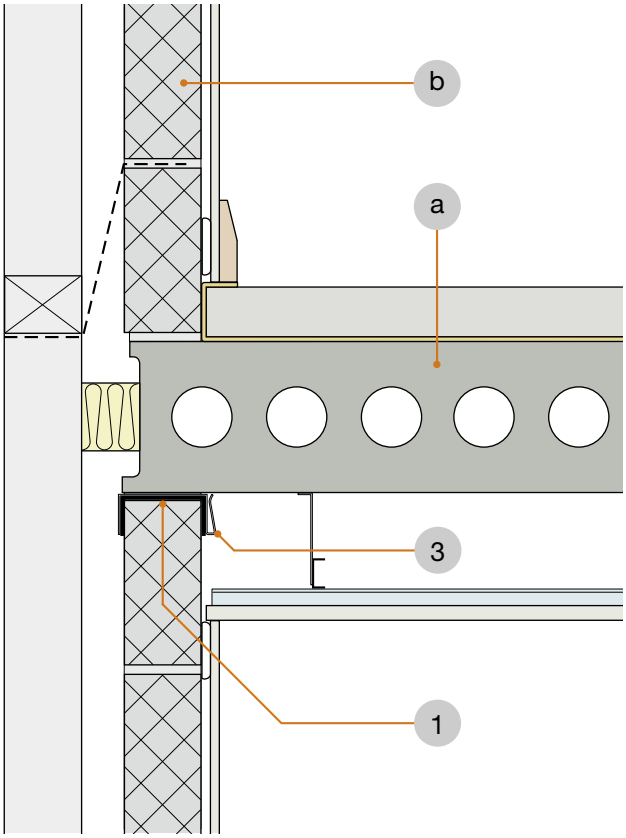
Prestoplan PresPeak 60 interlocking single spandrel panel system for use on robustdetails® timber separating walls in non room-in-roof situations.

Prestoplan PresPeak 60
has been removed from the Handbook
because Prestoplan is no longer trading.

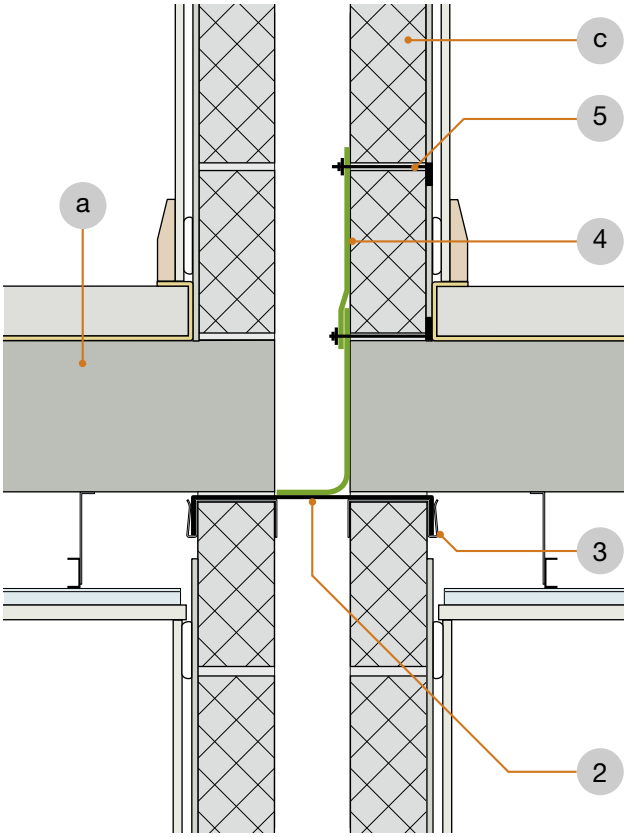
Appendix A2 – Specific Flanking Conditions

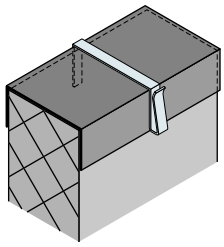
Icopal-MONARFLOOR® Wall Cap RDA2 System for robustdetails® separating floors in conjunction with cavity walls. Refer to Table 6 in Introduction.

1. External (flanking) wall junction

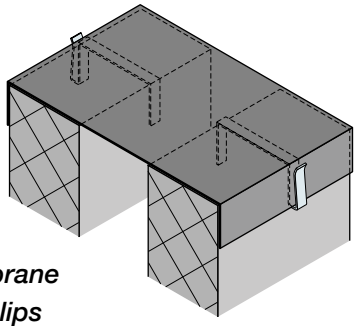


2. Separating wall junction





Wall Cap 200 and Wall Cap Clip



Wall Cap RDA2 Membrane and Wall Cap RDA2 Clips

Key

1 3.5mm MONARFLOOR® Wall Cap 200 laid as continuous layer on external (flanking) wall.

2 3.5mm MONARFLOOR® Wall Cap RDA2 Membrane laid as continuous layer on separating wall.

3 Wall Cap RDA2 Clips.

4 MONARFLOOR® RDA2 Quilt in two lifts to prevent mortar droppings touching both masonry leafs.

5 MONARFLOOR® RDA2 Tie to penetrate at max 450mm centres. Ties are reversible and may also be used as render depth gauges.

a robustdetails® separating floor. Refer to Table 6 in Introduction.

b External (flanking) wall. Refer to floor Robust Detail for specification.

c Separating wall. If using robustdetails® separating wall refer to Table 3a in Introduction.

When applying this system to forms of construction other than masonry, please refer to manufacturer's installation guides. Note: In these cases, not all components shown above may be required.

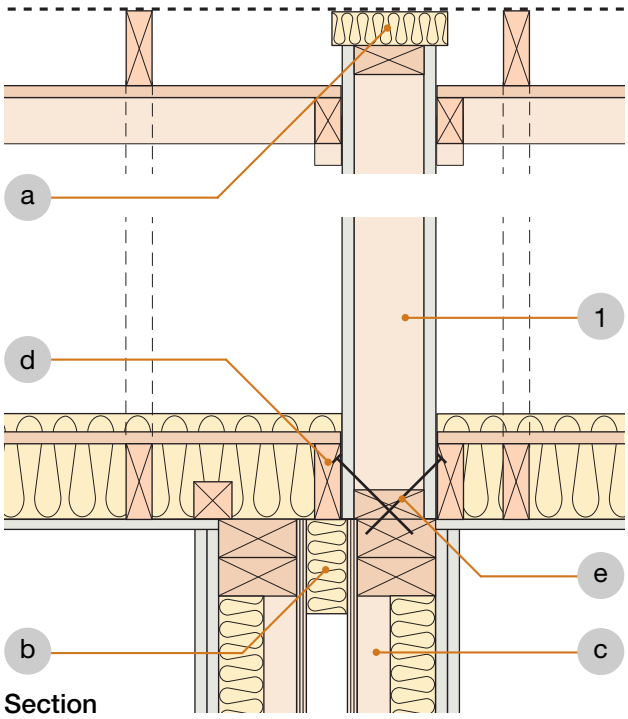
Contact details for Icopal-MONARFLOOR®:

Telephone: 0161 866 6540
Fax: 0161 865 8433
E-mail: acoustics.uk@icopal.com

Appendix A2 – Specific Flanking Conditions

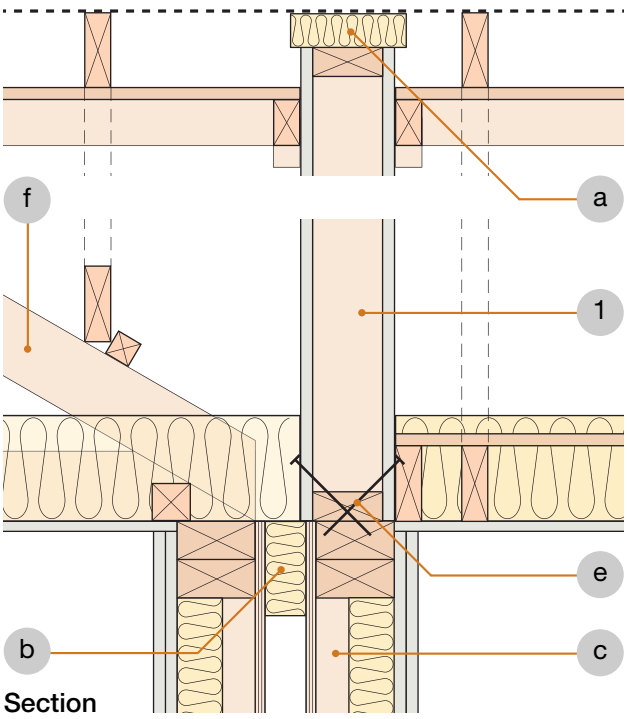
Donaldson Timber Systems Single Leaf Spandrel Panel System for use on robustdetails® timber separating walls in non room-in-roof situations. Refer to Table 6 in Introduction.

1. Spandrel panel located parallel to trussed rafters



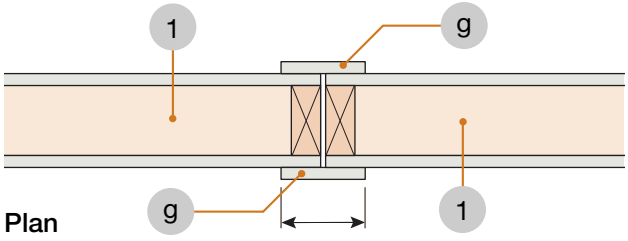
Section

2. Spandrel panel located across trussed rafters



Section

3. Spandrel panel joint detail
Panels secured together using angled screw fixings



Plan

Key

1 Donaldson Timber Systems Single Leaf Spandrel Panel System.

a Mineral wool closer.

b Flexible cavity stop.

c Timber frame separating wall.

d Site-fixed runners must not contact both wall leafs.

e Angled screw fixings to secure spandrel to wall head.

f Trusses and rafters must not contact both wall leafs.

g Gypsum board cover strip.

Refer also to manufacturer's guidance

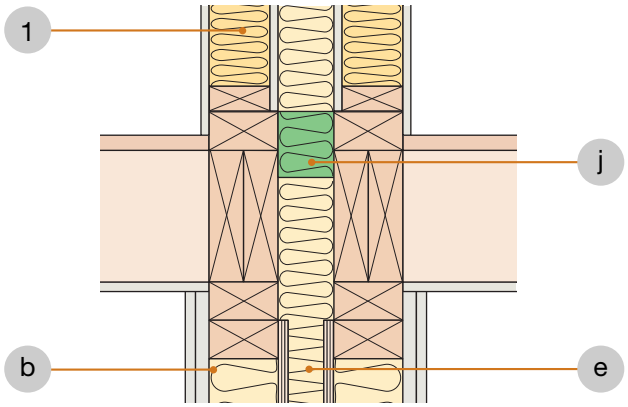
Contact details for
Donaldson Timber Systems Limited:

Telephone: 0845 009 2774
Email: help@donaldsontimbersystems.com
Web: www.donaldsontimbersystems.com

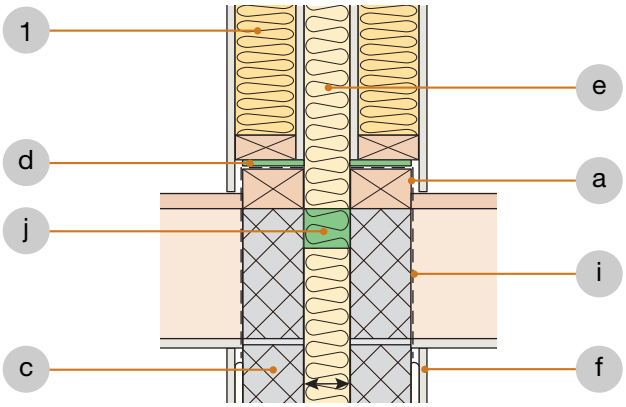
Appendix A2 – Specific Flanking Conditions

NTSROOF *RAPID FIT SYSTEM* for **robust**details® timber or masonry cavity walls for "room-in-roof" situations. Refer to Table 6 in Introduction.

1. Room-in-roof junction with timber cavity walls

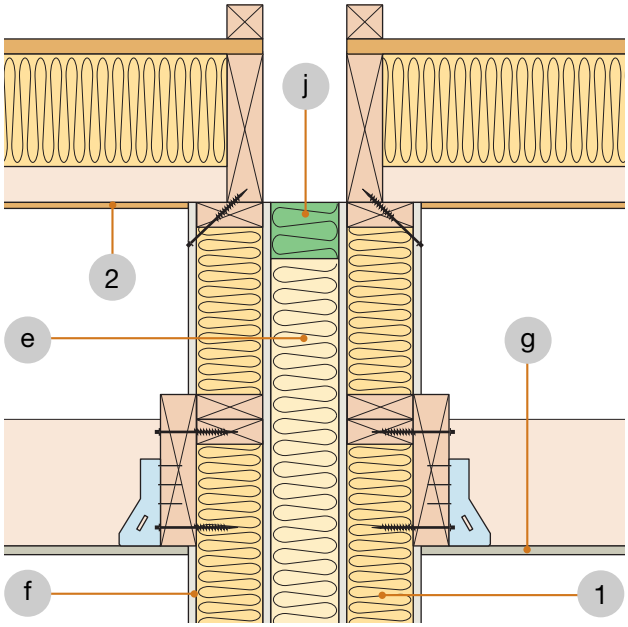


2. Room-in-roof junction with masonry cavity walls

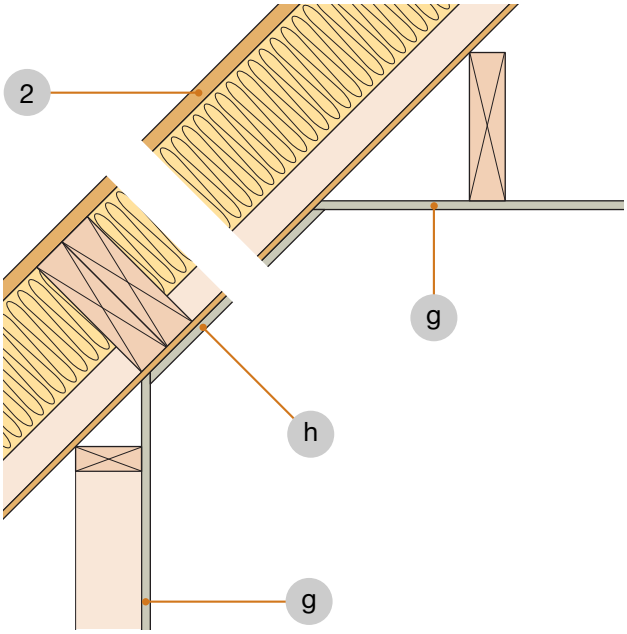


Min 75mm

3. Separating wall – roof junction



4. Room-in-roof lining requirements



Key

a Wall plate bedded on mortar (notched to take straps where these are required).

b Timber robustdetails® wall (see Table 6 in Introduction).

c Blockwork dependent on Robust Detail used.

d Intumescent sealant.

e Mineral wool roll or batt 40 kg/m^3 (max).

f Gypsum-based board (nominal 10 kg/m^2).

g Gypsum-based board (nominal 8 kg/m^2)

h Min. 1 layer gypsum-based board (nominal 10 kg/m^2).

i Vertical metal straps if required. Straps must not extend into the cavity.

j Cavity closer if required for other Regulations.

1 NTSROOF spandrel panel.

2 NTSROOF roof cassette.

Contact details for National Timber Systems:

Telephone: 01609 751111
Fax: 01609 788388
E-mail: george.rayden@nationaltimbersystems.co.uk
Web: www.nationaltimbersystems.co.uk

Appendix A3 – Specific Proprietary Products

Contents

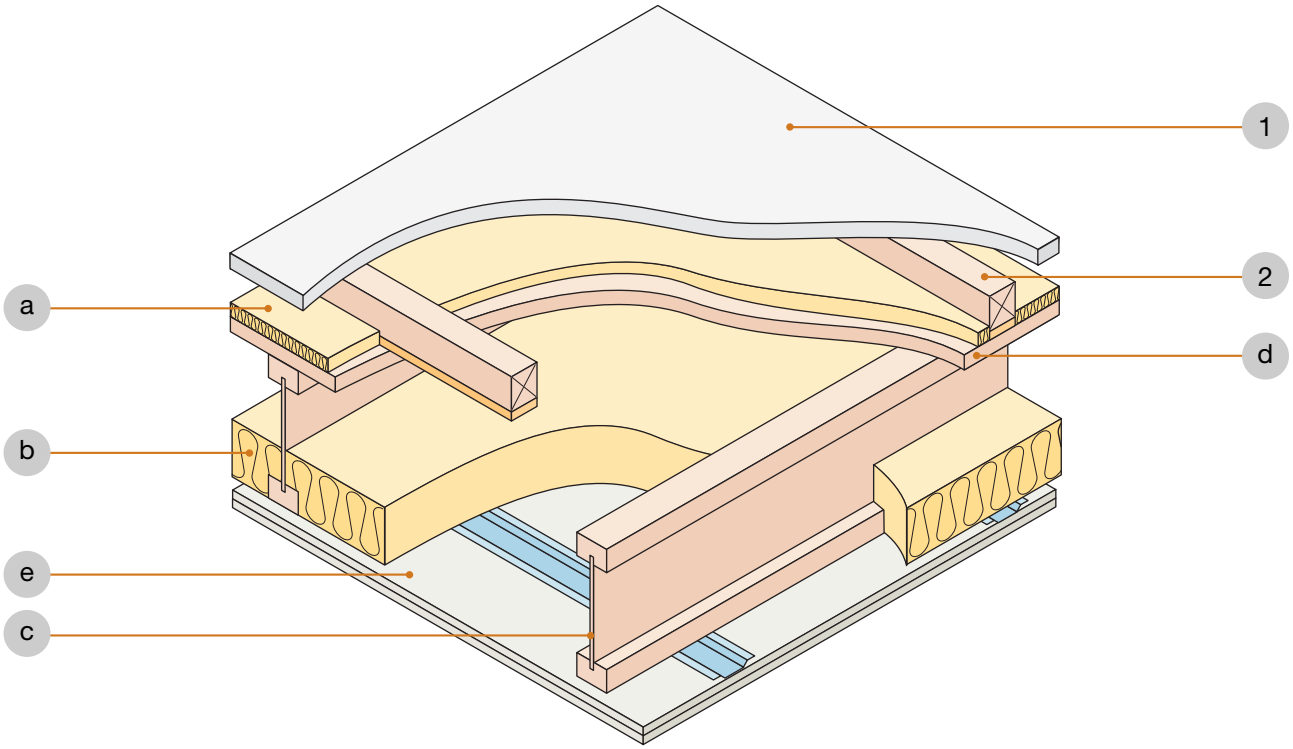
Appendix A3 – Specific Proprietary Products

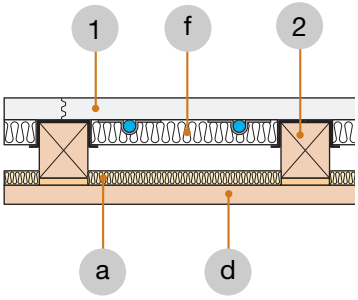
British Gypsum GypFloor SB floating floor treatment for robustdetails® concrete separating floors.

British Gypsum GypFloor SB system is no longer being produced, so has been removed from the Handbook.

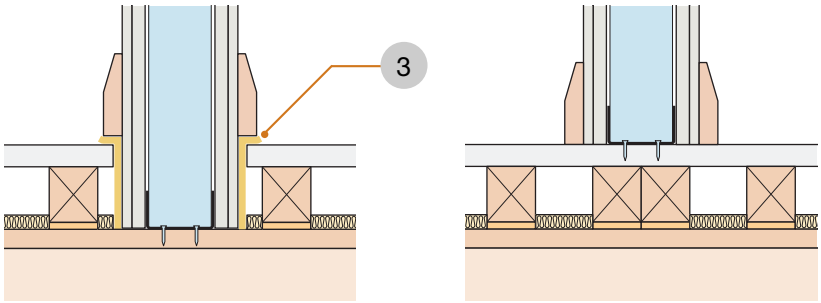
Appendix A3 – Specific Proprietary Products

JCW Soundboard One Platform Floor Board floating floor treatment for robustdetails® timber and steel joist separating floors. Refer to Table 7 in Introduction and the relevant Robust Details for acceptable joist types.





Optional underfloor heating



Partition may be fitted through or on top of the JCW Soundboard One Platform Floor Board

Key

1 18mm (min) JCW Soundboard One Floor Board.

2 JCW 80T Acoustic Batten.

3 5mm JCW Perimeter Edging Strip to the whole flooring perimeter.

a 25mm mineral wool insulation.

b 100mm mineral wool insulation - as relevant Robust Detail.

c Steel or timber joist - as relevant Robust Detail.

d Timber subdeck - as relevant Robust Detail.

e Ceiling treatment - as relevant Robust Detail.

f Optional underfloor heating.

JCW Soundboard One Platform Floor Board and related components must be fitted in accordance with the manufacturer's instructions.

Contact details for JCW:

Telephone: 01204 548400
Fax: 01204 366960
E-mail: sales@acoustic-supplies.com
Web: www.acoustic-supplies.com