

## TF1 Omega Installer Pack 22mm With Valves 62368

- Complete pack for cleaning and protecting a central heating system.
- TF1 Omega Filter is a robust, sealed nickel-plated, brass in-line system filter for greater reliability and ease of servicing
- Unique action, removes magnetic and non-magnetic contaminants from system water.
- Fernox Cleaner F3 is a non-foaming, effective cleaner designed to remove all debris, sludge and scale from new and existing systems
- Fernox Protector F1 provides long term protection against corrosion and limescale formation.
- Market- leading 25 year warranty



A complete pack for cleaning, protecting and guarding a central heating system. The TF1 Omega Filter is a precision-engineered, sealed in-line system filter made from nickel plated brass. This market-leading, high-performance filter is available with quality valves and slip socket connections, which is an industry first. The TF1 Omega Filter offers the ultimate in installer choice and has a market-leading 25 year warranty. Supplied with best-in-class chemical water treatment, Cleaner F3 and Protector F1 to ensure system efficiency and longevity.

### Additional Information

The TF1 Omega Filter is constructed from a high strength engineering grade brass, suitable for heating and cooling system applications. The brass components are nickel-plated to increase durability and resistance, meaning the filter is compatible with a range of glycols and additives used in central heating systems.

The TF1 Omega Filter has been designed to ensure there is a minimal pressure loss, whilst also maintaining a high collection efficiency. The internal HPS, magnet assembly and area of low flow have all been engineered to allow the filter to capture a range of system contaminants, whilst ensuring this does not impact the rest of the heating system.

The TF1 Omega Filter utilises a range of high-quality component parts that ensure the filter offers the best possible performance. The magnet is manufactured using a premium grade of neodymium, enabling a high-efficiency capture rate, combined with the stainless-steel hydronic particle separator, which enables the continued and consistent filtration of a range of system contaminants.

### Application

Designed to be installed on domestic heating systems on the relevant pipework size. The TF1 Omega Filter can be easily fitted onto either horizontal or vertical pipework in both flow directions. The TF1 Omega Filter is designed to protect the boiler from the damaging effects of circulating corrosion debris, which has collected in the system as a result of a chemical reaction when water comes into contact with mixed metals used within a heating and cooling system. The TF1 Omega Filter should be fitted on the return to the boiler and can be installed at up to 45° from the vertical position.

Fernox Protector F1 gives long-term protection of domestic central heating systems against internal corrosion and limescale formation. It is suitable for all types of boiler, radiators and pipe work systems. Protector F1 is compatible with all metals and materials commonly used in central heating systems. It is suitable for use with all types of water, including softened water and deionised water. One single dose of this product treats and protects a larger sized property with a heating system of 130 litres, up to 16 radiators, or 250 sqm of underfloor heating. For open vented systems add via the feed and expansion tank. For sealed systems add via a suitable dosing point (e.g. a towel rail, or an in-line system filter). Alternatively, use a suitable dosing vessel to inject the product into the system. In single feed indirect cylinders, e.g. 'Primatic' or similar, potable water chemicals must be used. Protector F1 has been formulated to have best-in-class pH buffering ability, which keeps system water pH between 6.5-8.5, giving optimum protection for mixed metal systems. To comply with BS 7593:2019, Protector F1 levels should be checked annually. The concentration of the product can be easily measured on site using a Fernox Protector Test Kit, or by using the Fernox Water Quality Test postal service. BS 7593:2019 also states that after 5 years systems should either be re-dosed, or a laboratory test performed, such as the Fernox Water Quality Test. 'If you protect a central heating system using Fernox Protector F1, after cleaning with Fernox Cleaner F3, you can restore and maintain system efficiency, resulting in a gas saving of up to 15% every time you heat your room. This saving is equivalent to 110 Kg CO<sub>2</sub>e per typical home per year.'

A single dose of Cleaner F3 treats a larger sized property with a heating system of 130 litres, up to 16 radiators, or 250 sqm of underfloor heating. Additional / repeat applications of Cleaner F3 may be necessary for larger systems, or if systems are heavily sludged. Alternatively, Power Cleaner F8 may be used for heavily sludged systems. First drain and refill the entire system with plain water. For optimum results the entire system, including drop feed radiators where fitted, should be completely drainable. Preferably, full bore gate valves with hose connectors should be provided temporarily for this purpose. Motorised and thermostatically controlled valves must be set so that no part of the system is closed off during cleansing, or rinsing. Discharges must be made to the foul drain and not the surface water drain. For open vented systems add Cleaner F3 via the header tank. For sealed systems add via a suitable dosing point, or use Fernox Cleaner F3 Express 400ml. Fernox Cleaner F3 can also be used in conjunction with a powerflushing unit. In this case, please refer to the unit manufacturer's instructions. When pre-commission cleansing new systems, Fernox Cleaner F3 should be circulated for a minimum of one hour at normal operating temperature. For cleaning existing systems, sludge and debris should be dispersed also within one hour at normal operating temperatures. However, to remove hardened iron oxides and limescale, the cleaning time can be extended to up to one week under the normal heating cycle. If a radiator still has a cold spot after one hour, increase the flow through the radiator by closing the valves on the other radiators. An additional or repeat dose of Cleaner F3 may be necessary in some cases. Drain and flush thoroughly, at least twice, until the water runs clear. When using Cleaner F3 with a powerflushing machine, cleaning should be completed within an hour. Use dynamic flushing with plain water until the water is clear. Refill the system adding Fernox Protector F1 for long term protection against corrosion and limescale. In single feed indirect cylinders, e.g. 'Primatic' or similar, potable water chemicals must be used. 'Cleaning a central heating system using Fernox F3 Cleaner and protecting with Fernox F1 Protector can restore and maintain system efficiency, resulting in a gas saving of up to 15% every time you heat your room. This saving is equivalent to 110 Kg CO<sub>2</sub>e per typical home per year.'

\*independently verified

### **Package, Handling & Safety**

Fernox Protector F1 is supplied in 500 ml bottles.

Fernox Protector F1 is classified as non-hazardous for human health, but as with all chemicals, keep out of reach of children. In case of contact with eyes or skin, rinse immediately with plenty of water.

Fernox Cleaner F3 is supplied in 500 ml bottles.

Fernox Cleaner F3 is classified as non-hazardous for human health, but as with all chemicals, keep out of reach of children. In case of contact with eyes or skin, rinse immediately with plenty of water.

As with all magnetic products, if you have an implanted cardiac device extra caution should always be taken when handling any magnetic filter.

Individually packaged with instructions included. No special storage requirements.

## Performance

Suitable Fluids:

Water

Inhibited Glycol Solutions

Fernox Chemical Range / System Additives

Maximum Percentage of Glycol - 50%

Maximum Working Pressure - 50 L/min

Maximum Working Temperature - 100°C

Capture Rate - Up to 100% of system contaminants

Operating Principle - Contaminated water enters the filter via the manifold, carrying a variety of system debris and particulate matter held in suspension. This debris, including ferrous impurities such as Magnetite, moves through the manifold and into the main body of the filter.

Water is forced down towards the bottom of the filter due to the engineered flow characteristics created within the filter by the Hydronic Particle Separator (HPS). The HPS action helps to disrupt any dirt particles held in suspension by the water, as well as direct these particles towards an engineered area of low flow at the base of the filter.

The dynamic flow of the water within the filter also allows ferrous impurities to be captured by the high-powered magnet assembly.

To exit the filter, water must pass over the magnet sheath and around the HPS, then out of the manifold. In this way, system debris has difficulty escaping the unit, and is either trapped in the area of low flow, or captured by the powerful magnet, meaning clean water exits the filter.

Any dirt collected within the filter can then be discharged by removing the magnet from the sheath and opening the drain valve. This procedure is shown in the cleaning guide and does not require system shutdown or the filter to be disassembled.

## Specification

Filter Body – Forged brass (EN 12165-CW617N-DW), Nickel plated

Manifold – Forged brass (EN 12165-CW617N-DW), Nickel plated

Magnet – Neodymium

Hydronic Particle Separator – Stainless Steel

Circlip – Stainless Steel

Drain Valve – Nickel plated brass

Isolation Valves - Nickel plated brass

Seals & Washers – EPDM

Cleaner F3

Colour: Amber

Odour: Faintly Aromatic

Form: Liquid pH (conc): 6.4

pH (in-use) 6.5 - 7.7

SG: 1.145 @ 20°C

Protector F1 is a blend of inorganic and organic corrosion and scale inhibitors.

Form: Liquid

Odour: Aromatic (slight)

Colour: Light Yellow pH (conc.): 8.3

pH (in-use): 7.8 to 8.5

SG: 1.135 at 20°C

## Single Item

Barcode EAN

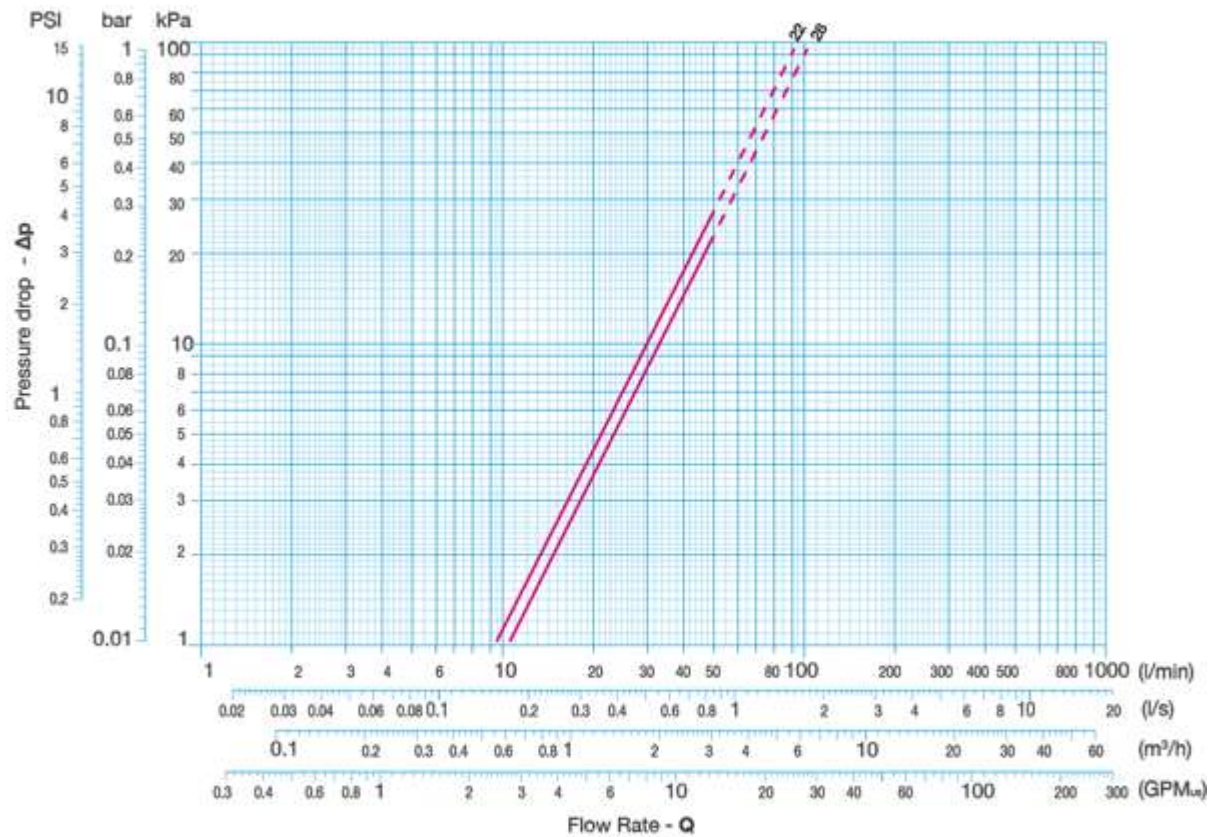
5014551623682

## Outer Carton

OCU Barcode

05014551001596

Graph



Dimensions Diagram

**TF1 Omega Filter 22mm**

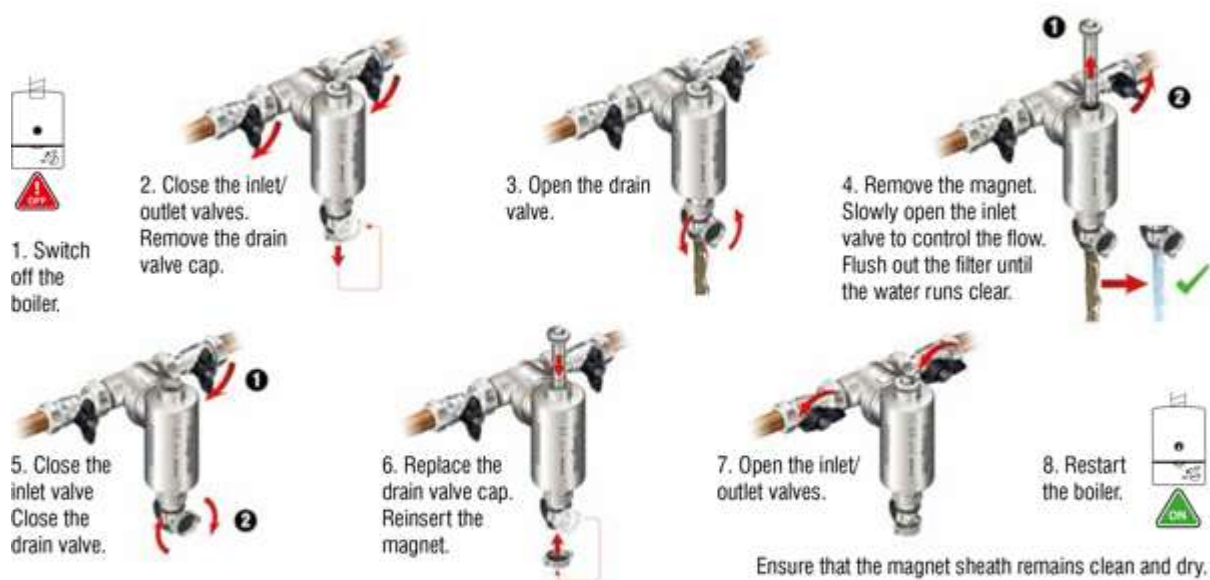


**TF1 Omega Filter 28mm**

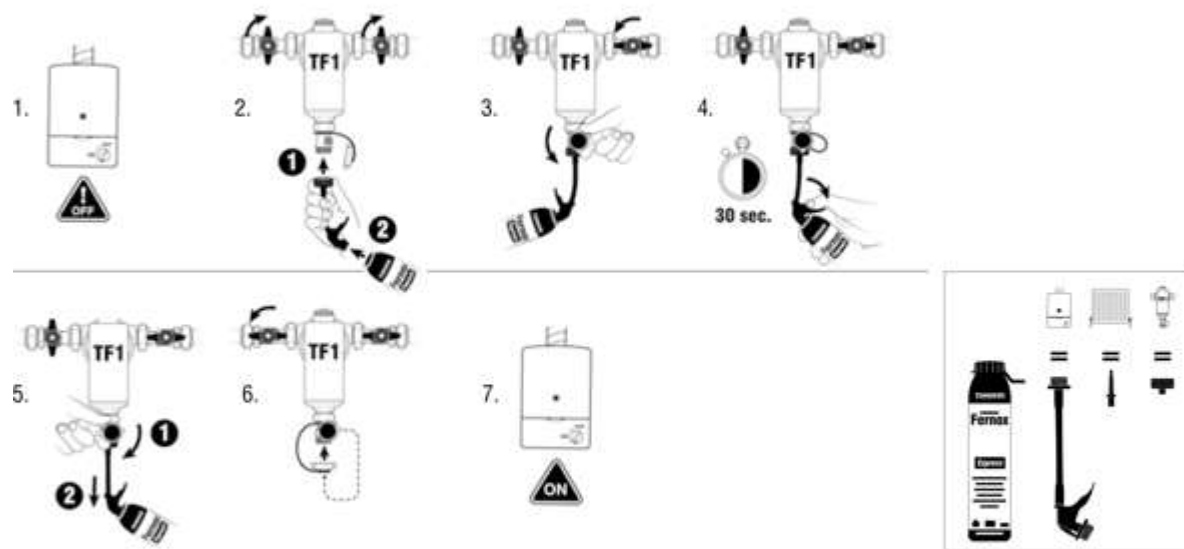




## Cleaning Diagram



## Dosing Diagram



Last modification

12-02-2021 (d/m/y)