

Manifold for central heating system

550 series



Function

The manifolds for central heating system are used in heating and air-conditioning systems to allow different heat adjustments of the various rooms when there is only one heat generator or chiller. The various configurations are compact and can be easily fitted in any kind of hydraulic circuit, with the advantages of ease of installation and saving of useful living space. The manifolds for central heating systems can be equipped, as an accessory, with pre-formed shell insulation to ensure perfect thermal insulation in both heating and air-conditioning systems.

Product range

Code 550020	Manifold for central heating system 2	size 1 1/4"; outlet: 1 1/2" with nut (centre distance 125 mm)
Code 550030	Manifold for central heating system 3	size 1 1/2"; outlet: 1 1/2" with nut (centre distance 125 mm)
Code 550040	Manifold for central heating system 4	size 1 1/2"; outlet: 1 1/2" with nut (centre distance 125 mm)
Code 550021	Manifold for central heating system 2+1	size 1 1/4"; outlet: 1 1/2" with nut (centre distance 125 mm)
Code 550031	Manifold for central heating system 3+1	size 1 1/2"; outlet: 1 1/2" with nut (centre distance 125 mm)

Technical specifications

Materials

Body: painted steel
 Maximum working pressure: 10 bar
 Working temperature range: 5-110°C

Medium: water and non-hazardous glycol solutions excluded from the range of application of Directive 67/548/EC

Connections: - main: 2 and 2+1: 1 1/4" M
 3, 4 and 3+1: 1 1/2" M
 - outlets: 1 1/2" with nut
 - fitted for brackets: M8x1,25 (brackets, wall anchors, nuts and bolts are not supplied in the package)

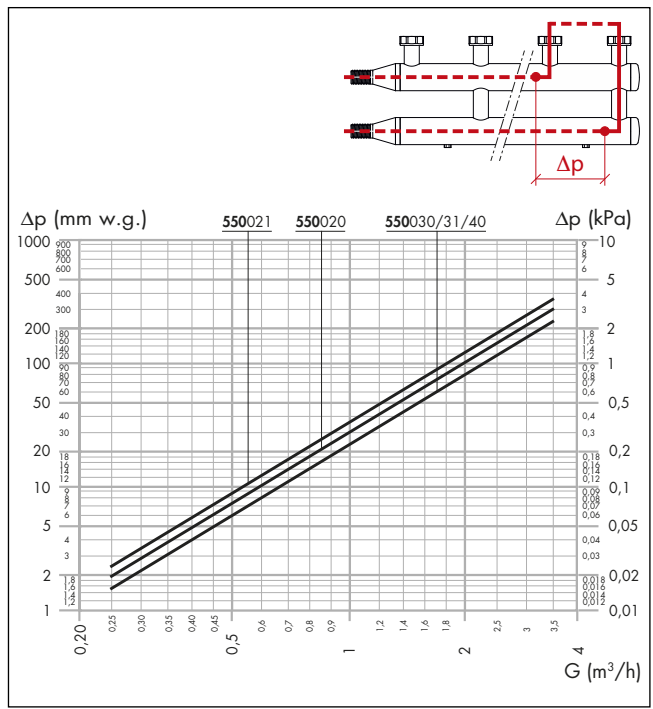
Centre distance: - main: 120 mm
 - outlets: 125 mm

Technical specifications of insulation (optional)

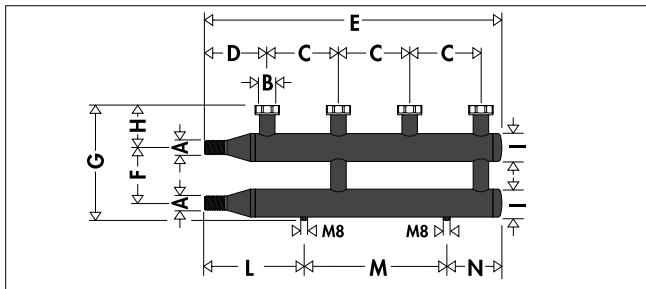
Material: closed cell expanded PEX
 Thickness: 20 mm
 Density: - inner part: 30 kg/m³
 - outer part: 50 kg/m³
 Thermal conductivity (DIN 52612): - at 0°C: 0,038 W/(m·K)
 - at 40°C: 0,045 W/(m·K)
 Coefficient of resistance to water vapour diffusion (DIN 52615): > 1300
 Working temperature range: 0-100°C
 Reaction to fire (DIN 4102): class B2

Hydraulic characteristics

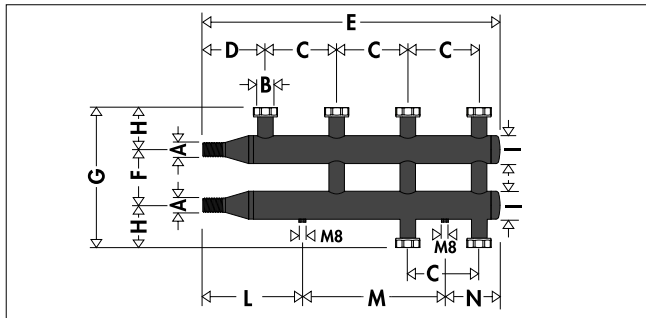
Manifold inner diameter: - 2 and 2+1: Øi 53 mm
 - 3, 3+1 and 4: Øi 69 mm



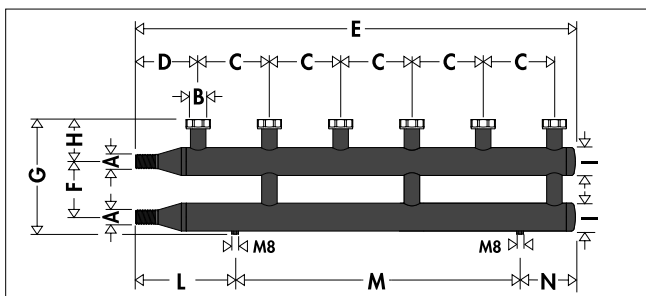
Dimensions



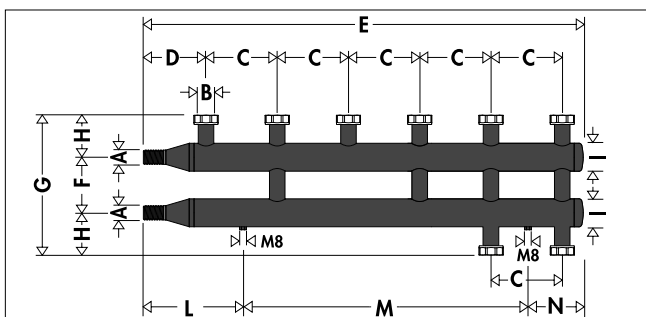
Code	A	B	C	D	E	F	G	H	I	L	M	N	Mass (kg)
550020	1 1/4"	1 1/2"	125	137	557	120	247	91	∅60	199	250	108	6,1



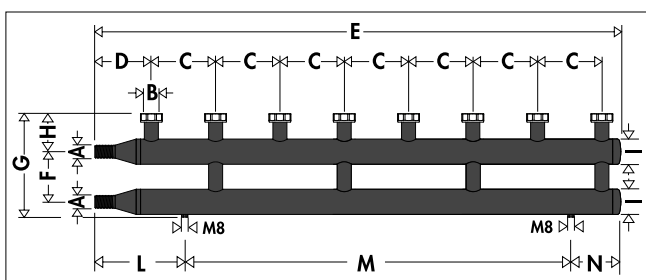
Code	A	B	C	D	E	F	G	H	I	L	M	N	Mass (kg)
550021	1 1/4"	1 1/2"	125	137	557	120	301	91	∅60	199	250	108	6,5



Code	A	B	C	D	E	F	G	H	I	L	M	N	Mass (kg)
550030	1 1/2"	1 1/2"	125	151	823	120	263	91	∅76	213	500	110	11,3



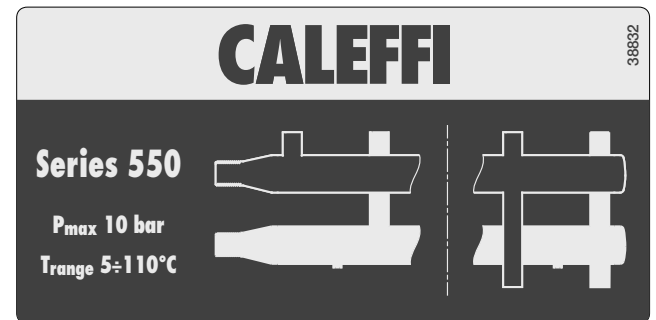
Code	A	B	C	D	E	F	G	H	I	L	M	N	Mass (kg)
550031	1 1/2"	1 1/2"	125	151	823	120	317	91	∅76	213	500	110	11,7



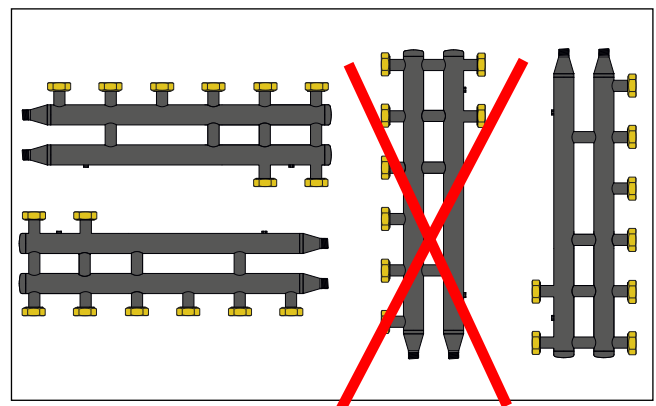
Code	A	B	C	D	E	F	G	H	I	L	M	N	Mass (kg)
550040	1 1/2"	1 1/2"	125	151	1073	120	263	91	∅76	213	750	110	14,9

Installation

The 550 series manifolds are equipped with outlets with a captive nut. The manifolds must be installed by paying attention to the connection of the flow and return pipes, both for the main connections and for the outlets, in accordance with the label affixed to the body.

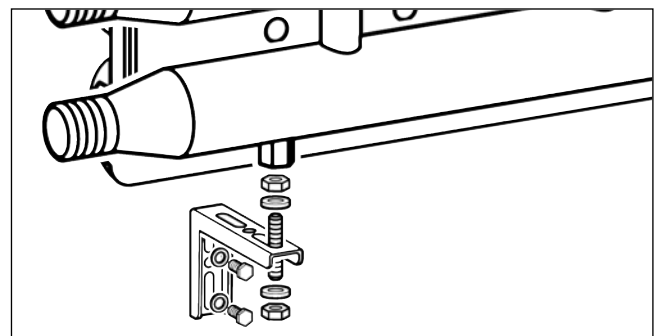


The 550 series manifolds can be installed horizontally and even upside down. They can also be installed vertically, but with the main connections turned upward in order to prevent air pockets forming in the top.



Fitted for wall mounting

The 550 series manifolds are equipped with M8 nuts for wall mounting (brackets, wall anchors, nuts and bolts are not supplied in the package).



Volumes

Code	Volume (litres)
550020	2,5
550021	2,6
550030	6,0
550031	6,1
550040	7,9

Accessories



Insulation for manifolds for central heating systems 550 series. For heating and air-conditioning systems.

Code

CBN550020 for manifold 2

CBN550021 for manifold 2+1

CBN550030 for manifold 3

CBN550031 for manifold 3+1

CBN550040 for manifold 4



550

Kit for 550 series manifold pipe connection to 548 series hydraulic separator.

Code

550001 1 1/4" M x 1 1/4" F

550002 1 1/2" M x 1 1/4" F

550003 1 1/2" M x 1 1/2" F

550004 2" M x 1 1/2" F



559

Pair of plugs with seal for unused outlets.

Code

559001



559

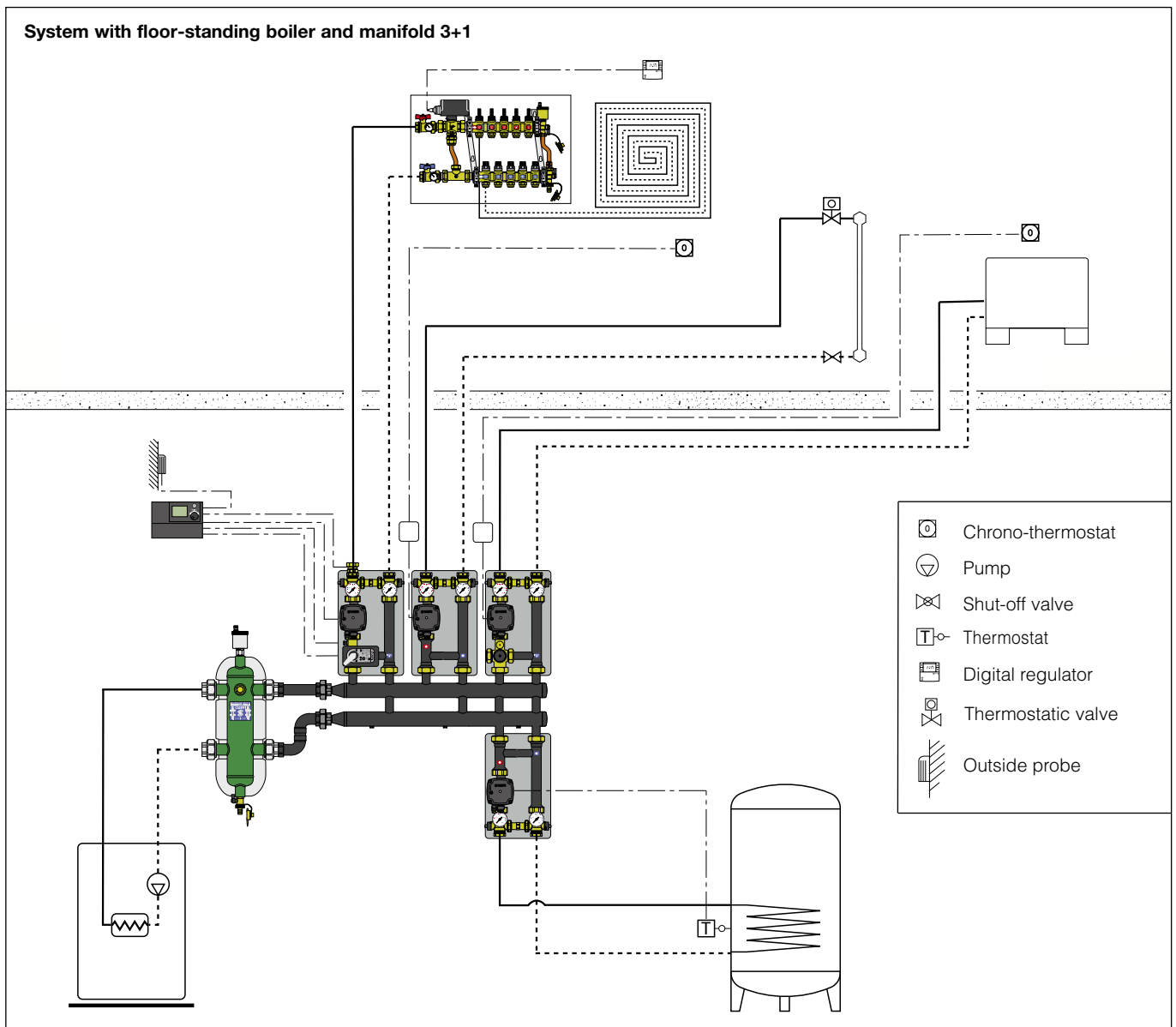
Pair of fitting with gaskets. For 550 and 559 series.

Code

559002 1 1/2" M x 1" M

Application diagrams

System with floor-standing boiler and manifold 3+1



SPECIFICATION SUMMARY

Code 550020

Manifold for central heating systems, 2 outlets. Painted steel body. Connections to generator 1 1/4" M, centre distance 120 mm. Outlet connections 1 1/2" with nut, two at the top, centre distance 125 mm. Medium water and glycol solutions, maximum percentage of glycol 30%. Maximum working pressure 10 bar. Working temperature range 5–110°C (0–100°C with insulation). Fitted for mounting with M8x1,25 nuts.

Code 550030

Manifold for central heating systems, 3 outlets. Painted steel body. Connections to generator 1 1/2" M, centre distance 120 mm. Outlet connections 1 1/2" with nut, three at the top, centre distance 125 mm. Medium water and glycol solutions, maximum percentage of glycol 30%. Maximum working pressure 10 bar. Working temperature range 5–110°C (0–100°C with insulation). Fitted for mounting with M8x1,25 nuts.

Code 550040

Manifold for central heating systems, 4 outlets. Painted steel body. Connections to generator 1 1/2" M, centre distance 120 mm. Outlet connections 1 1/2" with nut, four at the top, centre distance 125 mm. Medium water and glycol solutions, maximum percentage of glycol 30%. Maximum working pressure 10 bar. Working temperature range 5–110°C (0–100°C with insulation). Fitted for mounting with M8x1,25 nuts.

Code 550021

Manifold for central heating systems, 2+1 outlets. Painted steel body. Connections to generator 1 1/4" M, centre distance 120 mm. Outlet connections 1 1/2" with nut, two at the top and one at the bottom, centre distance 125 mm. Medium water and glycol solutions, maximum percentage of glycol 30%. Maximum working pressure 10 bar. Working temperature range 5–110°C (0–100°C with insulation). Fitted for mounting with M8x1,25 nuts.

Code 550031

Manifold for central heating systems, 3+1 outlets. Painted steel body. Connections to generator 1 1/2" M, centre distance 120 mm. Outlet connections 1 1/2" with nut, three at the top and one at the bottom, centre distance 125 mm. Medium water and glycol solutions, maximum percentage of glycol 30%. Maximum working pressure 10 bar. Working temperature range 5–110°C (0–100°C with insulation). Fitted for mounting with M8x1,25 nuts.

Code CBN5500..

Optional insulation for 550 series manifolds for central heating systems. Material closed cell expanded PEX. For heating and air-conditioning systems.

Serie 550

Kit for 550 series manifold pipe connection to 548 series hydraulic separator. Sizes 1 1/4" M x 1 1/4" F (1 1/2" M x 1 1/4" F, 1 1/2" M x 1 1/2" F, 2" M x 1/2" F) with nut.

Code 559001

Pair of plugs with seal for not used outlets. Size 1 1/2" M.

Code 559002

Pair of fittings with gaskets. Size 1 1/2" M x 1" M.

We reserve the right to make changes and improvements to the products and related data in this publication, at any time and without prior notice.