

Technology from the ground up

# GO GEOTHERMAL

## PRODUCT GUIDE



[www.gogeothermal.co.uk](http://www.gogeothermal.co.uk)

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Established in 2006, Go Geothermal has grown to become the UK's largest supplier of renewable energy heat pumps and associated components.



Enertech Group

Part of the Enertech Group, we offer a one stop shop for Ground and Air Source Heat Pumps made by the world's leading edge companies in this field, including CTC, Vaillant, Mitsubishi, Stiebel Eltron, Viessmann and Clausius.

We also stock and distribute products for biomass, underfloor heating and many other renewable technologies.



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Enertech Group

### CTC - Made in Sweden

For 100 years (and counting) CTC's range of high-performance products have warmed homes effectively and efficiently. Go Geothermal has the exclusive rights to the CTC brand in the UK and our complete range of renewable products includes Air to Water and Ground Source Heat Pump systems including our unique energy hub - The EcoZenith.

All the products are developed and manufactured in Sweden - a guarantee of quality which is second to none.



### Ground and Air Source Heat Pumps

If you're looking for an efficient and green way to heat your home or business, then the CTC range of Ground and Air Source Heat Pumps are the perfect choice, with demand ranging from 2kW to 1.8MW.

From residential properties to commercial buildings, CTC Heat Pumps are some of the most advanced and energy efficient on the market, boasting Coefficient of Performance (COP) ratings of over 5.

With A+++ energy ratings, CTC Heat Pumps deliver exceptionally high efficiency which can heat your home and your water simultaneously while delivering up to 85% savings compared with traditional forms of heating.

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### GSi612

The GSi612 is an inverter driven Ground/Water Source Heat Pump with a market leading 300-litre integrated hot water cylinder. With CTC's Energy Flex ethos it is capable of controlling multiple heat sources and zones, including a swimming pool. The GSi, which is smart grid and WiFi enabled and is supplied with a 7-year warranty, comes in 3 sizes with outputs ranging from 2.5kW to 16kW and has circulation pumps installed and pre-plumbed, which saves installers time and money.

**An inverter driven Ground/Water Source Heat Pump with a market leading 300-litre integrated hot water cylinder.**



### EcoPart & EcoPart XL

The EcoPart is a compact Ground/Water Source Heat Pump available from 6kW to 17kW.

The EcoPart XL is the largest single-phase Ground/Water Source Heat Pump on the market available from 25kW to 35kW

With CTC's Energy Flex ethos they are capable of controlling multiple heat sources and zones, including a swimming pool. Both products, which are smart grid and WiFi enabled and supplied with a 7-year warranty, have circulation pumps installed and are pre-plumbed, which saves installers time and money.



### 700 Series

Built in Sweden and with a range of outputs, the CTC Air to Water Heat Pump 700 series delivers high performance. With an incredibly low Global Warming Potential (GWP) of less than 3, the pumps can both cool and heat to create the perfect indoor climate.

During the colder months, it supplies both heat and hot water and in the hotter periods of the year, the advanced cooling function ensures a wonderfully comfortable indoor climate. The heat pump switches from generating heat to cooling through the underfloor heating system or a separate fan convection system.

**An incredibly low Global Warming Potential (GWP) of less than 3.**



Its high performance and energy efficiency class of A+++ reduces the energy consumption of outdoor modules. When used with our intelligent control systems, the heat pump can also be connected to the smart grid, allowing you to benefit from flexible electricity charges and reducing your energy costs even further. These pumps are compatible with all our tanks, indoor modules and control systems.

### EcoAir

The EcoAir range of inverter driven Air to Water Heat Pumps are available from 2kW to 22kW. With CTC's Energy Flex ethos, they are capable of controlling multiple heat sources and zones including a swimming pool.

**Inverter driven and available from 2kW to 22kW with a 7-year warranty.**



### EcoHeat

The CTC EcoHeat Ground Source Heat Pump is truly unique. It is the ONLY unit on the market which has an integrated, pre-wired and pre-plumbed buffer tank, direct hot water tank and ground source compressor module in one box.



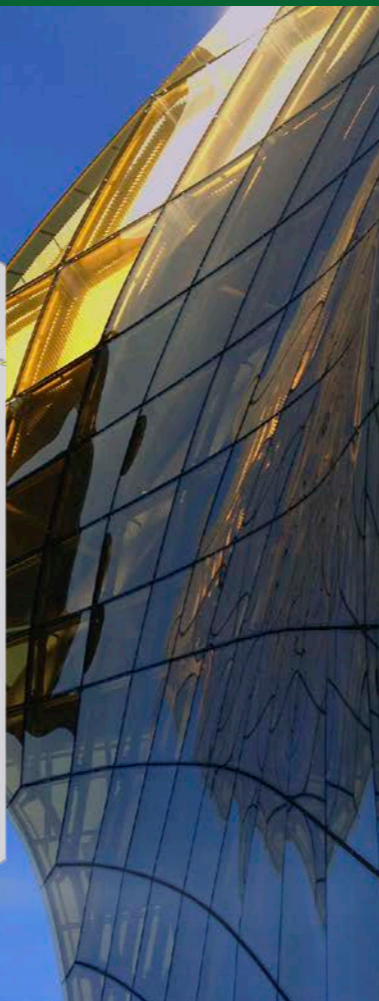
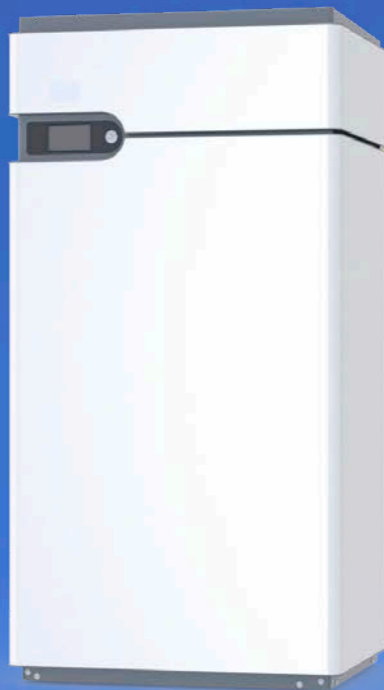
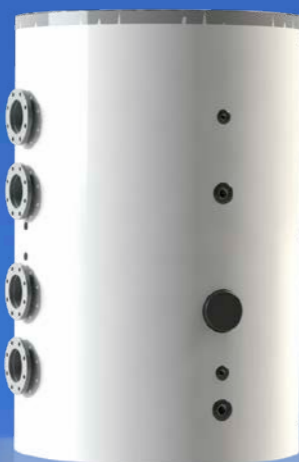
## Professional Range

Since becoming part of the Enertech Group in 2021, Go Geothermal is able to benefit from group resources and in-depth knowledge to offer exclusive leading heat pump solutions.

Part of this capability is the CTC Professional Range, effectively enabling solutions on ground source from light commercial to an industrial scale, starting at 50kW rising through to 1.8MW.

Boasting excellent functionality for the client and installer, it has the high SCOP's you'd expect coupled with a whole host of innovative features.

Contact us today to see how we can assist in your project.



## CTC Elite Partner Programme

We would like to invite installers to join our Elite Partner Programme.

This programme offers various benefits to you and your customers, namely:

1. Access to the latest online design software, specific to CTC.
2. Online and UK-based physical assistance, including commissioning & technical support.
3. Once you have completed your CTC Heat Pump training course, you will automatically be eligible for our enhanced warranty.
4. Regular pre-qualified lead generation for your business.
5. Priority call backs from CTC UK technical support.
6. Brand assurance 100 years plus in operation for peace of mind.
7. UK-based CTC dedicated specialist engineers.
8. Branding logos for websites and social media channels, , vans and clothing to add value to your offering.
9. Organised trips to Sweden to see the latest technologies produced.
10. Commercial advantage on pricing over other non-Elite installers (on both CTC Heat Pumps and other Go Geothermal products).

If this sounds appealing & you're ready for a new kind of brand partnership, then drop us a line today.

Entry criteria applies.



## CTC Heat Pump Installer Training

We have a network of national installer training centres, offering engineers hands-on training and experience in the installation of CTC Heat Pumps.

Delivered in partnership with a national technical training academy, at the end of the course you will receive the nationally recognised Cert-ain accredited course for the installation, commissioning and servicing of Air Source Heat Pumps.

Please contact us for details of your local training centre.

At the heart of our offering, Go Geothermal has both Ground and Air Source Heat Pump units from 3kW to 1MW demand. We have forged strong links with leading manufacturers such as Stiebel Eltron, Vaillant, IVT (Bosch) and Mitsubishi, and along with the best brands in the business, we have the full technical knowledge and support to meet all your installation requirements.

### Vaillant

The aroTHERM PLUS is Vaillant's second generation Air-to-Water Heat Pump. Developed in line with the exacting standards and precision engineering you would expect when you choose Vaillant, this MCS accredited pump is available from 5kW to 15kW and is one of the most adaptable heat pump systems on the market, ensuring high performance, quality and comfort levels.



### Stiebel Eltron

The WPL Inverter Air Source Heat Pump series provides heating and cooling as standard and range from 2kW to 1.8MW. With low noise emissions and the highest energy efficiency, these models reach an output level that enables flow temperatures of up to 70°C and can be controlled via a smartphone.



### IVT (Bosch)

The IVT AirX is a whole new generation of Air Source Heat Pump which sets new standards in terms of efficiency levels and noise abatement. Available from 6kW to 17kW, the pump is ideal for any new build or retrofit installation and is easy and low cost to fit.

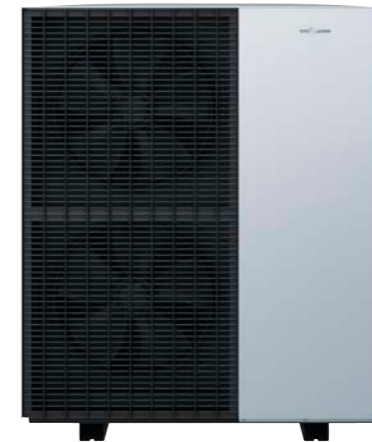
**Ideal for any new build or retrofit installation and is easy and low cost to fit.**



### Viessmann

Reliable, compact and more environmentally responsible than ever – the new, innovative heat pump range from Viessmann makes particularly efficient use of environmental energy for heating and cooling. Available from 2.6kW to 17.6kW. Vitocal 100A, 150A, 151A

**Reliable, compact and more environmentally responsible than ever**



### Mitsubishi

Available in 5kW to 14kW outputs and with a three-year warranty as standard, the Ecodan is one of the most popular heat pumps installed in the UK. Easy to install, the built-in electrical meter allows easy conformity with MCS.

**Easy to install, the built-in electrical meter allows easy conformity with MCS.**



### Stiebel Eltron

The WPE-I inverter Ground Source Heat Pump provides heating, cooling and integrated domestic hot water, with single phase options ranging from 4kW and three phase ranging from 33kW to 87kW.

Providing optimum operation and maximum efficiency all year round, they can be controlled via a smartphone and come with a seven-year warranty as standard.

**Can be controlled via a smartphone and come with a seven-year warranty as standard.**



### Vaillant

FlexoTHERM is a smart and flexible multi-source heating system that uses renewable heat sources from the ground, water or air. The heat pump come in different sizes of heat output to suit the particular property, with 5, 8, 11, 15 and 19kW models available. The pumps come with a seven-year parts and labour warranty as standard.



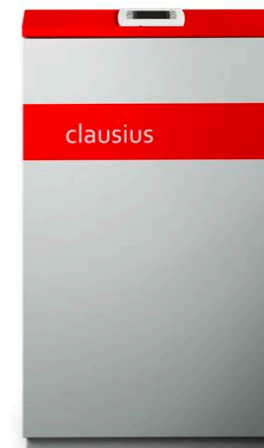
### IVT (Bosch)

The most installed Ground Source Heat Pump in the UK, the IVT Greenline HE is equipped with the latest generation of low-energy circulation pumps on both the hot and cold side, meaning that electricity consumption is reduced further, resulting in even lower heating costs. Flow temperatures of up to 65°C means that the IVT Greenline HE is an excellent choice for retrofit applications which require a higher flow temperature. The pumps are available from 6kW to 22kW for domestic applications (with larger commercial options available) and come with a five-year warranty as standard.



### Clausius

The Clausius Classic Heat Pump range can be tailored to meet specific customer requirements. A low operating sound and a small footprint, combined with a high level of integration, enables installation in almost any domestic, commercial or industrial environment. Models from 1-10kW, 3-15kW and 5-25kW (all single phase) provide perfect economics in buying and running costs for any building size.



### Horizontal Collector Pipe (PE100-RC)

The next generation of ground source pipework, the improved mechanical properties mean that in almost all soil conditions, no sand bed is required for backfilling, saving material and installation costs.



### Slinkies

Slinkies in 32mm PE100 SDR11, lengths are available as follows:

- 30m (200m of 32mm) – i.e. requires a 30m trench
- 40m (250m of 32mm)
- 50m (300m of 32mm)

There must be a separation of at least 5 metres between each trench.



### Header Pipe

Manufactured in the UK from virgin grade black PE100 high performance Polyethylene (BS/EN12201), this is typically installed in pipe sizes 40mm, 50mm & 63mm OD (available in 25m, 50m & 100m coils). We also stock 6m sticks in 40mm, 50mm, 63mm, 75mm, and 90mm. These are PE100, SDR11 (90mm available in both SDR11 and SDR17).



### Pre-insulated Header Pipe

For the transport of low temperature Glycol to and from the manifold in ground source applications, it is available in 40mm & 63mm (90mm OD). It significantly reduces installation time on site and has superior heat loss values versus other installation practices.

**Significantly reduces installation time on site and has superior heat loss values.**



### Probes for Elevated Temperature

The raised temperature probe offers unmatched security when transferring heat over 40°C. Rated to transfer temperatures up to 95°C, it maximises energy efficiency for both ground source and solar-powered heating systems.

**Rated to transfer temperatures up to 95°C, it maximises energy efficiency for a heating system.**



### PE100-RC: The New Generation of Ground Source Pipe Material

Our European sourced probes are manufactured from virgin grade black PE100-RC high performance Polyethylene and are manufactured, tested and certified within specific SKZ guidelines.

The major benefit of PE100-RC probes is the increased point load resistance over the PE100. Point loads are a potential problem as the probe does not sink in a straight line.

**The major benefit of PE100-RC probes is the increased point load resistance over the PE100.**



### 50mm Duplex Probe

Available in PN16 or PN20, lengths from 100m to 300m.

As the probe foot is exposed to the greatest stresses during installation and operation, HakaGerodur has developed the probe foot for the 50mm probe out of a solid Polyethylene bar.

Features include:

- Lower hydraulic pressure drop due to optimal U-bend design and larger cross section.
- DIN EN 12201-2
- Certified and monitored by SKZ. SKZ certification no. A278.

**Lower hydraulic pressure drop due to optimal U-bend design.**





### Rauvitherm

Cut to order and handling working temperatures of up to 95°C, this is the ideal solution when your Air Source Heat Pump is sited away from the building. Comes with a five-year warranty as standard and available in sizes 25mm, 32mm, 40mm, 50mm, 63mm, 75mm, 90mm, 110mm, 125mm, 140mm, & 160mm.



### Rauthermex

Cut to order and handling working temperatures of up to 95°C, this is ideal for large commercial projects where heat loss needs to be kept to a minimum. Comes with a five-year warranty as standard and available in sizes 20mm, 25mm, 32mm, 40mm, 50mm, 63mm, 75mm, 90mm, 110mm, 125mm, 160mm (DUO available up to and including 75mm).



### REHAU Everloc

Proven for over 30 years and is easy to install. It is versatile, leak proof and can be used on internal and external joints.



### VARGO Pipes

Available in lengths up to 380m (depending on the pipe size), the ECOPEX is a new generation flexible pre-insulated pipe system incorporating the latest performance enhancing innovations and providing a comprehensive safe, robust, reliable and thermally efficient heating/cooling distribution solution. The system is straightforward to install and delivered in cut lengths (25mm, 32mm, 40mm, 50mm, 63mm) of pipe for Air Source Heat Pumps.

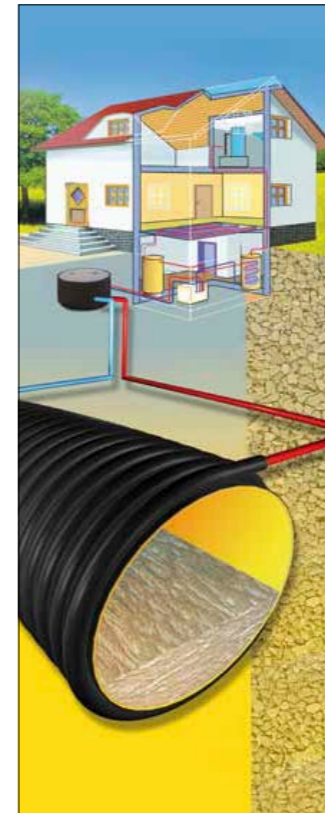


### PKS Thermpipe

By using the PKS Thermpipe system, industrial and private buildings can be heated cost-effectively with energy from sewage and geothermal. The pipe system is manufactured from high quality and approved PE100 material, thereby guaranteeing the durability of the whole installation for many decades.

DN	Q [W/m]	DN	Q [W/m]
300	350	1100	1130
400	450	1200	1220
500	550	1300	1320
600	640	1400	1420
700	740	1500	1520
800	840	1600	1610
900	930	1800	1810
1000	1030	-	-

The pipe system is manufactured from high quality and approved PE100 material.



### Pipe Coils/Dispensers

Our Spinning Jeni can accommodate most sizes and lengths of horizontal collector pipe and geothermal probes. The adjustable frame enables the installer to easily dispense and recoil if necessary. Assembly takes approximately 5 minutes and will fit easily into a small van for transportation (when disassembled).



## Thermally Enhanced Bentonite – HeatSeal

A blend of quality assured raw materials used in conventional civil engineering applications; specifically formulated for use in geothermal heat pump grouting technologies. Offers ease of mixing, combined with low shrinkage and excellent sealing.

Once mixed with water it does not fully harden, thus ensuring continued flexibility to cope with any ground movement and furthermore maintains contact between the ground and probes.



Used by leading edge companies this thermally enhanced grout provides excellent thermal conductivity specifically engineered for ground source and gives excellent pumpability.

### Performance

The mixed product offers good pumpable and flow characteristics. It is designed to provide a high thermal conductivity, its performance has been independently tested to provide a 2.15 w/mk performance and has the following attributes:-

- Quality assured manufacture.
- UK produced – low carbon footprint.
- Non-setting.
- Single bag product eliminates on site blending.
- Easy to mix.
- Consistent/easy pumping performance and flow.
- High thermal conductivity.
- Supplied in 25kg bags

The product is supplied in a dry powder form. We provide you with a single bag solution ensuring accuracy in material usage with each bag requiring only the addition of water.



Endorsed by leading heat pump manufacturers, our modular reinforced plastic manifolds are self-sealing, simple to install on site, and ideally suited for installation in plant rooms, utility rooms or in purpose-built chambers.

## Modular Manifold - Basic Installations

### Unit features:

- Fill/bleed points (1/2").
- 40mm PE spigot for header pipe / heat pump connection.
- Mounting brackets.
- Isolation valves (flow & return) or 40mm PE spigot outlet.
- Each outlet comes complete with flowmeters (variable) 8 to 32L/min and isolation valves.
- 40mm PE spigot suitable for electrofusion and compression.
- Fittings (also suitable for 25mm and 32mm collector pipe).
- Flow rate of 7.7m<sup>3</sup> per hour.

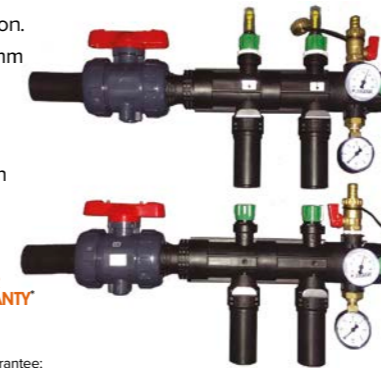
### Extras:

- Thermometer with immersion sleeve, -20°C to +40°C.
- Pressure gauge, 0-6 bar.



\*For all manifolds we now offer a 5 year guarantee; for all removable parts (e.g. ball valves, flowmeters etc.) the warranty period is 2 years.

Unlike inferior manifolds, ours are resistant to corrosion and freezing.



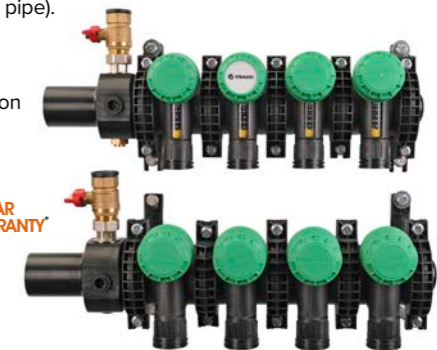
## Modular Manifold - Larger Installations / Greater Flow Rates

### Unit features:

- Fill/bleed points (1").
- 63mm spigot for header pipe/heat pump connection.
- Mounting brackets.
- Each outlet complete with flowmeters (variable) 5 to 42L/min and isolation valves.
- 40mm PE spigot suitable for electrofusion and compression Fittings (also suitable for 25mm, 32mm and 50mm collector pipe).
- Flow rate of 16m<sup>3</sup> per hour.

### Extras:

- Thermometer with immersion sleeve, -20°C to +40°C.
- Pressure gauge, 0-6 bar.



For all manifolds we now offer a 5 year warranty; for all removable parts (e.g. ball valves, flowmeters etc.) the warranty period is 2 years.

## Type L-520/L-540 Chamber

The square chamber manifold offers the following features:

- Compact design – reduced time excavating on site.
- Ball valve on the flow legs.
- Integral flow meters on the return legs (adjustable).
- Manifold header OD 63mm c/w 1" filling and bleed valve.
- All connections are welded to the chamber wall to ensure it is watertight.
- Able to handle light traffic loads of 600Kg (tested to 1,500 Kg).
- Anti-skid cover – perfect for residential & public sector installations.
- Lockable cover.
- Can be supplied with a telescopic section.
- Fully pressure tested (test certificate in each chamber).
- 63mm header pipe connections.
- 40mm flow & return ports.

**5** 5 YEAR WARRANTY\*

\*For all manifolds we now offer a 5 year warranty; for all removable parts (e.g. ball valves, flowmeters etc.) the warranty period is 2 years.

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The L-540 chamber manifold (2, 3 and 4-way) is even more versatile than standard chamber manifolds as the header pipe connections are fabricated at opposite sides of the chamber. You then simply select and cut away the end caps on the side you wish to use.

### Dimensions

Circuits	Width/Length (mm)	Height (mm)
2 – 4	500/500	650
5 – 8	500/600	650
9 – 12	600/670	650



## V-1200 T & V-1300 T Chamber - Larger Installations

For larger installations we have the following chamber manifolds available:

V-1200 T (up to 16-way) L-1200 T (up to 16-way)

V-1300 T (up to 24 way) H-1500 T (up to 40-way)

**5** 5 YEAR WARRANTY\*



## High Water Table Manifolds

These manifolds come with an oversized base which can be concreted into position, alleviating any risk of damage caused by the high water table putting undue pressure on the manifold spigots during periods of high rain fall.

- Space saving, compactly manhole of solid PE pipe.
- Designed for brine distribution from geothermal collectors and baskets.
- Less road cut because of small diameter.
- Flow with brass ball valve with full connecting passage, radially removable.

**5** 5 YEAR WARRANTY\*

Circuits	Width/Length (mm)	Height (mm)
2 – 4	400/600	600
5 – 12	600/800	800

We hold large stock of 2-way to 12-way chamber manifolds.

\*For all manifolds we now offer a 5 year warranty (subject to installation guidelines being followed); for all removable parts (e.g. ball valves, flowmeters etc.) the warranty period is 2 years.

- Return with integrated flow meter, radially removable.
- Collector of solid wall pipe OD 110mm with 1" filling and draining valve.
- All connections are welded to the manhole wall and are pressure water tight.
- Walkable cover made of plastic, weight bearing up to 600kg (tested to 1,500kg).
- The manhole cover is lockable.
- Leak tested.



## Kilfroth GEO

Specifically engineered, this is a high efficiency alternative to MEG/MPG for closed loop Ground Source Heat Pumps. Systems using our new GEO product will benefit from lower pressure drops, reduced pumping costs and higher overall efficiency. It has higher thermal conductivity than MEG, MPG or ethanol and is classified as non-hazardous.

Supplied in 20-litre tubs or 1,000-litre IBC's.



Freeze Protection		
Dilution % v/v	Freeze point / °C	Refractive Index
25	-10	1.3632
-10	-15	1.3679
40	-20	1.3795
50	-30	1.3905



We also stock a thermal fluid test kit which is used to monitor the health of Kilfroth GEO/AIR as part of a routine maintenance schedule. In addition, we also offer (via Kilfroth) a number of free comprehensive fluid health checks to our customers.

**It has higher thermal conductivity than MEG, MPG or ethanol and is classified as non-hazardous.**

## Sentinel R500C - Ground Source Heat Transfer Fluid

This non-toxic, biodegradable Glycol-based liquid is specifically designed for use as a highly efficient heat transfer fluid providing frost protection in Ground Source Heat Pump equipment and ground loop circuits. It also offers exceptional thermal transfer, protection against corrosion and deposits, resistance to degradation for extended fluid life, and contains an effective biocide that will help to control the growth of bacteria.

Available in 20-litre tubs.



## Sentinel R600 - Thermal Fluid for Air Source Heat Pumps

This non-toxic, biodegradable Glycol-based liquid is specifically designed for use as a highly efficient heat transfer fluid, providing frost protection in Air Source Heat Pump systems. As a multi-purpose inhibited thermal fluid concentrate, it has the added benefits of preventing corrosion and scale in the heat pump system.

Available in 20-litre tubs.



## Sentinel R700 Sanitiser & Biocide

This is a stable, high performing non-peroxide biocide for Ground and Air Source Heat Pumps, giving the installer and end user greater piece of mind.

Available in 1-litre bottles.

**This is a stable, high performing non-peroxide biocide for ground and air source heat pumps.**



## Sentinel R800

This is a clear liquid, unique and specifically designed for use as a highly efficient cleaning and flushing fluid in Ground Source Heat Pump equipment as well as ground loop circuits.

Available as concentrate in 20-litre tubs.

**A highly efficient cleaning and flushing fluid.**



## Kilfroth SF20

Fully biodegradable and suitable for pre-commissioning chemical cleaning, this is a stabilised, fast acting, sanitiser and biocide solution especially formulated for use with Ground Source Heat Pump systems. The active ingredient in SF20 is a fast acting oxidising biocide which decomposes to environmentally benign substances. These active ingredients are effective against a wide range of microorganisms including legionella bacteria.

Available in 1-litre tubs.



## Kilfroth SF20 Test Kit

The Kilfroth SF20 Test Kit is an easy-to-use portable field test kit containing the essential test tools to be used by engineers for the correct dosing and monitoring of the SF20 heat pump sanitiser and biocide solution on pre-commissioning Ground Source Heat Pump systems.

Contents:

- SF20 test strips (10 each).
- Dip slides (5 each) – 6 months shelf life.
- Sample bottle & instructions.



**Go Geothermal  
Geo-Treat G300**

A sanitiser and biocide for removing existing biological deposits in Ground and Air Source Heat Pumps, as well as underfloor heating systems. Fast, effective action, prevents blockages and biological contamination and suitable for both pre-commissioning and disinfection of pre-installed systems. A single 1000-ml bottle treats up to 300-litres of system volume.



**Go-Geo HPC**

A long life, corrosion and biological inhibiting thermal fluid based on glycol specially-formulated for use in both Ground and Air Source Heat Pumps. When mixed with water it protects against freezing from low temperature climate conditions down to -50°C depending on concentration. Go-Geo HPC will lead to long term energy savings for air and ground source heat pump installations. Available in 20-litre tubs.



**Sentinel X500 -  
Freeze Protection**

Some systems require protection against freezing as well as protection from scale formation and corrosion. X500 combines market leading technologies found in the X100 inhibitor, with a non-toxic anti-freeze in one simple product. Available in 20-litre tubs.



**Sentinel X100 -  
Central Heating  
Inhibitor**

Formulated as a multi-purpose treatment to inhibit corrosion, scale, boiler noise and hydrogen gassing in all types of indirect heating systems including those containing aluminium components. Sentinel X100 is suitable for use in all waters, both hard and soft. The formulation is completely non-toxic. Supplied in 1-litre, 10-litre and 20-litre tubs.



**Sentinel - KalGUARD**

KalGUARD requires no salt to operate and is an environmentally friendly solution to prevent limescale deposits that saves money through greater energy efficiency, reduced maintenance and enhanced performance of water systems.

**A permanent treatment solution is widely specified & installed for major commercial clients.**



**Sentinel - 22mm  
Electrolytic Scale  
Inhibitor (SESI)**

The Sentinel SESI is an electrolytic scale inhibitor that can provide a cost-effective solution to help tackle limescale build-up, providing an altogether more efficient system. The Sentinel SESI is an in line product, suitable for the whole house, without adding chemicals to drinking water and is WRAS approved.

**5** 5 YEAR WARRANTY



**Flush & Fill 100**

Specifically designed for the purging of air and dosing of glycol/inhibitor in commercial & domestic Ground Source Heat Pump systems. A compact machine, its high-volume pump has a maximum flow rate of 100l/m and is capable of delivering a static head of up to 6 bar.

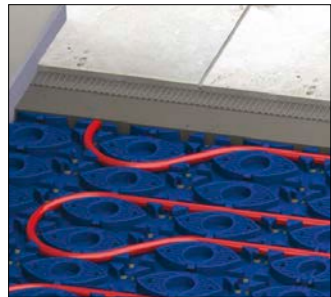
The machine makes the pump the ideal tool for liquids including heat transfer and frost protection liquids, water and small diameter suspensions. It comes with 2 x 4m 1" filling hoses, and an 8m dump hose for removal of dirty water. The hoses are fitted with high specification camlock fittings for quick connection and release.



## Underfloor Heating Solutions

We design and supply complete underfloor heating systems for existing home and new build properties. Our products offer a MLCP pipe pressure rating of 10 bar at 95°C and a projected pipe life well in excess of 50 years (to BS 7291 standard).

To proceed with a quotation, we need a little bit of information from you in advance, such as is there a boiler or heat pump in the home, what floor type is in the property and whether internet accessibility is required. Once we have the information and confirm an order, delivery will be made within 2-3 days. In addition you will also get detailed plans showing all pipe routes, manifold locations, as well as a wiring schematic.



### Solutions for floor constructions:

#### Screed Floors

Clip Rails or Tacker Staples

#### Timber Suspended Floors

Heat Plates or Screed Infill

#### Overlay Systems

Ideal for refurb of existing buildings

**You will also get detailed plans showing all pipe routes, manifold locations, as well as a wiring schematic.**



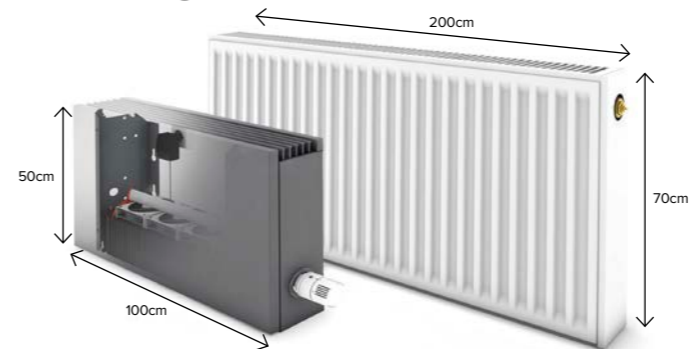
## Jaga Radiators

The pioneering Jaga Dynamic Boost Hybrid (DBH) utilises small electric thermal activators placed inside the radiator to significantly boost the output without increasing radiator size.

DBH is a future-proof technology revolutionising the way we manage our indoor climate. It provides rapid heating in winter and refreshing cooling in summer. Enabling high outputs with all water temperatures, hot and cold, DBH is perfectly suited to heat pumps and other renewable energy systems.

DBH works by boosting natural convection when room temperature needs to change quickly. A microprocessor measures and continuously processes room and water temperature, activating air movement across radiator fins to dramatically improve output. DBH can monitor automatically or be manually boosted, further increasing outputs for 15 minutes. Equally, Jaga radiators can be used without the DBH boost, so no electrical connections are required.

### A future-proof technology.



### EcoZenith

The EcoZenith i555 thermal store is a smart tank unparalleled to anything else available on the market today and is exclusive to Go Geothermal. Its ability to control multiple heat sources from one place makes this a truly unique offering. It has an integrated CTC's intuitive EcoLogic controller, making it smart grid and WiFi enabled, able to control and prioritise up to 5 different heat sources intelligently using the most efficient every time, and has 600-litres of capacity.

Features:

- Intelligent thermal store providing both heating (LTHW) and domestic hot water (DHW).
- Controls up to 3 CTC heat pumps and 3 weather compensated heating circuits.
- Provides up to 600-litres of hot water at 40°C with a flow rate of 22 l/m.
- Built-in 10 kW solar coil and controller as standard.
- Integrates with gas, oil, wood and pellet fired boilers.
- Able to control swimming pool heating, borehole recharging, comfort cooling and much more.
- With CTC Connect app the system can be controlled from your smart phone or iPad via the Internet or SMS.



CTC's intuitive integrated EcoLogic integrated controller makes it smart grid and WiFi enabled



**A range of cylinders are available in various sizes and configurations and in mild stainless steel. We also offer bespoke cylinders made to order. Choosing a cylinder and buffer tank that is specially designed to work with the heat pump being installed is critical for system efficiency. If space is a premium, please contact us to discuss our range of domestic hot water cylinders with integral buffer cylinders.**

### Hot Water Cylinders for Heat Pumps

Heat pump cylinders are designed to work seamlessly with heat pumps to provide an efficient and environmentally friendly way of supplying domestic hot water. Employing a large surface area heat exchanger (coil) to maximise the transfer of heat generated from renewable energy to the stored water, it optimises heat pump efficiency and reduces running costs. Available in unvented and with single or twin coils from 120L to 1500L and beyond. Coil lengths can be configured to your heat pump manufacturer's specification.



### Buffer Tanks

Buffer tanks are recommended by heat pump manufacturers to ensure efficient running of the heat pump. Presenting the heat pump with a large volume of water to heat reduces the amount of heat pump cycling, which in turn extends the life of the heat pumps' compressor, thereby reducing running costs.

Direct buffer stores are heated by the main heat source only (i.e. the heat pump). Mild stainless steel buffer tanks are available as direct or indirect (1 x coil) in sizes 100-litre to 5000-litre, insulated and cased. You can put a DHW on top of the square buffer.

**Recommended by heat pump manufacturers.**



For water source heat pump installations, a key component of the whole system is the heat exchanger. We offer a unique range of plastic solutions which are used in both open and closed loop systems and are specifically designed to extract heat from a variety of dynamic and static source water systems.

### ThermoGenius 'M'

Designed for use in still or slow-moving water, the ThermoGenius 'M' has an unrivalled power density that can be quickly installed individually or in a multi-unit configuration.

Available in 3 sizes and capable of extracting up to 20kW\* per unit, the ThermoGenius 'M' is ideal for a closed loop solution for lakes, water ways and marinas.



Units are simple to install and generate reliable and consistent inter-seasonal levels of heat extraction.



#### Features:

- Entirely made of plastic, no metal.
- For household buildings on or close to water.
- High efficiency heating and cooling.
- Space saving, environmentally friendly.
- Fast installation.
- Durable.
- Closed loop system.
- Heat output up to 22kW\* at a water temperature of 5°C.



\*Based on a source temperature of 5°C and dependent on other operational factors

### ThermoGenius 'ST'

This versatile dual circuit heat exchanger can be used in a variety of open loop installations. Source water can be pumped or gravity fed through the unit and because this runs in the opposite direction to the brine circuit, high levels of heat extraction and efficiency can be achieved.

Available in 3 standard sizes, the largest of which can extract up to 20kW\* of heat.

Source water can be pumped or gravity fed. High levels of heat extraction and efficiency can be achieved.



### ThermoGenius 'F'

These units are intended to extract heat from dynamic water courses. Capable of producing 6kW\* of heat and ideally arranged perpendicular to the direction of flow, units can be used individually or in multi-system configurations to achieve the total extraction power required.

Each unit can be supplied with mounting feet as shown or without if a custom mounting solution is to be used.

Specifically designed for use in shallow water and be linked together in order to heat or cool larger buildings.

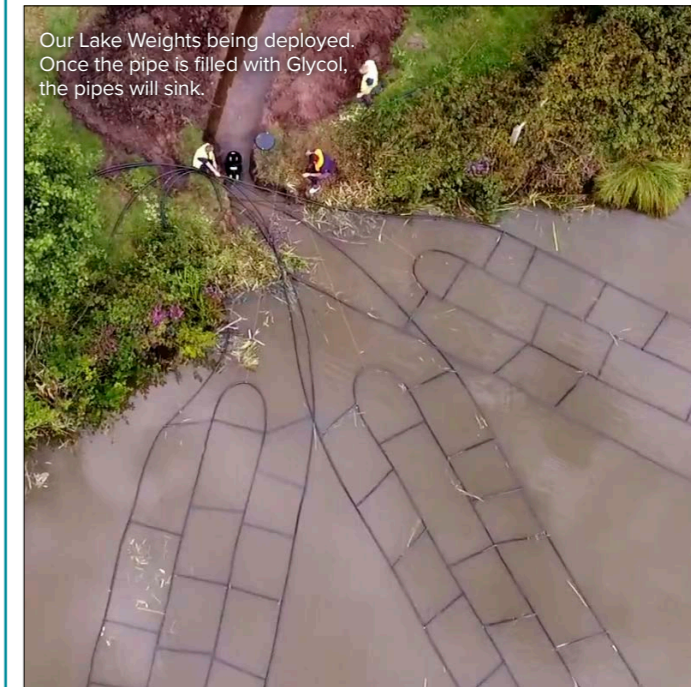


### Go Geothermal Lake Weights - Ground Source Collector Pipes

Diameter: 40mm  
Length: 120mm  
Weight: 2.2 - 2.5kg



Our Lake Weights being deployed. Once the pipe is filled with Glycol, the pipes will sink.





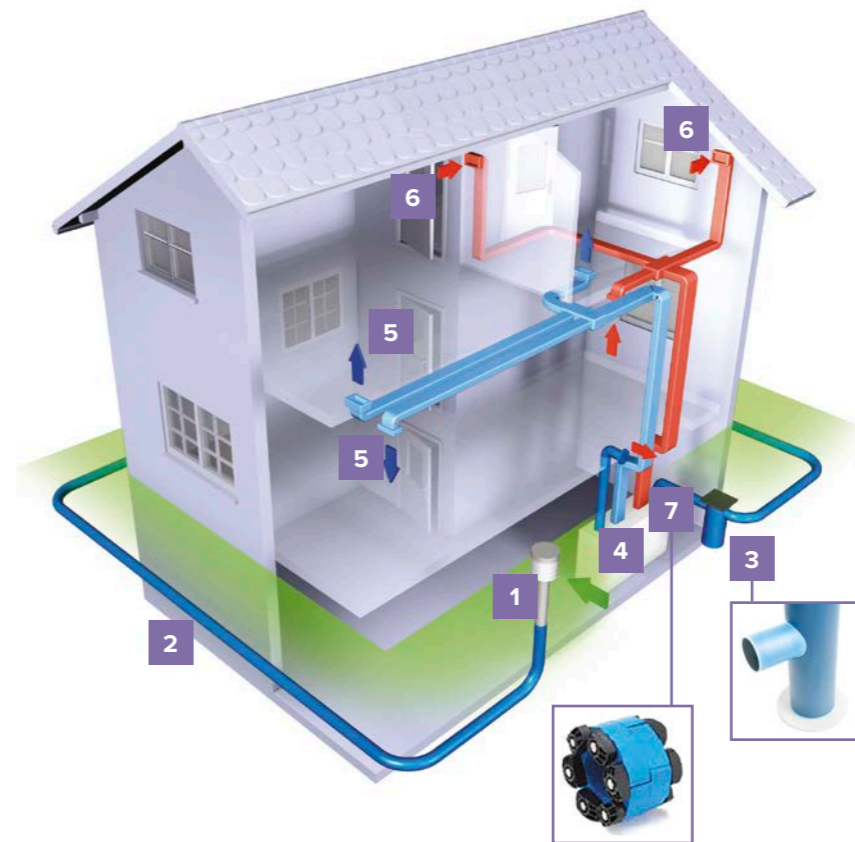
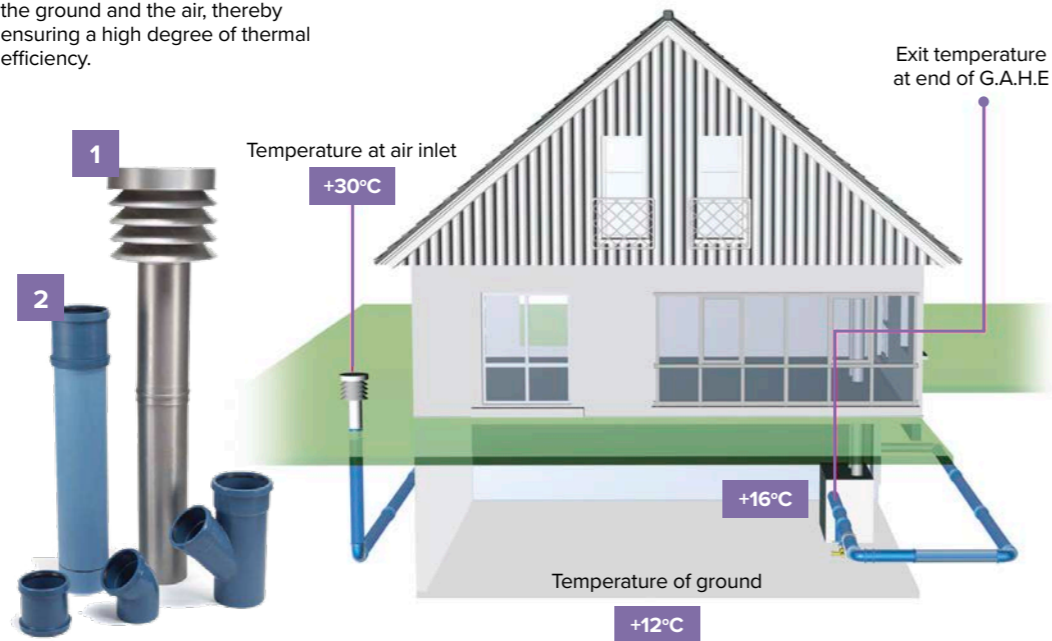
## Rehau Awadukt

Ever improving insulation and air tight construction of buildings means that controlled ventilation is becoming ever more important. The ground-air heat exchanger makes a considerable contribution to this, especially when used in conjunction with a heat recovery unit.

As well as increasing the quality of life within the building, this also provides significant energy savings by using the embodied ground energy to pre-condition the incoming ventilation air. The ground-air heat exchanger takes advantage of the fact that the temperature of the ground, 1.5 to 2m deep, remains constant between 7°C – 12°C throughout the year. The incoming air passes through an underground pipe system to pre-heat it in winter and to pre-cool in summer. Experience shows that a ground-air heat exchanger makes it possible to raise the temperature of air taken in by up to 9°C in winter, and to reduce it by up to 14°C.

The AWADUKT Thermo features include a unique inner layer which ensures fresh air inside the system is hygienic, containing virtually no germs, it is radon-proof, and the enhanced conductivity provides excellent heat transfer between the ground and the air, thereby ensuring a high degree of thermal efficiency.

The ground-air heat exchanger takes advantage of the fact that the temperature of the ground, 1.5 to 2m deep, remains a relative constant temperature.



### 1 Air Inlet Tower

With a range of filters (G4 or F6) for hygienic, dust and pollen free air supply.

### 2 AWADUKT Thermo Pipe System

- Solid walled PP pipe for optimised heat conductivity.
- Anti-microbial inner layer to prevent microbial growth.
- High longitudinal rigidity for reliable condensation discharge.
- Radon-proof by virtue of special sealing system.
- Wide range of fittings.

### 3 Condensation discharge

This is installed towards the end of the system to remove any condensation formed during the heat transfer.

### 4 Heat recovery unit

### 5 Distribution of fresh filtered air

### 6 Extraction of warm, stale air

### 7 Ring Seal

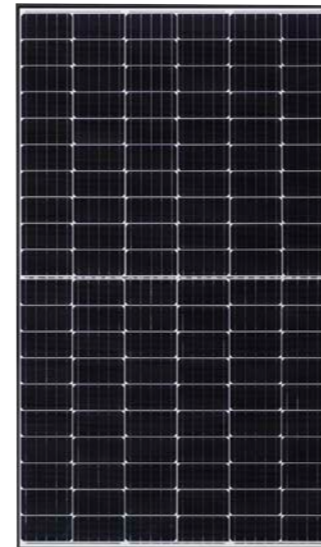
For a typical domestic application, a minimum of 40m of pipework is required. This is either with a loop around the building or by a meander pattern.

Anyone investing in a new heating system today should design it from the outset to include a solar system. This will result in lower energy consumption and lower monthly energy bills. Viessmann systems work in combination with solar technology and with more than 40 years' experience in the development and manufacturing of solar thermal systems and now PV systems, you can count on the quality and technical expertise.



### Solar PV

Monocrystalline photovoltaic modules in all black version with 395/400/405 WP rated output for generating power from solar energy.



### Battery

Capable of high-powered emergency-backup and off-grid functionality, the patented modular plug design requires no internal wiring and allows for maximum flexibility, safety and ease of use. Two distinct modules cover the complete range of system sizes.



### Sentinel R100 - Heat Transfer Fluid for Solar Heating Systems

This cleaning solution comes ready to use, removes sludge and deposits from degraded thermal fluid and cleans with only 20 minutes circulation.

Available in 20-litre tubs.



### Sentinel R200 - Solar Cleaning Solution

This cleaning solution comes ready to use, removes sludge and deposits from degraded thermal fluid and cleans with only 20 minutes circulation.

Available in 20-litre tubs.



For our solar/heat transfer fluid filling stations please see page 22

## Magnetic System Filters

For removing both magnetic and non-magnetic dirt particles from central heating systems, it has a detachable powerful magnet and rotating connector to enable the unit to be installed on horizontal, vertical and diagonal pipes. Easy to service.



## Air Eliminators

This automatically deaerates the system water and vents air as it circulates in the heating system, leaving the system totally air free. A rotating connector enables the unit to be installed on horizontal, vertical and diagonal pipes.



## Flow Limiters/ Meters

Brass balancing, multi-turn valve for accurate flow setting and shut-off. The flow meter is made from impact resistant and temperature stable plastic and has a rotatable flow meter permanently indicating the actual flow rate.

Available in sizes (Female BSP):  
1"FBSP – 5-50l/m  
1.5"FBSP – 15-12l/m  
2" FBSP – 25-200l/m

Please note this item should not be used as an external manifold replacement as their use in this way is not endorsed by the leading heat pump manufacturers.



## Ball Valves

Double spigot (electrofusion) and compression ball valves, available in various sizes.



## System Strainer

This 28mm CU Brass "Y" Strainer fits on the return side after the isolation valves, removing impurities from the system.



## Flexible Hoses

These stainless steel flexible hoses for connection to the Air Source Heat Pump are 1 1/4" FBSP x 750mm long, and feature 28mm copper compression fitting which is protected with 20mm weatherproof high grade insulation.



## Floor Mounting

These anti-vibration rubber mounting feet for air source heat pumps can also be supplied with a light weight mounting base.

- 600mm Wide x 100mm High Rubber Mounting Feet
- 600mm Wide x 100mm High Rubber Mounting Feet c/w Base



## Wall Mounted Brackets & Air Source Heat Pump Cages

The Air Source Heat Pump cages protect heat pumps from accidental damage or vandalism and can be mounted on the wall with brackets or on the floor.



## Heat Pump Magnetic Filter

For Air Source Heat Pump systems, 28mm.



## Heat Meters

The Sontex Supercal 5S is a next generation thermal energy meter for Ground Source & Air Source Heat Pumps, Biomass and Solar Applications.



[www.gogeothermal.co.uk](http://www.gogeothermal.co.uk)

## Heat Pump Anti-freeze Valve

For Air Source Heat Pump systems, 28mm.



## Filter Ball Valves

Filter ball valves, 28mm.



## Flow Balancing Valve/fill & Flush valve

Flow balancing valve (5-40L), fill & flush valve, 28mm.



## Pipe insulation

Class O rated, it can reduce energy losses by up to 87%. It also prevents condensation and has built-in anti-microbial protection which reduces mould and bacteria growth. Excellent for insulating flow and return pipes when in close proximity, and for use where collector pipes are less than 1m below the surface. Also for use in plant rooms. A large range of sizes are kept in stock.

**Reduces energy losses by up to 87%. A large range of sizes are kept in stock.**



## Underground Warning Tape

Our underground warning tape comes in two varieties, detectable (100m long and 200mm wide) and non-detectable (365m long and 150mm wide). The detectable tape is manufactured from high strength coloured rot resistant homopolymer polypropylene plastic mesh incorporating a traceable stainless steel wire. The non-detectable tape is made from high quality plastic which is free from PVC and is Acid/Alkali resistant.



**In line with best practice, GSHP guidelines state marker tape must be used in every ground source installation.**



## Refractometer

Special features such as anti-roll supports, zero adjust with lock and push on prism flap makes measurement easy and reliable.



## Electrofusion Tooling

Electrofusion Weld Wipes to clean pipe ends

- Pipe cutters (25mm – 63mm) to cut pipe ends square.
- Pipe scraper – to remove oxidized layer from the pipe.
- Alignment clamp (25mm – 63mm) to secure.



## Electrofusion Control Units

Our British manufactured electrofusion control unit is manual or fully automatic and designed to fuse bar coded PE and PP pressure fittings in the range of 8v to 48v and pipe sizes up to 400mm.

With a data log memory in excess of 2000 welds and the ability to download to a USB stick, it has been designed with simplicity of use in mind. Its fast user interface allows fittings to be welded quickly and reliably.



Tel: 01388 720228 | Email: [sales@gogeothermal.co.uk](mailto:sales@gogeothermal.co.uk)



# GO GEOTHERMAL

Technology from the ground up

As the UK's largest supplier of heat pumps and ancillaries, we offer a wide product range from our **new warehouse** in County Durham to maximize distribution into Scotland as well as England and Wales.

Offering a friendly and knowledgeable service to our trade customers, with **quick delivery** across the UK.



We pride ourselves on our responsive and flexible approach and maintain an excellent working relationship with our customers.

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