

# HEATING SYSTEMS

A guide to your central heating system  
and helpful energy saving advice.

ASTER  
GROUP

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# THE COST OF RUNNING

*your central heating system*

Use the same energy company for both fuels

- Compare your current tariff against those offered by other companies to ensure you are getting the best deal
- Pay monthly by direct debit
- Choose an online tariff with no cancellation fee
- Oil buying groups buy fuel in bulk which is a cheaper way for you to fill your tank. To find out details of local oil buying groups in your area visit: **[www.acre.org.uk](http://www.acre.org.uk)**
- If you have night storage heaters and are at home for most of the day, you may want to consider an Economy 10 tariff - these are available on E.on and SSE
- If you prefer to budget using a key meter, pick an energy company dedicated to this method of payment.

*For more information on energy costs and changing your payment method or provider call: Energylinx on 0800 849 7077 or visit: [www.energylinx.co.uk/energy/aster](http://www.energylinx.co.uk/energy/aster)*

# GAS CENTRAL HEATING

A gas central heating system is designed to keep your home warm using a central heat source such as a boiler. The boiler heats water which is distributed through pipes to radiators in each room. It also heats the water that comes out the hot taps in your kitchen and bathroom. A central heating system will have controls which can help you to manage the temperature and time of day you need your heating and hot water to come on.

*“ Using the programmer or timer is the most efficient way to use your heating system. ”*

## HEATING CONTROLS

Your boiler will have a programmer or timer that sets the periods the heating is on. This is the most efficient way to use your heating system. These controls also help you set what times you have hot water if you don't have a combination boiler (see section Hot Water). Some heating controllers have a digital screen, others will have little plastic teeth on a mechanical dial which are pushed in or out. You can also control heating in individual rooms by using temperature adjusting valves attached to the radiator (see section Room Thermostats and TRVs).

On the timer you must:

- Set the correct time (depending on the time of year)
- Set the times you want the heating and hot water to turn on and off including 45 minutes warming up and cooling off periods.

Typical settings in table below:

SETTING	WHAT IT MEANS
1. Off	Off all the time.
2. On or Continuous	On all the time.
3. Twice, Timed or Auto	On and off at each of the timer settings you have programmed.
4. Once	On at the first timer setting and off at the last timer setting.
5. Boost, Override or Advance	Operates only when the programmer is set to once or twice or the equivalent. This turns the boiler on or off until the next programme finishes or begins.

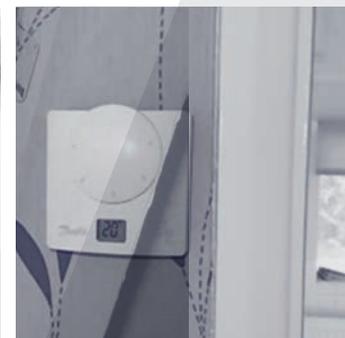
*If you need help with setting up your heating controls then please contact us, see contact information on page 27.*

## HOT WATER

Gas boilers heat water to a specific temperature at set times (via the heating controls) in an insulated water cylinder where the water is then stored. These cylinders are often kept in a cupboard. If the boiler breaks down, the water cylinder also has an electric immersion heater which can provide a smaller amount of hot water until the boiler is repaired. You should plan ahead when using this method of heating water as the immersion should only be used for short periods.



A combination boiler doesn't need a water cylinder. When you turn on a hot tap, the boiler turns on and heats up water just before you use it then turns off again when you turn the tap off.



# ROOM THERMOSTATS AND TRVS

All central heating systems that use hot water to heat radiators need a room thermostat. This is usually located in the coldest area of the house to make sure all your rooms are adequately heated. Sometimes TRVs (thermostatic radiator valves) are also fitted to individual radiators. Both of these controls regulate the temperature of your home.

*“Your main living areas should be heated to about 21°C.”*

## ROOM THERMOSTATS

This will only operate if the heating is due to come on. It turns the boiler off when the set temperature is reached and back on again when the temperature goes down. Normally your main living areas should be about 21°C. Sometimes the room thermostat is combined into one unit with the programmer.

## THERMOSTATIC RADIATOR VALVES (TRVS)

These allow you to adjust the temperature in individual rooms and are attached to most radiators. They only operate if the heating is due to come on.

TRVs are adjusted by turning them to the desired number on the temperature indicator. At the lowest setting there's a symbol like a snowflake, this setting will turn the radiator on if the temperature inside your home gets close to freezing. At the highest setting (sometimes called 'Max'), the radiator will be on for much longer than the other settings until the room reaches temperature.

Any communal areas in your home (such as the hallway) will generally have TRVs which are not normally adjustable without special tools.



# OIL CENTRAL HEATING

An oil central heating system is designed to keep your home warm using a central heat source such as a boiler. The boiler heats water which is distributed through pipes to radiators in each room. It also heats the water that comes out the hot taps in your kitchen and bathroom.

A central heating system will have controls which can help you to manage the temperature and time of day you need your heating and hot water to come on.

With oil heating systems, it's very important not to let the level of oil in the tank get too low. We recommend you check the level regularly, especially during colder months.

*“ Any time the boiler is on when it does not need to be it will be costing you money. ”*

## HEATING CONTROLS

Your boiler will have a programmer or timer that sets the periods the heating is on. This is the most efficient way to use your heating system. If you don't have a combination boiler, these controls will allow you to set the times you have hot water (see section Hot Water). Some heating controllers have a digital screen, others will have a mechanical dial with little plastic teeth that you push in or out. You can also control heating in individual rooms by using temperature adjusting valves attached to the radiator (see section Room Thermostats and TRVs).

On the timer you must:

Set the correct time (depending on the time of year)

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Typical settings in table below:

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*If you need help with setting up your heating controls then please contact us, see contact information on page 27.*

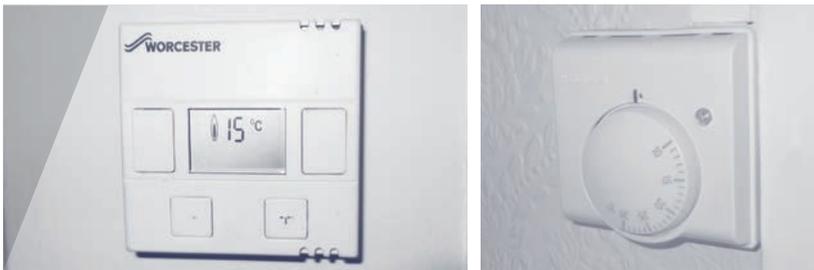
# WAYS TO SAVE ENERGY AT HOME

## HOT WATER

Oil boilers heat water to a specific temperature at set times (via the heating controls) in an insulated water cylinder where the water is then stored.

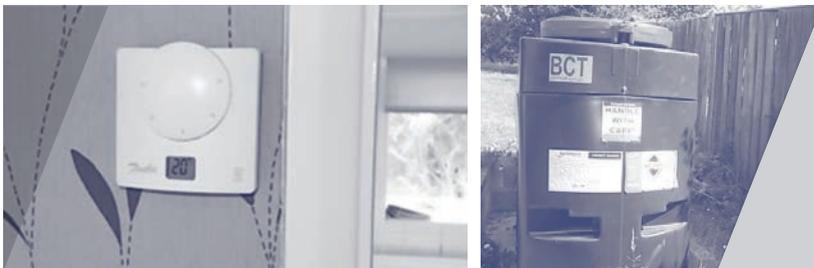
These cylinders are often kept in a cupboard. If the boiler breaks down, the water cylinder also has an electric immersion heater which can provide a smaller amount of hot water until the boiler is repaired. You should plan ahead when using this method of heating water as the immersion should only be used for short periods.

A combination boiler doesn't need a water cylinder. When you turn on a hot tap, the boiler turns on and heats up water just before you use it, then turns off again when you turn the tap off.



## OIL BUYING GROUPS

Oil buying groups buy fuel in bulk which is a cheaper way for you to fill your tank. To find out details of local oil buying groups in your area visit: [www.acre.org.uk](http://www.acre.org.uk)



- Turn the thermostat down by 1°C. You will hardly notice a difference and it could save you money on your energy costs
- Wash clothes at 30°C
- Switch off electrical items at the plug when you have finished using them
- Only light rooms with people in
- Shut curtains at dusk during the winter to keep the heat in
- Boil only what you need when using the kettle making sure you cover the element.

# SOLID FUEL BOILERS

A solid fuel boiler burns natural combustible materials, such as coal, to generate heat. It's important you check the type of fuel your boiler is designed to use. The wrong fuel could damage the system. The heat created is used to produce hot water in a boiler which is then distributed through pipes to radiators in each room. It also produces hot water for the hot taps. Most solid fuel boilers have glass doors which form a barrier between you and the flames and help retain heat in the fire. Some are completely enclosed and look like large metal boxes. They use flues and/or chimneys to draw air from outside and take away the gasses produced by the burning fuel.

*“ Always buy your solid fuel from an approved coal merchant. ”*

## HEATING CONTROLS

Your boiler has something called a damper which controls how quickly the fuel burns inside the boiler by regulating the amount of air fed into it. This can be an automatic device which is controlled by a thermostat, located on the side of the boiler.

Some solid fuel appliances may also have a room thermostat fitted which will control the heating temperature. Higher temperatures will burn more fuel.

## HOT WATER

Solid fuel boilers heat and store water in an insulated water cylinder. If the boiler breaks down, or you run out of fuel, the water cylinder also has an electric immersion heater which can provide a smaller amount of hot water until the boiler is up and running again. This is an expensive method of heating water and should only be used temporarily.

## BUYING SOLID FUEL

Any time the boiler is on when it does not need to be it will be costing you money, so plan your heating periods and solid fuel usage. Always buy your solid fuel from an approved coal merchant. Phone 0845 601 4406 or visit [www.solidfuel.co.uk](http://www.solidfuel.co.uk) for details.

## CHIMNEY CLEANING

Aster Property recommends that you get your chimney swept twice a year. The first sweep should be at the beginning of the winter period with a secondary sweep half way through the heating season.



# HEAT PUMPS

Heat pumps are a sustainable heating source able to produce more energy than they consume. They do this by absorbing heat from the air or the ground which is then made hotter through a process of compression, making it ready to be transferred and put to use in the home. Water is heated and stored in an insulated tank to provide hot water to the hot taps and to be circulated around the home via a wet central heating system of radiators.

*“ Heat pumps are designed to be on all day, working most effectively by providing ambient heat. ”*

## THE PUMP

This is located outside and works automatically so there's no need to touch the equipment. The pump may produce condensation when it's working, this is sent to a nearby drain.

## HEATING CONTROLS

Heat pumps are designed to be on all day, working most efficiently by providing an ambient heat. If your home is empty during the day, do not switch the heating off.

It's normal for the radiators to run at a surface temperature much lower to other central heating systems. You can adjust the temperature of your heating via the wall thermostat to your preferred comfort level. Ideally a heat pump should be run at about 21°C. Temperatures above this will require the heat pump to work for longer and it'll cost more to keep your home warm.



## HOT WATER

Although the heating and hot water are provided by the same tank, it uses two separate circuits of pipework so your heating water does not get mixed up with clean water for washing etc. This means you'll have hot water whenever the heating is switched on.

When you want the heating off and hot water on during warmer months, there is an override switch on the heating controls which will tell the heat pump to just send the hot water to the hot taps.

If you run out of hot water, for example if you want to run several hot baths in a short space of time, the heat pump has an electric immersion to keep up with your hot water demand. This varies from pump to pump and can be switched on automatically or manually. It's important you read the instructions for your heat pump to find out which type of immersion you have so that your energy use is kept to a minimum.



# SOLAR THERMAL

An efficient solar thermal system will reduce but not replace the need for a conventional water heating system and is most effective in the summer months. You'll also have a standard immersion boiler to ensure all your hot water needs are met.

*“ Renewable energy is better for the environment. ”*

## HOW IT WORKS

Solar thermal works automatically. You will have a display unit installed that will show you when it is switched on. This will also show you the temperature of various parts of the system such as the panels and water cylinder.



# QUANTUM STORAGE HEATERS

A Quantum heater is a super insulated metal case that contains several clay bricks. These bricks store heat generated by elements within the heater at night.

This state-of-the art heater will release the vast majority of its stored heat using a built-in fan that pushes hot air out from a grille at the bottom of the case. This happens automatically at various times during the day, you can set by a programmer on the heater. A small amount of heat is still 'lost' through the case but this is minimal.

*“ Any time your heating is on when it does not need to be it will be costing you money. ”*

## HEATING CONTROLS

A Quantum heater is controlled by an adjustable digital thermostat and timer built into the heater. This means you can programme the heater to come on at specific times of the day. The heater will then automatically respond to changes in room temperature to maintain your chosen comfort level. The minimum room temperature setting is 7°C and may be used for protection against frost. The maximum temperature setting is 26°C. You can change the temperature of the heater by rotating the control dial on the top of the heater. Normally your main living areas should be about 21°C.

## HOT WATER

If you have Quantum storage heaters you'll have a dual immersion water boiler. This is an insulated tank with two heating elements. The bottom element will heat a whole tank of water at night using your night rate energy tariff. The top element can be used to heat the water towards the top of the tank if you need extra hot water during the day. This will use the day rate of your energy tariff so will be a more expensive way of heating water.



# NIGHT STORAGE HEATING

A storage heater is a well-insulated metal case that contains a ceramic or clay brick. This large brick holds heat produced by an electric element running through the centre of it.

Storage heaters charge up and store heat at times when electricity is on a cheaper rate or at off peak times, also known as an Economy 7 rate.

Storage heating is generally used in areas where mains gas isn't available.

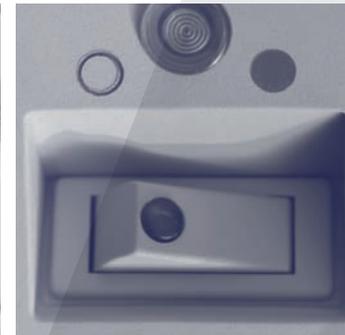
*“ It's important you regulate how much heat is stored at night and how quickly it's released during the day. ”*

## HEATING CONTROLS

It's important you control your storage heaters by regulating how much heat is stored at night and how quickly it's released during the day.

Night storage heaters work individually and usually have two controls located on the top of the heater called input and output. Sometimes these are labelled Charge and Autaset. Output can also be labelled as Discharge or Temperature.

Some storage heaters have a Boost setting. This uses electricity from the mains to provide immediate heat, a bit like a plug-in heater. This is an expensive way of heating a room and should only be used if the stored heat runs out.



## HEATER BEHAVIOURS

If a heater keeps running out of heat in the evening while you still need it, or if the weather becomes colder you may need to turn the input dial up. If the heater never runs out of heat in the evening, you can probably save money without getting cold by turning the input dial down. During warmer weather when heating isn't needed, turn your night storage heaters off at the wall but don't forget to switch them on again the day before you want heating to come back on.

## HOT WATER

If you've got night storage heaters you'll have a dual immersion water boiler. This is an insulated tank with two heating elements. The bottom element will heat a whole tank of water at night using your night rate energy tariff. The top element can be used to heat the water towards the top of the tank if you need extra hot water during the day. This will use the day rate of your energy tariff so will be a more expensive way of heating water.

*Please note there is a legal requirement for your heating system to be checked periodically and you must provide access for this as part of your tenancy agreement.*

*Failure to do so may result in court action.*

# USEFUL INFORMATION

There may be a time when you need to talk to someone about your energy costs or use. If you're struggling to pay your bills always call your energy provider first.

They'll be able to check if your current tariff suits your needs and may also be able to check if you're eligible for certain benefits that help pay towards your energy costs.

### *Here are some other useful numbers to call:*

Advice on managing energy costs: Home Heat Helpline:  
0800 33 66 99

Free, confidential and impartial advice on consumer issues -  
Citizens Advice Bureau (CAB) Consumer Line: 08454 04 05 06

Impartial advice on energy efficiency and sustainability:  
Energy Savings Trust (EST): 0800 123 1234

Aster Group: 0333 400 8222

If you'd like to report a repair or need more advice on how to use your heating systems, please contact:

Customers in Devon & Cornwall,  
Hampshire and Wiltshire: 0800 612 1010

Customers in Somerset: 0800 068 8873

Customers in Dorset: 0800 230 0232 or 01202 308799

All our leaflets are available in large print, Braille, on audio cassette or on CD. They can also be translated into the language of your choice.

For a full list of our office contact details please call us, email us, or visit the contact us section on our website.

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