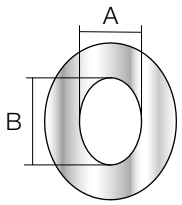
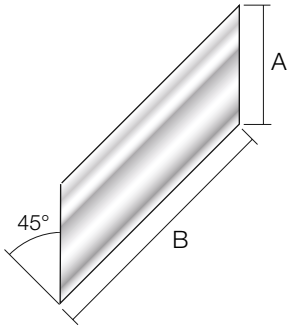
Elliptical Trim Plate



Diameter (Ø)	125mm (5")	150mm (6")	180mm (7")	200mm (8")
A	195mm	208mm		
B	272mm	287mm		
Code	**EXETP13**	**EXETP15**	**EXETP18**	**EXETP20**

Wall Sleeve



Diameter (Ø)	125mm (5")	150mm (6")	180mm (7")	200mm (8")
A	220mm	254mm		
B	570mm	570mm		
Code	**EXWS13**	**EXWS15**	**EXWS18**	**EXWS20**

WARRANTY & INSTALLATION

Docherty Group chimney systems are manufactured to the highest quality standards. Under normal operating conditions, Excelsior provides many years of reliable service and carries a 10 year conditional warranty depending on application, installation and maintenance. The components within the range can be vulnerable when exposed to the products of combustion from solid fuel appliances and this is especially true for terminals. Condensate collectors are also vulnerable, particularly if the flue system is not regularly maintained and cleaned. These components are considered 'incidental' and their life expectancy will vary depending on location, application, fuel usage and maintenance. For this reason, these fittings are covered by a 2 year warranty and not the 10 year conditional warranty.

Excelsior carries a 10 year conditional warranty for any defect due to faulty manufacture, this is provided the system has been installed in accordance with the installation instructions, and has been used for the purpose it was designed for. Furthermore, the system must be regularly cleaned, maintained and inspected.
This should be carried out at least once per year, and more regularly if the appliance is used continuously or frequently, by a member of one of the HETAS recognised chimney sweep associations (APICS, GMCS or NACS) or a HETAS Approved Engineer. Written documentation to demonstrate the inspection and cleaning of the chimney must be kept to validate the ten year warranty. When burning mineral fuel or smokeless fuel in your appliance, care should always be taken to use a high quality fuel. Only HETAS or SFA (Solid Fuel Association) approved fuels must be used with Excelsior. For guidance on fuel choices please visit www.hetas.co.uk.

Under no circumstances should an appliance be located where there is the potential of chemical contamination of the combustion air.

Where the chimney system is exposed to severe coastal locations, you must ensure adequate protection to the outer components of Excelsior. A chimney fire will invalidate the warranty; in the event of a chimney fire it is always advisable to replace the complete chimney system.
Excelsior must only be installed by a competent approved installer and in accordance with the manufacturer's instructions.

Chimney and flue design

The chimney and flue design is the responsibility of the engineer or installer and should conform to the requirements of Approved Document J and, where appropriate, BS EN 15287 part 1.
Any variation will require the designer to ensure the performance of the chimney meets the requirements of the appliance by calculation using the methods given in BS EN 13384 part 1 or any proprietary software programme based on this standard.

Regulations and standards

The regulations and standards covering the design and installation of a chimney system in the UK are as follows:

Building Regulations

England and Wales -- Approved Document J - Combustion Appliances and Fuel Storage Systems.

Scotland -- Scottish Building Standards Technical Hand Book Section 3.

Northern Ireland – Building Regulations Part L – Combustion Appliances and Fuel Storage Systems.

Standards

BS EN 15287 part 1 - Chimneys. Design, installation and commissioning of chimneys Part 1: Chimneys for non-room sealed heating appliances.
BS EN 13384 part 1 - Chimneys. Thermal and fluid dynamic calculation methods.

Flue sizing
The sizing of flues for appliances should be based on the type of fuel and the appliance to be used.

• Gas Appliances
In the case of gas appliances the Building regulations Approved Document J table 5, the gas safety in use regulations and in all cases as required by the manufacturers' installation instructions.

• Oil Appliances
Flues for oil appliances should be sized in accordance with the requirements of Approved Document J Paragraphs 4.4 and 4.5.

• Solid Fuel Appliances
The size of flues for solid fuel appliances should be in accordance with the requirements of Approved Document J Paragraphs 2.4 to 2.7 and as given in table 2 of ADJ. For solid fuel appliances with back or side flue outlet, the maximum permitted length of horizontal chimney or flue pipe is 150mm. Greater horizontal lengths up to 450mm are now possible subject to meeting the requirements of the National Annex for BS EN15287-1.Please refer to NA.7.2.2 for full details.

Building Regulations do not allow any part of the chimney system to form an angle greater than 45 degree from the vertical. Where the system is used for solid fuels and oil, no system can be constructed with more than two separate offsets in the chimney. If a 90 degree tee is used on the back of the appliance it would constitute as one offset, any change of direction in a flue will create resistance to the flue gas movement.
The maximum length of the offset must not exceed 20% of the total length of the chimney.
Where the chimney passes through a wall, the opening must be lined with a wall sleeve. The termination height of the chimney will depend on appropriate regulations and standards.
The connection between the connecting flue pipe to Excelsior must be made in the same room as the appliance.
According to the UK Building Regulations, the chimney must be accessible for inspection and cleaning.
We recommend the inclusion of a tee to provide easy access.

Where the chimney passes through a roof space, it is essential that it is adequately supported by bracing to roof timbers. If there is a chimney run of more than 1.5m from the ceiling support to the roof support, use a bracing bracket and rigid stays for such application. Also, provision must be made to ensure that no accidental placement of combustible product can occur within 50mm of the external casing of the chimney. For example, a mesh or screen around the chimney is required for the first 1mtr of the chimney ensuring that no airways are obstructed on the ventilated plate assembly. Where it passes through any insulation provision should be made to ensure that no insulation can penetrate the guard. (See loft protector brochure, available on request).

Each chimney section and connected fittings shall be used as manufactured for assembly on site without any alteration. Please make sure that all elements are installed the right way up.

The system must be adequately supported with elements supplied from the Excelsior range of products.
The support components must be used at intervals depending on the load bearing criteria quoted on page 11. Wall brackets are not load bearing and should be used to provide lateral support only. When an offset is present a lateral support bracket is required; one before the first bend and one after the second bend.

Where the chimney passes through any occupied space other than the room in which the appliance is installed, it must be fully enclosed with none combustible board a minimum of 9mm thickness with at least a 30 minute fire rating maintaining a minimum air gap of 41mm (we recommend 50mm or more to provide increased protection) between the inside of the enclosure and the outer wall of the chimney. The enclosure is to prevent damage to the chimney, accidental human contact, cooling and to prevent combustible material being placed too close to the chimney.
Provision for inspection throughout the enclosed length is required under Building Regulation ADJ paragraph 1.47. If this cannot be achieved via the fire stop a non-combustible access hatch 100mm x 100mm with a minimum 30 minute fire rating will be required. The access hatch should form an airtight seal.

First Floor penetration into an occupied space (example bedroom): When passing through a combustible floor a ventilated fire-stop assembly is required (EXVFSK). A suitably sized box frame to accept the fire-stop assembly (four sides) should be created; remove any combustible material within the boxed area. The box frame should then be shielded with a non-combustible board of a minimum 9mm thickness with a fire rating of at least 30 minutes whilst maintaining a minimum air gap of 41mm (we recommend 50mm or more to provide increased protection) between the inside of the enclosure and the outer wall of the chimney the non-combustible lining should finish flush with the finished floor level and ceiling and secured to the boxing using suitable fixings. Offer assembly up to the ceiling and locate within the boxing secure in place using 6mm screws.

The top plate and clamp supplied with the fire stop is secured to the finished floor/top of formed chamber and fixed in place using 6mm screws.

Enclosure for occupied space and second floor/ ceiling penetration into an unoccupied space/loft area.
When passing through a combustible floor or ceiling a second box frame (four sides) of similar size should be created in-line with the first floor penetration; remove any combustible material within the boxed area.

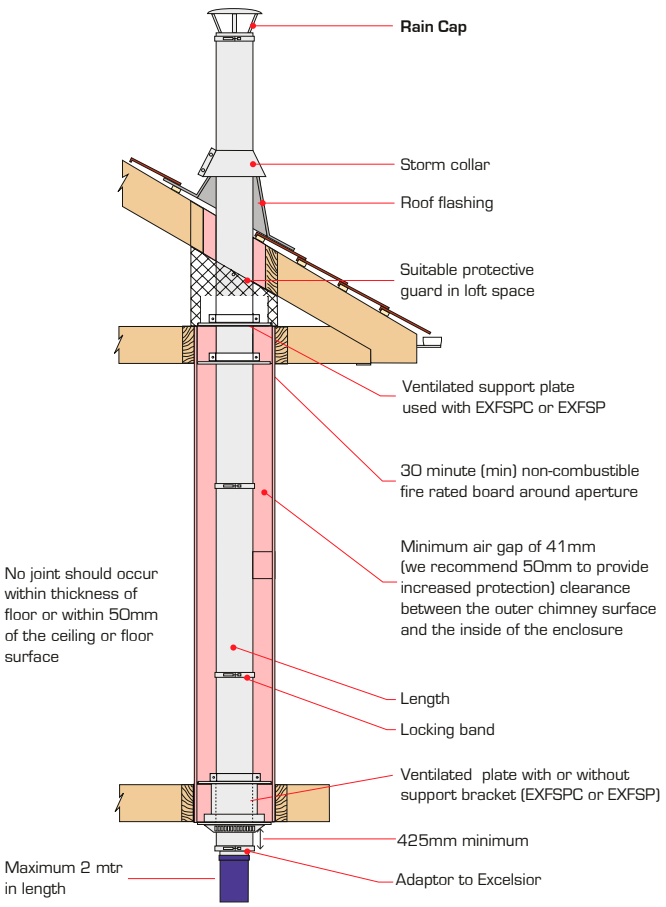
The box frame should be shielded with a non-combustible board of minimum 9mm thickness with a fire rating of at least 30 minutes whilst maintaining a minimum air gap of 41mm (we would recommend 50mm or more to provide increased protection) between the inside of the enclosure and the outer wall of the chimney the non-combustible lining should finish flush with the finished floor level and ceiling and secured to the boxing using suitable fixings. Ventilated support plates should be fitted to both the top and underside of the penetration and secured in place 6mm screws.

As an option a support bracket can also be used with the top plate.
Using suitable vertical galvanised or stainless steel angle trims 25mm x 25mm or plasterboard angle fixing bead or non-combustible battens to form a corner or use as vertical fixings against a wall. Please note if it is deemed to be a combustible wall you will be required to also line this area with a non-combustible board to form part of the enclosure. Once the frame is complete measure each side of the enclosure between the floor plate and ceiling plate, cut a suitable non-combustible board to the required size and attach to the support framework using suitable fixings. Angle trim may also be used at the bottom of the shaft to give further strength and support by fixing it to the floor creating an upstand to secure the board too.

All joints will need to be sealed to form a continuous air tight enclosure using appropriate materials. If intermediate lateral support is required a wall bracket may be fitted within the enclosure.

Ventilated fire stop arrangement

Diagram shows Method 1 for enclosure and second floor/ceiling penetration



Where the chimney system penetrates more than one floor please contact us for more information

Single Penetration into Unoccupied Space (Example Bungalow)

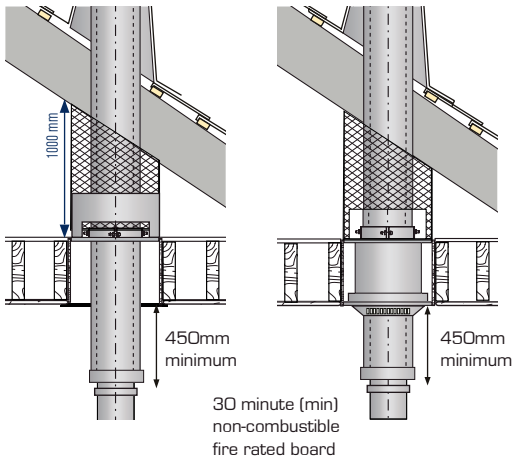
Method 1 – Solid trim with ventilated plate

When penetrating the ceiling into the loft space a box frame (four sides) should be created. The box frame should then be shielded with a minimum of 9mm non-combustible board giving a minimum fire rating of 30 minutes maintaining a minimum air gap of 41mm (we recommend 50mm or more to provide increased protection) between the inside of the enclosure and the outer wall of the chimney; sizing is to suit the ventilated plate with support clamp EXFSPC.
Remove any ceiling material within 50mm minimum (we recommend 70mm for increased protection) of the outside face of the flue and fit a ceiling support (EXCSP) (Please note that this component EXCSP when used for this application is not load bearing) to the ceiling using suitable screws. The plate is pre-drilled for ease of fitting, the mounting screws should penetrate the underside of the formed boxing.
Fit the ventilated plate and support bracket to the loft side of the box frame and secure in place using 6mm screws. Where protection is required to prevent accidental contact in a loft space a suitable fire rated guard with 50mm clearance is required for the first 1000mm. Where loft insulation is present provision should be made to ensure that no insulation can penetrate the guard.

Method 2 - Alternative method using a Ventilated Fire Stop Assembly EXVFSK

When passing through a combustible floor a ventilated fire-stop assembly can be used (EXVFSK). A suitably sized box frame to accept the fire-stop assembly (four sides) should be created, remove any combustible ceiling material within the boxed area. The box frame should then be shielded with a non-combustible board of a minimum 9mm thickness with a fire rating of at least 30 minutes whilst maintaining a minimum air gap of 41mm (we recommend 50mm or more to provide increased protection) between the inside of the enclosure and the outer wall of the chimney. The non-combustible lining should finish flush with the finished floor level and ceiling and secure to the boxing using suitable fixings. Offer assembly up to the ceiling and locate within the boxing, using suitable screws secure in place at the four pre-drilled points by screwing into the formed boxing.
The top ventilated plate and support clamp supplied with the fire stop is secured to the finished floor/top of formed chamber and secured in place using 6mm screws.
NOTE: the Ventilated Fire Stop assembly comes complete with top ventilated plate and support bracket.

Single storey building penetration into unoccupied loft space



Where flue passes through insulation provision must be made not to allow insulation to penetrate the guard.

EXTERNAL AND INTERNAL INSTALLATION