



Environmentally friendly heating & hot water solutions
for the homes of New Zealand

next R290 Air to Water Heat Pumps

Combi-Tank Flexi-Tank

Buffer-Tank

Product & installation guide

Complete Comfort

Smart on the outside : Intelligent on the inside

NeXt R290 inverter heat pumps.

The beating heart of every system.
Built for dependable, efficient
performance, yet ...

“Oh so Quiet “

5YEAR
WARRANTY



NeXt R290 Heat pumps can be applied utilizing a NeXt hydraulic **Tower** or **Station** or in a traditional system format using stand alone system components such as a buffer tank, pressure vessel, pumps, motor valves and safety vales in conjunction with... NeXt hydraulic **Manager** & **PWM** primary circuit pump

MANAGER



A traditional A to W Heat pump system with the added advantage of a central Heating & Hot water management control hub.

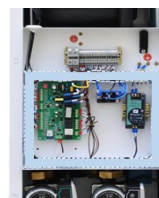
Solar PV Input options



Step up to a system built around the NeXt Hydraulic Station...

Installation gets easier. The system buffer, primary & system pumps, three way valve for optional domestic hot water & expansion vessel all pre plumbed and pre wired.

STATION



For the ultimate system, include a **neXt** Hydraulic Tower...

As with the Station, the system buffer, primary & system pumps, three way valve for domestic hot water & the system expansion vessel are pre plumbed & pre wired. Along with a pre piped **200L Duplex** hot water cylinder optimized for maximum DHW performance.

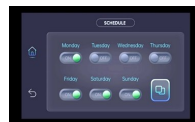
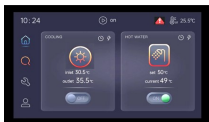


TOWER

Simple installation : enhanced performance



Top rear connections all designed with flat faced connections for easy fit, swivel unions.



Super intuitive **WIFI enabled, touch screen interface.**



neXt : Probably the easiest heating system out there for the installer to configure & certainly one of the easiest for the consumer to control.

HEATLOGIC

Outstanding credentials. ,

*German BAFA listed & quality assured through European certification.

European Key-mark Certified

EMC

EN IEC 55014-1-2021
EN IEC 55014-2-2021
EN IEC 61000-3-2019-A1-2021
EN 61000-3-3 2013 +A2 2002

Testing and certification by TUV

Factory Production Control. verified

Certified and conforming to...

EN 14825-2022
EN12102-1 2022
EN14511-4-2022 Clause 4
EN14511-3-2022

LVD

EN60335 1 21012+A15-2021
EN 60335-2-21 2021+A1 2021
EN60335-2-40 2003+A1-2021
EN 622238-2008

Planet friendly R290 refrigerant

A GWP (global warming potential) of just 3. R290 is the environmentally friendly future of Heat pump technology. R290 offers Higher delivery temperatures and a higher COP than traditional R410 & R32 refrigerants, which are not so good for our planet.

Equally suited to Under-floor & Radiator systems.

Next heat pumps can also be used for systems with higher KW output requirements, installed in cascade or alternatively in hybrid configuration where a condensing gas boiler managed by the HP is used to provide input if and when needed.

Product	Purchase Order Code
Next HS15V Heat Pump	HS15V
Next HS12V Heat Pump	HS12V
Next HS10V Heat Pump	HS10V
HP Anti-vibe feet set	HSF
Hydraulic Tower	HST
Hydraulic Station	HSS
Hydraulic manager	HSM
Pump for Manager	HSP
Three way valve for manager	HS3

Impressive specifications

nextR290 **R290**

Descriptive	HP >	unit	HS15V	HS12V	HS10V
Power supply			230v 50/60Hz	230v 50/60Hz	230v 50/60Hz
Max current rating			32A	18A	
Heat output range at Air7°/ Output35°			4.95 to 15.2	3.8 to 12.2	2.9 to 9.5
Heat Output at Air 7/Water 35 (@Median output)	Kw		12.6	9.87	6.7
Power consumption A7/W35 (Median output)	Kw		2.50	2.06	1.45
Performance COP A7/35 (Median output)	COP		4.90	4.79	4.77
Heat output range at Air7°/ Output 55°			4.65 to 14.3	3.48 to 11.1	2.57 to 7.6
Heat Output at A7/W55 (Median output)	Kw		11.69	8.8	5.87
Power consumption A7/W55(Median output)	Kw		3.39	2.58	2.00
Performance COP A7/W55 (Median output)	COP		3.45	3.41	2.90
Cooling Air 35/ Water 7	Kw		10.8	7.8	5.2
Power consumption A35 / W7	Kw		4.5	2.8	1.8
EER @ A35/ W7	EER		2.29	2.79	2.89
Refrigerant R290 /Weight (GWP=3)	KG		R290 /1.15Kg	R290 /0.8Kg	R290 /0.8Kg
ERP Efficiency rating for EU @35°			A+++	A+++	A+++
ERP Efficiency rating for EU @55°			A++	A++	A++
Dimensions H x W x D	mm		1370 x 1060 x 420	1014 x 1060 x 420	1014 x 1060 x 420
Weight	KG		132	108	106
Sound level	Db		58	58	58

Hydraulic >	Tower	Station	Manager
Power supply	230v 50Hz	230v 50Hz	230v 50Hz
Touch screen interface	✓	✓	✓
Buffer tank	✓	✓	✓
Primary pump	✓	✓	Req, accessory
System pump	✓	✓	Option
Expansion vessel	✓	✓	no
Supplementary element Htg,	✓	✓	no
3 way valve for DHW	✓	✓	Option
200L Duplex Cylinder	✓	no	no
Cylinder back up element	✓	option	no
Net Weight Kg	163	43	8
Dimensions W D H mm	665 665 1878	450 360 900	

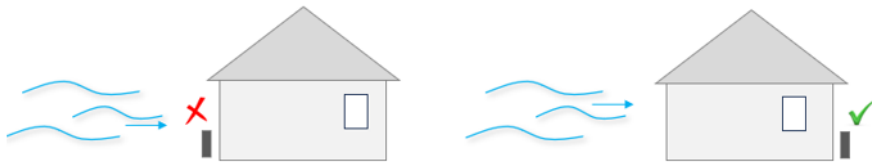
* Manager includes the terminal connections for the addition of external components.

Location Requirements

HEAT PUMP

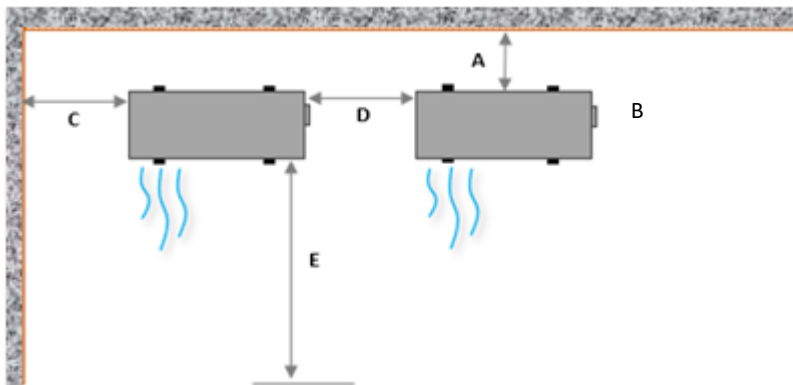
Location and accessibility

As with any heat pump, it is best to avoid locations exposed to prevailing wind. Where possible locate the HP on a warmer northerly face of the property avoiding placement outside bedroom windows where low level sound may be noticed.



Clearances and safety zone requirements.

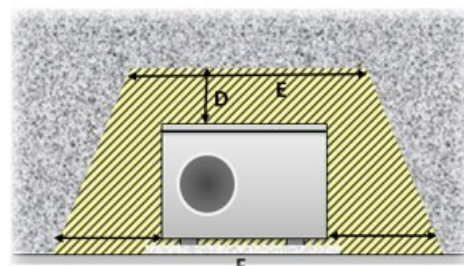
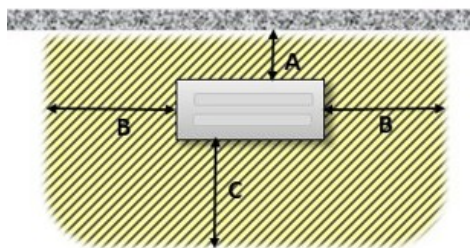
MINIMUM CLEARANCES required for air flow.



Minimum Clearances

- A = 280mm
- B = See safety zone
- C = 600mm
- D = 500mm
- E = 1500mm

SAFETY ZONE Clearances must also allow for a required safe Zone.



Safety Zone B must = **Minimum clearance** C to a wall return or 1.0 m on an open wall

Safety Zone C must be at least . 1.0m

Safety Zone A must = **Minimum clearance** A or 1.0m if no wall behind

Safety Zone D = 500 mm

Safety Zone E = 0.5m wider than the top of the HP at dimension D

No Gully, Source of ignition or opening window shall fall within the safety zone

A concrete base, Level on both plains.

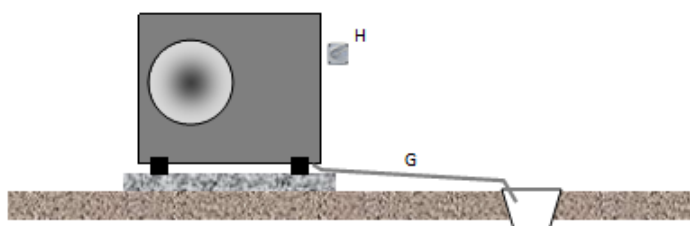
This base should be independent of contact with the house base to prevent condensate discharge contaminating adjacent pathways. The base should be slightly raised and have free drainage around it .

Required base (all models)

1200mm x 600mm 70mm thickness

Condensate drain. G

A condensate drain may be run from the base to a suitable discharge gully or soak-away outside the safety Zone (minimum 1.0 m from the HP)

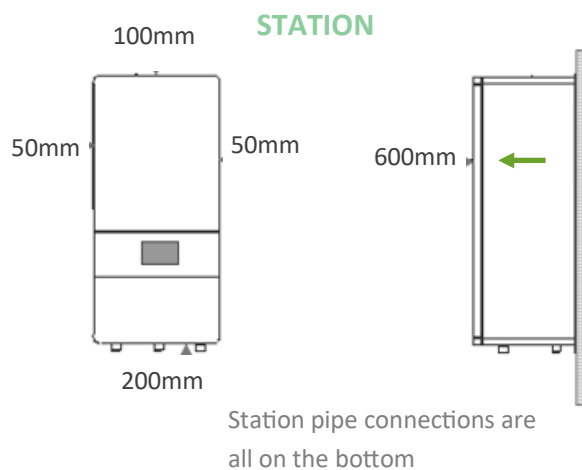
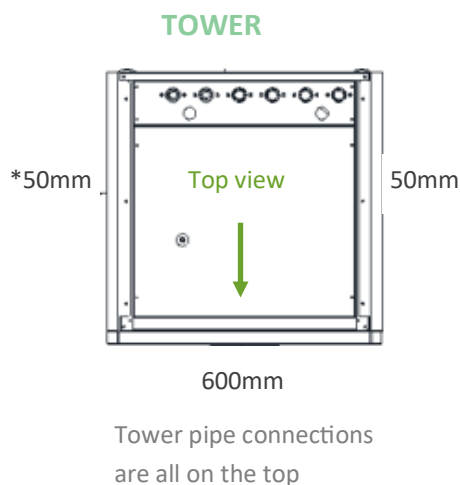


Power Supply. H

A suitable flash proof double pole isolator is required for the power supply. This must be located at least 600mm above the heat pump base.

Dimensions for the hydraulic Tower, Station and Manager options are given on the specifications page.

The following clearances should be applied .



* L/H Side clearances of 250 mm is preferable for some component replacement operations. When enclosed in a tight alcove or cupboard, consideration should be given to facilitate future removal of the Tower.

System Configuration overviews



System configuration, with NeXt Hydraulic Tower

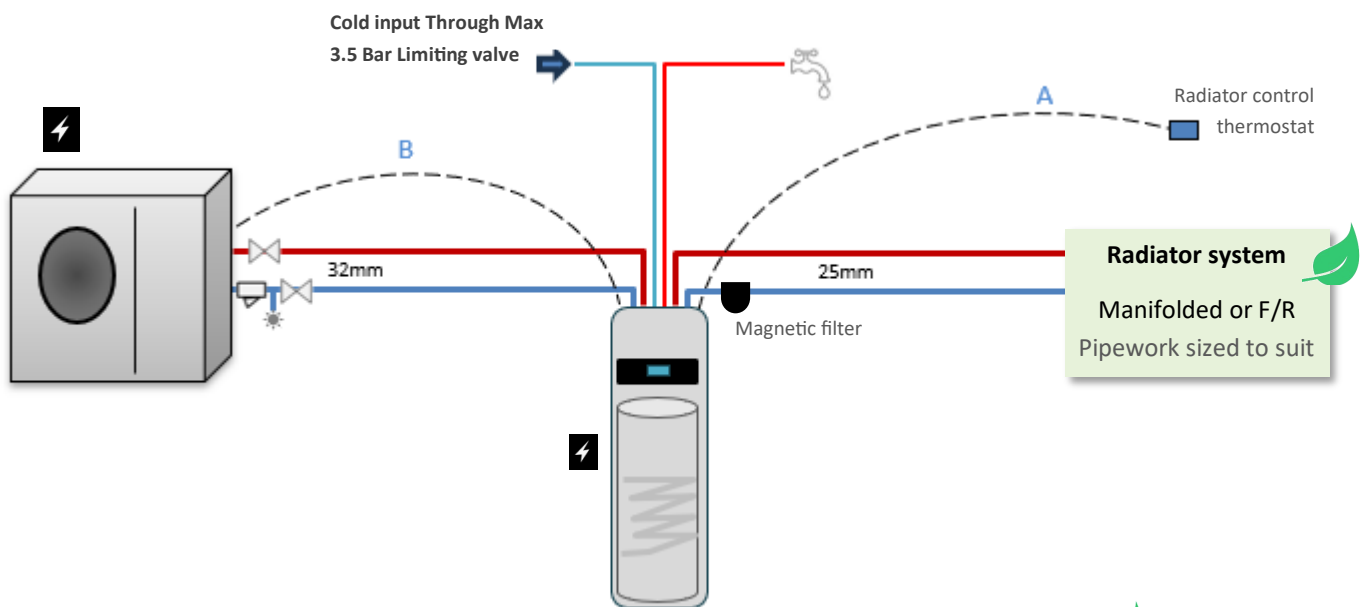
The Ultimate home heating & hot water solution.

NeXt hydraulic Tower, incorporates the system buffer tank, pressure vessel primary and system pumps and three way valve. All pre wired, along with a 200L optimized cylinder designed to maximize performance efficiency from your next Heat Pump.

Installation is as simple as it can be... Presenting a clean modern look combined with truly efficient performance.



TOWER : Radiator system + Domestic Hot Water.



 **Energy wise Tip**

See manifolded radiator systems Page

Applies to schematics on **This page only.**

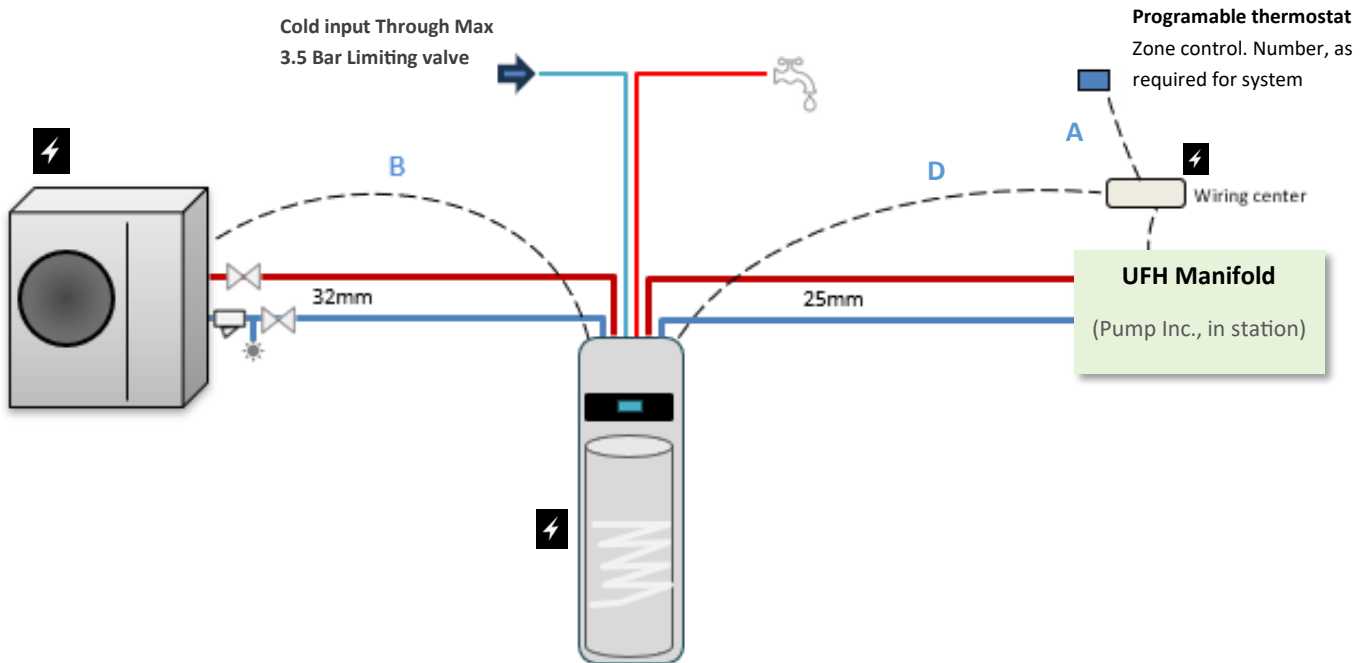
A	1mm 4 core L / N feed to thermostat with Potential free switching back to station. (Or 2 core if power sourced locally.)
B	1mm Two core - for communication



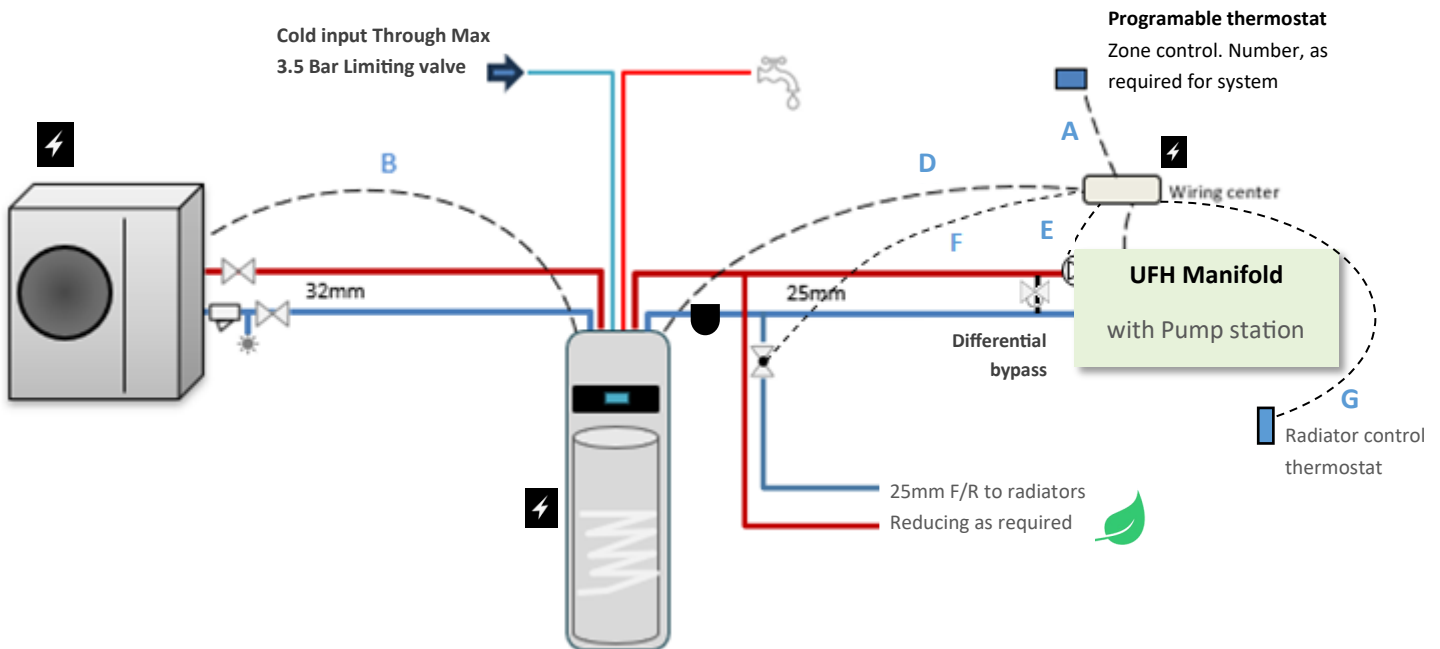
Power Supply required

These generic schematics may not show every valving requirement for a specific install

TOWER : Under-floor system + Domestic Hot Water.



TOWER : Under-floor / Radiator system + Domestic Hot Water.



Applies to schematics on **This page only.**

A	1mm 3core L / N feed to thermostat with Switched live back to wiring center.	D	1mm 2 core (Potential free switching)
B	1mm Two core - for communication	E	3 core flex for pump
C	N/A	F	3 core flex to Motorised valve

G 1mm 4 core L / N feed to thermostat with Potential free switching back to station.
(Or 2 core if power sourced locally.)



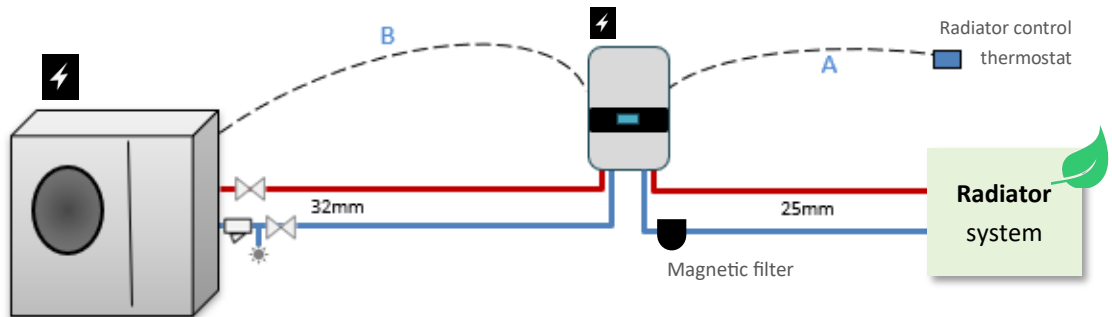
Power Supply required



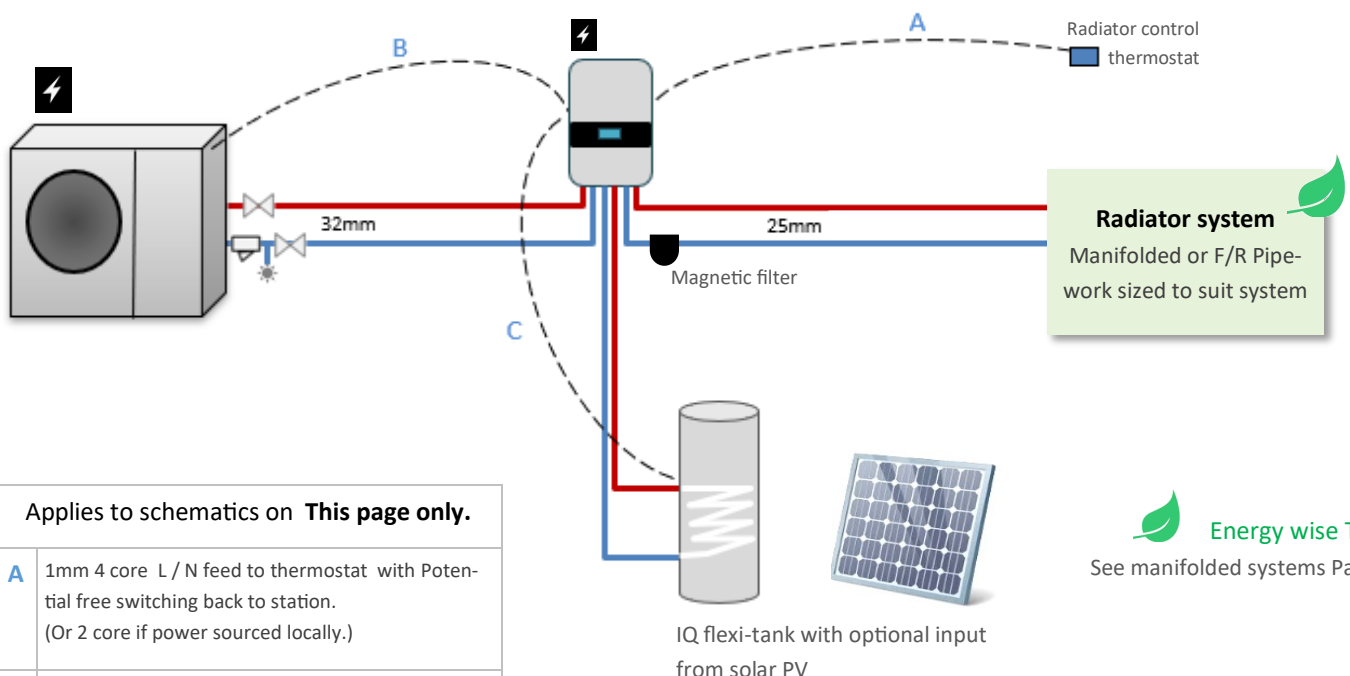
Configuration, with a neXt Hydraulic Station

neXt hydraulic Station, incorporates the system buffer tank, pressure vessel primary and system pumps and three way valve all pre wired making installation easier and consistently correct .

STATION : Radiators, system only.



STATION : Radiator system + Domestic Hot Water.



Applies to schematics on **This page only.**

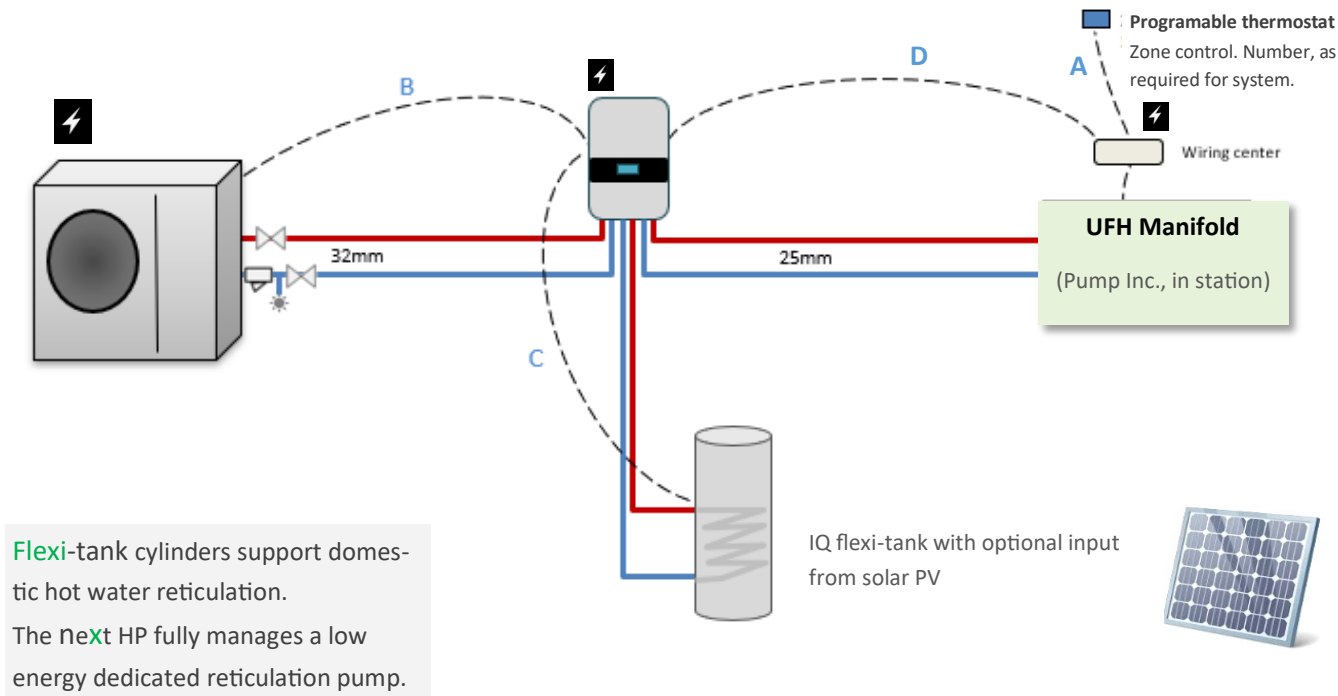
A	1mm 4 core L / N feed to thermostat with Potential free switching back to station. (Or 2 core if power sourced locally.)
B	1mm Two core - for communication
C	Sensor B1 - supplied Pre-wired within Station

 **Energy wise Tip**
See manifolded systems Page

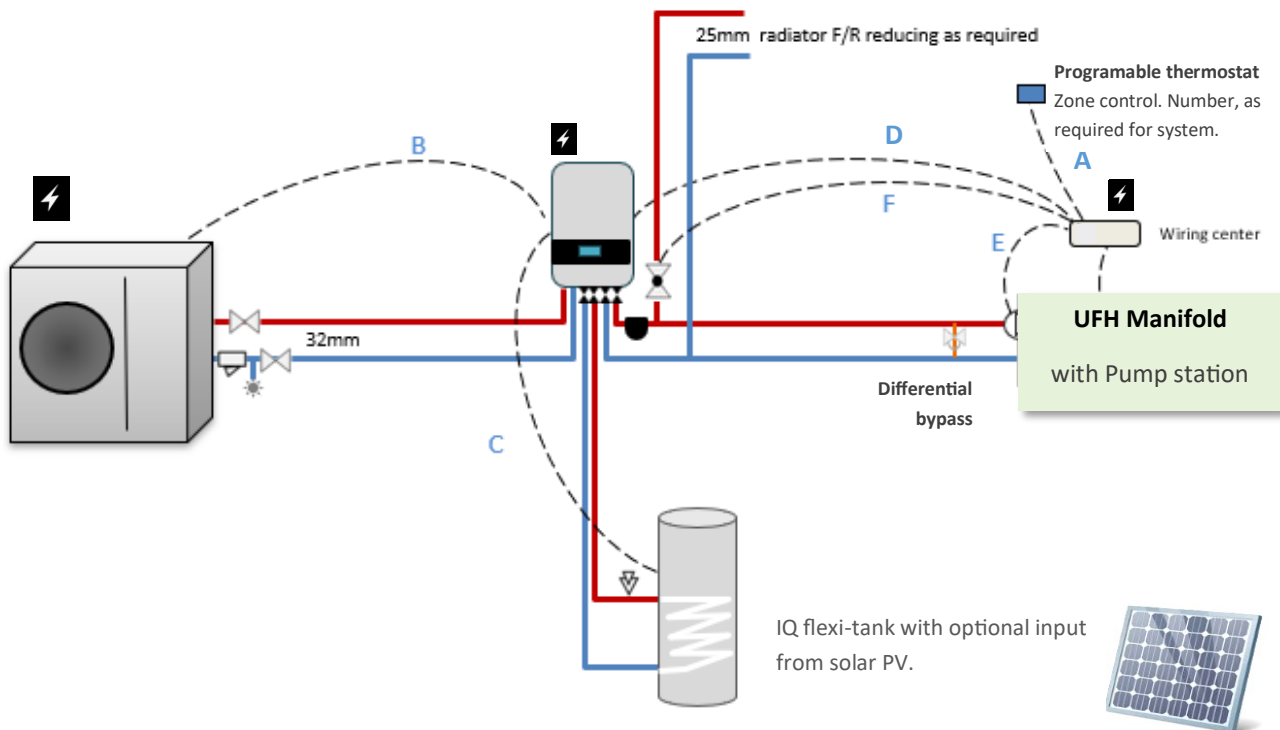
 **Power Supply required**

These generic schematics may not show every valving requirement for a specific install

STATION : Under-floor system + Domestic Hot Water.



STATION : Under-floor / Radiator system + Domestic Hot Water.



Applies to schematics on **This page only.**

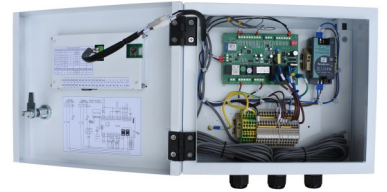
A	1mm 3 core L / N feed to thermostat with Switched live back to wiring center .	D	1mm 2 core (Potential free switching)
B	1mm Two core - for communication	E	3 core flex for pump
C	Sensor B1 - supplied Pre-wired within Station	F	3 core flex to Motorised valve

 Power Supply required

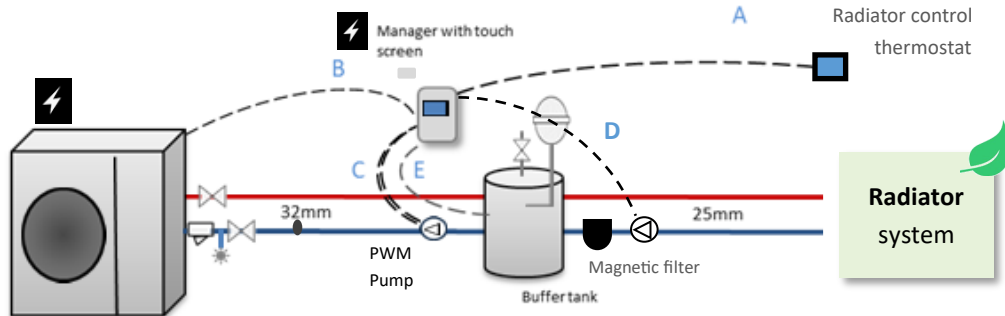


Configuration with a neXt Manager

Systems use individually sourced system components.



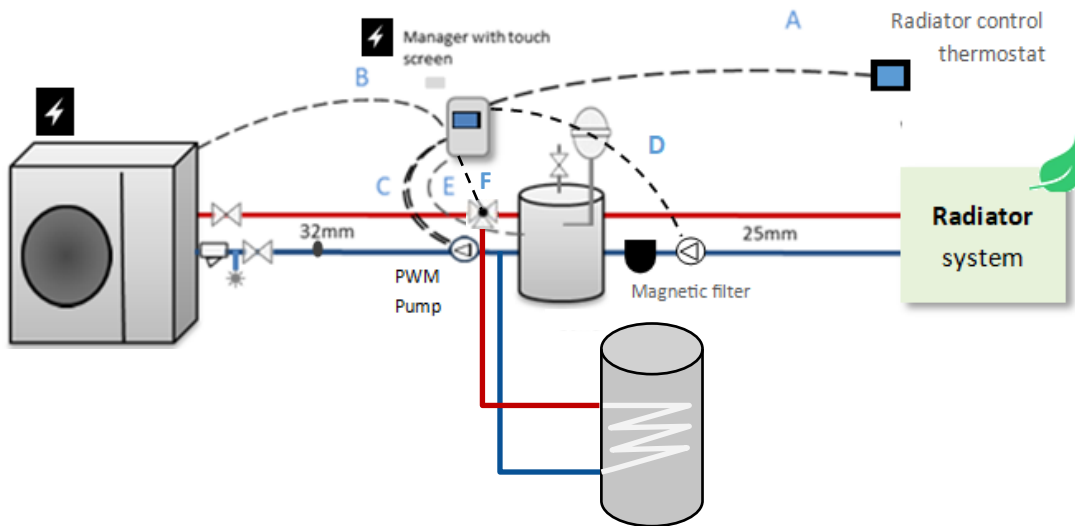
MANAGER : Basic Radiator system only.



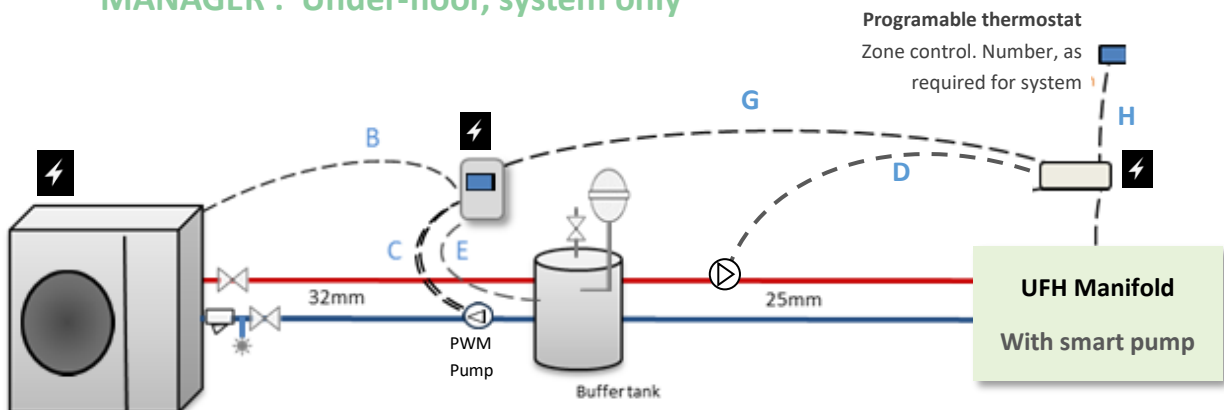
A radiator system can be without a buffer tank - but, you must ensure there is consistent flow at the M3hr rate required by the HP.

A Buffer is always better!

MANAGER : Radiator system + Domestic Hot Water.



MANAGER : Under-floor, system only

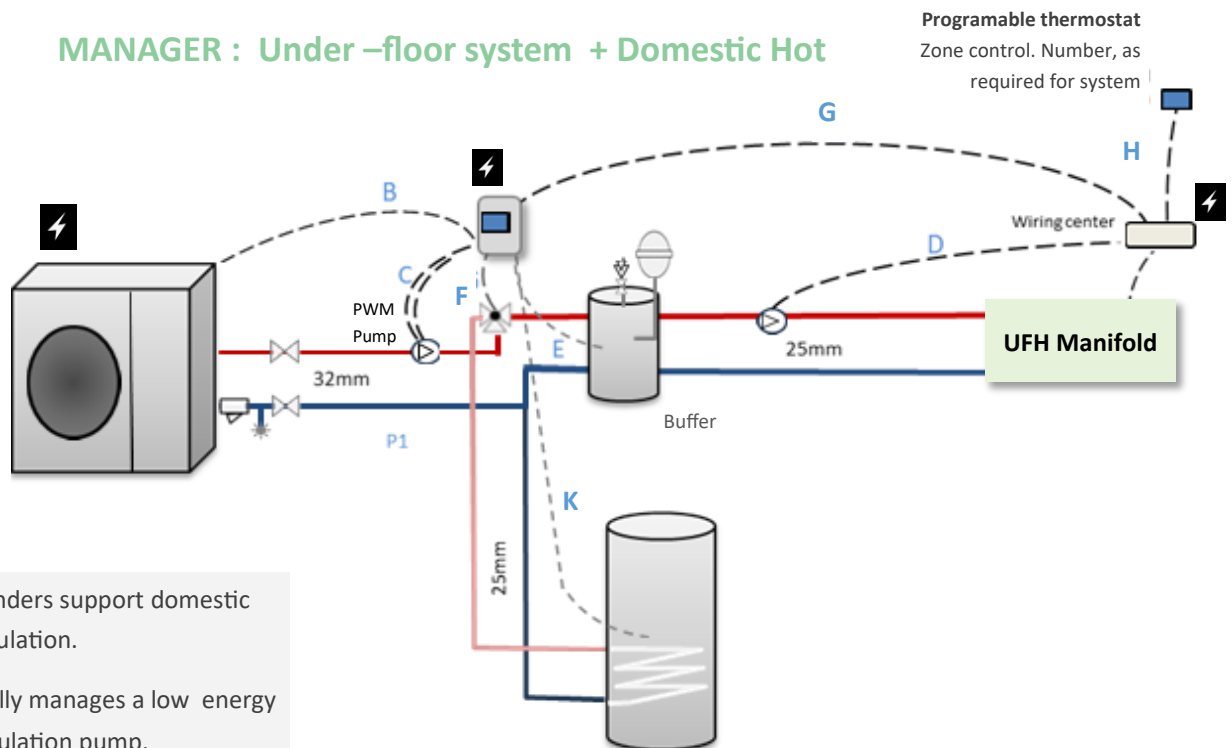


PWM pump is supplied with Manager & must be used

A	1mm 4 core L / N with Potential free switching pair back to station. (Or 2 core if power sourced locally.)	B	1mm Two core - communication	C	L/N/E Power & PWM control to pump (supplied with pump)	D	3 core flex for pump	E	B1 NTC Sensor, Supplied within Manager
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These generic schematics may not show every valving requirement for a specific install

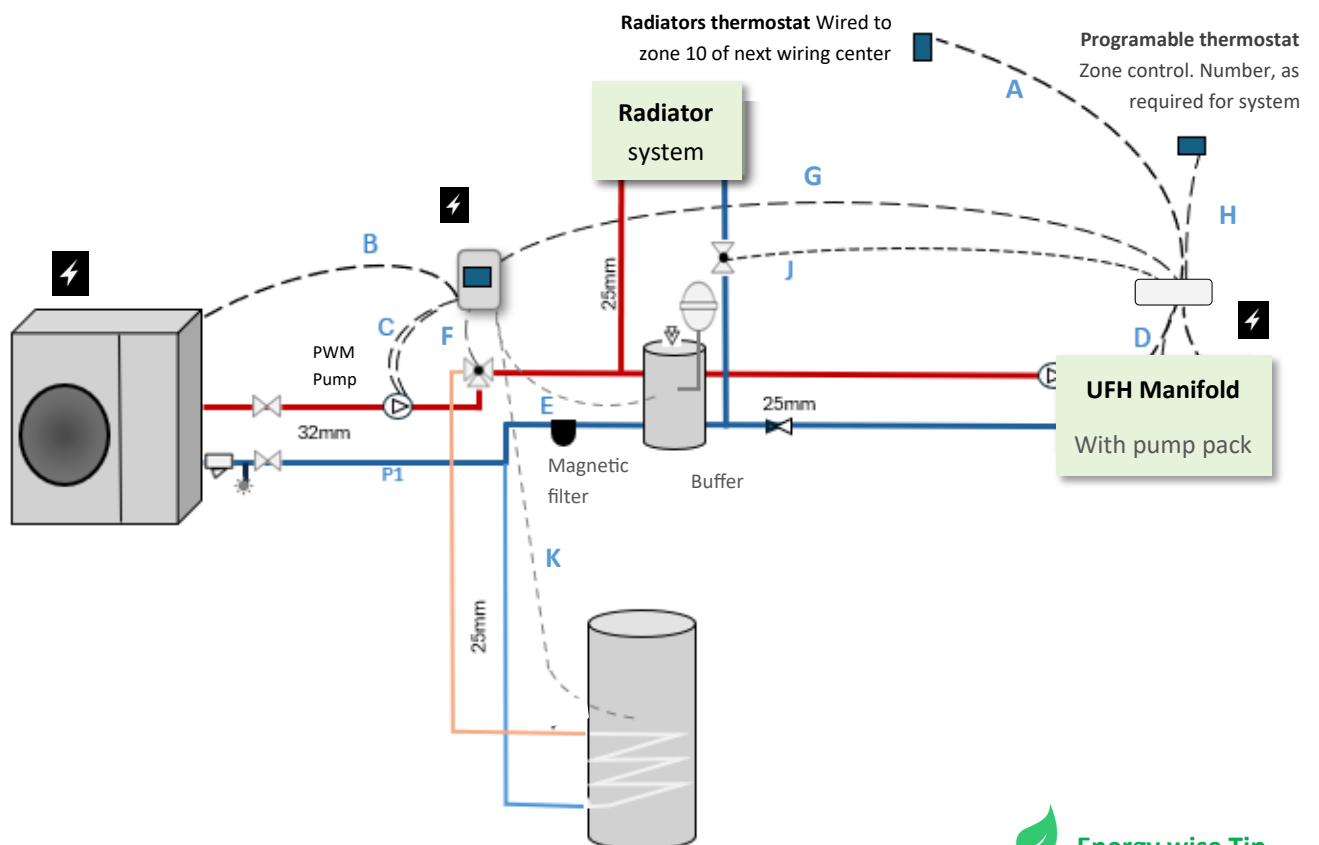
MANAGER : Under –floor system + Domestic Hot



Flexi-tank cylinders support domestic hot water reticulation.

The next HP fully manages a low energy dedicated reticulation pump.

MANAGER : Combined Under –floor / Radiator system + Domestic Hot



 **Energy wise Tip**

See manifolded systems Page

PWM pump is supplied with Manager & must be used

F	3 core flex, DHW Motor valve	G	1mm 2 core (Volts free switching)	H	UFH thermostat 1mm 3 core L / N /Sw L	J	1mm 3 core to Rads, Motor valve	K	B2 NTC DHW sensor supplied within Manager
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Power Supply required 

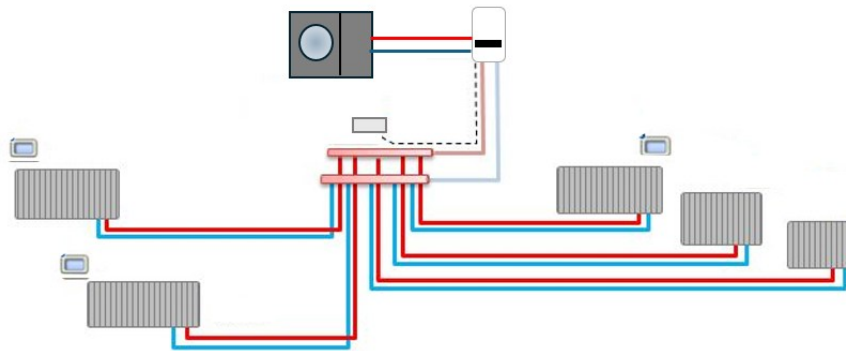
Radiator systems

neXt R290 brings higher system delivery temperatures.

A game changer when it comes to radiator systems. But, in order to make the most of a neXt HP you might want to consider how the system is configured...

Manifolded systems,

The norm in North America & Scandinavia, a manifolded system provides significant advantage over traditional flow & Return systems for heat pump applications.



- More efficiency through independent time & temperature control of areas or rooms.
- Reduction of peak load on the compressor... higher inverter modulation gains are made.
- Far greater ability to regulate and fine tune flow requirements.
- None, or at least very few fittings in walls ceiling spaces or floor cavities.
- Easier to maintain, and much easier to extend or modify at a future date.
- Similar material & labor cost compared to a traditional flow & return system.

See our fact sheet for manifolded radiator systems in more detail

Fully controllable, efficient and effective, Yet simply logical!

Traditional flow and return configuration is still of course a viable solution.

In a traditional Flow and return system we recommend creating a two zone system where the bedrooms initial heating on time is stepped out from the initial on time for the rest of the house. This simple inclusion reduces peak load and improves efficiency.

Controllable energy efficient solutions !

Guaranteed performance

NeXt R290 heat pumps are designed for long term, trouble free performance. backed by up to ***5 years** Warranty,

***When** installed into a new system cover is rolling 12 month cover up to **5 years**.

Warranty is given from the date of registration or 30 days from date of purchase (whichever is the sooner). Covering parts and *labour, Total period of warranty is conditional on the below....

- The appliance must have been installed and commissioned as prescribed.
- For year 4/5 cover the combined online warranty registration / commissioning declaration must have been completed.
- *Servicing must have been carried out within each 12 month period, (a 30 day grace period applies)

Where servicing is not carried out this warranty will terminate at 395 days after the last service or commissioning. Servicing must be in line with the prescribed requirements. Service requirements are in the manual, & also available from our website.

Evidence of service is required in the event of any claim. All claims must be formally approved prior to any repair being carried out. We will not cover any claim made retrospectively.

- When installed in a pre existing system a magnetic filter must be included in the system return.
- *Labour is covered for the first 3 years - limited to the time limits and maximum hourly rate set out in our full terms and conditions of warranty, (available online)

*Warranty is parts only for years 4 and 5.

Maximum claimable travel allowances are also set within our terms. We do not cover call out charges.

- Auto Air relief valves, pressure relief valves. Circulating pumps, NTC & PT and other temperature sensors, cover is limited to 3 Years & Labour for replacement of these items is excluded after 1 Year.
- R290 Heat pumps are exclusively designed for and warranted in domestic use. no cover is applied for commercial applications

Where the above conditions are not met our warranty is limited to 24 months from date of purchase and will exclude any claim where failure to adhere to the above could be a factor.

Completion of the required commissioning record & warranty registration is, as easy as...



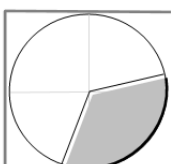
Simply Register your neXt HP installs online.....

Combi-Tank

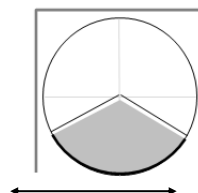
Developed right here in New Zealand Combi-Tank has unique flexibility and energy saving features compatible with almost any brand of Air to water heat pump.

Energy saving pre heater coil for DHW Utilizes High COP energy to DHW
High performance Large surface area coil for HP HW heating
PV Solar ready DC element port in DHW Cylinder for PV to DHW input
PV solar ready DC element port in Buffer tank for PV to heating input
230V element port in optimized HP controlled position
Reticulated DHW return connection point
System pressure vessel anchor Tab for on case mounting
Space Saving Design Buffer & Cylinder in a 550mm diameter single shell
Duplex Stainless Steel with additional Anode protection in DHW Cylinder
Tight space installation with all connections XX° accessible.
Wipe Clean color steel shell with feet

DHW CYLINDER		BUFFER TANK	
Construction	Duplex SS	Construction	Duplex SS
Capacity	240L	Capacity	70L
Input Coil DHW	22mm OD 24M	Pre Heating coil*	22mm OD 6m
Hot & Cold ports	3/4" BSP Female	Coil connections	3/4" BSP male
Reticulation Return,	1/2" BSP Female	Buffer ports	1" BSP Female
TPR port	1/2" BSP Female	Element Port PV	1 1/4" BSP X1
Element Ports DC PV	1 1/4" BSP X1	Insulation	50mm PU
Element Port 230v,	1 1/4" BSP X1	Probe pockets	X 1
Probe pockets	X 2	Anode	N/A
Anode	Included	Sludge Drain	Included
Insulation	50mm PU in Shell	Insulation	50mm PU in Shell
Overall outer case dimensions . 2080 mm x 570 Diameter . Including feet			
Pre heat coil may alternatively used as an input source			



Pipe and element connections fall within a Radius allowing installation in tight cupboards and corners



Min 650

DUPLEX SS

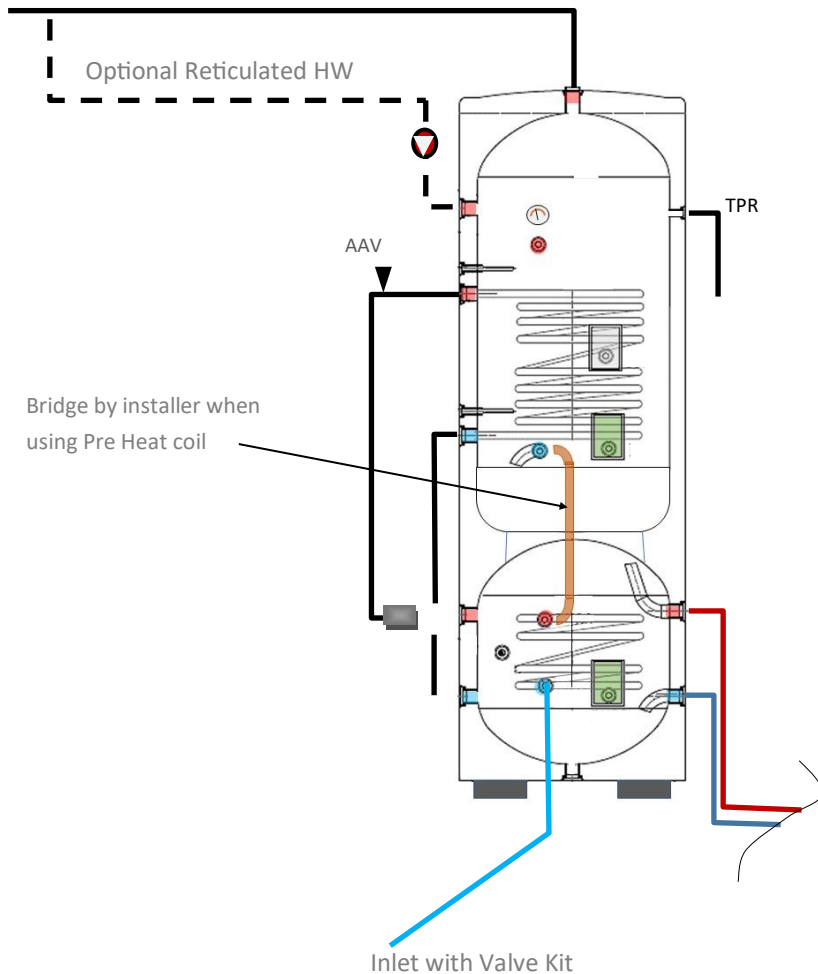


Purchase order Code

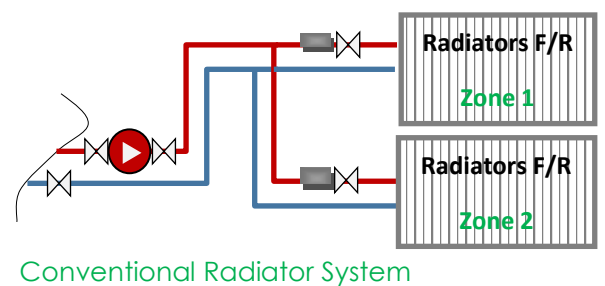
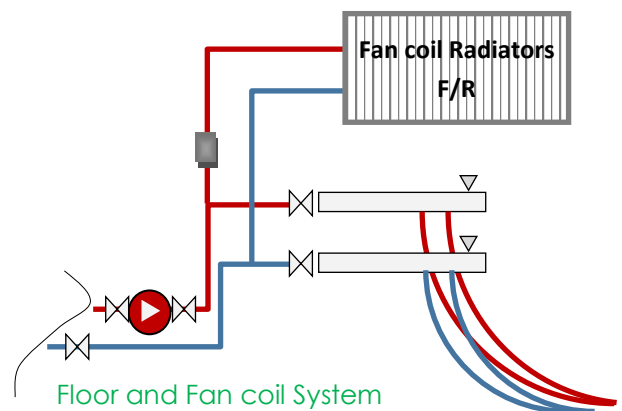
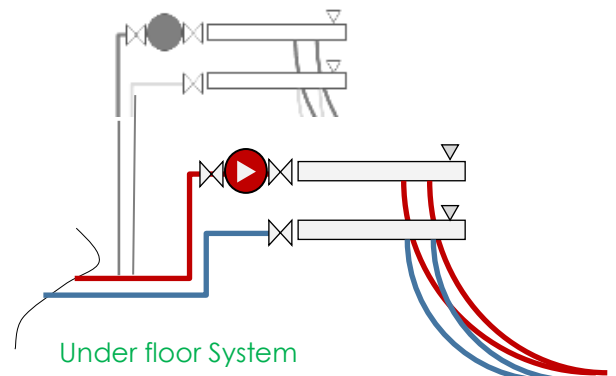
HL240/70

Combi-Tank

Mechanical connections : Heating & Hot water systems



Pipework shown in black
in copper for G12



Purchase order Code HL240/70

HEATLOGIC

Flexi-Tank 300L Twin Coil Cylinder

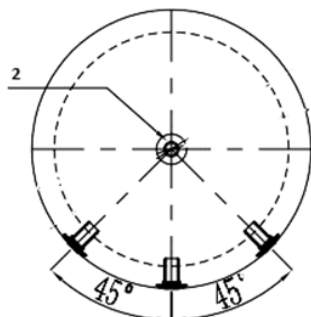
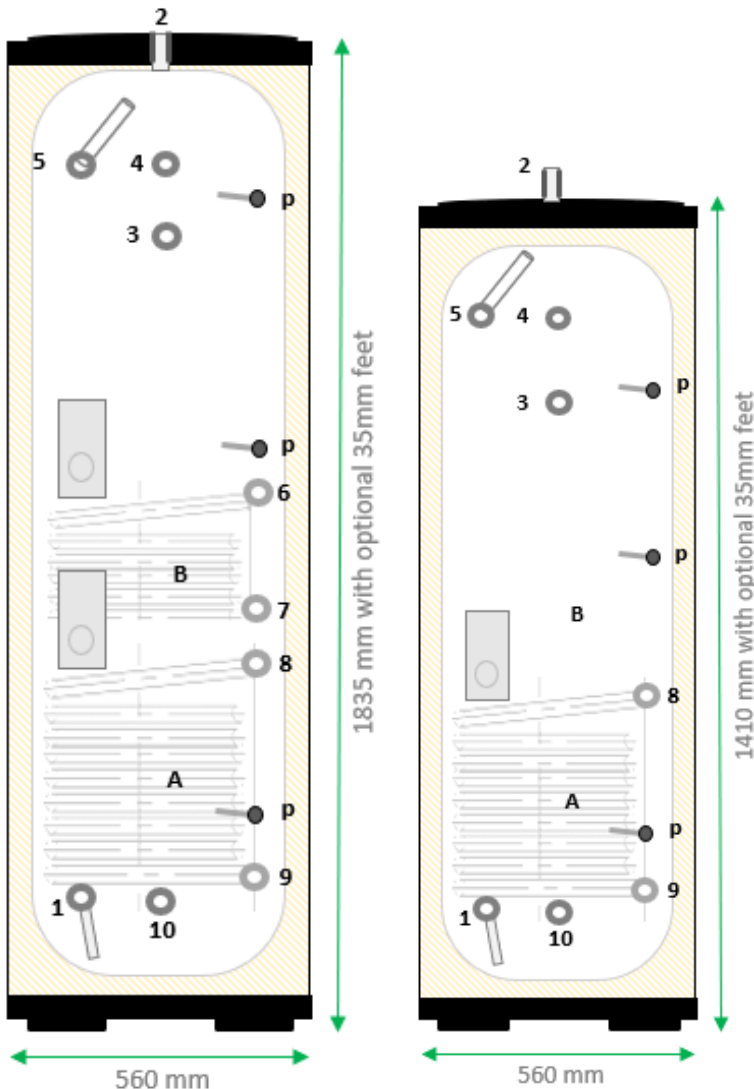
Purchase order Code HL300

Flexi-Tank 210L Single Coil

Purchase order Code HL210



DUPLEX SS



Ultimate configuration flexibility

- 1/ Cold feed 20mm (F)
- 2/ TPR Valve port (F)
- 3/ DHW Reticulation return port 20mm (F)
- 4/ Anode for additional protection (F)
- 5/ DHW outlet port (F)

Coils 22mm OD

Rating Coil A 21 Kw -- Coil B 14 Kw

- 6/ 20mm (M) Coil 2 in
- 7/ 20mm (M) Coil 2 out
- 8/ 20mm (M) Coil 1 In
- 9/ 20mm (M) Coil 1 out

All coil connections are flat face for swivel union washer.

10/ 20mm (F) Drain valve port (or*)

*Ports 3 and 10 can be utilised as optional hydronic circuit ports, Eg: solar.

2 x Element ports, one 230V for and a second that could be used as a Solar PV DC input

P 3 x sensor pockets

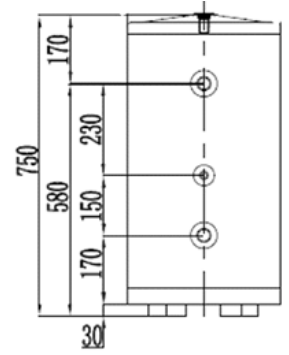
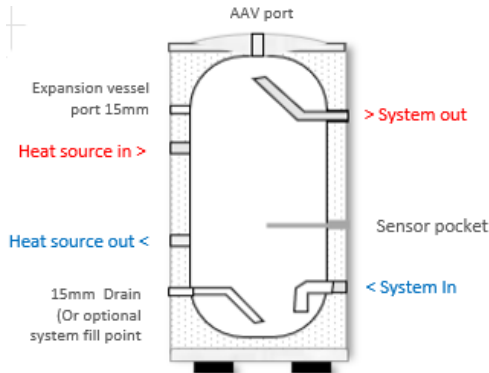
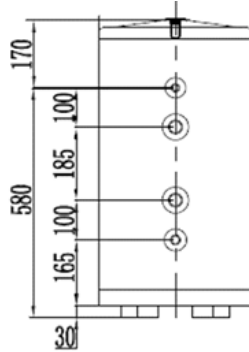
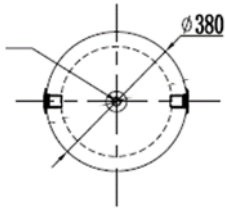
Off the floor feet

Easy clean gloss white shell with black cap and base.

Coils can be Pumped or Thermosyphon
Upper coil can be for input or extraction.
Utilise both coils for max HP input

Buffer-Tank 45

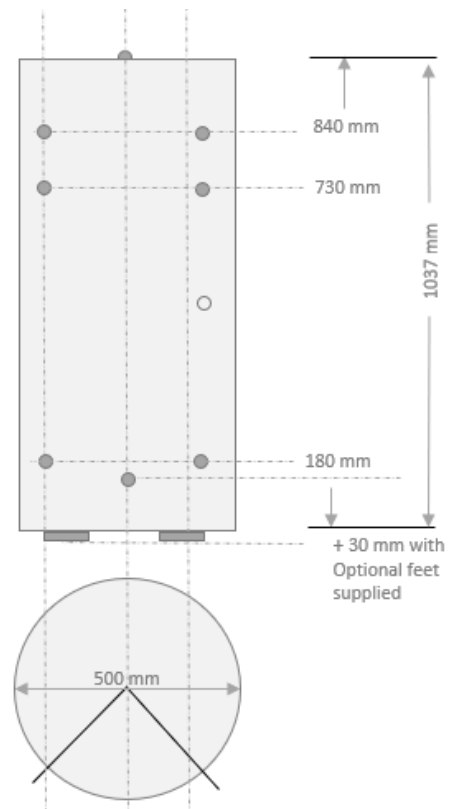
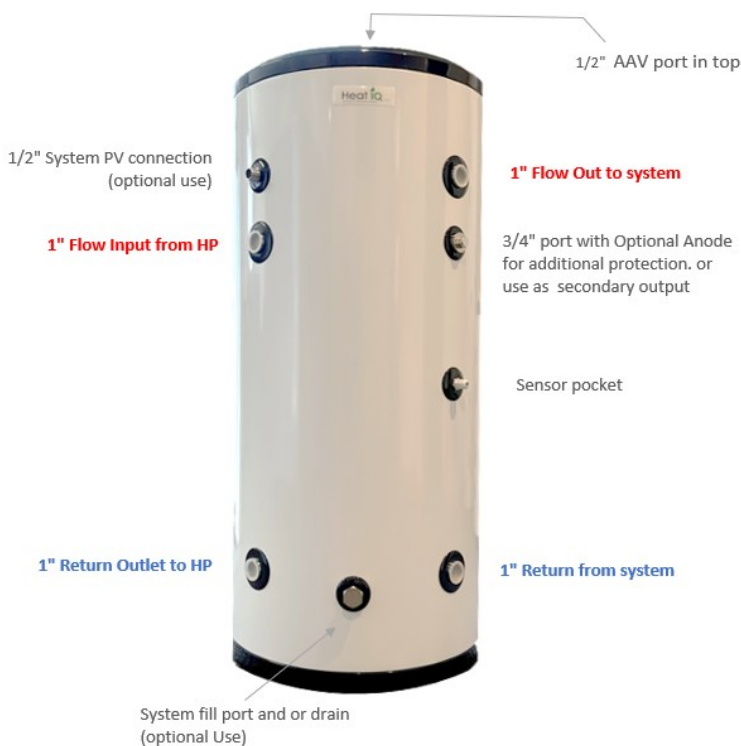
Purchase order Code HL45



Buffer-Tank 100

Purchase order Code HL100

& 100C (with Coil) Purchase order Code HL100C



Discover more about Heat-Logic visit our website,

if you would like to talk about your upcoming projects
We are happy to take your calls to discuss your requirements



027 461 6880

sales@heatlogic.co.nz



Complete Comfort