

## Warranty terms and conditions

**QSW 316 is manufactured to the highest quality standards. Under normal operating conditions, QSW provides many years of reliable service and carries a 2 year conditional warranty depending on application, installation and maintenance.**

The 2 year warranty covers 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 (at least once per year, and more regularly if the appliance is used continuously or frequently) by a registered qualified sweep from either APICS, GMCS or NACS or a HETAS approved engineer.

Written documentation to demonstrate the inspection and cleaning of the chimney by an appropriately qualified person must be kept to validate the two year warranty.

Use only quality fuels with QSW, such as seasoned logs, wood pellets and chip to BS EN 14961. When solid mineral fuels such as coal and smokeless fuel are burned, use only those approved by HETAS or the Solid Fuel Association.

For guidance on fuel choices please visit [www.hetas.co.uk](http://www.hetas.co.uk).

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

A chimney fire will invalidate the warranty. In the event of a chimney fire it is always advisable to replace the connecting flue pipe and any steel chimney system or liner.

## Installation Guide

**QSW 316 must only be installed by a competent approved installer and in accordance with the installation instructions that are available on request.**

### Chimney and flue design

The chimney and flue design is the responsibility of the engineer or installer and should conform to the requirements of these instructions, the requirements of Approved Document J and, where appropriate, BS EN 15287 part 1.

Any variation from these instructions and the standards 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 program based on this standard.

### Regulations and standards

The regulations and standards covering the design and installation of a flue pipe 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 manufacturer's 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.

All combustion appliances require adequate ventilation to operate correctly; ventilation should be provided in accordance with Approved Document J or the appliance manufacturers instructions, whichever is the greater.

The connecting flue pipe run should be studied and measured accurately to reduce the need for cutting lengths and reduce joints to a minimum.

All flues must have provision for cleaning and inspection both internally and externally. Where the chimney is to be swept through the connecting flue pipe then it is important to ensure a suitably sized and stiffness of brush for the flue in the chimney can pass through the pipe. If this is not the case, then an additional cleaning access in the chimney will be required. If the sweeping of the chimney through the flue pipe will put strain on any of the joints, such as around bends and offsets, then additional bracketing of the connecting flue pipe will be required to avoid such damage.

**QSW 316** can be installed as close as required to non-combustible material, but should not be touching any wall or surface it is not going to be sealed and connected to. For solid fuel installations, QSW 316 has to be positioned a minimum of three times its nominal diameter away from any combustible material. Where a shield is provided as required in Approved Document J, then this distance can be reduced to 1.5 times the diameter. The shield must be of non-combustible material and have a minimum 12mm air gap between it and the combustible material it is shielding.

The best possible chimney system is straight and vertical at all times, but in some cases it is necessary to have an offset in a connecting flue pipe if the chimney and appliance outlet do not line up. If this is the case then a maximum of two bends of up to 45 degrees from the vertical are allowed in a connecting flue pipe.

The weight of any chimney system or chimney liner must not be borne by the flue pipe and it must be possible to remove the connecting flue pipe without the need to remove any other part of the flue or chimney.

The connecting flue pipe must be connected to the flue in the chimney using an appropriate adaptor. This will vary depending on the type of arrangement. The adaptor may be to a flexible twin wall stainless steel flue lining, rigid clay or concrete lining, factory made steel chimney system, or into an unlined chimney via a register plate.

**All these components are available within the Docherty range of chimney systems and chimney liners.**

## Installation

