

# fire doors – the burning issues

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From specification to  
maintenance – the life cycle  
of a fire door explained



# guide

# Passive Fire Protection

Passive fire protection products are built into the fabric of a building, providing protection to the occupants that often goes unnoticed. The aim of these products is to restrict the spread of fire, by containing it to one area or compartment. By compartmentalising a fire, people in other parts of the building are given time to escape, and damage to the building is restricted.

An effective fire protection system will have passive fire protection products built into the walls, floors, ceilings and structure of a building to help maintain the structural integrity of a building in the event of a fire.

## Passive and Active Fire Protection Working Together

Active fire protection products, such as alarm systems, fire extinguishers and sprinklers are more visible and are equally important to a fire safety plan. Their role is to warn occupants and assist in controlling a fire until the fire services arrive. This often leads to the assumption that active systems are the most effective means of increasing fire safety in a building. In a majority of cases, however, active systems are designed and incorporated into a building with the assumption that passive fire protection products will also be in place and will achieve their performance rating.

Passive and active systems need to be designed and installed in combination to form an effective fire protection system. Only installing active systems in your building would allow a fire to run unchecked with potentially disastrous consequences for the building and its occupants. By using an early warning system, containing a fire within a small compartment and providing methods of controlling or extinguishing a fire, you have the most effective method of protecting lives and property.

## The Role of a Fire Door in Passive Fire Protection

A fire door has a critical role to play in any passive fire protection plan. A doorway is considered a weak point in containing a fire as it represents a break in the barrier formed by fire protection products installed within the compartment wall. A door also requires a gap between the frame and the leaf and often includes metal components that conduct heat. Using a certificated fire door, with the compatible components identified in the fire test data sheet, will ensure the fire barrier is maintained.

## Third Party Certification of Passive Fire Protection Products

Just like a fire door, all passive fire protection products are potential life saving products. With all life saving products, third party certification, involving independent testing and auditing, should be the minimum standard demanded for every building. Through this, the customer and enforcement authorities can be confident the goods supplied and installed are fit for purpose. It is these measures which ensure the product supplied to the contractor meets and maintains the guaranteed quality of the original design.

## Definitions

### Fire door leaf

A door leaf which has been tested to have resistance to fire, and the main component of a fire door assembly or set.

### Fire doorset

A fire door leaf supplied pre-hung, in its compatible fire door frame, hinges, glazing, intumescent fire (and smoke) seals and latch, supplied complete.

### Fire door assembly

All the correct, compatible and certificated elements of a fire doorset, but which have been collated together from different sources.

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## Installation instruction

Attached to every fire door, it explains the specific details that must be followed during installation, including components required, to maintain certification.

## Data sheet

Produced following a fire test, a data sheet explains the scope of adjustment allowed and components required to maintain certification.

## Glazed aperture

A glass opening which has been glazed using the correct fire resistant glass, beads and intumescent glazing system.

<b>Specification</b>	Regulations	Certification	Manufacturing	Converting
Components	Buying	Installation	Checking	Maintenance

# Specification

## The Role of a Specifier

The role of the specifier is as critical as anyone's in the life of a fire door. The specifier's role, being at the beginning of the project, is an opportunity not only to identify where a fire door is required and what its rating needs to be, but to set the standard by insisting on a third party certificated product.

The specifier has the opportunity to look at the fire safety of a building as a whole, and as such, make decisions on what fire safety products are required to ensure the safety of the occupants in the event of a fire. While product costs are always a consideration to specifiers, decisions on the quality of a product are made with safety in mind. If you leave the decision of fire doors quality to someone further down the process, are they going to make the decision based on the safest option or the cheapest? The specifier can prevent this situation arising by insisting on a third party certificated product from the design stage.

## Availability

Manufacturing members of the BWF-CERTIFIRE Fire Door & Doorset Scheme supply more than 75% of the fire doors used in the UK each year. With the Scheme representing both volume manufacturers and manufacturers of bespoke, made-to-measure fire doors, there is a third party certificated option available for every situation at competitive prices. There is no reason to avoid specifying third party certificated fire doors.

## Design

Fire doors are now available to suit a variety of design requirements from heritage buildings to ultra modern settings. The designs available include various timber finishes, glazing options, sizes, even stable doors. Security issues have also been addressed with certificated fire doors available with multi-point locking systems, and alarm release locking systems. The BWF-CERTIFIRE Scheme Directory has a complete listing of third party certificated manufacturers of fire doors and their components.



Specification	<b>Regulations</b>	Certification	Manufacturing	Converting
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## Building Regulations

Building Regulations stipulate the legal requirement for fire safety in the construction of all buildings. English & Welsh Building Regulations are made up of Parts, each of which relates to a specific aspect of construction, with associated Approved Documents providing guidance on how to achieve the requirements. Fire doors are affected by several separate Parts of the Building Regulations, but the principal guidance is contained in Part B on fire safety. Approved Document B is the only document that directly mentions fire doors, however doors in general are affected by other Approved Documents covering acoustic, ventilation and thermal performance as well as access to and movement around the building. Scotland and Northern Ireland both have separate regulations to England and Wales, although they are set out in much the same way.

The table below, outlines the specific issues that the Building Regulations cover in each of the 3 areas and the aspects that are particularly important. Further guidance can be found in the Scheme's fact card 9. For a copy of the regulations and guidance documents please contact the relevant authority.

England and Wales – Dept. of Communities and Local Government – [www.communities.gov.uk](http://www.communities.gov.uk)

Scotland – Scottish Building Standards Agency – [www.sbsa.gov.uk](http://www.sbsa.gov.uk)

Northern Ireland – Dept. of Finance & personnel – [www.dfpni.gov.uk](http://www.dfpni.gov.uk)

Performance	Notes	Regulatory Parts		
		England & Wales – Approved Documents	Scotland - Sections	Northern Ireland - Technical Booklets
Fire Safety	- Where a Fire Door is required - The fire resistance period expected - Specific requirements eg smoke seals & signage	B	2	E
Sound	- Minimum sound resistance performance of the door	E	5	G
Ventilation	- Minimum air transfer gap required under the door	F	3	K
Thermal	- Minimum thermal performance of the door if required	L	6	F
Accessibility	- Access to buildings for disabled people, including door width, hardware locations, opening forces, provision of vision panels and light reflectance values required	M	3	R
Safety Glazing	- Where safety glass is required	N	4	V

## Regulatory Reform Order

**New fire safety laws affecting all non-domestic premises in England and Wales came into force on 1 October 2006.** If you are:

- responsible for business premises
- an employer or self-employed with business premises
- a charity or voluntary organisation
- a contractor with a degree of control over any premises

...then **you need to act now** to ensure you have a suitable and sufficient risk assessment in place.

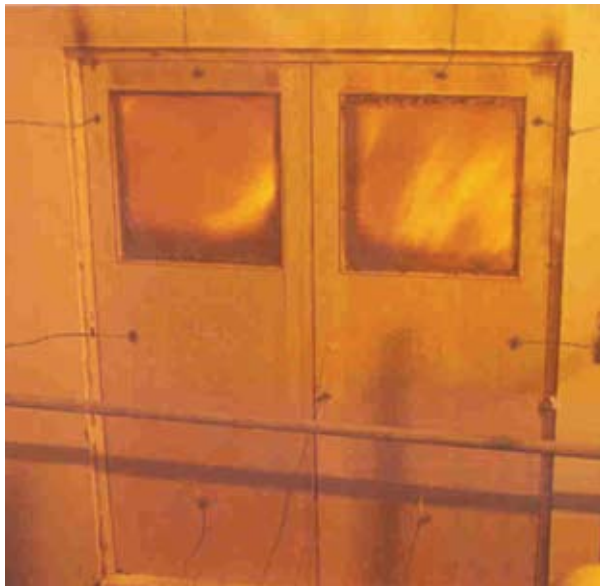
**For more details go to [www.communities.gov.uk](http://www.communities.gov.uk)**

Specification	Regulations	<b>Certification</b>	Manufacturing	Converting
	Components	Buying	Installation	Checking
				Maintenance

## Certification

Certification is the cornerstone of the BWF-CERTIFIRE Fire Door & Doorset Scheme and should be the minimum requirement demanded for every passive fire protection product. In the event of a fire, passive fire protection products have a critical role to play in saving lives and property, so only third party certificated products should be used.

Third party certification tests and verifies a fire door's design, performance, manufacturing process and quality assurance from manufacture to installation.



### Testing

Testing a fire door as a complete assembly is the only sure way to prove that it is going to fulfil its rating, and along with auditing, is the basis for certification. Fire doors are currently tested to BS 476 part 22 or EN1634, which require the test to be undertaken as a complete assembly including door leaf, frame, ironmongery, intumescent seals and glazing. A rating is then given to the door assembly based on the time it has held back the fire without being breached. The Scheme requires each fire door design to be re-tested every 5 years or 250,000 doors produced, to ensure standards are maintained. When tests are carried out, a fire door is randomly selected to ensure that each fire door is made to the same, high standards as the original tested design.

Following the test, the UKAS accredited certification body produces a certificate and data sheet which clearly identifies the scope for adjustment in terms of trimming, maximum aperture area and the specific components that must be used with the door leaf. If any component is used that is not allowed by the data sheet, the whole door assembly loses its certification. To help the installer maintain the certification, all Scheme members use the information contained in the data sheet to produce a detailed installation instruction document that is attached to every fire door.

### Auditing

All members involved in the manufacture of fire door leaves and components (including frames, glass, ironmongery and intumescent seals) and licensed converters, who fit glazing & make up doorsets, are required to undergo a yearly audit. The audit aims to ensure that fire doors being made and adjusted use the same materials as the original test for that specific design. The auditor will also look to ensure that the BWF-CERTIFIRE Fire Door & Doorset Scheme labels and installation instructions are being attached to every door.

BWF Approved Fire Door Centres (AFDCs) are also required to undergo yearly audits to ensure they stock the correct components for the doors they supply. The auditor will also question the trained sales staff to ensure they are giving the correct advice to their customers.

### ISO9000

Certification is more than just testing and auditing. A certificated ISO9000 quality management system is also a requirement of the Scheme to ensure that standards are maintained for every door manufactured. The ISO9000 system is also audited each year by the UKAS accredited certification body to ensure the procedures are being implemented.

Specification	Regulations	Certification	<b>Manufacturing</b>	Converting
Components	Buying	Installation	Checking	Maintenance

# Manufacturing

Manufacturers certificated under the BWF-CERTIFIRE Fire Door & Doorset Scheme account for over 75% of fire doors manufactured for use in the UK. These cover the full range of fire door ratings; FD30, FD60, FD90 and FD120. All manufacturing members have been certificated through a process that includes testing, auditing and implementation of the ISO9000 quality management system. Fire doors are tested under BS 476 part 22 or EN1634 and are always tested as a complete assembly.

## Role of a Manufacturer

When manufacturers join the Scheme they are required to follow a set of strict rules that ensure a consistent quality of fire doors. These rules include a regular testing schedule, which requires a significant time and financial commitment, proving their dedication to providing a high quality safety product.

The Scheme requires members who manufacture fire doors to have all fire door designs tested and certificated to give the consumer confidence in the use of their products. This ensures that all fire doors manufactured by Scheme members will achieve their ratings if the installation instructions are followed.

Installation instructions are put together by the manufacturer based on the fire test data sheet issued following a test. A copy of the installation instructions is attached to every fire door manufactured by a Scheme member and clearly explains the installation process and components that can be used with the door leaf. If any part of the installation instructions is not followed, the whole door assembly loses its certification.

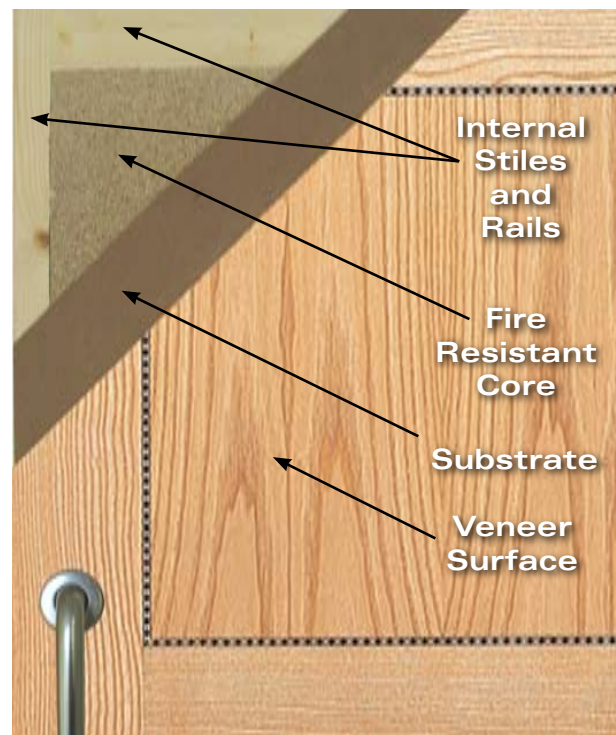
Every fire door manufactured by a scheme member has a label attached to the top edge of the door leaf, or, in the case of a doorset, above the lowest hinge. This label identifies the fire doors rating, manufacturer's name, contact phone number, certification number and a unique serial number. This gives the fire door traceability through the supply chain and provides all contact details required to check any technical details with the manufacturer.

## Fire Door Construction & Finishes

Gone are the days when fire doors were only available in solid timber construction that were heavy to open and stood out like a sore thumb. Prime fire door manufacturers now produce fire doors using safer, cost effective materials, from sustainable sources, that are available in a variety of finishes to suit all building designs.

While solid timber fire doors are still available, flaxboard and wood composite door cores are the basis of a majority of fire doors manufactured by the Scheme members. These materials have the advantages of reducing the weight and cost of a fire door while still burning at a slow consistent rate.

The door core is covered with a moulded skin or laminate to suit the design of the building. These products have significantly increased the variety of finish you can now get on a fire door to suit all locations from heritage buildings to ultra modern settings.



Specification	Regulations	Certification	Manufacturing	<b>Converting</b>
	Components	Buying	Installation	Checking
				Maintenance

## Licensed Converters

Licensed Converters are companies who generally do not manufacture fire doors but are involved in making alterations to the fire door leaf, often with the aim of creating a doorset. These companies can be licensed to fulfil a number of functions with regard to fire door assemblies, carrying out activities which are often not cost effective for the Prime Fire Door Manufacturer. These functions include; producing certificated fire door frames for specific door leaves, and cutting apertures, often installing a glazing system. When these functions are undertaken by a certificated Licensed Converter, and installed in accordance with the installation instructions, with all compatible components, you will have a certificated fire door assembly. Licensed Converters will alternatively produce a complete doorset ensuring the installation instructions are followed. Concentrating on this type of work allows the Licensed Converters to offer shorter turn around times than volume manufacturers on made to order designs.

### The Licensing Process

These certificated companies will be licensed to one or more Prime Fire Door Manufacturer. During the licensing process the manufacturer will provide a complete list of data sheets, for their fire doors, to the licensee who agrees to adhere to the scope of adjustment clearly identified within them. The data sheets will identify the specific materials to be used, the dimensions allowed and the components required to turn the door leaf into a doorset. Regular audits ensure that the data sheets are being followed and are the basis for certification. Licensed Converters are also required to have a certificated ISO 9000 quality management system, which is also audited by the UKAS accredited certification body. Only companies who have been licensed and certificated can make adjustments to a certificated fire door leaf and maintain its certification. Look for the label, next to the manufacturers label, on the top edge of the door, to check your door has been altered by a Licensed Converter.



### Fire Rated Frames

Fire door frames are as important as any other component in a fire door assembly and therefore must be made to replicate what was used in the original fire test. A data sheet will identify the specific timber type and density that must be followed for the certification of the door assembly to remain valid. The dimensions of the frame are also critical to allow the correct sized screws to be used with the door hinge without going through the back of the frame. Frames should also be grooved or rebated to allow for the relevant sized intumescent seal. Frames can only be used if made from the timber type, density and dimensions allowed in the installation instructions. For an FD30, Redwood with a minimum thickness of 30mm is usually required, although there are now some specific cases where MDF is allowed. Ensure you check the requirement of every different door design you use.

Specification	Regulations	Certification	Manufacturing	<b>Converting</b>
	Components	Buying	Installation	Checking
				Maintenance

The only way to ensure your frame fulfils the requirements of the fire test data sheet, is to purchase it directly from the door leaf manufacturer or a certificated joinery company licensed to them. Buying a certificated frame and making your own copy to the same dimensions is a dangerous practice, invalidating the certification of the whole fire door assembly and putting lives at risk.

### Vision Panels and Other Apertures

Cutting an aperture in a fire door creates a weak point that is the most likely point of failure if not filled with certificated products. A fire test data sheet will identify if apertures are allowed in a specific fire door design, and if so, the maximum area allowed. Glazing is the most common reason to cut an aperture in a fire door, but the use of letter plates, air transfer vents and spy holes are also common. These products will generally be required to be installed in conjunction with intumescent seals, pads or paste to maintain the certification.

Glazed apertures are often required in fire doors to fulfil the requirements of Part M of the Building Regulations but are regularly used to improve the vision around a building. With the range of fire rated glasses available including clear, coloured, textured and self cleaning, a glazed aperture can also add to the aesthetic appeal of a fire door.

When putting glazing into a fire door, it is vital to use a CERTIFIRE Approved intumescent glazing system and fire rated glass as well as the correct bead, as identified in the data sheet. It is also important to note that not all glasses can be used with all intumescent glazing systems so it is vital that a Licensed Converter installs the glazing and seals with reference to the data sheet. When pinning or screwing the beads, it is important to do so at the correct angle to ensure if the beads burn away, the pins/screws will still hold the glass and seals in place. These operations can only be carried out by the door manufacturer or Certified Licensed Converter or the door certification will be invalid. Fitting glazing to a fire door should never be done on site.



### Doorsets

Doorsets, put together by the door leaf manufacturer or a licensed converter, are by far the best solution. A doorset involves the door leaf being pre-hung in its frame, in factory conditions, with all the correct compatible components including glazing, ironmongery, intumescent seals, and where required smoke and acoustic seals. Using a licensed converter with the correct training and information is the best way to ensure that your fire doorset will be made according to the scope of the data sheet and maintain its certification.

Specification	Regulations	Certification	Manufacturing	Converting
<b>Components</b>	Buying	Installation	Checking	Maintenance

## Components

The BWF-CERTIFIRE Fire Door & Doorset Scheme has put great efforts into raising the awareness and understanding of the importance of compatibility of fire door components. Fitting a component of incorrect size or made from a material that was not specifically designed to be used on a fire door could significantly affect the performance of a fire door assembly. The components identified in the data sheets and installation instructions must be used to maintain the certification of the whole door assembly.

### Essential Ironmongery

The role of essential ironmongery is to hold the fire door in place in the event of a fire. Door closers, hinges, locks and latches are all considered essential ironmongery and must therefore carry fire test evidence to show suitability for use on fire doors. Intumescent pads may need to be used with these products, check the manufacturers requirements.

There is now a variety of tested and certificated door closers available to fit all of your design requirements. Concealed overhead and jamb-mounted closers are now used on fire doors where a closing mechanism is required to be hidden when the door is in a closed position, for example in heritage buildings. Also certificated floor springs are now readily available and can be used in double leaf configurations. If hold open devices are used, they must be fitted in line with the closer to ensure the door does not distort and only used if linked directly to a fire warning system.

The BWF-CERTIFIRE Scheme requires all door closers to be CERTIFIRE Certificated and all locks, latches, hinges and panic hardware to be CE marked for fire door applications as a minimum.



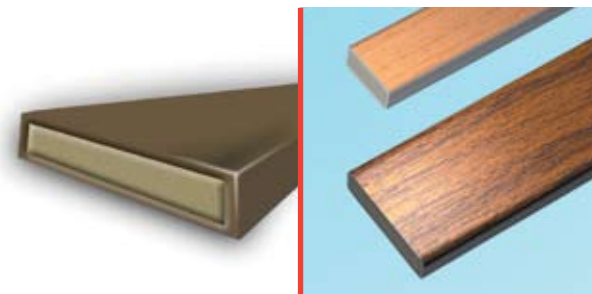
Specification	Regulations	Certification	Manufacturing	Converting
Components	Buying	Installation	Checking	Maintenance

### Non-essential Ironmongery

Products that are considered non-essential ironmongery such as handles, letter plates and air transfer vents, do not have a direct role in holding the door in place but can still have a significant effect on the fire door achieving its rating. It is critical that non-essential ironmongery is chosen and installed according to the door leaf installation instructions. These generally require intumescent sleeves or paste to be used.



**Intumescent Seal**



### Intumescent, Smoke and Acoustic Seals

An intumescent seal must be used on every fire door and can be placed in the door edge or preferably the door frame. The minimum recommended seal for a FD30 fire door is now 15mm x 4mm, that will expand to fill the 3mm gap allowed between the door leaf and frame in the event of a fire. Where higher fire ratings are required, it will be necessary to refer to the door leaf installation instructions for the correct seal size.



Smoke seals are available in a brush or fin design and come in combination intumescent, smoke and acoustic seals or separately. Threshold seals may also be required. The need for smoke seals is set out in the relevant national fire safety regulation and is a critical safety device considering the danger that cold smoke poses to human life. All seals fitted to BWF-CERTIFIRE scheme doors are required to be CERTIFIRE Certificated.



### Fire Rated Glass

Fire rated glass is made in wired and clear designs and is available in a variety of colours and thickness. Fire rated glass must be installed in conjunction with an intumescent glazing system and hardwood beads. Not all fire rated glasses work correctly with all intumescent glazing systems, so it is important to check the data sheet for the specific products. Apertures should always be cut in a factory environment and the glass installed by a licensed converter. All glass and glazing systems fitted to BWF-CERTIFIRE scheme doors are required to be CERTIFIRE Certificated.

The fire rated glass must also be safety rated when fitted into a fire door, where it is within 1500mm from the finished floor level and/or the aperture exceeds 250mm in its smallest dimension.

Specification	Regulations	Certification	Manufacturing	Converting
Components	<b>Buying</b>	Installation	Checking	Maintenance

## Buying Fire Doors

Doorsets are generally the best way of buying a fire door, as they are put together in a factory conditions by someone who understands the product. This ensures that the components used are compatible with the door leaf and the instructions in the data sheet are being followed. So all that needs to happen on site is for the frame to be properly secured to the wall, saving time and therefore installation costs.

If you cannot get a doorset, door kits are now available, providing all the compatible components in kit form for installation on site. If you have to buy the components separately, make sure you go to your nearest BWF Approved Fire Door Centre, which will stock a full range of compatible components to match the fire doors they carry.

It is important to note that not all doors can be used in all configurations. Check the installation instructions attached to the door to see if it has been tested to be used in double leaf and double acting configurations.



### BWF Approved Fire Door Centres

Builders merchants account for over 75% of fire doors sold in the UK, so they are a significant player in the fire door supply chain. Builders merchants, by nature, sell a wide range of products and their staff are trained to have a basic understanding of them all. Selling a fire door with the incorrect components or offering incorrect advice could cost people's lives, so it is critical that the sales staff of builders merchants have the correct training and components for the doors they sell. The Scheme has sought to rectify this problem by offering a training service to builders merchants through its BWF Approved Fire Door Centre (AFDC) network.

Sales staff of all AFDCs are required to undergo initial training and testing in the key concepts of fire doors and then take regular refresher training. The training assists the staff to provide correct advice to their customers to ensure compatible components are sold with a fire door. This will make sure the builders merchant maximises its sales opportunity and the customer has all the correct components to ensure the certification of the door is maintained.

The other key requirement for AFDCs is that they stock all of the compatible components that need to be sold with the fire doors they sell. Therefore AFDCs become a one stop shop for all your fire door needs. All AFDCs are audited on a yearly basis to ensure the standards are maintained.

### The Role of the Building Contractor

Building contractors always feel the pressure to bring a job in on budget or preferably under budget to save their customers money. Life saving products, including fire doors are not the right place to look for cost savings. Choosing cheaper untested products may save money, but if a fire breaks out, it will cost far more in lives and property.

By providing installation instructions with the fire door, the manufacturer is advising you of the procedure for installation and the components that must be purchased and used to maintain the certification. If you choose not to follow these instructions and use components against the advice of the manufacturer you could be held responsible if they fail.

When a fire door is specified, generally only the position and rating or the fire door are included, leaving no clear requirement for a third party certificated product. In this case you have a choice, either buy the cheapest option available or take the responsibility for ensuring the safety of the occupants and insist on certification.

Specification	Regulations	Certification	Manufacturing	Converting
Components	Buying	<b>Installation</b>	Checking	Maintenance

# Installation

The installation of a fire door is a complex procedure requiring a detailed understanding of the important role played by each component and therefore needs to be undertaken by someone with the correct training.

Doorsets are clearly the best option as they are put together in a factory condition by someone who understands the importance of using compatible components and allowing a consistent 3mm gap between the door leaf and frame. If, however, the components need to be sourced individually, it is vital that the installation instructions are followed. Failure to follow the instructions exactly will result in the fire door losing its certification. Fire doors are a heavy product, ensure correct manual handling procedures are used during installation.

## FIRAS



Installation of fire doors is one of the most important roles in the fire door supply chain and the role that is least monitored. While manufactures, licensed converters and component supplies undergo regular testing and auditing, installers largely go unchecked. The FIRAS Scheme, run by Bodycote WarringtonFire, aims to solve this problem by providing certification for fire door installers.

Supported by the BWF-CERTIFIRE Fire Door & Doorset Scheme, FIRAS provides certification to a company through competency assessment of its operations and regular on site auditing of its work. FIRAS allows its certified members to produce certificates for each individual job by logging the details of each job into the FIRAS website leaving a complete record of the jobs undertaken. Using a FIRAS member to install your fire doors will ensure the certification of the fire door assembly is maintained.

For further information on companies certified by FIRAS to install fire doors or if you are interested in becoming certified phone 01925 646 777 or go to [www.warringtonfire.co.uk](http://www.warringtonfire.co.uk).



## Installation Instructions

Installation instructions are put together by the Schemes fire door manufacturers based on the fire test data sheet and attached to every fire door. The installation instructions guide the installer to replicate the door assembly used in the original test by clearly identifying the components and materials allowed. Trimming details, required gaps and maintenance are other important issues set out in the installation instructions. The Scheme encourages its members to use picture based instructions to overcome language barriers.

## Frame to Wall Gap

Where possible, the frame to wall gap should be limited to 10mm, but some fire doors will allow up to 50mm if identified in the installation instructions. The gap should be filled according to the method and with products identified in the installation instructions.

## Trimming Allowance

Trimming allowances will be clearly identified in the installation instructions, but as a general rule are limited to 5mm off the bottom and 3mm off the stiles. Taking more off the door may affect the structure of the door reducing the expected performance. Never trim the top of the door due to the positioning of the BWF-CERTIFIRE Fire Door Scheme label. If the label is destroyed or removed the doors certification is invalidated.

Specification	Regulations	Certification	Manufacturing	Converting
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# Checking Fire Doors

## The Role of Building Control

If a fire door is installed without the correct components and the correct gaps it might as well just be a standard door. When signing off the fire safety of a building, the role of a Building Control Officer must include a detailed assessment of each fire door installed, not just a quick check that a fire door leaf has been used. The only way to be sure that a fire door will work is if the fire door assembly, as described in the original test report is replicated. By allowing untested products or incorrectly sized products, to be used, you are taking a gamble that the fire door will work, and therefore a gamble with peoples lives.

## Checking the Certification of a Fire Door

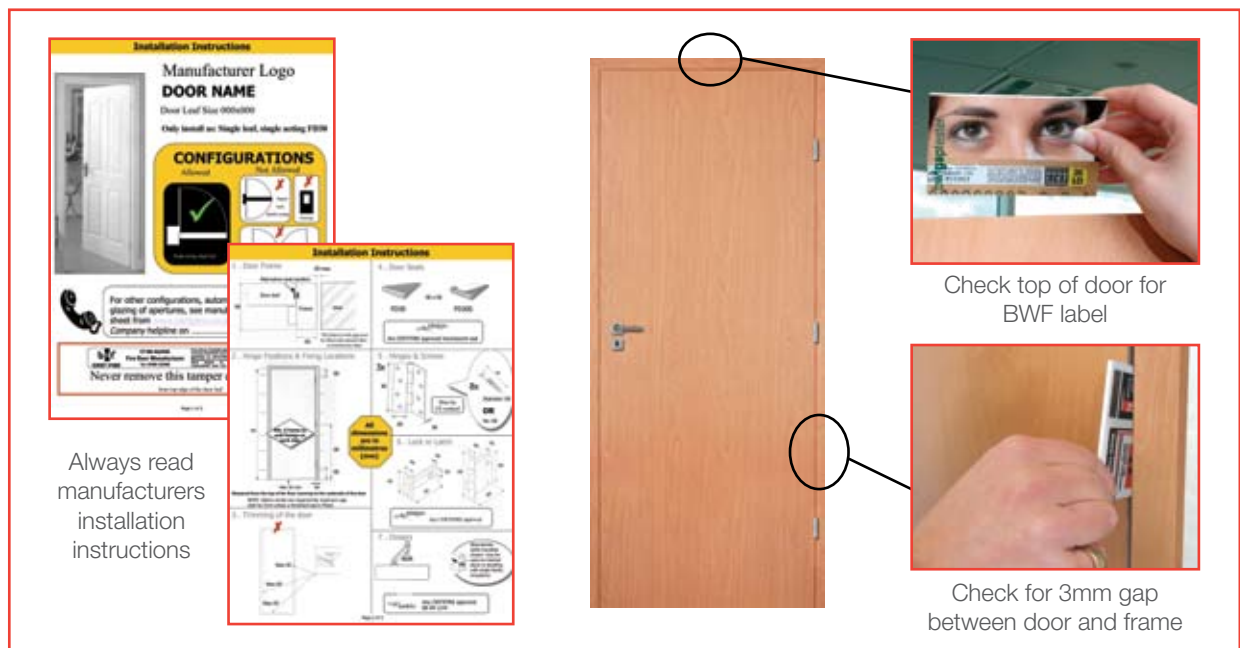
The first thing to check when assessing a fire door, is whether the door leaf has been certificated. The BWF-CERTIFIRE Fire Door & Doorset scheme, for example, produces a label that identifies the manufacturer, certification number and rating and is located on the top edge of the door leaf or in the case of a doorset by the lower hinge.

Once you are sure that the door leaf you are checking is certificated, it is important to check that the components used are compatible. The best way to check this is to use the installation instructions attached to each door manufactured by a Scheme member. If this is not available then contact the manufacturer through the phone number on the label for a copy of the data sheet, quoting the certificate number. Both the data sheet and installation instructions will list the components, including door frame, that can be used with the particular door leaf.

Secondly, check that the door leaf has only been altered by licensed converters within the allowances of the data sheet. Any aperture cut in a fire door for glazing, letter plates or air transfer grilles represent weak points so only trained and certificated companies should undertake the work, using certificated products. If a licensed converter has made these adjustments they will place a label on the top edge of the door leaf. If you are uncertain about any of these points, they can be checked by quoting the certification number, from the label, when contacting the manufacturer.

Other issues identified in the installation instructions which should be checked are:-

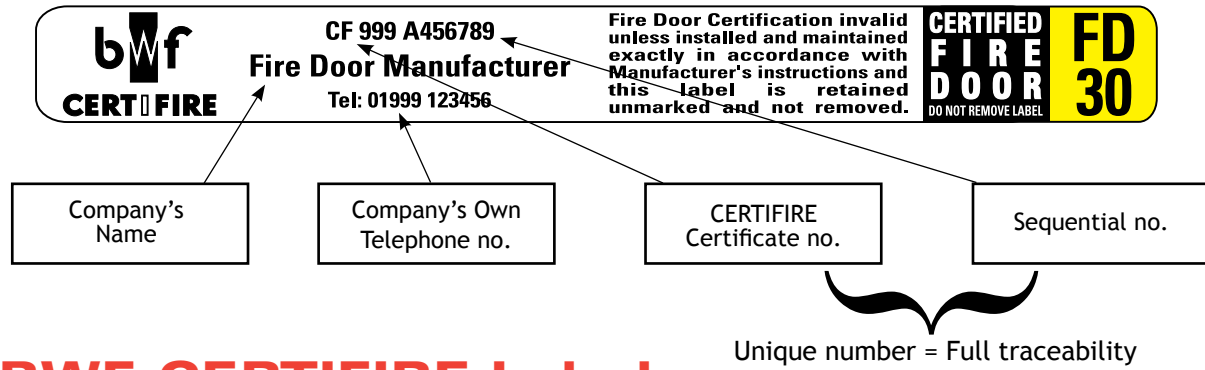
- Has the trimming allowance been followed?
- Has the frame to wall gap been filled using intumescent foam or mineral fibre?
- Are the frame to door leaf gaps consistently 3mm on the top and sides?
- Is the frame certificated?



Specification	Regulations	Certification	Manufacturing	Converting
Components	Buying	Installation	Checking	Maintenance

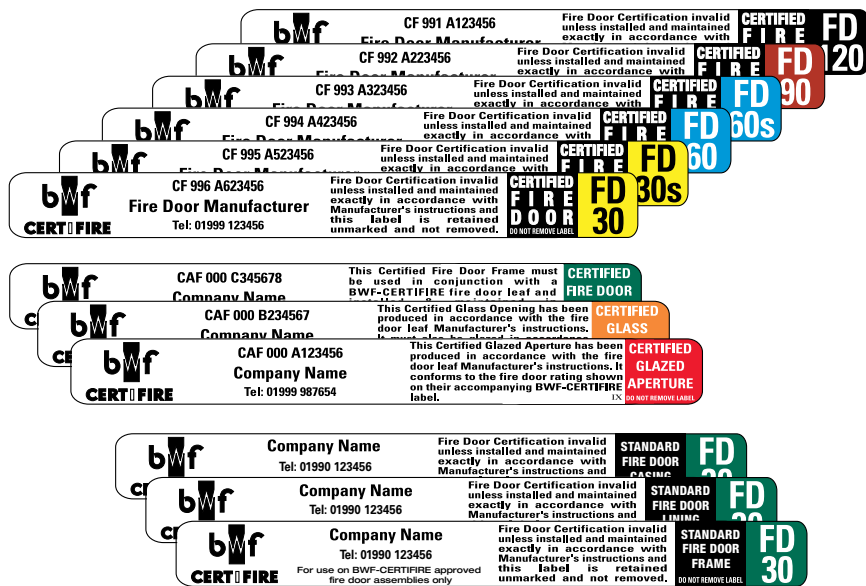
## Labels Explained

The BWF-CERTIFIRE Fire Door & Doorset Scheme has a variety of labels to suit the different ratings and requirements of each job. These labels have the manufacturer's name and phone number, and where applicable the certification number, a unique serial number and the rating, printed on them.



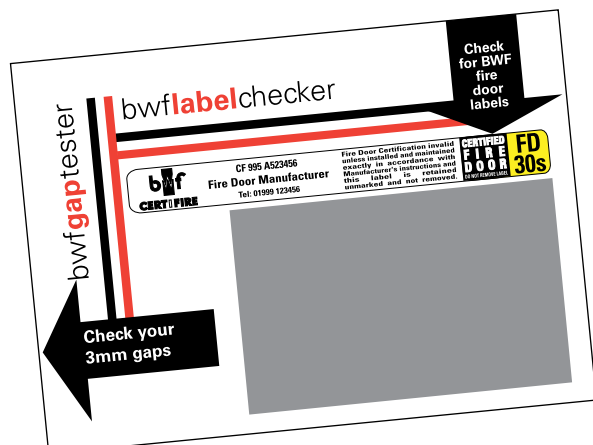
## BWF-CERTIFIRE Labels

The label should never be removed or covered



## BWF Gap Tester and Label Checker

To help you to check for the correct label why not use this handy device. It incorporates both a reflective mirror to check the top of the door and is gauged to 3mm to help you check the door/frame gap.



# Fire Door Maintenance Checklist

Please refer to the BWF-CERTIFIRE Scheme fact cards for further information while processing this checklist.

Maintaining a fire door is as critical as any role in the life cycle of a fire door. If you are responsible for the fire safety of your building you must check your fire doors every 6 months, or 3 months if your building has a high usage. This checklist can be used to ensure your fire doors are in working order and maybe used as part of your Regulatory Reform Order risk assessment.

This is a guide to maintenance only. For specific instructions on your fire door, refer to the installation instruction or data sheet available from the door manufacturer.

**Label** (use your BWF Gap Tester to look for the label)

Has the fire door got a BWF-CERTIFIRE Fire Door Scheme label on the top edge? .....

If not, can you confirm that the door is in fact a fire door and has been certificated as such? .....

**Door Leaf**

Does the door leaf sit against the door stop and is it free of distortion? .....

If the door is veneered or lipped, is the glue still holding these products firmly in place? .....

Is the door free from damage including dents, and holes? .....

**Door Frame**

Is the door frame firmly attached to the wall? .....

If a planted door stop is present, is it firmly attached? .....

Is the frame to door leaf gap consistently 3mm? (use the BWF Gap Tester) .....

**Intumescent/Smoke/Acoustic Seals**

Are intumescent seals in place? (if not install immediately) .....

Are the seals well attached inside the groove in the frame or door leaf? .....

Are the seals free from damage? .....

If you have a brush or fin type seal, is it free from damage or breakage? .....

If fitted, are the smoke and acoustic seals continuous around the frame or door leaf? .....

**Hinges**

Is there a minimum of 3 hinges with all the screws fitted? .....

Are all the screws the correct size? .....

Are the hinges free of metal fragments and oil leakage, which are signs of wear? .....

Are the hinges free from packing? .....

Specification	Regulations	Certification	Manufacturing	Converting
Components	Buying	Installation	Checking	Maintenance

**Door Closers**

- Open the door to 5 degrees or 75mm. Does it close and engage with the latch? .....
- Is the closer correctly attached to the door and frame? .....
- Is the closer free from damage and not leaking? .....
- If unlatched, does the closer hold the door in line with the frame and intumescent seal?.....
- If hung in pairs, do they close in line if both opened and released together? .....

**Hold Open Devices** – only electronically powered allowed

- Does the hold open device release the door when required? .....

**Lock and Latch**

- Does the latch hold the door firmly in place without rattling? .....

**Glazing and Glass**

- Is the intumescent seal continuous and attached to the glass and bead? .....
- Are the glazing beads well attached to the frame and free from damage?.....
- Is the glass free from damage and cracking?.....
- If the glass has been replaced, is it fire rated glass?.....
- If glazing panels are below 1500mm from bottom of door, is the glass safety glass?.....

**Threshold Gap**

- Is there a consistent gap under the door that allows it to swing without touching the floor covering? .....
- Is the door to floor covering gap consistently 10mm (3mm if smoke seals are fitted) or less when the door is closed? .....

**If your fire door does not pass all aspects of this checklist then it could fail!**

Contact the door manufacturer identified on the label on the top of your door or check the BWF-CERTIFIRE Fire Door & Doorset Scheme directory at [www.bwf.org.uk/firedoors](http://www.bwf.org.uk/firedoors) for certificated companies that can repair, replace or supply components for your door.

# Scheme Membership



If you are involved in the manufacture of a potentially life saving product, you have the responsibility of ensuring that if required, the product will fulfil its role and protect people's lives. Fire doors generally remain unnoticed, but if a fire breaks out, whether it is now or in 10 years time, they fulfil a vital role. It doesn't matter if you have been making fire doors or components for 30 years, the only way to know if a fire door assembly will work in a fire is to have it tested!

By joining the BWF-CERTIFIRE Fire Door & Doorset Scheme, you are joining a group of companies that are committed to providing a high quality end product. These companies work together throughout the supply chain forming partnerships, sharing information and knowledge with the aim of providing a certificated product in the shortest time possible at a competitive price.

The Scheme's members are its managers, providing strategic direction, information, advice and suggestions that are implemented by the Scheme Manager. Members are able to be involved in every project and are actively encouraged to participate through Scheme meetings and email updates.

## Background

The BWF-CERTIFIRE Fire Door & Doorset Scheme was established in 1997 by the Prime Fire Door Manufacturers. The aim was to ensure the high standard of fire doors sold in the UK through certification and to educate the fire door industry on the importance of compatibility. Since then the Scheme has grown to encompass Licensed Converters of fire doors, suppliers of Fire Door Components, Builders Merchants involved in the sale of fire doors, and even the installation of fire doors through the FIRAS scheme run by Bodycote Warrington Fire.

## Aims of the Scheme

- To help the members to increase their market share and improve their profitability
- To increase and maintain the standard of fire doors sold in the UK
- To educate the construction industry on the importance of third party certification of fire doors.

## Benefits of Membership

- A listing in the Scheme Directory and on the BWF website
- Advantage over your competitors
- Receive the benefits of the Schemes promotional activities
- Becoming certificated proves your commitment to providing a high quality safety product.



# Requirements of joining the Scheme

## Prime Fire Door Manufacturers

- Have all fire door designs tested to BS 476: part 22 or EN 1634
- Implement, gain certification for and maintain the ISO9000 quality management system
- Only produce fire doors within the scope of the fire test data sheet
- Undergo yearly audits to maintain certification
- Re-test every 250,000 fire doors produced or 5 years, which ever comes first
- Attach a Scheme label to every fire door produced
- Attach a detailed installation instruction to every fire door produced.

## Licensed Converters

- Undertake training by Prime Fire Door Manufacturer
- Implement, gain certification for and maintain the ISO9000 quality management system
- Undergo a yearly audit to maintain certification
- Attach a Scheme label to every certificated fire door adjusted.

## Suppliers of Certificated Components

- Undertake specific product testing
- Implement gain certification for and maintain the ISO9000 quality management system
- Undergo a yearly audit to maintain certification.

## BWF Approved Fire Door Centres

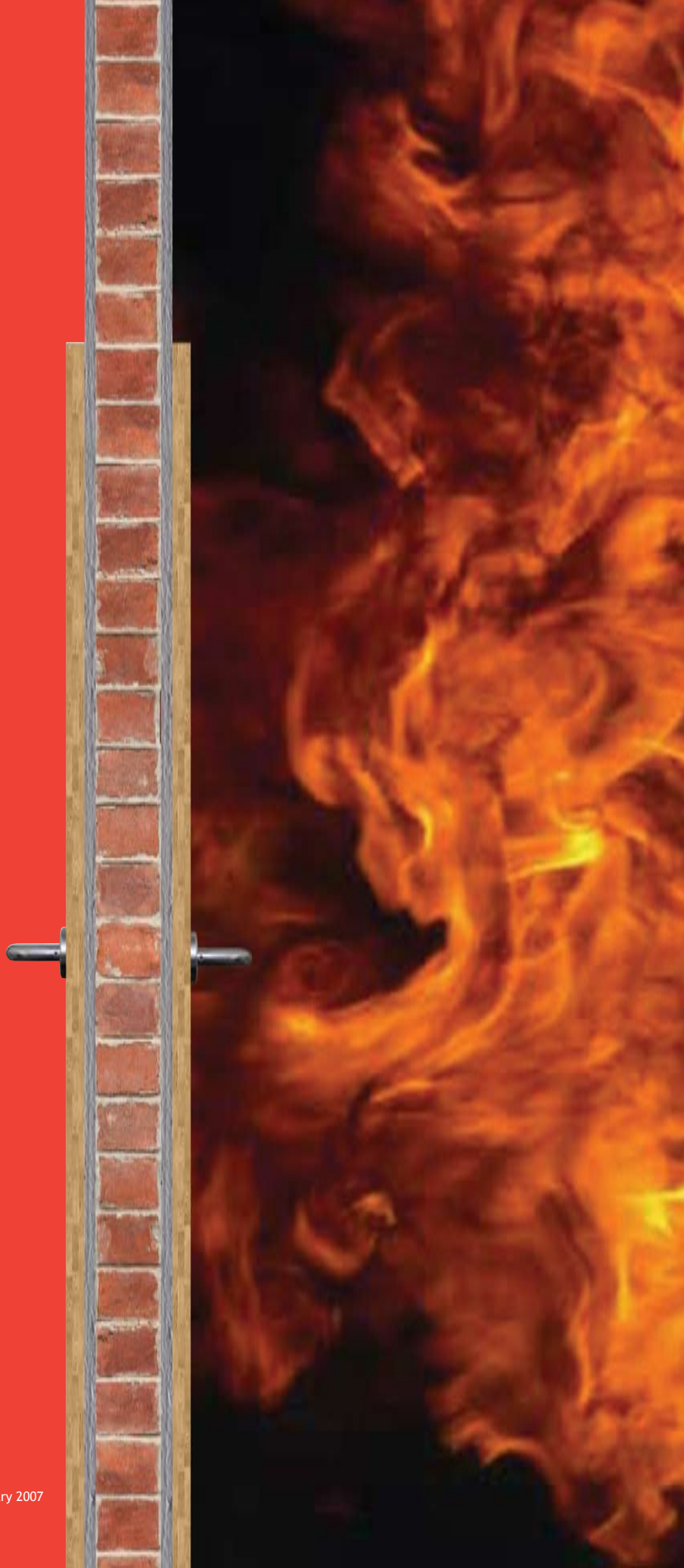
- Staff involved in the sale of fire doors are required to:-
  - Undertake initial 1/2 day training session
  - Achieve a minimum of 80% in post training test
  - Undertake refresher training every 2 years
- The branch must stock CERTIFIRE approved compatible components for the fire doors they sell.

**For further information and assistance in joining the Scheme, please contact the Scheme Manager.**





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