

## Ground source and air source heating

This information will help you get the best comfort and value for money from your new ground source or air source heating system.

### Heat your home with energy absorbed from outside

Air source heat pumps absorb heat from the outside air. This heat can then be used to heat radiators and hot water in your home. A ground source heat pump absorbs heat from a loop circulating liquid through a borehole drilled up to 120 metres below ground.

Heat pumps extract heat from the air or ground in the same way that a fridge extracts heat from the food stored inside it. It can get heat from the air even when the temperature outside is as low as  $-15^{\circ}\text{C}$ .

Heat pumps have some impact on the environment as they need electricity to run, but the heat they extract from the air is constantly being renewed naturally.

### Using your heat pump

- Unlike solid fuel, gas and oil boilers, heat pumps deliver heat at lower temperatures over much longer temperatures.
- During the winter you may need to have your heat pump on constantly to heat your home efficiently.
- Radiators will not feel as hot to the touch as you are used to with your previous heating system - and that's OK!

## How do heat pumps work?



Heat from the air or ground is absorbed at low temperatures into a fluid. This fluid then passes through a compressor where its temperature is increased, and transfers its higher temperature heat to the heating and hot water circuits of the house.

- An air to water or ground to water system distributes heat via a wet central heating system, with pipework and radiators throughout your home. Heat pumps work much more efficiently at a lower temperature than a standard boiler system would. This means the system needs larger radiators which give out the same amount of heat at a lower temperature over longer periods of time.
- The installer will set up your new heating system to be efficient as possible for your needs, based on when you are at home and the amount of hot water you are likely to use every day. The best thing to do is not to adjust these settings, as this could result in your heating being less efficient and costing more to run.

## Installation



Our contractors will need access to your home to install the new heat pump, hot water cylinder and radiators, and to remove the existing heating system. This

will take approximately five days.

Some of the work will be done outside of your home, for example, installing the underground pipes for ground source heat pumps and external heat pump for air source heating systems. This external work will normally take around five days. Usually the external work is finished first, before the contractor needs to come into your home.

The ground around your home will be disturbed, but any mess will be kept to a minimum and access will not be restricted. Any grass that is disturbed will be replaced at the end of the work.

Please ensure any personal items are removed from the areas the contractors will work in are removed before the works starts, to protect them from damage.

## Are you on the right electricity tariff?



If your property had an Economy 7 or Economy 10 electricity meter before the installation of the new system, you will need to have this changed. This is normally when the old system was night storage heaters or electric boilers.

You will need to contact your existing energy provider and explain that a new heating system has been installed. Ask for a standard meter on the cheapest standard rate. The energy provider will give a date for the changeover. Please make a note of this and inform the contractor that is fitting the new system.

If you experience any difficulty or feel you cannot do this yourself, please contact our Tenant Liason Officer using the details [here](#).

## Who will carry out the work?



The installation will be carried out by specialist contractors. Our '[Internal Improvements](#)' page sets out the standard of services you should expect from the contractor, including how you can help.

You will be shown how the controls work to make the best use of your new heating system. We will leave you a simple user's guide for reference.

More questions? Please [contact us](#).

03332 31 32 33 | [connexus-group.co.uk](http://connexus-group.co.uk) | [hello@connexus-group.co.uk](mailto:hello@connexus-group.co.uk) |  
@weareconnexus