



FIRE RESISTANT STEEL HINGED DOORS



KONE Fire Resistant Steel Doors

Application

The fire resistant steel door is designed to protect personnel and property from the spread of flames and smoke for upto 6 hours. These doors are designed to be fitted in internal applications in a variety of wall constructions. The doors are suitable for any building type where fire protection is paramount. Our steel door construction can offer inherent benefits above and beyond that expected from traditional timber doors; strength, security and durability extended fire resistance. They will not warp, rot or support infestation by vermin or insects. With our version we offer a traditional unlatched design

Designed & Tested to Protect

At **KONE Doors** we take testing and third party assessment and validation of the performance of our fire resisting doors as of the utmost importance.

Our Hinged Fire Doorset has been tested in the United Kingdom to BS 476 Part 20 & 22 at WFRC test report WARRES No 38975.

This original test data has been re-assessed by FRS part or BRE. Through these FRS assessments we believe that we have one of the technically best supported products available in the UK market.

Our current documentation includes:

-  FRS Assessment CC 213838 Covering General Performance and Size Validity
-  FRS Assessment CC 215713 & CC216884 Covering Vision & Louvre Panel Performance and Size Validity
-  FRS Assessment CC 90983 Covering stainless steel door construction

Fire Resistant Steel Door

Each and every door is custom made. The maximum size is 1250mm wide as a single and 2500mm as a double with a maximum height for each of 2500mm in a single leaf (This does not include overpanels etc) with infill panels for taller ones. The doors can also be supplied with side or overpanels which can be glazed, solid or louvred.

Leaf Specification

The door leaf is constructed from two skins of 1.2mm aluzinc steel folded around a rigid resin impregnated cellular core to form a 48mm thick, flush door leaf. The door leaf is of a non weld construction that performs excellently under fire conditions and offers a long life expectancy/

Frame Specification

The door frame leaf is constructed from 1.5mm mild steel formed into our standard 89mm deep single rebate frame. A 250mm double rebate for cross cavity fitting is available as an optional extra.

The Frame is fitted with 3No template drilled CE marked, Class 13 SSS hinges complete with security dog bolts.

Each side of the frame is complete with 4 fixing points with rapid fit adjustable feet instead of awkward shims.

The frame complete with our unique expandable sub frame to ensure a precision fit to your structure.

Wrap around and other custom frame profiles are available additional cost.

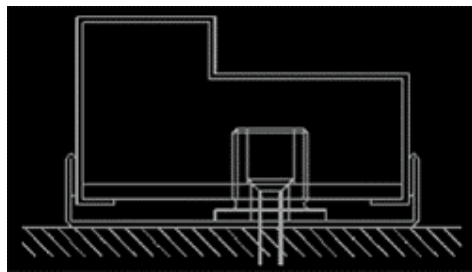


diagram of frame construction 1

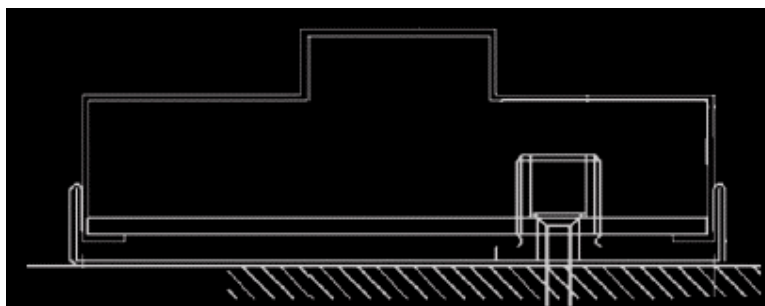
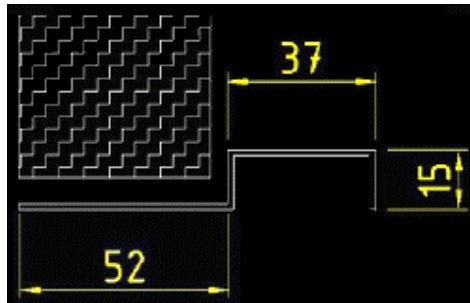


diagram of frame construction 2

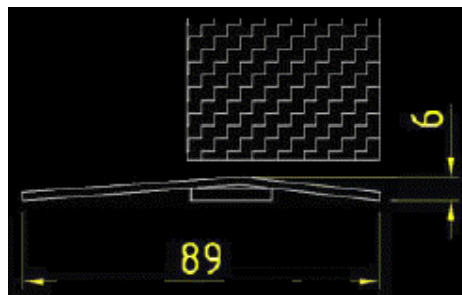
Thresholds

We supply doors with thresholds as standard. There are 3 options as detailed below:

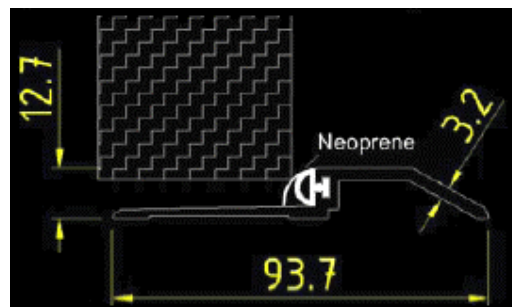
1. Standard



2. Driveable



3. 564 Zero



Hardware

Doors are supplied with a 19mm stainless steel pull handle and push plate and Arrow fire rated Door closer as standard. On double doors a pull handle and closer is supplied on each leaf with auto flush bolts to the second opening leaf. This is the minimum requirement to achieve the 1 hour fire resistance. The doors can be offered with r locks for security but the beauty of this design is that they allow free access to users by the simply pulling or pushing the door.

Other hardware can be used but may need to be individually assessed.

Finishes

Doors are supplied in grey primer finish for on site painting as standard. Wet spray and powder coat finishes are available. We can offer a range of 14 standard powder coat colours with non-standards being available at additional cost and subject to powder availability.

We also offer any standard BS or RAL colour in a wet spray finish. The wet spray is a flexible alternative that allows a high quality finish to be applied to shorter production runs and also enable different colours to be applied to internal and external faces or door blades and frames.

Having this flexibility allows us to control the paint process and ensure that only our highest quality finishes are supplied to our customers. We offer a standard Satin gloss level with other levels available on request.

Doors are also available in a different material finishes such as stainless steel please see relevant data sheet for details.

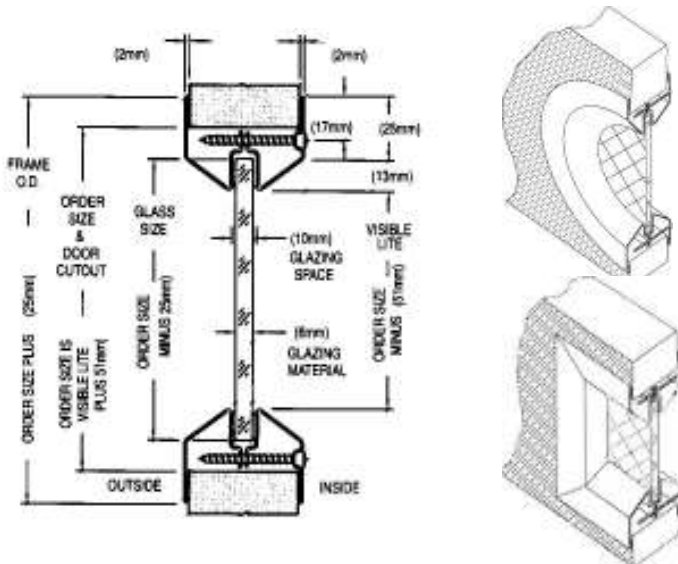
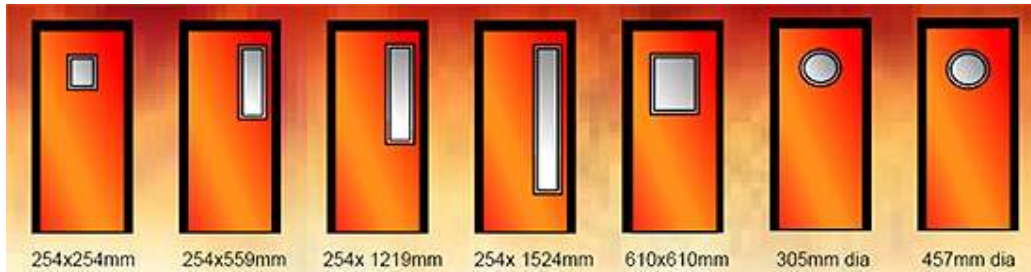


Standard RAL & BS colours

RAL 9016 - White
RAL 9005 - Black
RAL 9006 - Metallic Silver
BS 10 A 05 - Goosewing Grey
BS 18 B 25 - Merlin Grey
BS 12 B 27 - Olive Green
RAL 6002 - Heritage Green
BS 18 E 53 - Solent Blue
RAL 5010 - Royal Blue
RAL 5003 - Britannia Blue
RAL 3004 - Burgundy
BS 04 E 53 - Poppy Red
BS 10 C 31 - Honesty Cream
BS 08 B 29 - Vandyke Brown

Please note: As our FD240 door is of a welded construction, some weld marks may be visible in any paint finishes. These are not faults but known construction characteristics.

Vision Panel Options



PART M GUIDANCE NOTES

To comply with part M of Building Regs 2004 door across circulation routes should have visibility glazing

PART L GUIDANCE NOTES

If the vision panel size represents less than 50% of the door area they do not need to comply with Part L.

GLASS OPTIONS

Standard Glazing

6mm GWPP safety – up to 2hrs integrity




Glazing Options

120 Minutes integrity, 6mm Firelite Clear Ceramic Glass

Double glazed units available with any of the above glass.

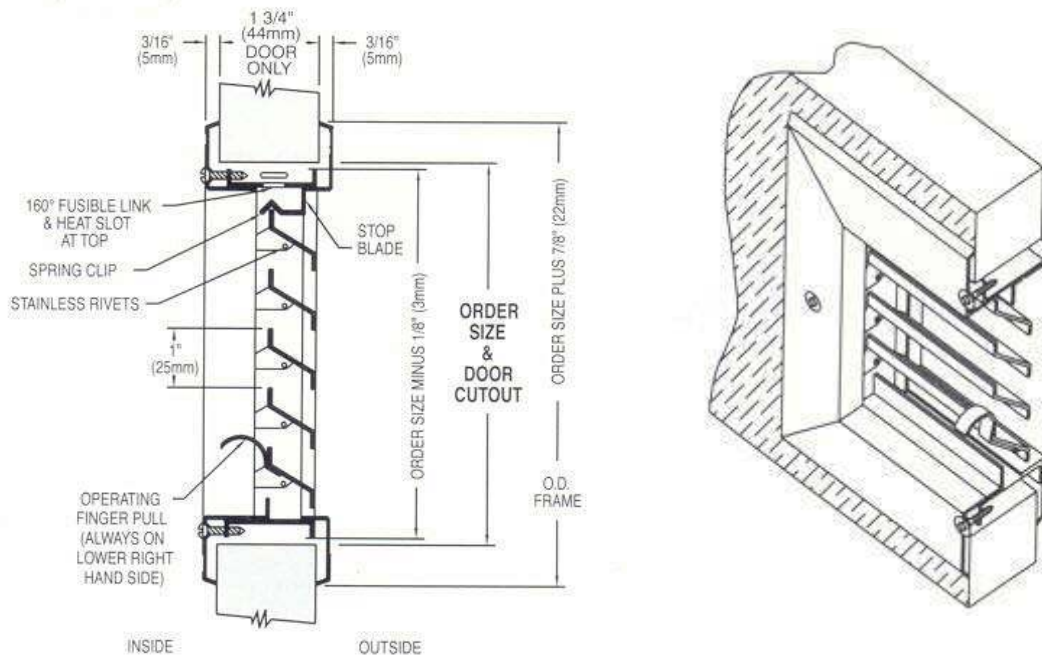
FIRE ASSESMENT NOTES

Under the fire assesment for FD 120 minute doors the following rules must be observed when fitting vvision panels:

-  Maximum vision panel size 637 x 592 or 0.377 sq metres
-  No vision panel to be fitted closer than 200mm from any edge of the door leaf
-  On double door the vision panels should be symmetrical from leaf to leaf

Louvre Panel Options

The louvre panel has moveable steel blades. They can be closed manually and are also closed by a fail-safe fusible link set to melt at 160deg



FIRE ASSESMENT NOTES

Under the BRE assesment for FD 120 minute doors the following rules must be observed when fitting vgsion panels:

- Maximum panel size 610 x 610
- No panel to be fitted closer than 200mm from any edge of the door leaf
- The top of the louvre panel is not to be more then 1000mm from the floor level