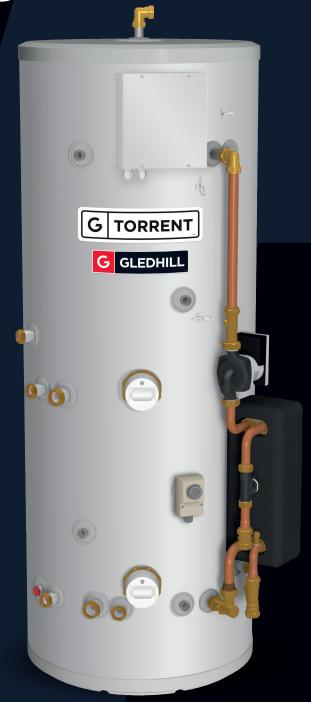


TORRENT STAINLESS

OPEN VENTED THERMAL STORE PROVIDING HEATING AND MAINS PRESSURE HOT WATER



# WHAT IS A THERMAL STORE?

A THERMAL STORE IS THE PERFECT SOLUTION FOR A HOME'S HEATING AND WATER REQUIREMENTS. TORRENT OFFERS MORE OPTIONS THAN ANY OTHER STORE OR CYLINDER, AND IS DESIGNED TO REDUCE HEATING COSTS BY OFFERING COMPLETE FLEXIBILITY FOR HOUSEHOLDERS TO USE MULTIPLE ENERGY SOURCES.

The hot water within the store circulates around the heating system to heat the property, while mains cold water is instantaneously heated through a plate heat exchanger, to provide hot water.

All our Torrent models are open vented, enabling uncontrolled heat sources such as woodburning stoves to be used.

### **BENEFITS OF THERMAL STORES**



PROVIDE MAINS PRESSURE HOT WATER



USE FOR BOTH HEATING AND HOT WATER



NO ANNUAL MAINTENANCE OR SAFETY CHECK REQUIREMENT



NO DISCHARGE PIPEWORK



NO RISK OF LEGIONELLA



NO G3 QUALIFICATION REQUIREMENT

### **OUR NETWORK**

IN ANSWER TO THE DEMANDS OF CUSTOMERS WE HAVE SPECIFICALLY TAILORED OUR DISTRIBUTION NETWORK TO ENSURE OUR PRODUCTS REACH THEIR DESTINATION IN A DIRECT AND EFFICIENT MANNER.

Our unique structure, consisting of five distribution hubs, is geographically situated for effective, widespread product availability. Headed by our central sales and logistics team at our Blackpool headquarters and transported via our own fleet of Gledhill vehicles, we have ultimate control over the delivery of our products, enabling us to add value to our customers, meet demanding orders and high service expectations.

### FOR ALL TECHNICAL ENQUIRIES

### TECHNICAL

T: **01253 474 584** 

E: TECHNICALSUPPORT@GLEDHILL.NET

### FOR ALL ORDERS CONTACT

# SALES & LOGISTICS TEAM

T: **01253 474 525** 

E: ORDERS@GLEDHILL.NET



02

### **TORRENT STAINLESS**

THE TORRENT STAINLESS IS MANUFACTURED FROM STAINLESS STEEL AT OUR BLACKPOOL HEADQUARTERS.

Torrent provides the flexibility for homeowners to select the thermal store which best suits their requirements, allowing them to maximise the available heat sources, whether they are traditional boilers, electric immersions, or increasingly popular alternative energy fuel sources.

The cylinder is open vented, enabling uncontrolled heat sources such as woodburning stoves to be used.

G TORRENT

G GLEDHILL

- FLOW SENSOR PROVIDES A FAST RESPONSE TIME FOR HOT WATER SUPPLY
- INTEGRATED PCB AND SOFTWARE
- HIGH STORE TEMPERATURES CAN BE UTILISED, PROVIDING GREATER BENEFIT FROM SOLID FUEL INPUTS
- ENERGY SAVING WITH A HIGH **EFFICIENCY PUMP**







5 YEAR WARRANTY

GAS OR OIL **BOILERS** 

IMMERSION HEATER



SOLID **FUEL** 

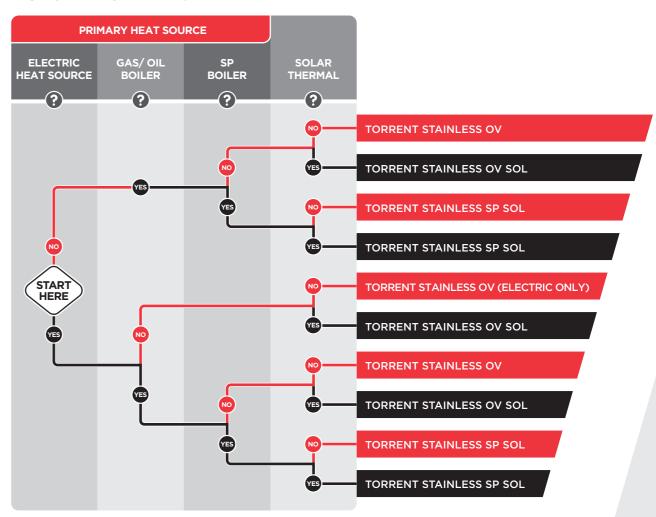
**THERMAL** 

### WHICH PRODUCT DO I NEED?

**OUR SELECTION CHART BELOW WILL HELP YOU IDENTIFY** THE MOST SUITABLE TORRENT STAINLESS MODEL FOR YOUR INSTALLATION.

To use the chart, identify the available heat sources for your cylinder in each section, and follow the lines to identify the model required.

### DOES THE SITE HAVE:



- All models come complete with back up immersion.
- All models come complete with solid fuel connections.
- Where a Torrent STAINLESS SP is selected, heating should be provided directly by the boiler as the store will only provide auxiliary heating.
- Where a Torrent STAINLESS SP is selected and no solar input is required, connecting the solar and boiler coils will maximise the boiler input and reduce reheat times.
- For all solid fuel installations, the feed and expansion tank should be of copper construction, available to order from Gledhill at the time of purchase.

### TORRENT STAINLESS OV

150 | 180 | 210 | 250 | 350 LITRES



### **KEY FEATURES**

- Utilises open vented boiler to heat the store directly, with 3kW immersion heaters for emergency back-up
- 3kW immersion heaters available when electric only is used as the primary heat source
- Utilises solid fuel connections
- Provides mains pressure hot water
- Blanking caps supplied

### COMPONENTS

- 1 Open vent
- 2 Cold feed
- **3** On-peak immersion heater
- **4** Off-peak immersion heater
- **5** Control thermostat
- **7** Control thermostat
- **8** Central heating flow
- **9** Central heating return
- 11 Plate heat exchanger flow

- 12 Plate heat exchanger return
- **13** Domestic hot water store sensor
- **14** Open vented flow
- **15** Open vented return
- **16** Solid fuel flow
- 17 Solid fuel return
- **18** Solid fuel overheat
- thermostat
- 19 Solid fuel control thermostat



WARRANTY

IMMERSION

HEATER

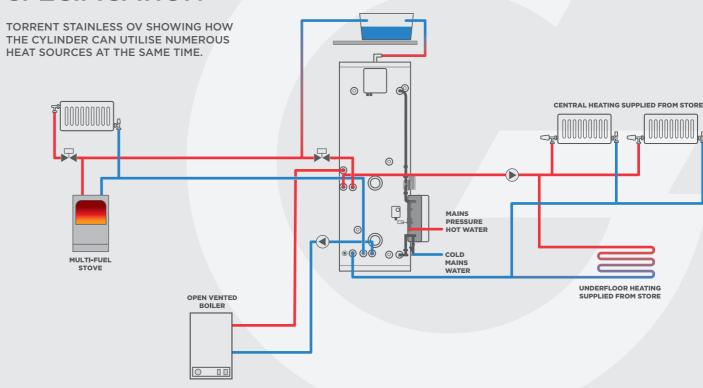


BOILERS



SOLID

### **TECHNICAL SPECIFICATION**



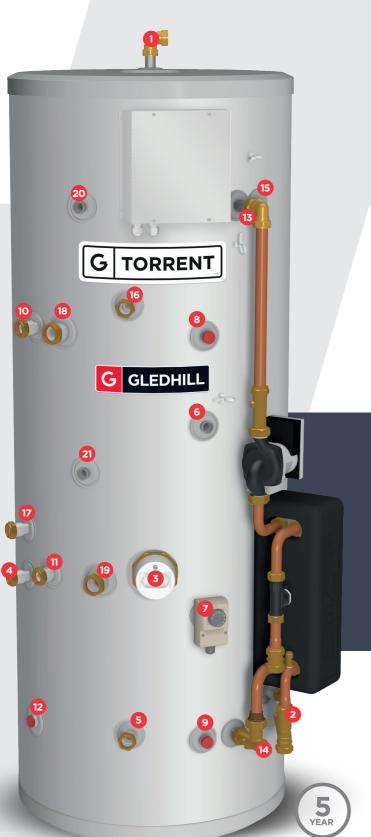
### **TORRENT STAINLESS OV**

Description		TST150OV	TST180OV	TST210OV	TST250OV	TST350OV
ErP rating		В	В	В	С	С
Heat loss	watts	47	55	62	74	79
Capacity	litres	148	178	208	248	345
Unit height	mm	1118	1306	1494	1744	1765
Unit diameter	mm	550	550	550	550	630
Max. hot water flow rate	litres/minute	26.5	26.5	26.5	26.5	26.5
Maximum dwelling type	bath	1	1	2	2	3
	shower room	-	1	1	2	2
	bed	1-2	2-3	2-3	3-4	4-5

- · Additional height for feed and expansion tank will need to be allowed if it is to be sited in the same cupboard.
- · Vent pipes shown through the side of the feed and expansion tank may not be suitable for all systems. Installers must check suitability.
- The standard open vented store relies on a feed and expansion tank suitably sited above the highest radiator point to provide sufficient head for the system.
- The feed and expansion tank must be sized to take the water expansion of the whole system (ie. solid fuel boiler, cylinder, open flue boiler and auxiliary heating).
- The feed and expansion tank is not supplied as standard with the unit, but is available as an optional extra at the time of order.
- · For all solid fuel applications, copper feed and expansion tanks are required and are available as an optional extra at the time of order.

### TORRENT STAINLESS OV SOL

150 | 180 | 210 | 250 | 350 LITRES



### **KEY FEATURES**

- Specifically designed for use with solar thermal panels
- Utilises open vented boiler to heat the store directly
- 3kW immersion heater for emergency back-up
- Utilises solid fuel connections
- Provides mains pressure hot water
- Blanking caps supplied

### COMPONENTS

- 1 Open vent
- 2 Cold feed
- **3** Immersion heater
- 4 Solar coil flow
- **5** Solar coil return

- 8 Solar sensor pocket
- **9** Solar sensor pocket
- 10 Central heating flow
- 11 Central heating return
- 12 Drain

IMMERSION

HEATER

5 YEAR

WARRANTY

- 13 Plate heat exchanger flow
- 14 Plate heat exchanger return
- **15** Domestic hot water store sensor
- 16 Open vented flow
- 17 Open vented return
- **18** Solid fuel flow
- **19** Solid fuel return
- 20 Solid fuel overheat
- thermostat 21 Solid fuel control
- thermostat





FUEL

GAS OR OIL

BOILERS



SOLAR THERMAL

**TECHNICAL SPECIFICATION** SENSOR CIRCUIT TORRENT STAINLESS OV SOL SHOWING HOW SOLAR CONTROLLER THE CYLINDER CAN UTILISE NUMEROUS HEAT SOURCES AT THE SAME TIME. PUMPING STATION MAINS PRESSURE HOT WATER OPEN VENTED

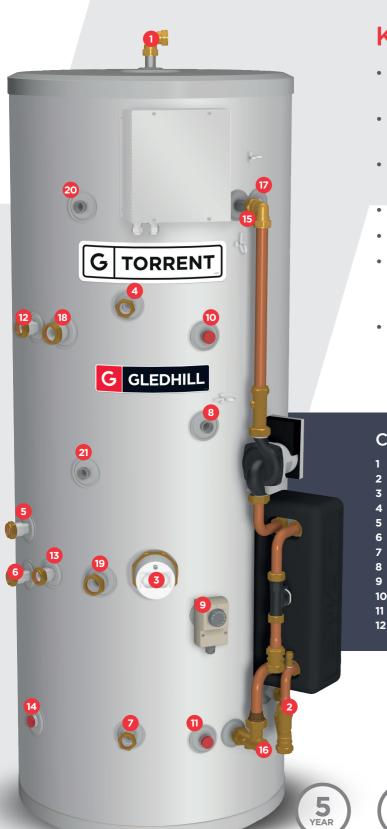
### **TORRENT STAINLESS OV SOL**

Description		TST1500VSOL	TST1800VSOL	TST2100VSOL	TST250OVSOL	TST350OVSOL
ErP rating		В	В	В	С	С
Heat loss	watts	47	55	62	74	79
Capacity	litres	148	178	208	248	345
Unit height	mm	1118	1306	1494	1744	1765
Unit diameter	mm	550	550	550	550	630
Dedicated solar volume	litres	64	74	84	97	130
Max. solar collector area <sup>1</sup>	m²	2.22	2.54	2.91	3.88	4.64
Solar heat exch. surface area	m²	0.78	0.78	1.27	1.27	1.27
Max. hot water flow rate	litres/minute	26.5	26.5	26.5	26.5	26.5
Maximum dwelling type	bath	1	1	1	2	2
	shower room	-	-	1	1	2
	bed	1-2	2-3	2-3	3-4	4-5

- 1 To comply with the Building Regulations ADL1 Domestic Heating Compliance Guide.
- · Additional height for feed and expansion tank will need to be allowed if it is to be sited in the same cupboard.
- · Vent pipes shown through the side of the feed and expansion tank may not be suitable for all systems. Installers must check suitability.
- The standard open vented store relies on a feed and expansion tank suitably sited above the highest radiator point to provide sufficient head for the system. As the domestic hot water is at mains pressure, the Torrent Stainless OV Sol itself can be sited anywhere in the property.
- The feed and expansion tank must be sized to take the water expansion of the whole system (ie. solid fuel boiler, cylinder, open flue boiler and auxiliary heating).
- The feed and expansion tank is not supplied as standard with the unit, but is available as an optional extra at the time of order.
- · For all solid fuel applications, copper feed and expansion tanks are required and are available as an optional extra at the time of order

### TORRENT STAINLESS SP SOL

150 | 180 | 210 | 250 | 350 LITRES



### **KEY FEATURES**

- Specifically designed for use with solar thermal panels
- Sealed primary boiler connections as standard
- 3kW immersion heater for emergency back-up
- Utilises solid fuel connections
- Provides mains pressure hot water
- Where there is no solar input, the coils can be connected to maximise heat input, reducing reheat time
- Blanking caps supplied

### **COMPONENTS**

- 1 Open vent
- 2 Cold feed
- 3 Immersion heater
- 4 Primary coil flow
- 5 Primary coil return

IMMERSION

HEATER

5 YEAR

WARRANTY

- 8 Control thermostat **9** Control thermostat
- **10** Solar sensor pocket
- 11 Solar sensor pocket
- 12 Central heating flow

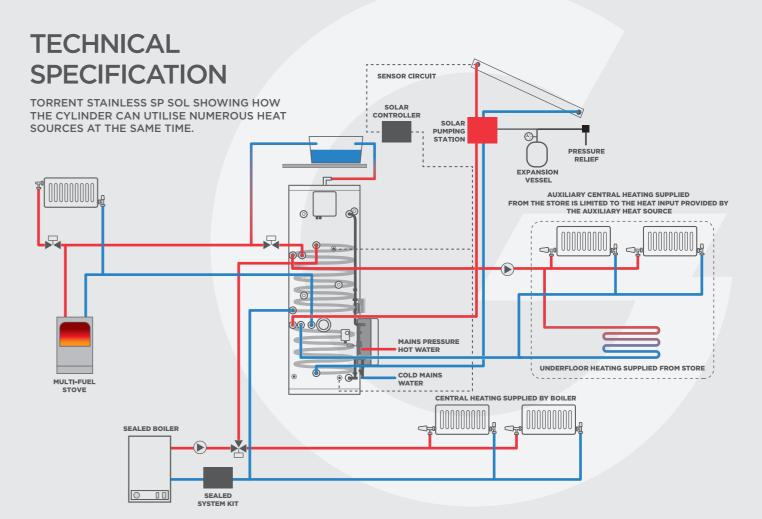
- 13 Central heating return
- **14** Drain
- **15** Plate heat exchanger flow
- 16 Plate heat exchanger return
- 17 Domestic hot water store sensor
- **18** Solid fuel flow
- **19** Solid fuel return
- 20 Solid fuel overheat thermostat
- 21 Solid fuel control thermostat







SOL AR THERMAL



### **TORRENT STAINLESS SP SOL**

Description		TST150SPSOL	TST180SPSOL	TST210SPSOL	TST250SPSOL	TST350SPSOL
ErP rating		В	В	В	С	С
Heat loss	watts	47	55	62	74	79
Capacity	litres	148	178	208	248	345
Unit height	mm	1118	1306	1494	1744	1765
Unit diameter	mm	550	550	550	550	630
Dedicated solar volume	litres	64	74	84	97	130
Max. solar collector area <sup>1</sup>	m²	2.22	2.54	2.91	3.88	4.64
Solar heat exch. surface area	$m^2$	0.78	0.78	1.27	1.27	1.27
Max. hot water flow rate	litres/minute	26.5	26.5	26.5	26.5	26.5
Maximum dwelling type	bath	1	1	1	2	2
	shower room	-	-	1	1	2
	bed	1-2	2-3	2-3	3-4	4-5

- 1 To comply with the Building Regulations ADL1 Domestic Heating Compliance Guide.
- · Additional height for feed and expansion tank will need to be allowed if it is to be sited in the same cupboard.
- · Vent pipes shown through the side of the feed and expansion tank may not be suitable for all systems. Installers must check suitability.
- The standard open vented store relies on a feed and expansion tank suitably sited above the highest radiator point to provide sufficient head for the system connected to the store. As the domestic hot water is at mains pressure, the Torrent Stainless SP Sol itself can be sited anywhere in the property.
- The Torrent Stainless SP Sol can be installed as a standard 'S' plan or 'Y' plan. The benefit of this is more flexibility on the location of the feed and expansion tank. However, when installed this way the central heating output will not gain heat from the solar thermal input to the thermal store.
- The feed and expansion tank must be sized to take the water expansion of the whole system (ie. solid fuel boiler, cylinder, open flue boiler and auxiliary heating).
- The feed and expansion tank is not supplied as standard with the unit, but is available as an optional extra at the time of order.
- · For all solid fuel applications, copper feed and expansion tanks are required and are available as an optional extra at the time of order

#### **SPARES**

Gledhill products are manufactured to the highest quality standards. In the unlikely event that you require a spare part, you can contact Gledhill Spare Parts, on:

#### 01253 474412

or visit www.gledhill-spares.net

#### **HERE TO HELP**

If you're looking for technical assistance while you're on the job, give our technical team a call. With many years' experience, they're an invaluable resource to have at the end of the phone.

# FOR TECHNICAL ADVICE PLEASE CALL

01253 474584



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WWW.GLEDHILL.NET



