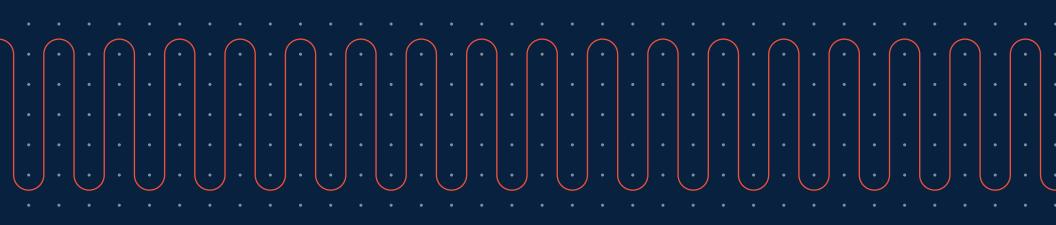
# **CALEFACTIO**

# $\begin{array}{c} \textbf{PRODUCT CATALOG} \\ \textbf{Residentiel} \cdot \textbf{Commercial} \\ \hline 2023 \end{array}$



23-011

### RADIANT HEATING SYSTEM DESIGN SERVICE

Short on time and resources to design your radiant floor or snow melting project? The Calefactio team can help you every step of the way.

We offer fast turnkey service to help you execute your residential and commercial projects across Canada. With the guidance of our dedicated professionals, you'll be amazed how much you can get done in a short time.

#### **ADVANTAGES**

- We'll send you a customized looping plan and a product list faster than our competition.
- Our team of professionals will be there to offer support and answer your questions at all times.
- Our expertise and knowledge will help you choose the right components for your mechanical room.
- You'll save time and money.

#### OUR TEAM OF EXPERTS



#### WHY CHOOSE CALEFACTIO?

- Our solutions are developed locally here in Canada.
- We offer reliable, high-performance products and provide no-pressure support services.
- We do things differently, which motivates us to go the extra mile.

#### OUR ACHIEVEMENTS



To complete a design request, scan the QR code.



Model#	Decerin	Weight		
MUUUUI#	Description		lb	kg
CALPEX-R-12-300A	PEX-a ½"	300 ft	18	8.1
CALPEX-R-12-1000A	PEX-a ½"	1000 ft	59	26.8
CALPEX-R-58-300A	PEX-a ⁵⁄ଃ"	300 ft	14.5	10.9
CALPEX-R-58-400A	PEX-a ⁵⁄ଃ"	400 ft	32	14.5
CALPEX-R-58-500A	PEX-a ⁵⁄ଃ"	500 ft	40	18.1
CALPEX-R-58-1000A	PEX-a ⁵⁄ଃ"	1000 ft	80	36.3
CALPEX-R-34-100A	PEX-a ¾"	100 ft	11	5
CALPEX-R-34-300A	PEX-a ¾"	300 ft	35	15.9
CALPEX-R-34-400A	PEX-a ¾"	400 ft	44	20
CALPEX-R-34-500A	PEX-a ¾"	500 ft	55	25
CALPEX-R-34-1000A	PEX-a ¾"	1000 ft	110	50
CALPEX-R-1-100A	PEX-a 1"	100 ft	17.9	8.1
CALPEX-R-114-100A	PEX-a 1¼"	100 ft	25.3	11.5
CALPEX-R-112-100A	PEX-a 1½"	100 ft	35	15.9
CALPEX-R-2-100A	PEX-a 2"	100 ft	60	27.2

#### STRAIGHT LENGTH

Model#	Decerinti	Weight		
MUUEI#	Descriptio	lb	kg	
CALPEX-R-1-20AS	PEX-a 1"	20 ft	3.5	1.59
CALPEX-R-114-20AS	PEX-a 1¼"	20 ft	5.25	2.38
CALPEX-R-112-20AS	PEX-a 1½"	20 ft	7.3	3.3
CALPEX-R-2-20AS	PEX-a 2"	20 ft	11.9	5.4

CALPEX-R tubing is extremely flexible and durable, so you can create tight crimping angles by simply applying minimal pressure.

# PEX-A TUBING Calpex-R

Calefactio reticulated polyethylene tubing's (PEX-a) are built with an anti-oxygen barrier that limits oxygen diffusion in the system to protect its components





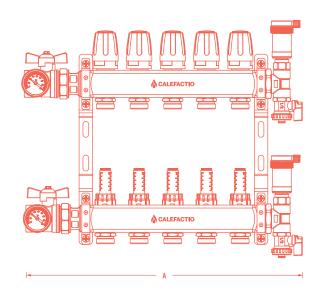
# MANIFOLD Caltherm Pro

Our stainless steel manifold kit comes with 1 in connection.



#### **TECHNICAL DATA**

- Headers with 1" connection
- Made of 304 stainless steel
- Pre-assembled on wall support
- Integrated flowmeters (5 LPM / 1.3 GPM per loop)
- Maximum pressure: 125 psi / 862 kPa
- Maximum temperature: 230°F / 110°C
- Provided with air purger and drain
- Compatible with Calefactio 24 volt actuator (#AC24NC)
- Compatible with glycol used for heating (50% glycol, 50% water)
- Possibility to isolate each loop with isolating valve and balancing valve
- 2-way NPT ball valve with integrated thermometer



Calefactio's stainless steel manifold kit is delivered pre-assembled and ready to install. Headers are offered in 11 models (2 to 12 loops) with a maximum flow rate of 15.6 gallons per minute (GPM).

The integrated flowmeters allow the user to adjust the flow easily in each loop. Circuit isolation valves are also compatible with 24V actuators from Calefactio (#AC24VNC).



Model#	Loops	Maximu	ım Flow	Length (A)		Weight		
Model#	Lo	LPM	GPM	in	mm	lb	kg	
MAN2-SS100	2	10	2.6	10	254	7.9	3.6	
MAN3-SS100	3	15	3.9	12	304	9.0	4.1	
MAN4-SS100	4	20	5.2	14	354	9.9	4.5	
MAN5-SS100	5	25	6.5	16	404	11.0	5.0	
MAN6-SS100	6	30	7.8	17¾	454	12.1	5.5	
MAN7-SS100	7	35	9.1	19¾	504	13.2	6.0	
MAN8-SS100	8	40	10.4	21¾	554	14.1	6.4	
MAN9-SS100	9	45	11.7	23¾	604	15.0	6.8	
MAN10-SS100	10	50	13.0	25¾	654	16.1	7.3	
MAN11-SS100	11	55	14.3	27¾	704	17.2	7.8	
MAN12-SS100	12	60	15.6	29¾	754	18.1	8.2	

# MANIFOLD – Caltherm Mega –

Our stainless steel manifold kit comes with 1 ½" connection but it is also available in 1 ¼" connection.

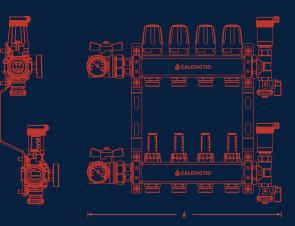
Calefactio's stainless steel manifold kit is delivered pre-assembled and ready to install. Headers are offered in 9 models (2 to 12 loops) with a maximum flow rate of 25.2 gallons per minute (GPM).

The integrated flowmeters allow the user to adjust the flow easily in each loop. Circuit isolation valves are also compatible with 24V actuators from Calefactio (#AC24VNC).



#### **TECHNICAL DATA**

- Headers with 1 1⁄4" or 1 1⁄2" connections
- Made of 304 stainless steel
- Preassembled on wall support
- Integrated flowmeters (7.9 LPM / 2.1 GPM per loop)
- Maximum pressure: 125 psi/862 kPa
- Maximum temperature: 230°F / 110°C
- Provided with air purger and drain
- Compatible with Calefactio 24 volt actuator (#AC24NC)
- Compatible with glycol used for heating (50% glycol, 50% water)
- Possibility to isolate each loop with isolating valve and balancing valve
- 2-way NPT ball valve with integrated thermometer



1¼" Connection*	Loops	Maximum Flow		Length (A)		Weight	
Model#	Ē	LPM	GPM	in	mm	lb	kg
MAN2-M150SS-BV125	2	15.9	4.2	113⁄8	289	12.4	5.6
MAN4-M150SS-BV125	4	31.8	8.4	155⁄16	389	14.8	6.7
MAN6-M150SS-BV125	6	47.7	12.6	19¼	489	17.2	7.8
MAN7-M150SS-BV125	7	55.3	14.7	21¼	539	18.4	8.3
MAN8-M150SS-BV125	8	63.6	16.8	23 <sup>3</sup> ⁄16	589	19.6	8.9
MAN9-M150SS-BV125	9	71.5	18.9	25½	639	23.0	10.4
MAN10-M150SS-BV125	10	79.5	21.0	273⁄8	689	20.8	9.4
MAN11-M150SS-BV125	11	87.4	23.1	29½	739	23.0	10.4
MAN12-M150SS-BV125	12	95.4	25.2	311⁄16	789	24.2	11.0

1½" Connection <sup>*</sup>		Maximum Flow		Length (A)		Weight	
Model#	Loops	LPM	GPM	in	mm	lb	
MAN2-M150SS-BV150	2	15.9	4.2	113⁄8	289	13.6	6.2
MAN4-M150SS-BV150	4	31.8	8.4	155⁄16	389	16.0	7.3
MAN6-M150SS-BV150	6	47.7	12.6	19¼	489	18.4	8.3
MAN7-M150SS-BV150	7	55.3	14.7	21¼	539	19.6	8.9
MAN8-M150SS-BV150	8	63.6	16.8	23 <sup>3</sup> ⁄16	589	20.8	9.4
MAN9-M150SS-BV150	9	71.5	18.9	25½	639	22.0	10.0
MAN10-M150SS-BV150	10	79.5	21.0	27¾	689	23.0	10.4
MAN11-M150SS-BV150	11	87.4	23.1	29½	739	24.2	11.0
MAN12-M150SS-BV150	12	95.4	25.2	311/16	789	25.4	11.5

\* Caltherm Mega's body is offered in 1 % in. BV125 suffix means that it is connected to the system through a 1 % in ball valve while suffix BV150 is connected to the system through a 1 % in ball valve.

# FITTINGS and Rings

Our compression fittings and our F1960 cold expansion fittings are made of brass, for increased durability.



#### **TECHNICAL DATA**

- Material: Brass
- O-Ring: Buna-N
- Type de connexion: 3/4" BSPP
- Maximum temperature: 200°F (93°C)
- Maximum pressure: 160 psi (11 bar)





#### OUR FITTINGS ARE MADE WITH ACCORDING TO ASTM F1960 AND ASTM F877.

#### FITTINGS AND COLD EXPANSION CRIMP RINGS F1960

The cold expansion ring is made of PEX-a just like our tubing Calpex-R to offer a permanent tightest without welding. Our fittings are made with according to ANSI/NSF 14, ANSI/NSF 61, ASTM F1960 and CSA B137.5.

#### **TECHNICAL DATA**

- Use with cold expansion crimp rings F1960
- Material: Crosslinked polyethylene (PEX-a)
- Maximum temperature: 200°F (93°C)

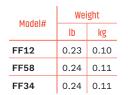
Model#	0.000	Weig	ht	
MUUUU#	Conn.	lb	g	
CPR12	1⁄2"	0.0044	2	
CPR58	<sup>5</sup> ⁄8"	0.0066	3	
CPR34	3⁄4"	0.0088	4.5	
CPR1	1"	0.011	5	Cold expansion crimp rings F1960



fittings F1960

#### TECHNICAL DATA

- Material: Brass
- O-Ring: Buna-N
- Type de connexion: 34" BSPP
- Maximum temperature: 200°F (93°C)
- Maximum pressure: 160 psi (11 bar)



## **ELBOWS AND** MOUNTING CLIPS **EXCLUSIVE AT CALEFACTIO**

Due to our rigid PVC elbows and our polyethylene mounting clips, you'll be organizing your tubing in no time, just like the pros.

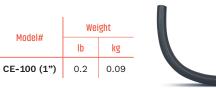
#### **ADVANTAGES**

- Allows modular and directional installation of elbows
- Offers great flexibility when aligning your pipes
- Quick and easy installation on nailing base
- For a professional look and feel
- Space saving
- No special tools required
- Can be used for residential or commercial projects

### **ELBOW**

#### **TECHNICAL DATA**

- Made in PVC
- 1 elbow per package
- Use with PEX-a tubing 1/2" and 3/4"
- Can be installed with Calefactio's mounting clips (#CE-100CLIP)



Unlike the competition, Calefactio's mounting clips allow a modular installation and directional installation. In addition, 90° elbows prevent PEX-a tubing from bending and/or crack under the concrete floor.

#### **TECHNICAL DATA**

- Made in polyethylene
- Box of 15 clips, screws included (#8, 11/4")
- Can be installed with Calefactio's elbow (#CE-100)





# PREASSEMBLED COMPLETE MANIFOLD CABINETS

## cal-pannel-pro

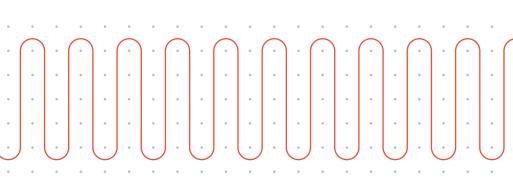
Calefactio's preassembled complete manifold cabinets are factory tested and allow different configurations.

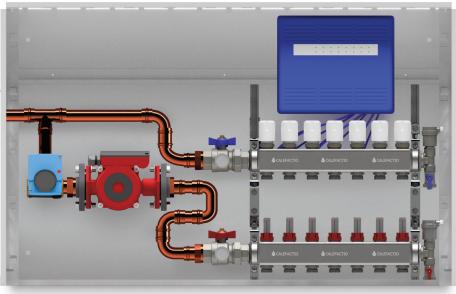
#### **TECHNICAL DATA**

- Installation inside walls between 4 in and 6 in deep
- Safety lock
- Screws and safety lock nuts included
- Door, frame and housing made of 18 gauge steel
- Model #MWC52SS made of 18 gauge SS304 stainless steel
- Covered with a white baked paint
- Adjustable door frame

#### FEATURES

- With or without pump
- With or without actuators
- With or without 3-way valve (0-10 volts or 24 volts floating)





## **ELECTROTHERMIC ACTUATOR 24V** FOR CALEFACTIO MANIFOLDS

When there are multiple thermostats connected to one manifold, then it's essential to use actuators to control the distribution flow in the loops according to the thermostat demands. With this, you will be able to manage the temperature of each zone independently.

Weight

#### **TECHNICAL DATA**

- Type of movement: linear movement
- Maximum actuator stroke: 3.5 mm
- Working stroke on valve: 2.5 mm
- Rated voltage: 24 V (+10% / -15%)
- Frequency: 60 Hz
- Power consumption: 2.0 W-24 V (continuous duty)
- Version: NC (normally closed), 2-wire
- Time to open/close: ~ 90-120 seconds
- Protection degree: IP54 according to EN 60529
- Electrical protection class: Class II
- Connecting cable: length 1 m 2 × 2.0 mm<sup>2</sup>
- Ambient temperature range: 0°C up to 50°C during use
- Storage temperature range: -25°C up to 60°C
- Mechanical connection: threaded ring nut M30 × 1.5



## ACCESSORIES

#### **Pression Differential By-Pass Valves**

Model#		Description	We	ight	
	MUUEI#	Description	lb	kg	
	PDBV075N	¾"NPT, adjustable pressure	0.8	0.36	
	PDBV100	1", fixed pressure	1.4	0.7	C

PDBV100

Union Weight Model# Description lb kg CM150 Coupling manifold 0.38 0.17



PDBV075N

#### **Repair Fitting**

Мо	Model#	Description	Wei		
	MUUEI#	Description	lb	kg	
	CG075	G ¾" Connection	0.11	0.049	



#### Plug Weight Model# Description lb kg PLUG-G075 G <sup>3</sup>/<sub>4</sub>" Connection 0.08 0.04

#### **PEX Cutter**

Model#

CUTTER For PEX tubing until 1"

Description



#### **Zone Controller**

Model#	Description	Weight			
MUUEI#	Description	lb	kg		
CTR-24V	24V	1.6	0.58		



10



Actuator

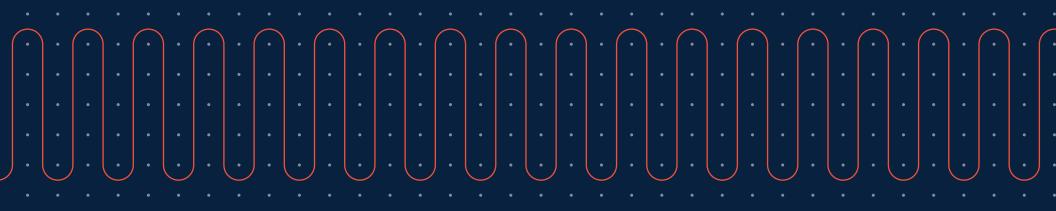
Model#	Connection	Weight			
Model#	Connection	lb	kg		
AC24NC	<sup>3</sup> ⁄ <sub>4</sub> " × <sup>1</sup> ⁄ <sub>2</sub> "	0.44	0.2		

## CABINET

Model#					Donth			
MUUEI#	LPM	GPM	in	mm	Depth	lb	kg	
MWC24	640	25¼	600	24		23.4	10.6	
MWC32	640	25¼	800	32	110 to 150 mm	30.0	13.6	
MWC40	640	25¼	1000	40	43⁄8 to 6 in	35.3	16.0	
MWC52SS*	640	25¼	1320	52		43.4	19.7	
*Door and frame in 18 gage stainless steel (SS304).								

Height Width





Quebec, Canada T (450) 951-0818 F (450) 951-2165

CALEFACTIO RADIANT.COM