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Astroflame Fireseals Ltd Unit 8 The I O Centre Stephenson Road Segensworth, Fareham Hampshire, PO15 5RU

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1121-CPR-JA5015

ETA-14/0049
ETA-14/0050
ETAG 026-Part 1
ETAG 026-Part 2
ETAG 026-Part 3
ASTRO INTU MASTIC
"see ETA-14/0049 & ETA-

14/0050 for relevant characteristics"



Issue: 1 Feb 2014





FILL, VOID OR CAVITY MATERIAL FOR USE IN THROUGH-PENETRATION FIRESTOP SYSTEMS AND/OR JOINT SYSTEMS AND/OR PERIMETER FIRE CONTAINMENT SYSTEMS SEE UL FIRE RESISTANCE DIRECTORY <R27645>

CAN/UL-115-11 UL 2079 ASTM-E 1966

LEED 2009-EQ ASTM D2369-10



APPROVED CF640

EN13501-2 EN1026:2000 EN10140-2:2010 ISO 11600 ISO 7619-1:2011 EN1366-3:2009 EN1366-4:2009 BS476 part 20&22 ISO 8339:2005 ISO 9046:2005

**Tehnical Data Sheet** 

Astro Intu Mastic®

**UIC** of product-type: INTUM

Astroflame Ltd Unit 8, The I O Centre Stephenson Road Segensworth, Fareham Hampshire, PO15 5RU











ETA 14-0049 ETA 14-0050 GE-11121-GRI-JIJ5015



Unique identification code of product-type: INTUM

Astro Intu Mastic® is an acrylic based sealant used to reinstate the fire resistance performance of wall and floor constructions where they have been provided with apertures for the penetrations of multiple services and to form linear gap seals where gaps are present in wall and floor constructions and linear joints where wall and floor constructions abut.

Astro Intu Mastic® has slight intumescent properties that cause it to swell on heating.

The Astro Intu Mastic® is supplied in liquid form contained within 310ml & 380ml cartridges, 600ml foils or in 5, 10, 20 or 25 kg tubs. The sealant is gunned or trowelled into the aperture in or between the separating elements/elements to a specific depth utilising various backing materials.

A polyethylene backing rod can be utilised as a depth gauge.

Reaction to Fire classification 'F'

The Intended use of system Astro Intu Mastic® is to reinstate the fire resistance performance of gaps in and joints between rigid and flexible wall constructions, gaps in and joints between rigid floor constructions.

The specific elements of construction that the system Astro Intu Mastic® may be used to provide a gap or joints seal in, are as follow:

#### Rigid Floors:

The floor must have a minimum thickness of 150mm and comprise concrete, aerated concrete or masonry, with a minimum density of 650kg/m<sup>3</sup>.

#### Rigid walls:

The wall must have a minimum thickness of 100mm and comprise concrete, aerated or masonry, with a minimum density of 650kg/m<sup>3</sup>

#### Flexible walls:

The wall must have a minimum thickness of 120mm and comprise timber or steel studs lined on both faces with minimum 2 layers of 12.5mm thick, 'Type F' Gypsum boards according to EN 520. In timber stud walls, no part of the penetration shall be closer than 100mm to a stud, the cavity must be insulation of class A1 or A2 according to EN 13501-1, is provided within the cavity between the penetration seal and the stud.

Astro Intu Mastic® is required to seal all joints and junctions during the sealing process of Astro® Batt. Astro® Coated Batt are 50mm thick and supplied in overall dimensions 1200mm x 600mm with a density 140kg/m³ and is subject to a separate ETA referenced 14-????.

The Supporting construction must be classified in accordance with EN 13501-2 for the required fire resistance period.

The system Astro Intu Mastic® may be used to provide a linear joint or gap seal with specific supporting constructions and substrates and as a penetration seal.

The maximum permitted joint/gap width for system Astro Intu Mastic® is 50mm. The maximum movement capability of system Astro Intu Mastic® is ≤ 7.5%

Astro Intu Mastic® has been tested in accordance with EOTA Technical Report - TR024 - Edition November 2006, for the type Z<sub>1</sub>, use category specific in ETAG 026-3 (used as European Assessment Document, EAD). The results of the tests have demonstrated suitability for Penetration Seals and Linear Gap Joints.

Type  $Z_1$ : Intended for use In internal conditions with humidity equal to or higher than 85% RH excluding temperatures below 0°C, without exposure to rain or UV.







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#### **Air Permeability**

System Astro Intu Mastic® has been tested in accordance with BS EN 1314-1 to provide the following results:

Pro	Product tested		Astro Intu Mastic® intumescent sealant		
	Results under positive chamber		amber	Results under negative chamber	
	pre	ssure		pre	essure
Pressure (Pa)	Leakage (m³/h)	Leakage M²/	-	Leakage (m³/h)	Leakage (m³/m²/h)
50	0.0	0.0	)	0.0	0.0
100	0.0	0.0	)	0.0	0.0
150	0.0	0.0	)	0.1	2.8
200	0.0	0.0	)	0.1	2.8
250	0.0	0.0	)	0.1	2.8
300	0.0	0.0	)	0.0	0.0
450	0.1	2.8	3	0.1	2.8
600	0.1	2.8	3	0.1	2.8

#### **Airbourne Sound Insulation**

#### **Dangerous Substances Deceleration**

Astroflame Fireseals Limited has presented a declaration that Astro Intu Mastic® does not contain any substance of high concern with regards to REACH Regulations and are compliant with the requirements reference to http://ec.europa.eu/enterprise/construction/cpd-ds/index.cfm

Confirmation has further been declared that all dangerous chemical substances ≥1.0 % w/w as well as all toxic, carcinogenic, toxic for reproduction and mutagenic chemical substances ≥ 0.1 % w/w (Status: 29. adaption – 2004/73/EG – of the EU directive 67/548/EEC - classification, packaging and labelling of dangerous substances) are stated in the Astro Intu Mastic® safety data sheets (according to91/155/EEC including amendments) and have been considered for the classification of the products according to the directive 1999/45/EG (classification of preparations, including amendments).

All dangerous chemical substances are below the classification limits of 67/548/EEC.

In addition to the specific clauses relating to dangerous substances contained in this European technical approval, there may be other requirements applicable to the products falling within its scope (e.g. transposed European legislation and national laws, regulations and administrative provisions). In order to meet the provisions of the Construction Products Regulation, these requirements need also to be complied with, when and where they apply.

The provisions made in the European Technical Assessment are based on an assumed working life of the Astro Intu Mastic® of 10 years, provided that the conditions laid down in sections 4.2/5.1/5.2 for the packaging/transport/storage/installation/use/ repair are met. The indications given on the working life cannot be interpreted as a guarantee given by the producer, but are to be regarded only as a means for choosing the right products in relation to the expected economically reasonable working life of the works.







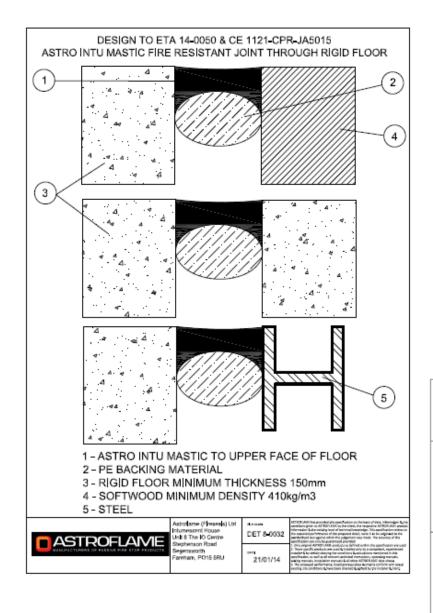
## ASTRO INTU MASTIC®

ETA 14-0049 ETA 14-0050 CE-1121-CRI-JASOUS



Unique identification code of product-type: INTUM

Astro Intu Mastic® Linear Joint Seals. Min 150mm thick Rigid Floor, Horizontally orientated to one side of the floor			
Substrate	Depth (mm)	Backing material	Classification
Concrete-Concrete	10(Single side)	PE backing rod	E240 EI45-H-X-F-W 00 to 20
Concrete-Concrete	25(Single Side)	PE backing rod	E240 EI90-H-X-F-W 00 to 50
Concrete-Steel	10(Single Side)	PE backing rod	E120 EI20-H-X-F-W 00 to 20
Concrete-Steel	50(Single Side)	PE backing rod	E240 EI90-H-X-F-W 00 to 50
Concrete-Softwood	10(Single Side)	PE backing rod	EI30-H-X-F-W 00 to 20
Concrete-Softwood	50(Single Side)	PE backing rod	EI45-H-X-F-W 00 to 50





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ASTRO INTU MASTIC
"see ETA-14/0049 & ETA14/0050 for relevant
characteristics"



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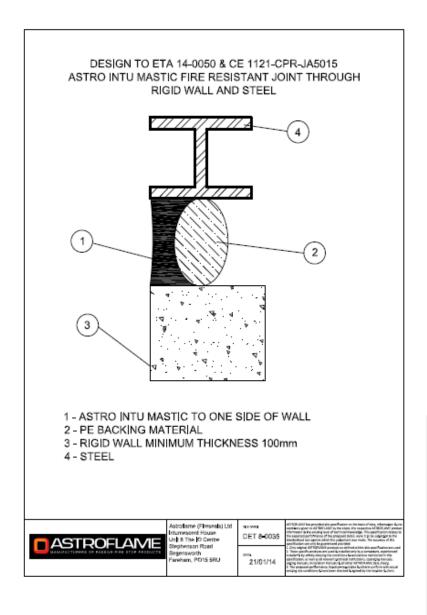
## ASTRO INTU **MASTIC®**

ETA 14-0049 ETA 14-0050 **CE-1121-CPR-JA5015** 



Unique identification code of product-type: INTUM

Astro Intu Mastic® Linear Joint Seals. Min 100mm Thick Rigid Floor, Vertically orientated Sealant to one side of the wall			
Substrate	Depth (mm)	Backing material	Classification
Concrete-Concrete	10(Single side)	PE backing rod	E120 EI45-V-X-F-W 00 to 20
Concrete-Concrete	25(Single Side)	PE backing rod	E120 EI60-V-X-F-W 00 to 50
Concrete-Steel	10(Single Side)	PE backing rod	E120 EI20-V-X-F-W 00 to 20
Concrete-Steel	50(Single Side)	PE backing rod	E45 EI30-V-X-F-W 00 to 50
Concrete-Softwood	10(Single Side)	PE backing rod	E30 EI20-V-X-F-W 00 to 20
Concrete-Softwood	50(Single Side)	PE backing rod	EI45-V-X-F-W 00 to 50





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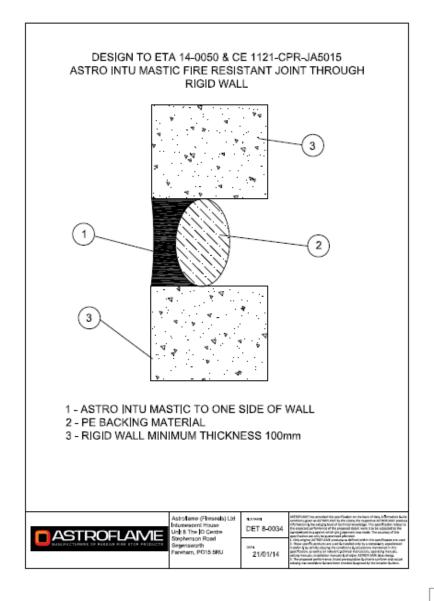


### ASTRO INTU MASTIC®

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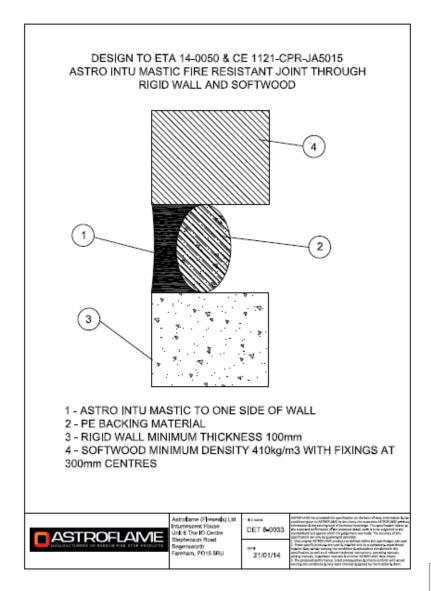




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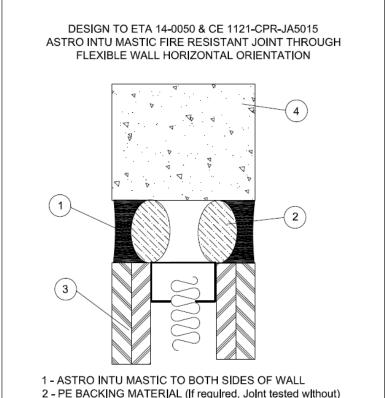


ETA 14-0049 ETA 14-0050 **CE-1121-CPR-JA5015** 



Unique identification code of product-type: INTUM

Astro Intu Mastic® Linear Joint Seals. Min 120mm thick - Sealing of Drywall Head Track - Sealant Flush To Both Faces of The Wall. Horizontally Orientated Sealant To Both Sides of The Wall			
Substrate	Depth (mm) Classification		
Gypsum board/Steel head track	25mm (both side)	EI120-T-X-F-W 00 to 20	
Gypsum board/Steel head track	25mm (both Side)	EI120-V-X-F-W 00 to 50	



3 - FLEXIBLE WALL MINIMUM THICKNESS 120mm

4 - RIGID FLOOR





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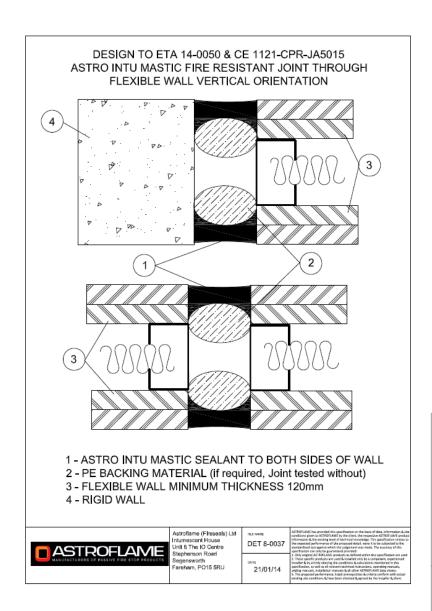


ETA 14-0049 ETA 14-0050 CE-1121-CRI-JASOUS



Unique identification code of product-type: INTUM

Astro Intu Mastic® Linear Joint Seals. Min 120mm Thick Flexible or Rigid Wall. Sealant Flush to Both Faces of The Wall		
Depth (mm)	Backing material	Classification
12.5(Both side)	PE backing rod	EI120-V-X-F-W 00 to 20





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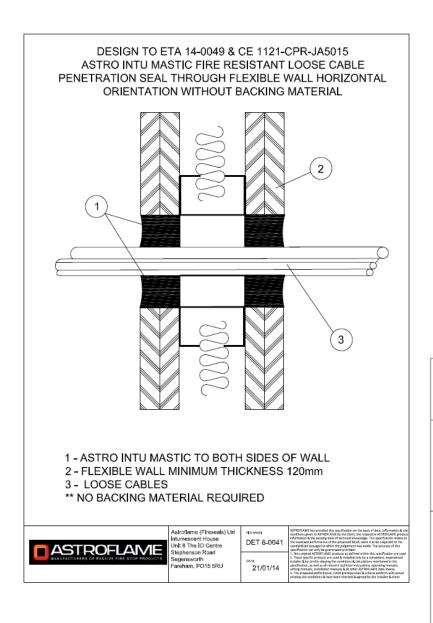


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Unique identification code of product-type: INTUM

Astro Intu Mastic® Linear Joint Seals. Min 150mm thick Rigid Floor, Horizontally orientated to one side of the floor. Sealant to both sides of the wall			
Penetration Specification	Astro Intu Mastic® (installed Both Faces)	Backing material	Classification
Cables up to 21mm			
Perforated Cable Tray 450mm x 50mm	490mm long x 100mm high x 25mm deep	70mm thick, 80kg/m <sup>3</sup>	E120 EI90
Cables up to 21-50mm	200mm long x 100mm high x 25mm deep	N/A	E90 EI60





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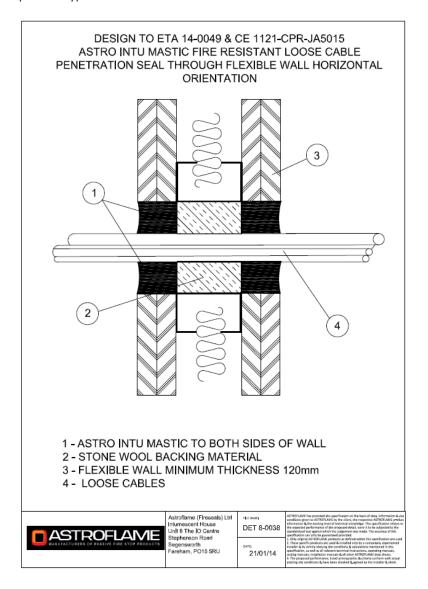


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### ASTRO INTU MASTIC®

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Unique identification code of product-type: INTUM

DESIGN TO ETA 14-0049 & CE 1121-CPR-JA5009
ASTRO INTU MASTIC FIRE RESISTANT CABLE TRAY & CABLE
PENETRATION SEAL THROUGH FLEXIBLE WALL HORIZONTAL
ORIENTATION WITHOUT BACKING MATERIAL

1 - ASTRO INTU MASTIC TO BOTH SIDES OF WALL
2 - FLEXIBLE WALL MINIMUM THICKNESS 120mm
3 - CABLE TRAY WITH CABLES
\*\* NO BACKING MATERIAL REQUIRED

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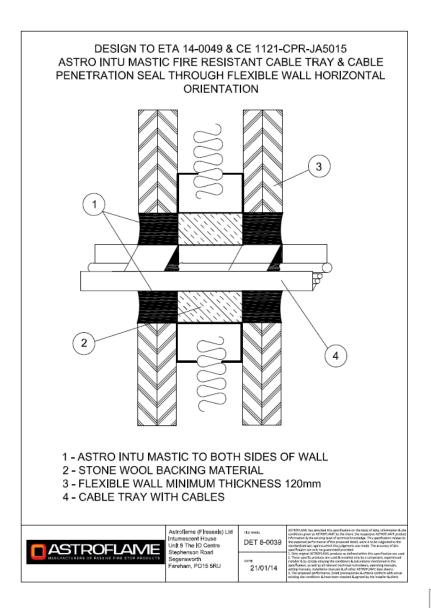


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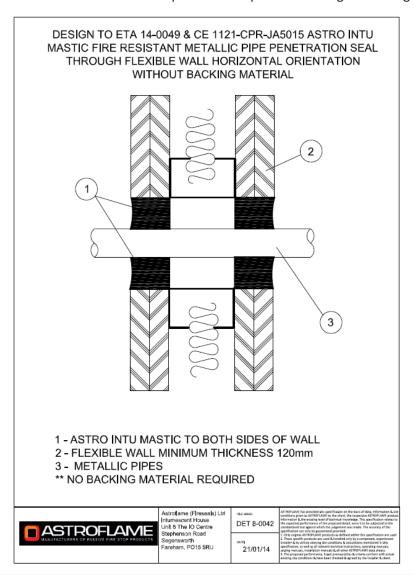
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Unique identification code of product-type: INTUM

Astro Intu Mastic® Linear Joint Seals. Min 120mm Thick Flexible or Rigid Wall. Sealant to Both Sides of The Wall.			
Penetrations Specification	Depth (mm)	Backing material	Classification
Copper/Steel Pipe 15mm $\emptyset$ , 0.8mm - 7.4 wall thickness	10mm annulus x 25mm deep	N/A	E120 C/U EI20 C/U
Copper/Steel Pipe 40mm $\emptyset$ , 0.8mm - 14.2mm wall thickness	10mm annulus x 25mm deep	N/A	E120 C/U EI15 C/U
Copper/Steel Pipe 40-159mm Ø, 1.8mm - 14.2mm wall thickness	10mm annulus x 25mm deep	N/A	E120 C/U
Copper/Steel Pipe 40mm Ø, 0.8mm - 14.2mm wall thickness*	10mm annulus x 25mm deep	N/A	E120 C/U EI90 C/U
Copper/Steel Plpe 40-159mm Ø, 1.8mm - 14.2mm wall thickness*	10mm annulus x 25mm deep	N/A	E120 C/U EI20 C/U

\* Astro Thermal defense wrap to the unexposed face long 300m long





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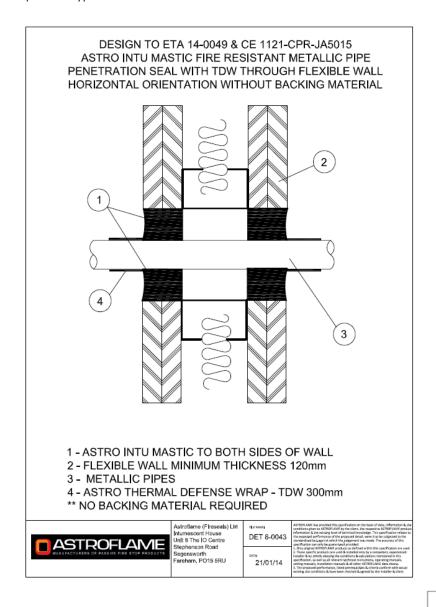


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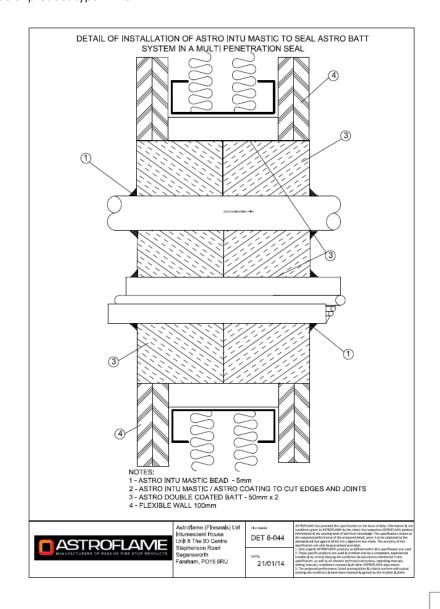


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## ASTRO INTU

#### XHHW & XHHW7.R27645



MASTIC\* ULCertification Fill or Cavity Materials Certified for US & Cenada

Unique identification code of product-type: INTUM

XHHW & XHHW7.R27645

UL Certification Fill or Cavity Materials Certified for US & Canada

Astro Intu Mastic® covers the fire exposure and hose stream tests conducted under UL Project No. 13CA05419. The fire exposure and hose stream tests were conducted in accordance with the Fourth edition of the Standard, December 12, 2012 and the Fourth Edition of the Standard, Fire Tests of Firestop Systems, CAN/ULC-S115-11, June 2011.

#### Test Assembly:

The test assembly consisted of a concrete floor and a steel stud/gypsum board wall assembly. The test assembly consisted of one head-of-wall joint system and two wall-to-wall joint system. The construction details of each joint system are described below:

#### Head of Wall

Nominal 25mm depth of sealant in 50mm wide joint, finished flush to each of the wall. Sealant backed with 80mm deep mineral wool 60kg/m³. Faces of the joint finished with steel studs but unlined.

#### Wall to Wall

Nominal 25mm depth of sealant in 10mm wide joints, finished flush to each face of the wall. Sealant backed with 120mm deep mineral wool 60kg/m³. Faces of the joint finished with steel studs but unlined.

#### Wall to Wall

Nominal 25mm depth of sealant in 50mm wide joint, finished flush to each face of the wall. Sealant backed with 80mm deep mineral wool 60kg/m<sup>3</sup>. Faces of the joint finished with steel studs but unlined.

Astro Intu Mastic® for use in joint system described in Vol.2 of the UL Fire Resistance Directory. The specific system Nos. and the applicable rating information are as follows:

Custom No	Rating, Hr			
System No.	F	FT	FH	FTH
HW-S-0102	2	2	2	2
HW-S-0103	2	2	2	2

Astro Intu Mastic® for use in Joints Systems described in the product Certified for Canada Directory. The specific System No. and the applicable rating information are as follows:

Custom No	Rating, Hr			
System No.	F	FT	FH	FTH
HW-S-0065	2	2	0	0
HW-S-0066	2	2	0	0



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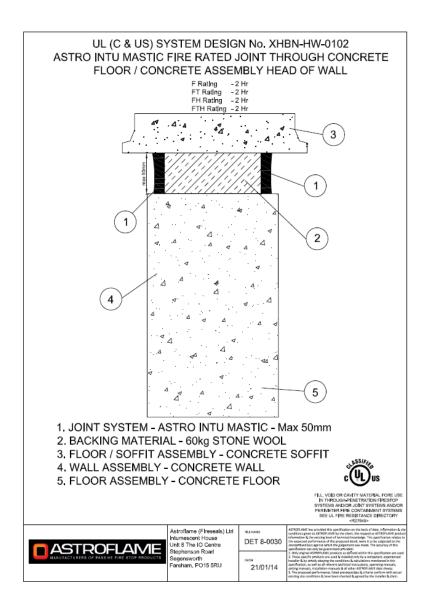
#### XHHW & XHHW7.R27645



ULCertification Fill or Certify Materials Certification US & Cenada

Unique identification code of product-type: INTUM

Maximum Joint Width, mm (in)	Min Sealant Thickness, mm (in)	Min packing Material Thickness, mm (in)
10 (3/8)	5 (1/4)	120 (4-3/4)
20 (7/8)	10 (3/8)	110 (4-3/8)
30 (1-1/4)	15 (5/8)	100 (4)
40 (1-5/8)	20 (3/4)	90 (3-1/2)
50 (2)	25 (1)	80 (3-1/8)





FILL, VOID OR CAVITY MATERIAL FOR USE IN THROUGH-PENETRATION FIRESTOP SYSTEMS AND/OR JOINT SYSTEMS AND/OR PERIMETER FIRE CONTAINMENT SYSTEMS SEE UL FIRE RESISTANCE DIRECTORY <R27645>



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## ASTRO INTU **MASTIC®**

#### XHHW & XHHW7.R27645



UL Certification Fill or Cavity Materials Certified for US & Canada

Unique identification code of product-type: INTUM

## UL SYSTEM DESIGN No. XHBN-WW-0066 ASTRO INTU MASTIC FIRE RATED JOINT THROUGH LIGHTWEIGHT **PARTITION** F Rating - 2 Hr FT Rating - 2 Hr FH Rating - 0 Hr FTH Rating - 0 Hr 3 4 3 1. JOINT SYSTEM - ASTRO INTU MASTIC - Max 50mm 2. BACKING MATERIAL - 60kg STONE WOOL 3. WALL ASSEMBLY - PLASTERBOARD WALL 4. PARTITION - METAL STUD Astroflame (Fireseals) Ltd Inturnescent House Unit 8 The IO Centre Stephenson Road DET 8-0020 ASTROFLAME tephenson Road legensworth areham, PO15 5RU



FILL, VOID OR CAVITY MATERIAL FOR USE IN THROUGH-PENETRATION FIRESTOP SYSTEMS
AND/OR JOINT SYSTEMS AND/OR PERIMETER
FIRE CONTAINMENT SYSTEMS
SEE UL FIRE RESISTANCE DIRECTORY <R27645>



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21/01/14



## ASTRO INTU MASTIC®

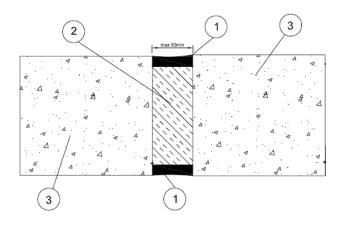
#### XHHW & XHHW7.R27645



MASTIC ULQuilibria IIII or Cavity Materials Certified for US & Canada
Unique identification code of product-type: INTUM

UL SYSTEM DESIGN No. XHBN-WW-0065
ASTRO INTU MASTIC FIRE RATED JOINT THROUGH CONCRETE
WALL / CONCRETE WALL ASSEMBLY

F Rating - 2 Hr FT Rating - 2 Hr FH Rating - 0 Hr FTH Rating - 0 Hr



- 1. JOINT SYSTEM ASTRO INTU MASTIC Max 50mm
- 2. BACKING MATERIAL 60kg STONE WOOL
- 3. FLOOR ASSEMBLY CONCRETE FLOOR



ILL, VOID OR CAVITY MATERIAL FORE USE IN THROUGH PENETRATION FIRESTOP SYSTEMS AND/OR JOINT SYSTEMS AND/OR PERIMETER FIRE CONTAINMENT SYSTEMS SEE UL FIRE RESISTANCE DIRECTORY



Astroflame (Fireseals) Ltd Intumescent House Unit 8 The IO Centre Stephenson Road Segensworth Fareham, PO15 5RU

DET 8-0025

21/01/14

«REZIGNAM" has provided this approximation in the basis of initial, information is, committee upon the school of the committee of the commi



FILL, VOID OR CAVITY MATERIAL FOR USE IN THROUGH-PENETRATION FIRESTOP SYSTEMS AND/OR JOINT SYSTEMS AND/OR PERIMETER FIRE CONTAINMENT SYSTEMS SEE UL FIRE RESISTANCE DIRECTORY <R27645>









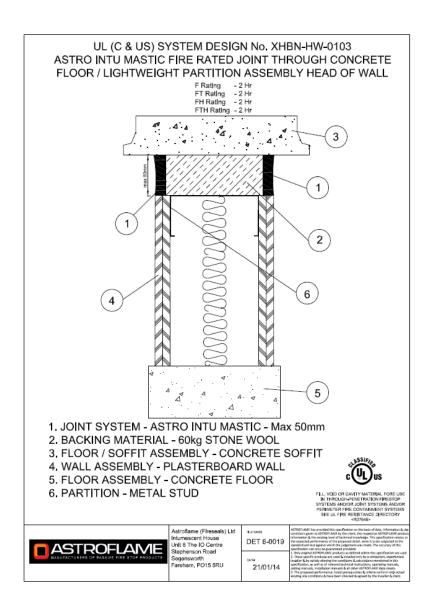
## ASTRO INTU MASTIC®

#### XHHW & XHHW7.R27645



UL Certification Fill or Cavity Materials Certified for US & Canada

Unique identification code of product-type: INTUM





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### ASTRO INTU MASTIC®





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**Durability and Serviceability** 

Type  $Z_1$ : Intended for use internal conditions with humidity equal to or higher than 85% RH excluding temperatures below 0°C, without exposure to rain or UV. The Durability conditions specified for this material was Type  $Z_1$  (23°C, 40°C). this is and 8 and 16 hours cycled program with extremities of 23°C and 40°C lasting for 21 days.

ISO7619-1(2010) Hardness after Curing using Ceast Shore 'A' bench-top durometer (T13) Readings taken after 15s Conditions: 23°C 50% RH

ISO8339:2005 Tensile Properties using instron 6025 test frame, 1kN load cell, environmental chamber, pneumatic grips Conditions: Test rate 5.5mm/s. Temperature as indicate.

Note: Three specimens prepared as controls and for durability using M2 mortar and 12mm spacers as indicate in ISO 8339.

ISO9046;2005 Adhesion properties using instron 5500 test frame, pneumatic grips, 1kN load cell

Conditions: 23°C 50%RH

Notes: Three specimens prepared as controls and for durability using M2 mortar and 12mm spacers as indicated in ISO 9046

#### LEED 2009 EQ c4.1, SCAQMD rule 1168 (2005) - VOC

Sample identification Astro Intu Mastic®	
Product type	Sealant - Other (Fire Resistance)
Product Data	Density: 1.6g/ml at 20°C Water content: 32.5 g/l Exempt Compounds: none ***

Method	Principle	Parameter	Detection Limit	Uncertainty Um (%)
LEED 2009 EQ c4.1	Gravimetric	Total Volatiles, SCAQMD rule 204	1 g/l	10%

Volatile content of the sample was determined gravimetrically by heating up to 110°C during 60 minutes. The result is the average of double testing. The result was calculated as: ( [g all volatiles] - [g exempt compounds] ) / ( [l material] - [l water] - [l exempt compounds] )

Solid content	Water content, % mass	Exempt compounds, % mass	VOC less water less exempt compounds, g/l	VOC limit g/l
76.8	2	0***	350	750*

<sup>\*</sup> VOC limit for "other sealants"





<sup>\*\*\*</sup> No information about exempt compounds. Set to zero

### ASTRO INTU Mastic®

## TECHNICAL SCHEDULE



Unique identification code of product-type: INTUM



This relates to the use of Astro Intu Mastic® through 3<sup>rd</sup> party certification with Certifire for the fire protection of movement joints within walls and floors. The detailed scope is given in the Approval Matrix. This shows the thickness and acceptable services for Astro Intu Mastic® required to provide fire resistance periods in accordance with BS 476: part 20: 1987 of up to 240 minutes for wall/floor constructions. The scope of certification complies with the guidelines stated in the ASFP Red Book: 3<sup>rd</sup> Edition for 3<sup>rd</sup> party certification schemes.

This level of certification is designed to demonstrate compliance of the products or system specifically with Approved Document B (England and Wales). If compliance is required to regulatory or guidance documents there may be additional constructions or conflict to be taken into account.

The product is approved on the basis of:

- I. Initial type testing
- II. Audit testing at the frequency specified in TS03
- III. A design appraisal against TS03
- IV. Inspection and surveillance of factory production control

The concrete walls shall be at least 150mm thick and the floors at least 230mm thick and have at least the same fire rating as that required for the penetration seal.

Masonry and concrete gap faces will be within the density range of 450 to 2300kg/m³, and gap faces will be free loose or flaking materials

Backing or support materials may be polyethylene or polyurethane foam, material or ceramic fibre insulation.

The approval relates to ongoing production. Product and/or its immediate packaging is identified with the manufacture's name, the product name or number, the CERTIFIRE name or name and mark, together with the CERTIFRE certificate number CF640 and application where appropriate.







## ASTRO INTU MASTIC®

## TECHNICAL SCHEDULE



Unique identification code of product-type: INTUM

oduc	t Name		Astro Intu Mastic <sup>®</sup>			
	Configuration	Max. Joint Width (mm)	Minimum Seal Depth (mm)	Backing Material	Integrity (mins)	Insulation (mins)
	Autoclaved aerated concrete to autoclaved aerated concrete	20	10	Polyethylene 30mm diameter	300	300
	Autoclaved aerated concrete to autoclaved aerated concrete	30	15	Polyethylene 40mm diameter	300	210
ck)	Autoclaved aerated concrete to autoclaved aerated concrete	40	20	Polyethylene 50mm diameter	300	210
mm thi	Autoclaved aerated concrete to autoclaved aerated concrete	50	25	Polyethylene 60mm diameter	300	210
mın 250	Brick to Autoclaved aerated concrete	15	10	Polyethylene 20mm diameter	240	0
ctions (	Brick to Autoclaved aerated concrete	25	10	Polyethylene 30mm diameter	240	30
Wall Constructions (min 250mm thick)	Steel to aerated blockwork	30	15	Polyethylene 40mm diameter	300	90
Wall	Steel to aerated blockwork	50	25	Ethafoam 50mm diameter	60	30
	Hardwood to aerated blockwork	50	25	Ethafoam 50mm diameter	60	60
	Softwood to aerated blockwork	25	12	Ethafoam 30mm diameter	30	30
	Aerated concrete to aerated concrete	20	10	Polyethylene 30mm diameter	300	120
າ thick)	Aerated concrete to aerated concrete	30	15	Polyethylene 40mm diameter	300	60
. 250mn	Aerated concrete to aerated concrete	40	20	Polyethylene 50mm diameter	300	60
ns (min	Aerated concrete to aerated concrete	50	25	Polyethylene 60mm diameter	300	210
ıstructic	Softwood to aerated conrete	25	12	Ethafoam 30mm diameter	30	30
Floor Constructions (min 250mm thick)	Hardwood to aerated cocnrete	50	25	Ethafoam 50mm diameter	30	30
正	Steel to aerated concrete	50	25	Ethafoam 50mm diameter	60	60







## ASTRO INTU MASTIC®

## TECHNICAL SCHEDULE



Unique identification code of product-type: INTUM

Product Name			Astro Intu Mastic®				
	Configuration	Max. Joint Width (mm)	Minimum Seal Depth (mm)	Backing Material	Integrity (mins)	Insulation (mins)	
	Autoclaved aerated concrete to autoclaved aerated concrete	50	25	Polyethylene 50mm diameter	120	60	
	Autoclaved aerated concrete to autoclaved aerated concrete	40	20	Polyethylene 40mm diameter	120	30	
	Autoclaved aerated concrete to autoclaved aerated concrete	30	15	Polyethylene 30mm diameter	120	30	
Wall Constructions (min 100mm thick)	Autoclaved aerated concrete to autoclaved aerated concrete	20	10	Polyethylene 20mm diameter	120	30	
100m ר	Autoclaved aerated concrete to softwood	50	25	Polyethylene 50mm diameter	45	30	
ons (mir	Autoclaved aerated concrete to softwood	40	20	Polyethylene 40mm diameter	30	15	
nstructi	Autoclaved aerated concrete to softwood	30	15	Polyethylene 30mm diameter	30	15	
Wall Cor	Autoclaved aerated concrete to softwood	20	10	Polyethylene 20mm diameter	30	15	
	Autoclaved aerated concrete to steel	50	25	Polyethylene 50mm diameter	45	30	
	Autoclaved aerated concrete to steel	40	20	Polyethylene 40mm diameter	45	30	
	Autoclaved aerated concrete to steel	30	15	Polyethylene 30mm diameter	45	30	
	Autoclaved aerated concrete to steel	20	10	Polyethylene 20mm diameter	120	15	







## TECHNICAL SCHEDULE



Unique identification code of product-type: INTUM

ct Name	Astro Intu Mastic®				
Configuration	Minimum Seal Depth (mm)	Backing Material	Integrity (mins)	Insulation (mins)	
Autoclaved aerated concrete to autoclaved aerated concrete	50	25	Polyethylene 50mm diameter	120	60
Autoclaved aerated concrete to autoclaved aerated concrete	40	20	Polyethylene 40mm diameter	120	30
Autoclaved aerated concrete to autoclaved aerated concrete	30	15	Polyethylene 30mm diameter	120	30
Autoclaved aerated concrete to autoclaved aerated concrete	20	10	Polyethylene 20mm diameter	120	30
Autoclaved aerated concrete to softwood	50	25	Polyethylene 50mm diameter	45	30
Autoclaved aerated concrete to softwood	40	20	Polyethylene 40mm diameter	30	15
Autoclaved aerated concrete to softwood	30	15	Polyethylene 30mm diameter	30	15
Autoclaved aerated concrete to softwood	20	10	Polyethylene 20mm diameter	30	15
Autoclaved aerated concrete to steel	50	25	Polyethylene 50mm diameter	45	30
Autoclaved aerated concrete to steel	40	20	Polyethylene 40mm diameter	45	30
Autoclaved aerated concrete to steel	30	15	Polyethylene 30mm diameter	45	30
Autoclaved aerated concrete to steel	20	10	Polyethylene 20mm diameter	120	15
	Autoclaved aerated concrete to autoclaved aerated concrete Autoclaved aerated concrete to softwood Autoclaved aerated concrete to steel	ConfigurationMax. Joint Width (mm)Autoclaved aerated concrete to autoclaved aerated concrete50Autoclaved aerated concrete to autoclaved aerated concrete40Autoclaved aerated concrete to autoclaved aerated concrete30Autoclaved aerated concrete to autoclaved aerated concrete20Autoclaved aerated concrete to softwood50Autoclaved aerated concrete to softwood40Autoclaved aerated concrete to softwood30Autoclaved aerated concrete to softwood20Autoclaved aerated concrete to softwood50Autoclaved aerated concrete to steel50Autoclaved aerated concrete to steel40Autoclaved aerated concrete to steel30Autoclaved aerated concrete to steel30	ConfigurationMax. Joint Width (mm)Minimum Seal Depth (mm)Autoclaved aerated concrete to autoclaved aerated concrete5025Autoclaved aerated concrete to autoclaved aerated concrete4020Autoclaved aerated concrete to autoclaved aerated concrete to autoclaved aerated concrete3015Autoclaved aerated concrete to autoclaved aerated concrete2010Autoclaved aerated concrete to softwood5025Autoclaved aerated concrete to softwood4020Autoclaved aerated concrete to softwood3015Autoclaved aerated concrete to softwood2010Autoclaved aerated concrete to softwood2010Autoclaved aerated concrete to steel5025Autoclaved aerated concrete to steel4020Autoclaved aerated concrete to steel4020Autoclaved aerated concrete to steel3015Autoclaved aerated concrete to steel3015Autoclaved aerated concrete to steel3015	ConfigurationMax. Joint Width (mm)Minimum Seal Depth (mm)Backing MaterialAutoclaved aerated concrete to autoclaved aerated concrete5025Polyethylene 50mm diameterAutoclaved aerated concrete to autoclaved aerated concrete4020Polyethylene 40mm diameterAutoclaved aerated concrete to autoclaved aerated concrete3015Polyethylene 30mm diameterAutoclaved aerated concrete to autoclaved aerated concrete2010Polyethylene 20mm diameterAutoclaved aerated concrete to softwood5025Polyethylene 50mm diameterAutoclaved aerated concrete to softwood4020Polyethylene 40mm diameterAutoclaved aerated concrete to softwood3015Polyethylene 30mm diameterAutoclaved aerated concrete to softwood2010Polyethylene 20mm diameterAutoclaved aerated concrete to softwood2025Polyethylene 20mm diameterAutoclaved aerated concrete to steel4020Polyethylene 50mm diameterAutoclaved aerated concrete to steel4020Polyethylene 50mm diameterAutoclaved aerated concrete to steel4020Polyethylene 40mm diameterAutoclaved aerated concrete to steel3015Polyethylene 30mm diameterAutoclaved aerated concrete to steel3015Polyethylene 30mm diameterAutoclaved aerated concrete to steel3015Polyethylene 20mm diameter	ConfigurationMax. Joint Width (mm)Minimum Seal Depth (mm)Backing MaterialIntegrity (mins)Autoclaved aerated concrete to autoclaved aerated concrete5025Polyethylene 50mm diameter120Autoclaved aerated concrete to autoclaved aerated concrete to autoclaved aerated concrete4020Polyethylene 40mm diameter120Autoclaved aerated concrete to autoclaved aerated concrete3015Polyethylene 30mm diameter120Autoclaved aerated concrete to autoclaved aerated concrete2010Polyethylene 20mm diameter120Autoclaved aerated concrete to softwood5025Polyethylene 50mm diameter45Autoclaved aerated concrete to softwood3015Polyethylene 40mm diameter30Autoclaved aerated concrete to softwood3015Polyethylene 30mm diameter30Autoclaved aerated concrete to softwood2010Polyethylene 20mm diameter30Autoclaved aerated concrete to steel5025Polyethylene 50mm diameter45Autoclaved aerated concrete to steel4020Polyethylene 50mm diameter45Autoclaved aerated concrete to steel4020Polyethylene 40mm diameter45Autoclaved aerated concrete to steel4020Polyethylene 30mm diameter45Autoclaved aerated concrete to steel4020Polyethylene 30mm diameter45Autoclaved aerated concrete to steel4020Polyethylene 20mm diameter45







## ASTRO INTU MASTIC®

## TECHNICAL SCHEDULE



Unique identification code of product-type: INTUM

Product Name			Astro Intu Mastic®				
Configuration Max. Joint Width (mm)		Minimum Seal Depth (mm)	Backing Material	Integrity (mins)	Insulation (mins)		
Wall Constructions (min 120mm thick)	Autoclaved aerated concrete to autoclaved aerated concrete  Drywall to autoclaved aerated concrete	20	12.5	Polyethylene 20mm diameter	120	120	
Wall Constructions (min 100mm thick)	Autoclaved aerated concrete to autoclaved aerated concrete	20	12.5	Polyethylene 20mm diameter	120	120	
nnlica	ltion Technique		On good clean	⊥ virgin blockwork, no prim	ing required		



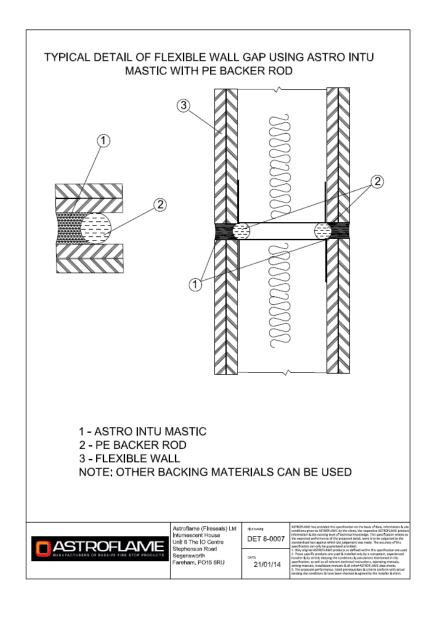




### ASTRO INTU MASTIC®

## TECHNICAL SCHEDULE







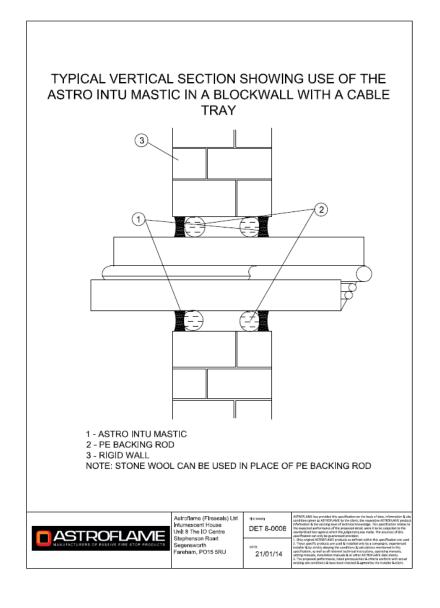






## TECHNICAL SCHEDULE







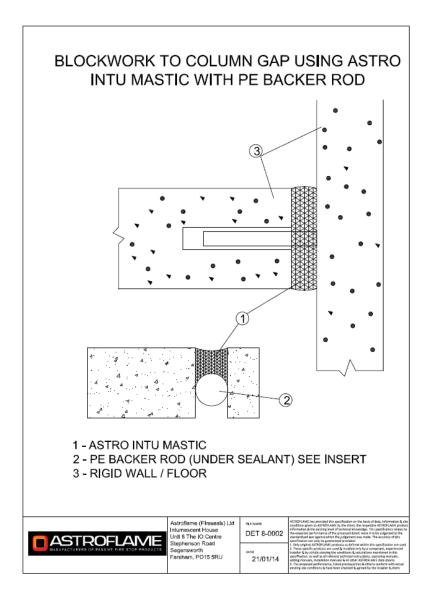






## TECHNICAL SCHEDULE









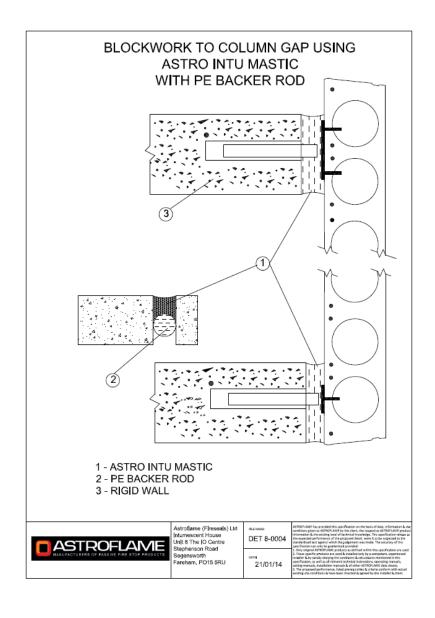


## ASTRO INTU MASTIC®

## TECHNICAL SCHEDULE



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Astroflame Ltd Unit 8, The I O Centre

Stephenson Road

Segensworth, Fareham

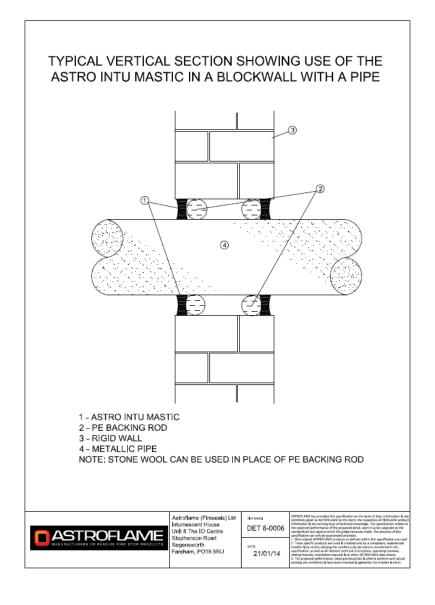
Hampshire, PO15 5RU



## ASTRO INTU MASTIC®

## TECHNICAL SCHEDULE











## ASTRO INTU MASTIC®

## TECHNICAL SCHEDULE



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## SRL

Data Sheet 4 14.5 °C Test Number: Air temperature: Client: Astroflame Air humidity: 70 % 28/04/2005 Receiving room volume 300 m3 Test Date: Sample height: 1.2 m 115 m3 Source room volume: 2 m 17 kg/m2 Sample width: Sample weight: Product Partition sealed with Astro Intu Mastic Identification: Intumescent and Acoustic Sealant Sound Reduction Freq ndex, dB 1/3 Oct 1/1 Oct Hz 50+ 10 B 63+ 16.4 11.9 80+ 10.7 60 100 14.9 125 17.7 160 21.D 50 200 22.4 Index. 250 31.5 26.0 315 29.8 35.4 400 500 36.7 36.9 630 39.5 Sound 800 42.8 30 1000 45.3 1250 48.2 1600 50.8 2000 50.D 48.3 20 2500 45.9 3150 43.D 46.5 45.9 4000 10 54.D 5000 6300+ 60.3 +0008 63.8 62.5 10000+ 64.5 250 400 630 1000 1600 2500 4000 160 Average 125 200 315 500 800 1250 2000 3150 5000 100-3150 35.9 Frequency, Hz

Rating according to BS EN ISO 717-1:1997

Rw(C;Ctr)= 38 (-2;-7)dB

Notes \* designates measurement corrected for background

Astroflame Ltd

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- # designates limit of measurement due to background
- + designates frequency beyond standard and not UKAS accredited

Air Permeability	Pressure (Pa)	Positive pressure (m³/h/m²)	Negative pressure (m³/h/m²)
EN1026	50	0	0
	10	0	0
Acoustic Rating BS EN ISO 10140-3:1995	R <sub>w</sub> (C;C	C <sub>tr</sub> ) :38(-2;-7)	dB



