

# Trafalgar Corex

# The Modern Multi-Purpose Board

















### Introduction

The fast-paced changes to our construction landscape, coupled with sustainability drivers, concerns over safety of workers cutting materials on site, and of course the increased scrutiny on fire applications lead to Trafalgar developing and now offering a new BUILDING BOARD suite of systems for the Australian & New Zealand markets.

#### Trafalgar Corex FyreBOARD is truly a 21st century board material.

#### Non combustible, paper free, impact resistance, water resistance, fire resistance & sound resistance.

Easy to score and snap and a totally environmentally friendly material with the highest international recyclable sustainability accreditations.

Backed by Trafalgar's Fire's technical expertise and support infrastructure, Trafalgar Corex FyreBOARD is quickly becoming the number one choice and we are seeing it stocked by more and more plasterboard outlets.

It has so many systems it can be used for that it is almost a *multi-purpose board*, but specialises in fire resistance.

We invite you to ask for samples, ask for training and to use our technical support to offer new, fully compliant, modern day fire resistance coupled with all the other design attributes needed.

We can sum it up with a quote from our owner, John Rakic:





"As the owner of Trafalgar, I have been involved in fire rated board materials my whole professional working life and Trafalgar Corex FyreBOARD is truly a special technology and we have created and continue to create market leading fire systems using this material. We are very proud to have developed Corex FyreBOARD For our local market place; enjoy it!"







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### **Steel Fire Protection**

Trafalgar has stepped in with the recent changes to the NCC or BCA whereby pink plasterboard does not offer the correct AS4100 and AS1530 Part 4-2014 fire test approvals.

#### Trafalgar Corex FyreBOARD is the BEST new option.

**Ideal for columns** in high traffic areas due to it's **high impact resistance**. Corners and joints can be finished with standard plasterboard tapes and materials.

The glass reinforced construction, without paper facings, **allow for quick score and snap**. Installation **DOES NOT require any steel angles** or structure; simply fix the Trafalgar Corex FyreBOARD around the steelwork as per Trafalgar's detailed installation instructions.

We recommend the use of **staples for fixings** which offer a much faster installation time.

Trafalgar offer **full technical support** you or your client needs; both off site and on-site as required.

We help with thickness calculations for Trafalgar Corex FyreBOARD to suit the **steelwork schedules** or you can easily look them up in our detailed technical manuals.

We have **interface details** with fire test approvals for where the Trafalgar Corex FyreBOARD needs to interface with intumescent paints or fire spray materials.

**Very thin square hollow sections** can be protected with Trafalgar Corex FyreBOARD.



- Up to 3 hour FRL rating on steel structures
- NCC / BCA & AS4100 compliance
- Impact resistant
- Easy to cut Score & snap option possible
- Quick installation with staples
- Available in 12.5, 15, 20 & 25mm thicknesses













### **Solid Fire Walls**

A solid fire wall is built like a riser shaft incorporating stud and track framing but with two layers of Trafalgar Corex FyreBOARD *fixed to one side only.* 

They provide a very thin fire wall and are ideal where fire separation of two spaces is required and access from one side only is ideal.

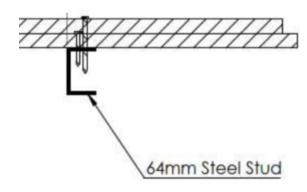
The **high impact resistance of Trafalgar Corex FyreBOARD** makes it widely specified and used.

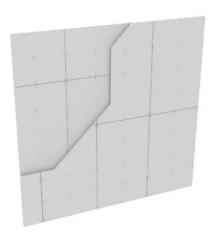
Trafalgar offer fire tested systems for 30, 45, 60, 90 & 120 minute fire ratings complete with both integrity and insulation fire criteria.

There is fire test data for service penetrations using Trafalgar's FyreSTOPPING systems.









- Solid fire walls allow for thin and quick erection
- Utilising a lightweight steel stud frame & have 2 layers of
   Trafalgar Corex board fixed to one side only
- Fire tested with fire in both directions
- Systems are available for 60, 90 & 120 minutes
- Trafalgar have a full range of service penetration approved





## High Impact Partitions

The **high impact resistance of Trafalgar Corex FyreBOARD** makes it perfect to build impact resistant and fire rated partitions or fire walls.

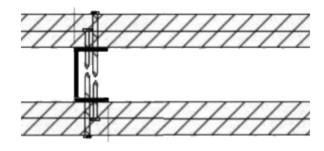
Trafalgar offer fire tested systems for **30, 60, 90 & 120 minute fire ratings** complete with both integrity and insulation fire criteria.

There is fire test data for access panels, fire dampers and most types of service penetrations using Trafalgar's FyreSTOPPING systems.

Trafalgar can offer structural engineering support to design very tall fire walls up to and including 10 meters in height.



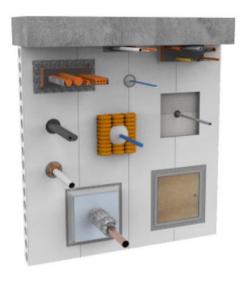








- resistant fire rated wall or partitions
- Utilising a lightweight steel stud frame & have
   Trafalgar Corex board fixed to both sides
- Fire tested with fire in both directions
- Systems are available for 60, 90 & 120 minutes
- Very tall partitions up to 10 meters are available
- Trafalgar have a full range of service penetration approved





### **Shaft Wall and Riser Shafts**

Trafalgar have simplified riser shaft construction and developed some market leading fire rated shaft systems.

When using Trafalgar Corex, there is no need to source and use special **J tracks** to over complicate the construction. Only one type of stud and track and board thickness is required.

Trafalgar can utilise conventional stud and track. Trafalgar Corex FyreBOARD can be fixed directly to this **from the outside of the riser shaft.** 

**The high impact resistance and water resistance characteristics** of Trafalgar Corex FyreBOARD makes it a great alternative to standard construction methods for riser shafts.

**Two way fire ratings apply;** that is fire from inside and outside the riser shaft, even with the exposed track and stud work, **which is an Australian** first!

The integration of *Trafalgar FyreBOX systems*, makes service penetrations quick and most importantly takes away the compliance issues we see with conventional fire stopping in riser shafts.



Corex - Shaft Walls



**Click here** to watch and see why the **FyreBOX Cast-In** is the future of fire stopping













- Trafalgar Corex can be used for fire rated shafts & risers
- They utilise a lightweight steel stud frame & have Trafalgar
   Corex board fixed to one side only
- Fire tested with fire in both directions
- Systems are available for 60, 90 & 120 minutes
- Trafalgar have a full range of service penetration approved





## Ceilings

Trafalgar's fire rated ceiling systems are the most fire tested systems available on the market.

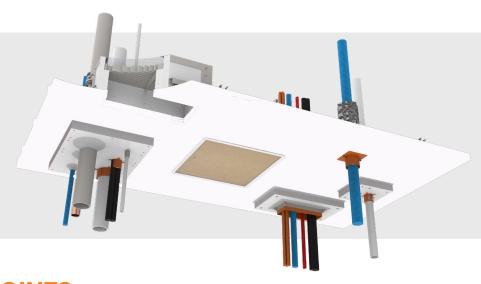
We offer fire tests for a FRL of  $-\frac{120}{120}$  with the additional required RISF or incipient fire rating.

We understand there is possibly some compliance issues with existing 2 hour plasterboard ceilings.

Most importantly we have a full suite of Trafalgar tested fire stopping systems & fire rated access panels for use in our Trafalgar Corex fire rated systems.



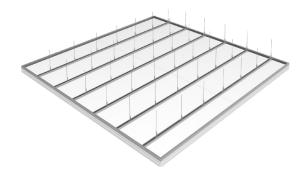






- Trafalgar Corex can be used for fire rated ceilings
- Utilising a lightweight steel stud frame & have Trafalgar

  Corex board fixed to the underside
- Fire tested for fire from below as required by NCC/BCA
- Systems are available for 60, 90 & 120 minutes with required RISF ratings
- Trafalgar have a full range of service penetration approved





### **Vertical Bulkheads**

The **high impact resistance of Trafalgar Corex FyreBOARD** makes it perfect to build impact resistant and fire rated vertical bulkheads.

Trafalgar offer fire tested systems for **60, 90 & 120 minute fire ratings** complete with both integrity and insulation fire criteria.

When using Trafalgar Corex for vertical bulkheads, **no sealant is required** is for the fixings.

Painting over Traflagar Corex is also possible, just like any other plasterboard wall

Trafalgar has penetration testing currently underway, please contact us for more information.

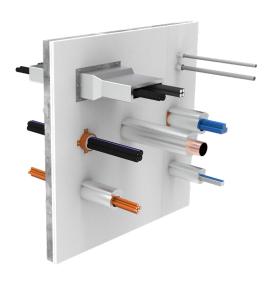


- Lightweight boards
- Thin partition footprint
- Install from one side
- Impact resistant
- FRL up to 2 hours
- Compliance with AS1530.4-2014 and AS4072.1
- Easy to cut and handle
- Low thermal conductivity
- Non-combustible
- Environmentally friendly/sustainable











## FyreFLOOR - Lightweight Load Bearing Floor Systems (Using Trafalgar Corex)

Trafalgar developed FyreFLOOR, a *lightweight and load bearing fire rated floor construction* for the modular construction and off-site prefab markets.

It is perfect for use, built on site in commercial projects.

Where lightweight & load bearing construction like FyreFLOOR is used; a two way fire rating is necessary; that is fire from below provided by Trafalgar Corex FyreBOARD and fire from above provided by Trafalgar Inex FyreBOARD. Many different internal framing options can be used giving total design flexibility.

Ideal for data centres where services run under the floor, for mezzanine floors, for upgrade of existing buildings and many more applications.



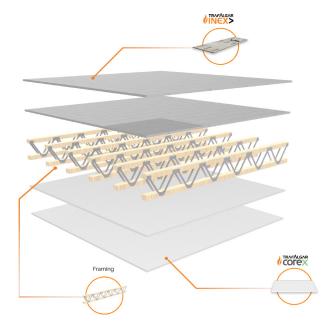


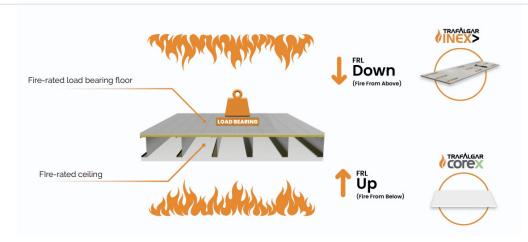






- Lightweight load bearing floor system
- 2 way FRL fire from above & below
- Ideal for existing building upgrades
- Raised floors in data centres
- Mezzanines







## Trafalgar Corex Overview

PROPERTY	12.5mm THICK	15mm THICK	20mm THICK	25mm THICK
Length	2000mm			
Width	1200mm			
Average Weight	11.5kg/m <sup>2</sup>	13.5kg/m <sup>2</sup>	17.6kg/m <sup>2</sup>	21.9kg/m <sup>2</sup>
Weight per sheet	27.6kg	32.4kg	42.24kg	52.6kg
Flexural Strength (Vertical)		≥870N	≥1160N	≥1450N
Flexural Strength (Horizontal)	≥300N	≥360N	≥450N	≥600N
R Value (Thermal Conductivity)	0.05m²K/W	0.06m <sup>2</sup> K/W	0.08m <sup>2</sup> K/W	0.1m²K/W
TRA	Boards	2x15mm	2x20mm	2x25mm
	FRL	-/60/60	-/90/90	-/120/120
	Flexural strength (Perpendicular)	≥ 870 N	≥ 1160 N	≥ 1450 N
	Flexural strength (Parallel)	≥ 360 N	≥ 480 N	≥ 600 N
TRAFALGAR CORE	Acoustics	Up to Rw 56 (2-layer Trafalgar Corex systems with 50mm mineral wool)		
SAR JCTI	Studs 64mm x 0.6BMT			
S C C	Stud centres	400mm		
)REX	Stud fixings	6g x 45mm screws at 500mm centres		
	First layer fixings	8 gx 45mm at 400mm centres		
	Second layer fixings	8g x 75mm at 300mm centres		
	Joint sealant	Trafalgar FyreFLEX acrylic sealant		
	Joint tape	Fiberglass joint tape		





### Trafalgar Corex Overview



Item Number	Thickness	Board Size	Pallet QTY	Weight per Board
COREX-12.5	12.5mm	2000mm x 1200mm	40	27.6kg
COREX-15	15mm	2000mm x 1200mm	32	32.4kg
COREX-20	20mm	2000mm x 1200mm	24	42.24kg
COREX-25	25mm	2000mm x 1200mm	18	52.6kg

## **Product Range Accessories**

ltem Number	Gauge	Size
COREX Staples 40	16g	40
COREX Staples 50	16g	50



# FyreFLEX Intumescent Sealant

Trafalgar's FyreFLEX® Sealant is a water-based, low VOC, environmentally friendly intumescent acrylic fire-rated sealant which makes it perfect for fire stopping cable and metal pipe penetrations through fire rated barriers.

FyreFLEX® is one of the most fire-tested penetration seals in the market with more than 30 fire tests.







- Non-toxic fire sealant
- Intumescent properties
- Low VOC fire resistant sealant
- Simple installation details
- Fire tested to AS1530.4:2014
- Used in conjunction with fully encapsulated
   25mm TWRAP<sup>TM</sup> material
- Tested in Hebel®, Speedpanel®, Plasterboard and more
- Top side only install for floors
- Available in White and Grey

