

Passive Fire Protection

Fire Protection for Construction Movement Joints, Gaps & Service Penetrations





Contents

- Introduction 3
- **About Us** 4
- **Product and Service Selection** 6

Product Information

- 10 Wall & Floor Penetration Sealing
- 12 **Pipe & Cable Penetration Closing**
- 16 Specialist Sealants & Movement Gap Seals
- Linear Movement & Specialist Building Gap Seals 18
- 25 **Large Cavity Barriers**

Project References

26 **Experience in Every Sector**

About tremco illbruck

- 28 Certification and Testing
- tremco illbruck and its Product Brands 31

Introduction

By bringing together two industry-leading brands in Nullifire and Firetherm, tremco illbruck has created an industry first. Specifiers, designers, facilities managers, contractors and installers can now access both support and products covering intumescent coatings and fire stopping from one source.

We are specialists, with one focus that has not and will not change - to protect people and buildings from fire. Passive fire protection is highly complex but crucially important, especially as buildings become more sophisticated. We understand the need to have confidence in fire protection so, we provide integrated systems that perform when they are called upon.

Alongside our market leading Nullifire intumescent coatings for the protection of steel structures, Firetherm fire stopping products, provide outstanding passive fire protection solutions to service penetrations, movement joints and linear gaps aong with unique interfacing solutions.

With a knowledgeable team of technical experts, everything is focused on providing what our customers need at every stage of their project - smart protection.





About Us

Better Service & Support

Technical Hub

Our service offer underpins our product range, providing customers with a fast track response to technical queries at any stage of the design, build and installation process. One central phone number ensures the relevant technical support team is reached with the minimum delay, advising on product specification, application and installation.

Early input at every stage of the construction process can facilitate the seamless integration of passive fire protection solutions and prevent unnecessary disruption or delays to the build programme.

This ensures accurate specification of products for every circumstance. Our extensive knowledge of the discipline allows us to advise on current and likely future legislation related to fire protection in order to future-proof construction developments.

Working with Contractors

We can work closely with contractors to optimise the installation process. Data on formulations, installation specifications and technical drawings can be supplied to field teams to ensure the correct application of our products. Bespoke manuals and instructions

can be prepared by our technical teams for specific situations.

On-site Support

We provide on-site support and classroom-based training to give installers working knowledge of passive fire protection solutions and instruction in the correct application and installation of our full range of products. Comprehensive searchable product information such as technical data sheets, safety data sheets and method statements are available on line.





Optifire – Guaranteed Product Traceability

Optifire is a unique product identification system which enables building inspectors, fire risk assessors and installers to validate that the specified product has been delivered and installed.

Benefit

By simply applying a UV light source to the surface of the coated product, a colour unique to our product range is revealed. Lifetime identification provides assurance of product and system integrity in terms of supply, usage and maintenance. Firetherm and Nullifire coated products are the only passive fire protection products that can be identified and referred to the product certification once all packaging has been removed and discarded. This benefits inspections and can ensure compliance should future repairs or modifications be required.



Requirement Types

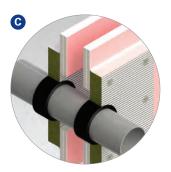
Firetherm manufacture a comprehensive range of fire stopping and fire resistant products that cover an extremely wide range of construction applications.



Penetration Openings Through Compartment Walls (Flexible or Non-Flexible Construction)



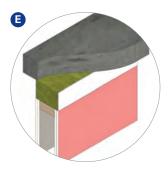
Penetration Openings in Floors (Concrete, Timber or Membrane Construction)



Combustible Penetration Services



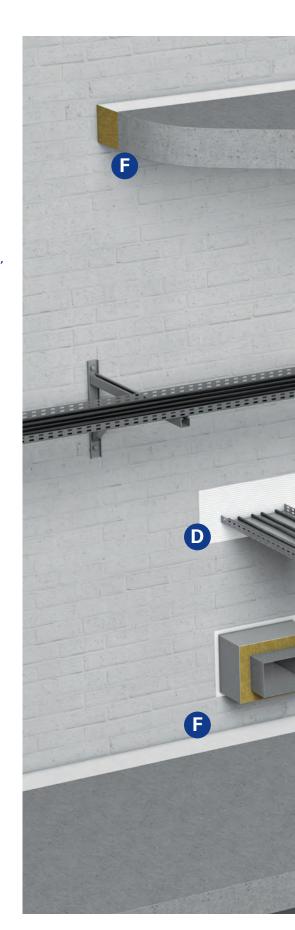
Non-Combustible Penetration Services and cable Management Systems

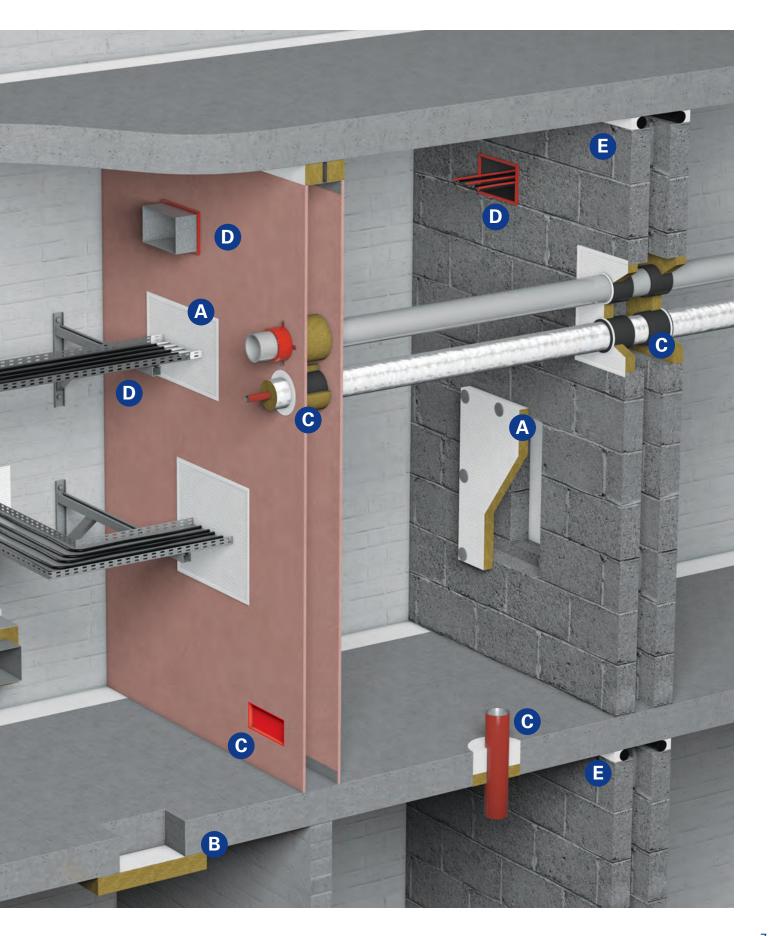


Linear Seals, Movement Heads and Deflection Details



Slab Edge Cladding and External Façade Solutions





Product Selection

This selector provides an at-a-glance overview of the complete Firetherm Firestopping range. Before referring to more detailed information about each product, use the selector to:

- Review and compare products and their specific functions
- Find suitable products for specific applications
- Always check the product application or technical data sheet for specific guidance and instructions.

PRODUCT NAME	DESCRIPTION	FIRE RATING (UP TO IN MINUTES) INTEGRITY/INSULATION
WALL & FLOOR PENETRATION	ON SEALING	
Intubatt (FB750)	Batt for use within walls and floors	240/240
Intucompound (FR230)	Load bearing fire stopping compond	240/240
IntumasticTrowel/Brush (FS700)	Trowel or brush grade acrylic emulsion	-/-
PIPE & CABLE PENETRATION	I CLOSING	
Intucollar (FP170)	Collar for sealing plastic pipes	240/240
Intusleeve (FP160)	Intumescent closer device	240/240
Intusleeve Duct (FP160)	Fire sealing ducting penetration	120/120
Intusleeve Cable (FP160)	Intumescent closer for cable penetrations	240/120
Intustrap/Intuband (FP302)	High pressure expansion strip	240/240
Intuflex 45/90	Pipe insulation	-/120
Intuputty Pads (FO100)	Putty pad	120/120
Electro Pad	Fire protection for metal socket boxes	120/120
SPECIALIST SEALANTS - LIN	EAR & MOVEMENT SEALS	
Intumastic (FS702)	Fire rated acrylic sealant	240/240
Intumastic HP (FS709)	Fire rated intumescent acrylic sealant	240/240
Intumastic ADL	Fire rated and acoustic acrylic sealant	240/240
Intusil (FS703)	Fire rated silicone sealant	240/90
LINEAR MOVEMENT & SPEC	CIALIST BUILDING GAP SEALS	
Rainbar 60 Range	Fire rated rainscreed cavity closer	60/60
Rainbar Plus	Fire rated rainscreed cavity closer	60/60
Rainbar Pro	Fire rated rainscreed cavity closer	60/60
Spanatherm	Fire rated linear movement joint	120/90
Intubatt 3	Fast fit, flexible fire seal	240/120
Intudeck	Fire rated timber floor upgrade	90/90
Intumastic Soft Joint	Fire rated flexible slab edge seal	240/240
Stonewool Slab	Acoustic and thermal rock fibre slab	
Soffit Liner PIR	Thermal upgrade for concrete soffits	
Soffit Liner Rock	Thermal upgrade for concrete soffits	120/-
Intuprofile	Trapezoidal fillers	120/120
Intuspan	Linear expansion and movement joint	120/120
Intuvent	Intumescent vent	120/120
FF197 Fire Rated Foam	Fire rated PU foam	240/240
LARGE CAVITY BARRIERS		
Firetherm 30	Fire rated fire curtain	30/-
Firetherm 90	Fire rated fire curtain	90/-

Linear joint	Blank seal	Cables/tray	Electrical trunking	Ducting/dampers	Metallic pipes	Plastic pipes	Electrical sockets	Certifire	ЕТА	Acoustic BS EN ISO 140-3	Air permeability EN 1026	Load-bearing capacity	Movement capability (up to)	Moisture resistance	
APPLICATION							CERTIFICATION				ADDITIONAL PROPERTIES			Page N°	
Х	Х	Х	Х	X	Х	Х		Х	Х	Х			7.50%		10
 Х	Х	Х	X	Х	Х	Х		Х	Х	Х	X	X			10
Х	Х							Х	Х	Х	Х				11
					Х	Х			Х						12
			х		X	Х		Х	Х						12
			х	Х	Х	Х		Х	Х						13
		Х	х					Х	Х						13
 			X	X	Х	Х		Х	Х						14
 		X			X	X									14
 		Х					X		X	X	X				15
							Х								15
Х	Х	х	х	Х	Х				Х	Х	Х		30.0%		16
		Х	-		X	Х		Х	Х	Х					16
Х	Х	Х	х	X	Х				Х	Х	X				17
Х	Х			X	Х				Х	Х	Х		12.5%		17
Х	Х														18
X	X														18
 X	X														19
 X															19
Х	X							X		X			7.5%		20
Х															20
Х	Х	Х			X	Х				Х	X		30%		21
Х															21
Х															22
Х															22
Х															23
 X								X							23
 Х															24
Х	Х	Х	X						Х	Х	Х				24
	Х	Х	Х		Х										25
	Х	Х	Х		Х										25

Wall & Floor Penetration Sealing



Intubatt (FB750) Batt for use within Walls and Floors



Rock mineral fibre board with an ablative elastomeric coating

Description

Intubatt is a factory finished unique multi-layered, low resin bonded, rock mineral fibre board. Firetherm ablative coated on both faces with our unique Optifire-identifiable coating. Manufactured under controlled factory conditions to the required thickness and specification. Intubatt may be over coated using any trade emulsion or eggshell paint for decorative purposes.

To reinstate service penetration openings within compartment walls and floors, stopping the potential path for fire and providing a thermal, fire, smoke and acoustic seal.

Features & Benefits

- Certified to EN 1366-3:2009; ETA 17/0392. Tested to BS 476 Pt 20/22 and BS EN 1366-3
- Unique traceability identifier
- Acoustic and smoke sealing
- Air pressure tested up to 2000 Pa
- Suitable for use in solid and flexible wall constructions and in floors seals where load capability is not required
- Light weight and easy to cut

Specification

1200 x 600 x 50 mm* 1200 x 600 x 70 mm Tolerances: ±2.5% 140 kg/m³* (180 kg/m³ option available) Supplied individually in clearly marked bags.

*FB750 only

Light weight and easy to cut



APPROVAL N° CF579

Intucompound (FR230) Load Bearing Fire Stopping Compound



Gypsum based mortar used to reinstate the fire resistance performance of floor constructions where the compartment line has been breached by service penetrations

Applications

Intucompound is used to stop the spread of fire and smoke around services that pass through compartment walls and floors, whilst providing an unsupported load bearing capacity (see Specification Information). The system also provides thermal, acoustic and air sealing performance.

Intucompound is suitable for the following service penetrations; single and bunched cables, cable trays, cable ladders, trunking, non-combustible pipes, ducting/damper penetrations and combustible pipes*.

Typical areas of use include health and leisure facilities, schools, universities, hotels, commercial, retail and industrial buildings.

Features & Benefits

- Provide an effective barrier to the spread of smoke and fire
- Fire resistance up to 240 minutes
- Certified to EN 1366-3:2009; ETA 17/0582
- Rapid setting, zero shrinkage formulation- can be used as pourable or trowel grade

*Suitable Firetherm closer device required

Specification

Supplied in 20 kg, clearly marked bags.

Mix Ratio: 2:1 powder to clean water (a stiffer mix may be required to aid application)

Coverage: 3.5 bags per m² at 100 mm depth

Maximum load capable unsupported opening: 1.21 m² at 100 mm



Intumastic Brush/Trowel (FS702) Trowel or Brush Grade Acrylic Emulsion

Used to repair damage to or bond to Intubatt (FB750)

Description

Trowel grade or brush grade, medium viscosity paste, or low viscosity liquid containing acrylic emulsion, inert fillers and fungicide. To be used for internal applications only.

A mastic used to coat plain mineral fibre batts of a density exceeding 64 kg/m3 in situations where it is more cost effective to install uncoated mineral fibre and later apply.

Features & Benefits

- Provides a fire, acoustic, smoke seal between floor slab or head of wall movement joint.
- Waterborne single pack system

Specification

Intumastic Brush - 5 litre tubs Intumastic Trowel - 10 litre tubs Colour: white Can be over-painted



Pipe & Cable Penetration Closing





Intucollar (FPI70)





Description

A metal shell suitable for retrofitting, lined with intumescent material, to be placed around combustible pipes and fixed to compartment walls or floors with suitable steel angles to provide up to 4 hours fire protection.

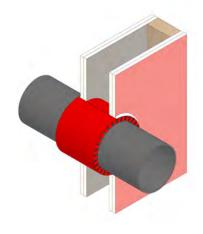
Intucollar is used to seal combustible pipes as they pass through fire compartment walls or floors. In a fire, the intumescent lining of the metal collar expands and fills the void left by the heat softened ombustible pipe, closing a potential path for fire completely sealed. Tested in insulated/non insulated dry wall construction, blockwork walls, concrete floors and within Firetherm Intubatt.

Features & Benefits

- Fire Classification to EN 13501-2 and CE Mark (ETA 17/0136)
- Suitable for use with a wide range of plastic, metal and insulated pipes
- Can be used for applications in walls and floors
- Simple to use, one-piece design saves time on site

Specification

Standard sizes: 55 mm, 82 mm, 110 mm, and 160 mm Colour: stainless steel







Intusieeve (FPI60) Intumescent Closer Device



A practical solution for fire sealing combustible pipes and ducting

Description

A 140 to 300 mm (dependent on requirement) deep steel sleeve that is positioned around combustible pipes to provide up to 4 hours fire protection. Designed specifically to provide a low cost solution for fire sealing combustible pipe penetrations as they pass through fire compartment walls and floors, whilst completely protecting the cavity within stud work walls. In a fire, the intumescent lining within the metal sleeve expands and crushes the heat softened plastic pipe leaving a potential path for fire completely sealed. Intusleeve is a perfect solution for angled pipes.

Features & Benefits

- Ultra-slim body design ensures easy installation in awkward situations and less obtrusive than externally fitted fire collars
- Fully tested at Exova BMTRADA to 2 hours integrity and insulation walls.
 4 hours integrity and insulation when used within Intucompound floor seals

Specification

Circular, diameters: 55 mm, 82 mm,90 mm, 110 mm, 160 mm & 200 mm.

Standard length: 140 mm. Length may be increased to suit angled pipe requirements.

Colour: red









An economical solution for fire sealing combustible ducting penetrations

Description

A 140 to 300 mm (dependent on requirement) deep steel sleeve that is positioned around the ductwork. The device is pre-lined with a high expansion intumescent and is designed specifically to provide a low cost solution for fire sealing combustible ducting penetrations whilst completely protecting the cavity within stud work walls. The device can be retro-fitted to existing ducting. Intusleeve Duct is used to seal plastic ventilation ducts as they pass through fire compartment walls. In a fire, the intumescent lining within the metal sleeve expands and crushes the heat softened plastic pipe leaving a potential path for fire completely sealed. 3-sided, soffit mounted version also available.



Features & Benefits

- Ultra-slim body design ensures easy installation in awkward situations
- Fully tested at BMTRADA to 2 hours integrity and Insulation walls

Specification

Rectangular ducts: 204 x 60 mm, 110 x 54 mm, 225 x 25 mm, 220 x 90 mm,

300 x 25 mm

50 to 160 mm diameters when using circular ducting.

Colour: red



CE ETA 17/0414



Intusieeve Cable (FPIGO)





A practical solution for fire sealing cables or mixed service types

Description

All Intusleeve will arrive preconfigured based upon requirements. The outer shell is steel lined with a high expansion intumescent and is specifically designed to provide a low cost solution for cables, conduits and combustible pipes and closing the cavity.

Lengths range from 140 mm minimum to 300 mm, but can be made to any length above 140 mm, dependent on requirement and timescales.

Intusleeve Cable management provides a tested fire solution to cables, cables within conduits, and combustible pipes passing through internal walls and floors. During a fire, the Intumescent within the metal sleeve expands and crushes the heat softened combustible elements, leaving a potential path for fire completely sealed. Once installed within the substrate, the Intusleeve product allows the removal and installation of services, without the risk of damaging fire seals.

Features & Benefits

- Ultra-slim body design ensures easy installation in awkward situations
- Fully tested at BMTRADA to 2 hours integrity and Insulation walls

Specification

Rectangular:

204 x 60 mm, 110 x 54 mm, 220 x 90 mm, 300 x 25 mm,

225 x 25 mm.

Circular:

50 to 160 mm diameter. Standard colour is red with black foam smoke seal

Pipe & Cable Penetration Closing







Intustrap/band (FP302)





High pressure graphite strip for maintaining compartment lines around combustible elements

Description

Firetherm Intustrap is a high pressure intumescent expansion device, designed to close off combustible elements such as pipes and insulation whilst maintaining compartmentation within a suitable substrate (such as Intubatt/FB750, Intucompound/FR230).

It is most commonly used around all types of pipe Insulation up to 60 mm thick or combustible pipes with a diameter of between 20 mm and up to 160 mm. Intustrap may also be used around conduits and cables (if required). Intubands are pre-configured pipe wraps to suit proprietary pipe size.

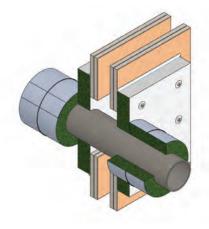
Features & Benefits

- Unaffected by moisture
- Fully tested for up to 240 minutes integrity and insulation (dependent on application)
- Available in easy to handle rolls or pre-configured bands to suit pipe size
- Simply link with adhesive tape

Specification

Intustrap/FP302 Roll: 60 mm x 4 mm x 25 m Intubands* 55 mm, 82 mm, 110 mm and 160 mm

*Firetherm Intubands only





Intuflex 45/90





Designed to reinstate the fire insulation of services to the requirement of the compartment line in terms of El

Description

Intuflex is a high insulate product, manufactured using fibre manipulation and strand orientation to achieve a compact yet lightweight component. Available in two sizes to accommodate the most onerous service penetrations. Intuflex is finished using reinforced foil offering both an aesthetically pleasing finish and a Class O surface spread of flame.

Features & Benefits

- Tested at Exova BMTrada to BS EN 1366 –3
- Included within Warrington Certificate CF580 Certifire

Specification

Intuflex 45: 200 mm x 25 mm x 10 m (4 rolls per pack)
Intuflex 90: 500 mm x 40 mm x 6 m (2 rolls per pack)
Should be used in conjunction with 50 micron foil tape (not included).



Intuputty Pad (FOIOO)



Provides fire protection for dry wall socket boxes

Description

Intuputty Pads have been designed to maintain the fire resistance of gypsum walls when breached by electrical switches and sockets.

Intuputty Pads are non-setting flexible intumescent pads based on a silicone polymer with additional fire retardant additives. Intuputty pads can be fitted inside or on the outside of the sockets and in a fire they form a robust fire resistant char that prevents burn through at the location of electrical penetrations.

Features & Benefits

- Up to 120 minutes fire resistance in 100mm and 130mm dry lining. EN 1366-3:2004
- Sound insulating BS EN ISO 140-
- Suitable for all dry lining applications
- Ready to use
- No special tools required for application
- Solvent free (no VOC)

Specification

Single Socket External (Rectangle) 180 x 130 mm

Double Socket External (Rectangle) 230 x 230 mm

Double/Single Internal (Cross Shape) 230 x 170 mm

Single Internal (Cross Shape) 170 x 170 mm

All Packaged: 20 pads per box



Electro Pad





Provides fire protection within steel electrical socket boxes which penetrate fire compartment walls

Description

A pressure exerting graphite manipulated extruded rubber pad. Electropad is simply bonded into position at the rear of the steel socket box, only reacting in the event of a fire.

Features & Benefits

- Up to 2 hours fire protection
- Acoustic sealing
- · Choice of installation methods
- Simple to install

Specification

Sizes:

70 x 60 x 4 mm or 130 x 60 x 4 mm

Colour: black/silver Density: 1567 kg/m³

Specialist Sealants Linear & Movement Seals



Intumastic (FS702)





Fire rated mastic for linear joints, sealing, bonding and pointing of Intubatt (FB750)

Description

Suitable for dry internal use only.

Joint widths 0 to 50 mm linear; 30 to 150 mm movement details.

Depth to width ratios 1:1 walls and floors; 2:1 split wall seals.

Standard colours are white and grey. Can be over-painted using acrylic paints (must be fully cured before over-coating). Tack free time 15 to 60 minutes, depending on temperature/humidity.

Firetherm Intumastic may be used to fire seal linear joints between many substrates in compartment locations. Intumastic may also be used in movement joints and, in this configuration, offers a movement capability of up to 30%.

Features & Benefits

- Maximum wall opening 50 mm x infinite length linear gap
- Maximum floor opening 50 mm x infinite length linear gap
- Maximum opening in movement seal 200 mm x infinite length

Specification

310 ml cartridge 600 ml foil pack Also available in 20 litre pour or spray grade for use with Intumastic Soft Joint.



Intumastic HP (F5709) Fire Rated Intumescent Acrylic Sealant



A heat-reactive, intumescent acrylic fire barrier mastic for internal use around combustible services

Description

An aqueous acrylic fire barrier mastic for internal use, containing inert fillers and graphite.

Suitable for a maximum diameter 125 mm combustible pipe seals, up to 60 mm pipe insulation, slots up to 600 mm around cables, cable trays, cable ladders, cable baskets and cable bundles (100 mm).

Features & Benefits

- Fully tested for use in double skinn partition walls both insulated and non-insulated.
- Low smoke and non-hazardous
- Tested for use in both walls, floors and Intubatt (FB750).

Specification

Tube size: 310 m Colour: grey. Tack free time 60 to 120 minutes depending on temperature/humidity.





APPROVAL N° CF578

Intumastic ADL





A medium viscosity, fire rated mastic for internal use, containing acrylic emulsion, inert fillers and fungicide

Description

Suitable for dry internal use only. Joint widths 0 to 50 mm linear; 30 to 200 mm movement details. Depth to width ratios 1:1 walls and floors; 2:1 split wall seals. Can be over-painted using acrylic paints (must be fully cured before over-coating). Tack free time 15 to 60 minutes, depending on temperature/humidity. Intumastic ADL may be used to fire seal linear joints between substrates in compartment locations. Intumastic ADL may also be used in movement joints and when in this configuration, offers a movement capability of up to 30%.

Features & Benefits

- Tolerant to building movement
- May be over-painted
- Fully tested for up to 240 minutes integrity and insulation
- Tools off easily with water
- Air pressure tested up to 2000 Pa
- Acoustic up to 61 dB

Specification

310 ml cartridge 600 ml foil pack Colour: white







Description

Intusil is a modified low modulus silicone that is designed for use in external aggressive environments or in high movement building joints. It has high adhesion and is suitable for high sheen surfaces such as ceramics or stainless steel. Intusil cannot be readily over-coated.

Intusil may be used to seal movement joints where a fire rating is required. Intusil can offer a period of fire resistance of up to 240 minutes with an insulation rating of up to 240 minutes. Intusil can offer a movement capability of up to ±25%.

Features & Benefits

- Water resistant seal
- Unaffected by moisture
- Fully tested for up to 240 minutes integrity and insulation
- Available in easy to handle light weight tubes/foil sausages
- Cures at a rate of 1 mm per day

Specification

Tube size: 310 ml and 600 ml foil sausage

Standard colour is white. Other colours are available subject to minimum order quantities





Linear Movement Specialist Building Gap Seals



Rainbar 60 Range

60 mins

Open State Cavity Closer

For use within rainscreen cladding systems to maintain compartment lines to the exterior of the building envelope

Description

Rainbar 60 is a high pressure graphite-manipulated intumescent composite retained within its carrier by a polymeric water proof encapsulate. The product remains dormant unless exposed to fire. The intumescent is capable of completely closing up to a 25 or 50 mm (depending on product variant) air space whilst maintaining 60 minutes fire integrity. Its simple fixing system allows for speedy installation on site. Rainbar 60 is both lightweight and durable and requires no further maintenance. The product requires no further sealing. Rainbar 60 is designed for inclusion within open state cavity barriers (e.g. rainscreen cladding systems). It has a screw fixing system and allows for free flow air movement and the drainage of moisture. The free air flow prevents mould growth and dampness within the cavity whilst the polymeric encapsulation ensures pooling water does not remain on the face of the product.

Features & Benefits

- Ultra-slim design ensures easy installation in awkward situations
- Fully tested at Exova BMTRADA up 60 minutes integrity
- Lightweight and durable
- No maintenance, no further sealing required

Specification

Size: $1200 \times 60 \times 8$ mm (50 mm cavity) maximum cavity 58 mm Size: $1200 \times 60 \times 4$ mm (25 mm cavity) maximum cavity 29 mm Colour: red/white



Rainbar Plus

Open State Cavity Closer



For use within open state cavities to maintain compartment lines to the exterior of the building envelope

Description

Rainbar Plus comprises of a rock mineral fibre carrier and a high pressure graphite manipulated intumescent composite. This is retained within a polymeric, branded (for product identification), water proof adhesive encapsulant. The product remains dormant unless exposed to fire. The intumescent is capable of completely closing up to a 25 or 50 mm (depending on product variant) air space whilst maintaining 60 minutes fire integrity. Its simple fixing system allows for speedy installation on site.

Rainbar Plus is designed for inclusion within rainscreen cladding systems, the product has a simple spike fixing system and allows for free-flow air movement and the drainage of moisture. The free air flow prevents mould growth and dampness within the cavity. Specifically engineered, angled mounting brackets ensure no pooling water remains on the upper face of the product. Rainbar Plus is both lightweight and durable and requires no further maintenance. The backing material is non-hygroscopic and all upper and leading edge faces are water resistant. Finish by sealing top edge to substrate with a durable and waterproof tape.

Features & Benefits

- Moisture proof covering, ensures easy installation in awkward situations
- Fully tested at BMTRADA up to 60 minutes integrity
- Lightweight and durable
- Maintenance free
- Requires mechanical fixings

Specification

Size: 1200 length x 60 mm height Free airspace 25 or 50 mm defined by requirement

Colour: Silver, black, red



Rainbar Pro

Open State Cavity Closer



For use within open state cavities to maintain compartment lines to the exterior of the building envelope

Description

Comprises of engineered, powder-coated and galvanized steel carrier. The carrier retains a high pressure graphite manipulated intumescent composite. The product remains dormant unless exposed to fire. The intumescent is capable of completely closing up to a 100 mm air space whilst maintaining 60 minutes integrity. Its simple fixing system allows for speedy installation on site. It is extremely durable giving a service life equal to that of the building with no requirement for maintenance, unless physically damaged.

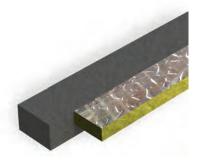
Rainbar Pro is designed for inclusion within open state cavities. The product has a simple fixing system and allows for free-flow air movement and the drainage of moisture. The free air flow prevents mould growth and dampness within the cavity.

Features & Benefits

- Ultra-slim flange and body design ensures easy installation in awkward situations
- Fully tested at BMTRADA up 60 minutes integrity and insulation
- No interruption of cavity ventilation

Specification

Size: 1200 x 105 x 15 mm. Colour: red/black



Spanatherm

Fire Rated Linear Movement Joint



Cost effective and efficient firestopping for slab edge and curtain walling, for static or movement joints

Description

Spanatherm is a strong pre-engineered rock fibre movement-joint fire seal, that allows significant movement accommodation at the same time as providing fire integrity, insulation and an effective smoke seal.

Spanatherm is a dense fibrous system faced on both sides with foil to provide Class O surface spread of flame and a vapour check barrier.

Spanatherm is a dry fit system designed to be a cost effective and efficient method of firestopping static and movement joints for slab edge/curtain walling or vertical details.

Features & Benefits

- Most economic overall system
- Up to 2 hours fire protection
- Economic fixings
- Vapour barrier
- Smoke barrierAcoustic seal

Specification

Size: 1200 x 600 x 100 mm thick slabs. (Firetherm also offer a cut to size service for larger projects).

Colour: foil faced both sides

Linear Movement Specialist Building Gap Seals



Intubatt 3

Fast Fit Flexible Fire Seal



A strong, fast-fit flexible fire seal for curtain wall, slab edge and vertical cladding applications

Description

Intubatt 3 is supplied pre-configured, ablative coated on a single side and factory cured. Intubatt 3 is a strand and binder orientated rock fibre compressible slab, utilising a modified polymeric ablative coating to provide a fire and smoke seal. Intubatt 3 has a 7.5% overall movement capability.

Intubatt 3 has been specifically designed as a strong, fast-fit curtain wall/slab-edge /vertical cladding flexible fire seal.

Design for use within: floor seals, slab to slab, slab to cladding, slab to blockwork, slab to glazing. Can be used horizontally or vertically.

Features & Benefits

- Low cost and simple install
- Fully tested at Exova BMTRADA up to 4 hours integrity
- Easy to cut
- Fully identifiable using Optifire
- Next day delivery available
- Service capable

Specification

Size: 1200 x 600 x 100 mm Weight: 8 kg (+/- 0.5 kg) (0.72 m2) Density: 100 kg/m3 nominal

Colour: Off white

Ablative coating: 1 mm factory applied and cured with Optifire

tracers.



Intudeck

Fire Rated Timber Floor Upgrade



Ideal where ceilings can not be disturbed or where lower floor occupancy does not allow fire upgrade

Description

Rock mineral wool slab coated on one side with a smoke and fire resistant sealant. Light weight and quick to install, the batts are cut to suit on site and fitted using compression and Intumastic bonding between joists and joints.

Used to upgrade the fire resistance of timber floors to 90 minutes fire integrity and insulation. Often used where a lath and plaster ceiling must not be disturbed, or where access is not possible from the soffit face because of occupancy of a dwelling or congestion caused by mechanical services. Suitable for use in both small units such as flats over shops, as well as large projects such as period or commercial buildings, multi- occupancy buildings, heritage properties and buildings of significant historical value.

Features & Benefits

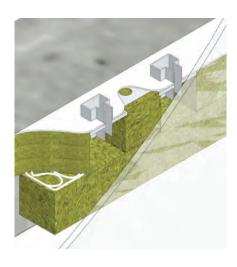
- Up to 90 minutes fire protection
- Simple installation method
- Does not disturb ceilings
- Contributes to acoustic upgrade
- Optifire technology identification

Specification

Size: 1200 x 600 x 70 mm

Density: 140 kg/m³

Colour: white: coated one side only



Intumastic Soft Joint





Ideal for high movement, fast-fit curtain wall/slab edge/vertical cladding fire seals

Description

Intumastic Soft Joint is supplied as a two part system (rock and coating(FS700)). Intumastic Soft Joint is applied on a strand and binder orientated rock fibre compressible slab, utilising a modified polymeric ablative coating to provide a fire and smoke seal.

Intumastic Soft Joint has been specifically designed for high movement fast fit curtain wall, slab-edge and vertical cladding fire seals. The system requires no fixings* for horizontal gaps up to 200 mm, subject to surrounding substrates. The system is suitable for horizontal and vertical applications and can offer an acoustic capability of up to 46 dB (cavity wall) limited by substrate.

* Fixings required if cladding is non-fire rated

Features & Benefits

 Fully tested at Exova BMTRADA up to 4 hours integrity and insulation

Specification

Rock Core

Length: 1200 long x 100 wide x 250 mm deep (can be cut to suit cavity requirements)

Density: 64 kg/m³

Intumastic Pour Grade (FS700) 5 litre tub, 20 litre pail, 200 litre drum

30% movement capable



Stonewool Slab

Acoustic and Thermal Rock Fibre Slab

Designed for a range of thermal and acoustic insulation applications

Description

Stonewool Slabs are used for a wide range of thermal and acoustic insulation applications in buildings, building services and industry. They are available in a range of densities from 33 to 200 kg/m³. Standard products are supplied unfaced, but slabs can also be manufactured with a factory applied foil or tissue facing and are also available with a water repellent additive.

Manufactured to a Quality Assurance system which complies with BS EN ISO 9001: 2000.

Features & Benefits

- Odourless, durable and nonhydroscopic
- Rot proof, does not sustain vermin and will not encourage the growth of fungi, mould or bacteria
- Excellent acoustic properties, up to 50 dB

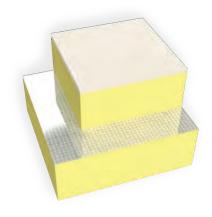
Specification

Standard sizes: 1200 x 600 mm
Thickness: 20 mm up to 250 mm.
A range of facings is available:
Bright aluminium foil which combines
vapour sealing and Class O surface spread
of flame.

Black or white woven glass tissue suitable for painting or untreated for acoustic insulation.

Glass cloth – white, heavy duty woven glass cloth suitable for painting.

Linear Movement Specialist Building Gap Seals



Soffit Liner PIR

Thermal Upgrade for Concrete Soffits

A PIR solution offering thermally efficient, acoustic, impact resistant soffit lining systems

Description

A rigid polyisocyanurate foam with a range of facing options to suit project requirements. Standard facings are Cemlux (calcium silicate), for Class O and impact resistance. Aluminium foil for Class O only. Other facing boards available upon request. Calcium silicate finishes are available with an optional bevelled edge.

Ideal for new-build and refurbishment of semi-exposed soffits in carparks, office/residential blocks and also basements. Provides a cost effective means of reducing CO₂ emissions and for compliance with Building Regulations.

Features & Benefits

- Economical
- Space saving

Specification

PIR Core

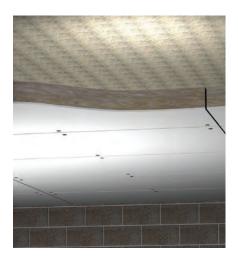
Size: 2400 x 1200 mm

Thickness is specific to U-value

required Area: 2.88 m²

Typical weight: Accumulated weight with 6 mm Cemlux - 33 kg per 2.88 m²

(total thickness 106 mm)



Soffit Liner Rock





Cost effective solution for insulating concrete soffits

Description

A specially formulated high density mineral fibre slab laminated to a 6 mm square or bevelled edge impact resistant board that provides an aesthetically pleasing liner to concrete soffits.

It performs exceptionally well thermally and acoustically but, above all, provides a fire safe solution to building requirements.

Features & Benefits

- Odourless, durable and nonhygroscopic
- Rot proof, does not sustain vermin and will not encourage the growth of fungi, mould or bacteria

Specification

Supplied in 1200 x 600 mm slabs for ease of handling and installation. Thickness is specific to U-value required



Intuprofile

Trapezoidal Fillers



Designed to fit the trapezoidal spaces in roof and wall cladding profiles or above intumescent coated steel beams

Description

Intuprofile blocks are factory cut from compressible mineral fibre to suit trapezoidal flutes or dovetails and are produced oversized to ensure a snug fit. Firetherm require either the steel decking manufacturer's reference or the site-measured dimensions (height, width at top and width at bottom). Used to seal trapezoidal openings against the passage of fire where profiled steel floor decking abuts the heads of fire compartment walls or where profiled wall sheeting abuts the edge of a floor slab. Can provide up to 2 hours integrity and insulation depending on specification.

Features & Benefits

- Highly economic solution
- Smoke and fire resistant
- Halogen free
- Excellent acoustics:
- 48 dB uncoated, 64 dB coated using 2 mm Intumastic trowel grade (FS702) or bonding cement

Specification

Size: bespoke to decking profile Colour: light brown. Can be painted or covered with acrylic mastic for aesthetic, acoustic and fibre migration reasons

Density: 70 kg nominal uncoated



Intuspan

Linear Expansion and Movement Joint



Joint filler providing a high level of movement suitable for gaps up to 100 mm

Description

Intuspan is a very pliable joint filler, black in colour and factory applied with a revolutionary 102 times volume expansion intumescent compound. A sandwich of intumescent strip, consisting of a modified rubber base filled with graphite and combustion modified foam. Provides a high level of movement suitable for gaps up to 100 mm and provides 2 hour protection with no adhesive required.

Features & Benefits

- Can accommodate regular cycles of high or low amplitude movement
- Unaffected by moisture
- Easy to install using finger pressure even in uneven gaps
- A dry system
- For vertical or horizontal wall applications

Specification

Sizes: 25 x 25 x 1000 mm 50 x 50 x 1000 mm 75 x 75 x 1000 mm 100 x 100 x 1000 mm

Colour: black

Linear Movement Specialist Building Gap Seals



Intuvent

Intumescent Vent



Provides up to 120 minutes fire resistance for ventilated openings

Description

An intumescent matrix supported in a steel frame. Under normal conditions, air is free to pass through in either direction with a free area of approx. 76%. Antivermin mesh is incorporated as standard. In a fire, the matrix is sealed by the expansion of the fibre/graphite composition.

Decorative grilles can be provided to special order.

Features & Benefits

- Approx. free area 76%
- Moisture and vermin resistant

Specification

Provides up to 120 minutes fire resistance for ventilated openings Sizes up to 900 x 900 mm can be accommodated

Square, rectangular and circular options available

Thickness: 44 mm









A moisture-curing foam that can provide up to 4 hours fire integrity to openings in masonry construction

Description

Fire-Rated Foam is a moisture-curing foam suitable for use in gaps up to 40 mm (2 hour fire integrity), around services or bonding door and window frames. It has excellent adhesion to most building materials.

Designed to be used to fire stop small gaps and service penetrations (in conjunction with Firetherm Intumastic) and in masonry walls and floors, and to bond and seal around fire door frames and windows.

Features & Benefits

- Certified to the latest British and European standards EN 1366-4, DIN 4102 Pt 1 (B1) and EN 13501: Pt 2
- Cures to form a semi-rigid foam that is able to accommodate some degree of movement of the joint
- Acts as an effective fire seal for up to 4 hours (BS EN 1366-4) when used with Intumastic (FS702) intumescent acrylic or Intusil (FS703) silicone sealant

Specification

Supplied in 750 ml aerosol containers

Large Cavity Barriers



Firetherm 30

Fire Rated Smoke Curtain



Provides a 30 minute fire and smoke barrier in roof voids and large volume areas

Description

Heavy duty non-insulant 260 g/m² coated glass fibre cloth supported on a steel frame. Unlike other reinforced mineral fibre solutions, there is very little fibre dust created during installation or during the life of the barrier. Long drops up to 3 m can be achieved without the need of extra support framework. As the system is lightweight, it can be fitted to small section structural steel members without the risk of overloading. If in doubt, refer the to the project engineer or specifiers. Used to provide a fire and smoke barrier in a large volume space, such as a high bay storage area or open roof space like a wide span portal frame building. Can also be used to provide a fire and smoke barrier in suspended ceiling applications and raised floors.

Features & Benefits

- Light weight for easy installation
- Easy to handle on rolls of 65 m² that can be easily carried by one man (roll size 1.3 m x 50 m)
- Very low to negligible dust generation
- Very fast and simple seam detail using staples and folds
- Coated on both sides to provide maximum smoke resistance

Specification

Size: $1.3 \times 50 \text{ m} = 65 \text{ m}^2$ $1.3 \times 10 \text{ m} = 13 \text{ m}^2$

Colour: grey



Firetherm 90

Fire Rated Smoke Curtain



Provides a 90 minute fire and smoke Barrier in roof voids and large volume areas

Description

Heavy duty non-insulant 470 g/m² coated glass fibre cloth supported on a steel frame. Unlike other reinforced mineral fibre solutions, there is very little fibre dust created during installation or during the life of the barrier. Long drops up to 3 m can be achieved without the need of extra support framework. As the system is lightweight, it can be fitted to small section structural steel members without the risk of overloading. If in doubt, refer the to the project engineer or specifiers. Used to provide a fire and smoke barrier in a large volume space such as a high bay storage area or open roof space like a wide span portal frame building. Can also be used to provide a fire and smoke barrier in suspended ceiling applications and raised floors.

Features & Benefits

- Light weight for easy installation
- Easy to handle on rolls of 65 m² that can be easily carried by one man (roll size 1.3 m x 50 m)
- Very low to negligible dust generation
- Very fast and simple seam detail using staples and folds
- Coated on both sides to provide maximum smoke resistance

Specification

Size: $1.3 \times 50 \text{ m} = 65 \text{ m}^2$ $1.3 \times 10 \text{ m} = 13 \text{ m}^2$

Colour: grey

Experience in Every Sector

Retail



Also in this sector:

- Bluewater
- Selfridges
- Westfield- Shepherds Bush and Stratford
- Trafford Park



Infrastructure



Also in this sector:

- Gatwick and Stansted and HeathrowT5
- HS1 London to Ashford
- Dubai Metro
- Underpass tunnel (Sydney)



Public Sector



Also in this sector:

- London Hospital
- St. Bartholomew's Hospital
- Ministry of Defence (Project SLAM)



Commercial



Also in this sector:

- Canary Wharf
- Masdar City (Abu Dhabi)
- General Motors Building (Detroit)
- Suntech City (Singapore)



Leisure and Entertainment

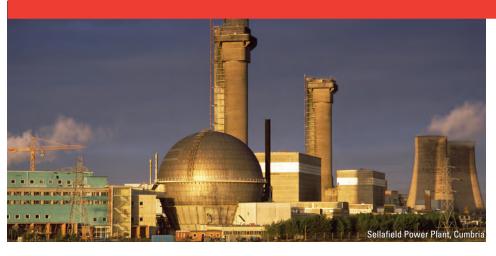


Also in this sector:

- Emirates Towers
- Royal Opera House
- Tate Modern
- Wembley Stadium



Industrial



Also in this sector:

- Sellafield Power Plant
- Cross Rail
- Dungeness Power Plant



Testing & Certification

tremco illbruck Passive Fire Protection Solutions is able to assist with the selection of appropriate products, or mix of products, to meet the fire protection requirements of any building. This can be achieved by using 3rd party accredited installers in conjunction with our Technical Hub. On larger projects, we work with clients, contractors and specialist sub-contractors to ensure the best possible and most cost-effective solution, without ever compromising on quality or safety.

As the only manufacturer and supplier that specialises in both intumescent coatings and passive fire protection products we are uniquely placed to offer the full package to suit all project requirements. tremco illbruck passive fire protection products combine together to give all parties peace of mind and ensure compliance with local building codes.

Our passive fire protection products undergo initial validation assessments at our in-house facilities prior to undergoing rigorous independent third party testing with leading UKAS test houses, resulting in the following accreditations:

- BS476 Pt20, 21, 22, 25
- BSEN 1366-3/4
- EN13501-2:2007
- ETAG 026-2
- CE Marking
- Certifire
- UL EU Classification

tremco illbruck is an active participant in BSI standards, CEN working groups and the ASFP.

















tremco illbruck and its Product Brands



tremco illbruck is a European manufacturer and service provider of high-performance sealing, bonding, flooring, waterproofing, and passive fire protection for the construction and manufacturing industries. We ensure that your processes become faster, smarter, more efficient. And more enjoyable.







illbruck

illbruck adds perfection – to all your sealing and bonding projects. Be it windows, façades, interiors or exteriors, a major construction scheme or a minor refurbishment job. We offer the right set of products, services and expertise to lessen your workload and improve the overall climate of buildings.

Making it perfect.

TREMCO

TREMCO stands for lasting performance for flooring, waterproofing and in-plant glazing.

The construction world is faced with ever more exacting requirements and longevity is essential for every application. That's why TREMCO puts durability at the heart of its promise to customers. We offer all the services and support you need, from specification reports to on-site support. With our nine decades of market experience we help you achieve the results you are looking for – with excellent lasting performance.

Nullifire

Nullifire is at the forefront of smart ntumescent coatings. For over 40 years, it has been a market leader in intumescent and fire stopping solutions.

At Nullifire, we understand the need to have confidence in fire protection, so we provide systems that perform when they are called upon. With the support of the tremco illbruck technical hub, everything is focused on providing what our customers need-smart protection.



Firetherm has built an enviable reputation as an innovative and progressive manufacturer and supplier of fire stopping products and services. From R&D through consultation on designs and schemes to advice on installation, we provide tailored solutions for every application.

Leading edge product design is only part of the package. We have a unique understanding of the demands on site, arranging deliveries to meet build schedules, often at short notice and unsocial hours.







tremco illbruck Limited Passive Fire Protection Solutions Unit F, Acorn Industrial Park, Crayford Road Crayford, Kent DA1 4FT, United Kingdom

T. +44 (0)132 255 1010

Sales: fsales @tremco-illbruck.com Technical: technical@tremco-illbruck.com

www.firetherm.com www.nullifire.com