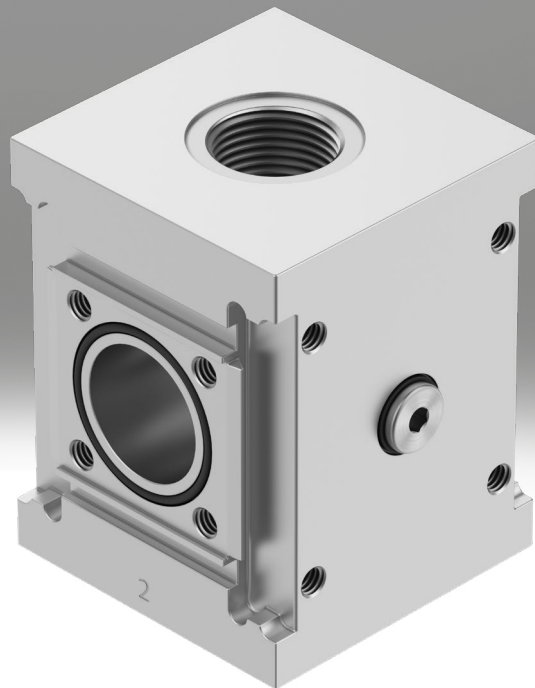


## Branching module PMBL

**FESTO**



## Characteristics

### At a glance

Air distributors for high-pressure applications with various connections.

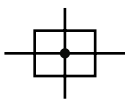
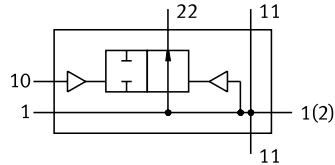
- Sizes: 90 mm, 186 mm
- Can be used as an intermediate distributor for varying compressed air qualities
- Support for additional modules

Outlets PMBL-90-HP3: Female thread G1 at the top and bottom; female thread G1/4 at the rear and front (behind cover plate), closed with blanking plug.

Outlets PMBL-90-HP3-E: Female thread G1 at the top, rear and bottom (exhaust connection); female thread G1/4 at the front (behind cover plate), closed with blanking plug.

Outlets PMBL-186-HP3-H: Female thread G1 at the top, bottom and front; female thread G1/4 at the front (2x) and rear.

### Additional function

[ ] None	[E] Pneumatically actuated exhaust
	

## Type code

001	Series
<b>PMBL</b>	Branching module

002	Size
<b>90</b>	90 mm
<b>186</b>	186 mm

003	Pressure application range
<b>HP3</b>	Up to 50 bar

004	Additional function
	None
<b>E</b>	Pneumatically actuated exhaust

005	Width
	Standard
<b>H</b>	Halfwidth

## Datasheet

### General technical data

Size	90		186
Additional function	None <input type="checkbox"/>	Pneumatically actuated exhaust [E]	None <input type="checkbox"/>
Nominal size DN	36		54
Pneumatic connection, port 3	G1	–	G1
Pneumatic connection, port 4	–	G1	–
Pneumatic connection, port 11	–	G1/4	–
Pilot air port 10	–	G1	–
Design	Branching module		
Type of mounting	In-line installation		
Mounting position	optional		

### Operating and environmental conditions

Size	90		186
Additional function	None <input type="checkbox"/>	Pneumatically actuated exhaust [E]	None <input type="checkbox"/>
Operating pressure	0 ... 5 MPa		
Operating pressure	0 ... 50 bar		
Pilot pressure	–	0 ... 50 bar	–
Operating medium	Compressed air to ISO 8573-1:2010 [:-:-]	Compressed air to ISO 8573-1:2010 [7:4:4]	Compressed air to ISO 8573-1:2010 [:-:-]
Note on operating and pilot medium	Lubricated operation not possible		
Ambient temperature	5 ... 60°C		
Media temperature	5 ... 60°C		
Storage temperature	-10 ... 60°C		
Corrosion resistance class KBK <sup>1)</sup>	2 - Moderate corrosion stress		
CE mark (see declaration of conformity) <sup>2)</sup>	In accordance with EU Pressure Equipment Directive		
UKCA marking (see declaration of conformity) <sup>3)</sup>	to UK Pressure Equipment Regulations		
Suitable for use with food <sup>4)</sup>	See supplementary material information		

1) More information [www.festo.com/x/topic/crc](http://www.festo.com/x/topic/crc)

2) More information: [www.festo.com/catalogue/pmb1](http://www.festo.com/catalogue/pmb1) → Downloads.

3) More information: [www.festo.com/catalogue/pmb1](http://www.festo.com/catalogue/pmb1) → Downloads.

4) More information: [www.festo.com/catalogue/pmb1](http://www.festo.com/catalogue/pmb1) → Downloads.

### Characteristic flow rate values

Size	90		186
Additional function	None <input type="checkbox"/>	Pneumatically actuated exhaust [E]	None <input type="checkbox"/>
Standard nominal flow rate in main flow direction 1->2 <sup>1)</sup>	49,000 l/min		117,240 l/min
Standard nominal flow rate for exhaust <sup>1)</sup>	–	13,000 l/min	–

1) Measured at p1 = 6 bar and p2 = 5 bar, Δp = 1 bar

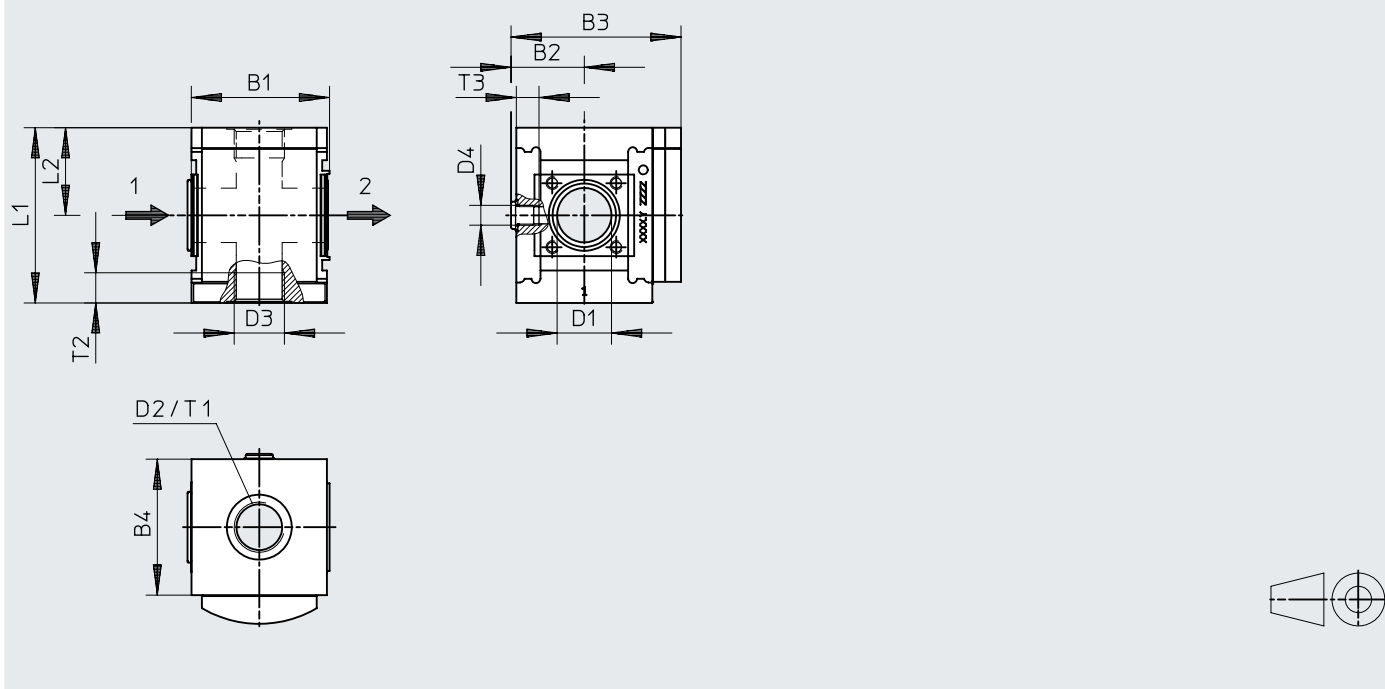
### Materials

Size	90		186
Additional function	None <input type="checkbox"/>	Pneumatically actuated exhaust [E]	None <input type="checkbox"/>
Material housing	Wrought aluminium alloy		
Material seals	NBR	NBR, PE	NBR
Note on materials	RoHS-compliant		
LABS (PWIS) conformity	VDMA24364 zone III		

## Dimensions

### Dimensions – PMBL-90-HP3

Download CAD data [www.festo.com](http://www.festo.com)

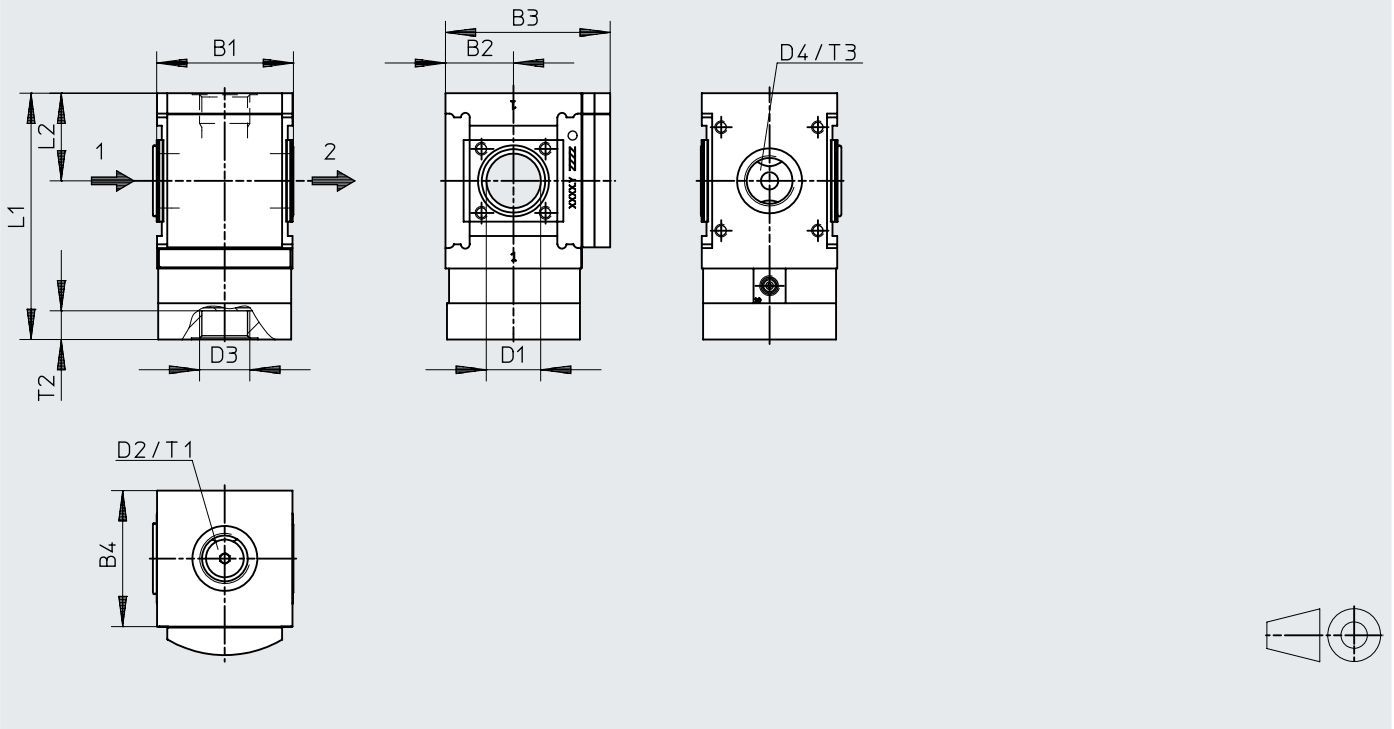


	B1	B2	B3	B4	D1 ∅	D2	D3	D4	L1	L2	T1	T2	T3
PMBL-90-HP3	~92	~49	~113	90	36	G1	G1	G1/4	116	58	20	20	15

## Dimensions

Dimensions – PMBL-90-HP3-E

Download CAD data [www.festo.com](http://www.festo.com)

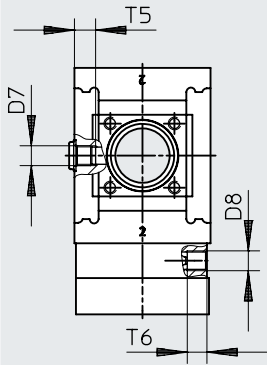


	B1	B2	B3	B4	D1 ∅	D2	D3	D4	D7	D8	L1	L2	T1	T2	T3	T5	T6
PMBL-90-HP3-E	90	45	109	90	36	G1	G1	G1	G1/4	G1/4	163	58	20	19	20	14	13

## Dimensions

Dimensions – PMBL-90-HP3-E, shown without cover plate

Download CAD data [www.festo.com](http://www.festo.com)

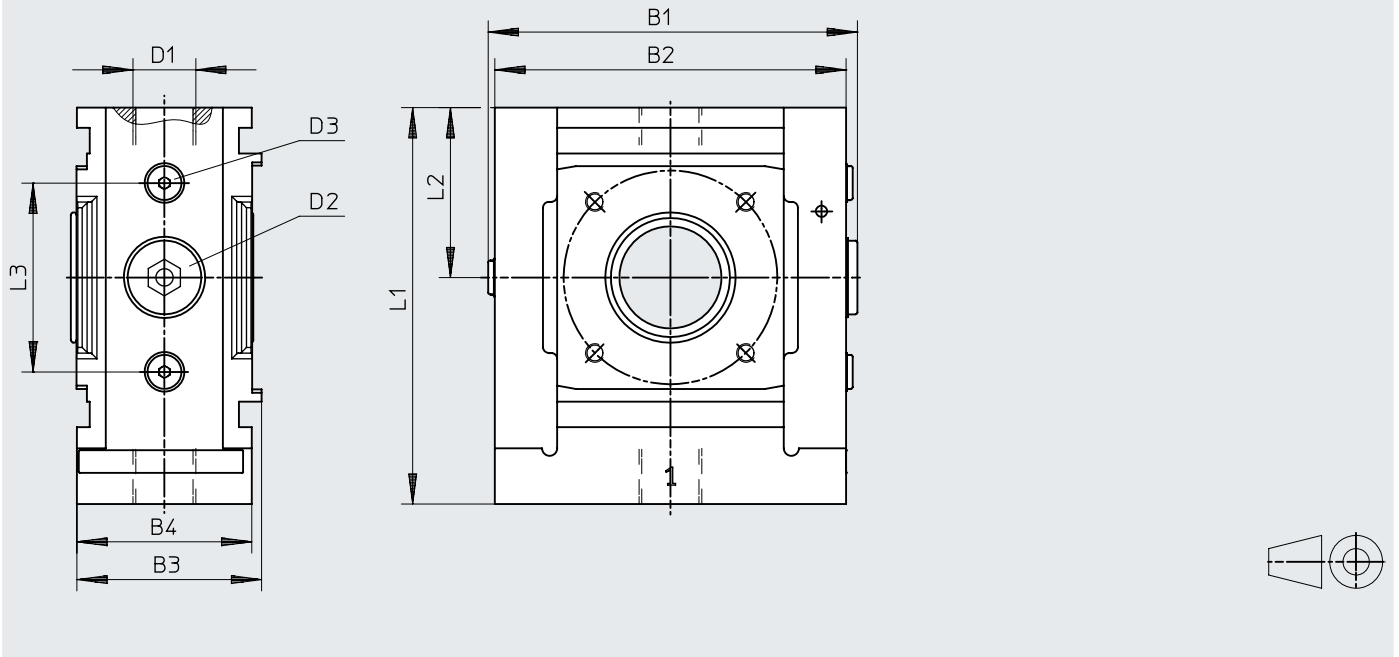


	D7	D8	T5	T6
PMBL-90-HP3-E	G1/4	G1/4	14	13

## Dimensions

### Dimensions – PMBL-186-HP3-H

Download CAD data [www.festo.com](http://www.festo.com)



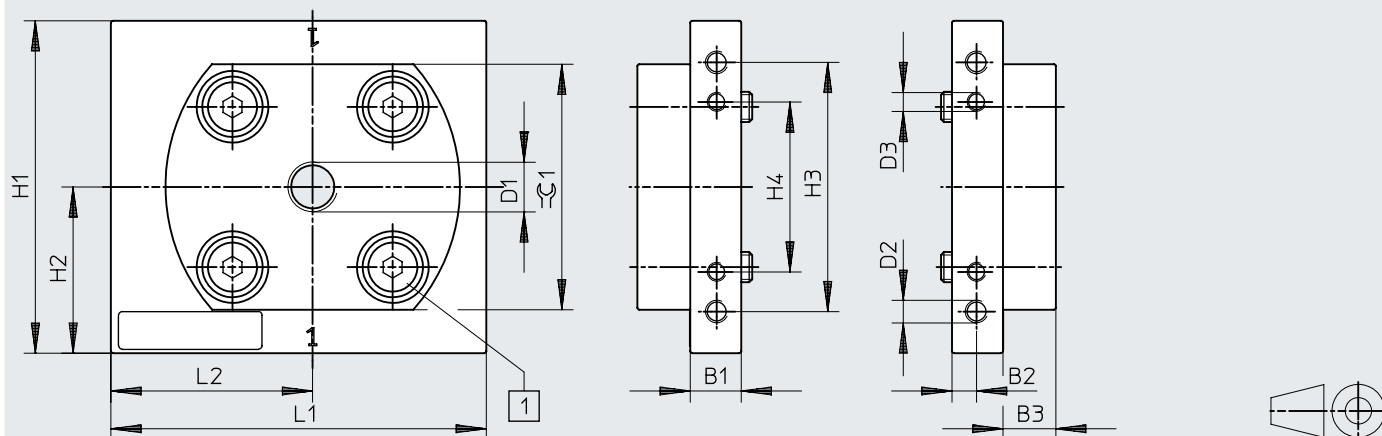
	B1	B2	B3	B4	D1	D2	D3	L1	L2	L3
PMBL-186-HP3-H	196	186	98	93	G1	G1	G1/4	210	90	100



## Dimensions

Dimensions – Connecting plate PAML-CP-90-HP3-G14/G12/G34/G1

Download CAD data [www.festo.com](http://www.festo.com)



[1] Cylinder screw M8x25

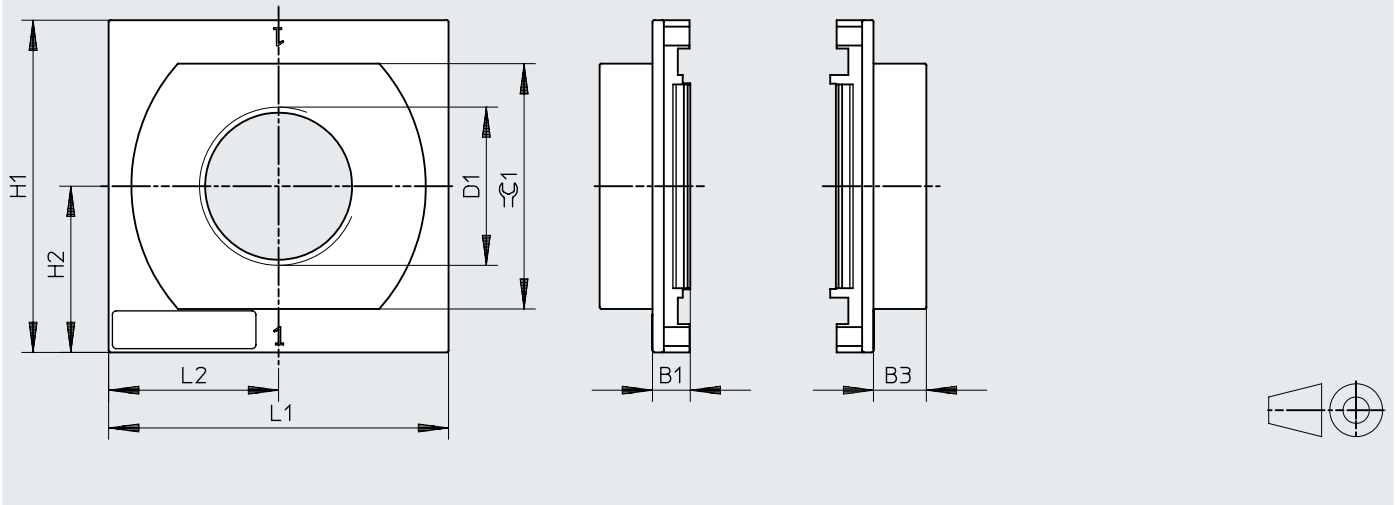
	B1	B2	B3	D1	D2 <sup>1)</sup>	D3	H1	H2	H3	H4	L1	L2	±0.1
PAML-CP-90-HP3-G14	13,5	6,5	14	G1/4	M6x10	M5x9	88	44	66	45	~99	~53	65
PAML-CP-90-HP3-G14				G1/2									
PAML-CP-90-HP3-G14				G3/4									
PAML-CP-90-HP3-G14				G1									

1) Thread for mounting the service unit component on a wall without mounting bracket

## Dimensions

Dimensions – Connecting plate PAML-CP-90-HP3-G114

Download CAD data [www.festo.com](http://www.festo.com)

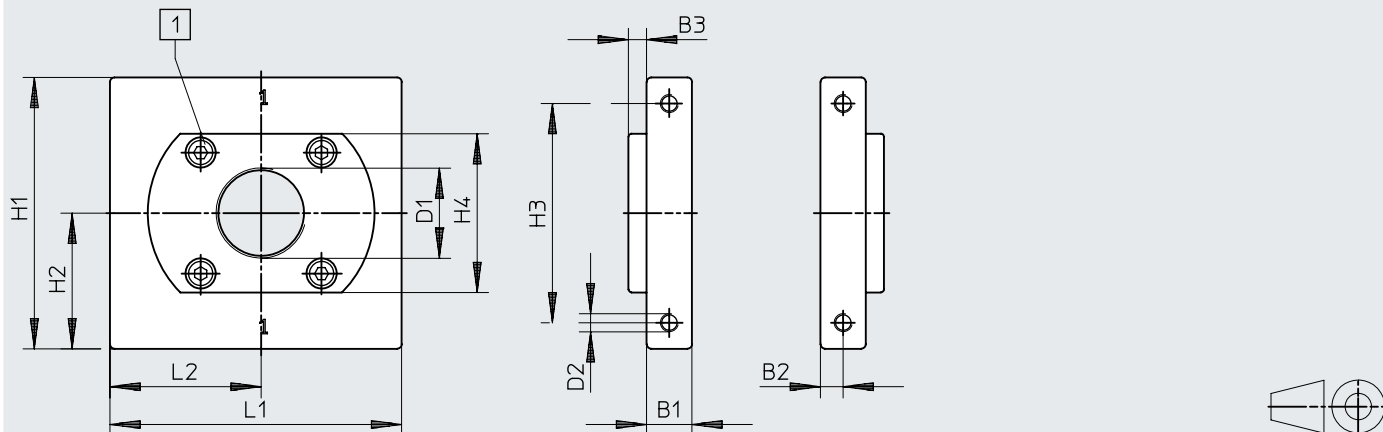


	B1	B3	D1	D3	H1	H2	L1	L2	±0.1
PAML-CP-90-HP3-G114	10	14	G1 1/4	M5x9	88	44	90	45	65

## Dimensions

### Dimensions – Connecting plate PAML-CP-186

Download CAD data [www.festo.com](http://www.festo.com)



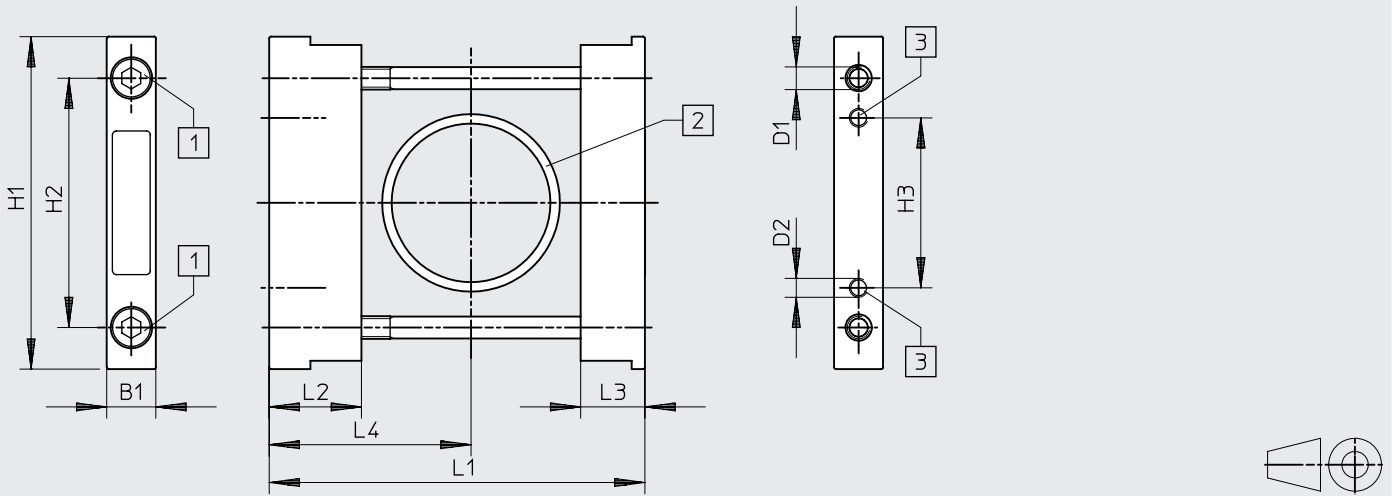
[1] Cylinder screw M10x30

	B1	B2	B3	D1	D2	H1	H2	H3	H4	L1	L2
PAML-CP-186-HP3-G14	30	15	12	G1/4	M12	180	90	145	105	193	100
PAML-CP-186-HP3-G114				G1 1/4							
PAML-CP-186-HP3-G112				G1 1/2							
PAML-CP-186-HP3-G2				G2							
PAML-CP-186-HP3-G212			25	G2 1/2							

## Dimensions

### Dimensions – Mounting bracket PAML-MK

Download CAD data [www.festo.com](http://www.festo.com)



- [1] Cylinder screw M6x85
- [2] O-ring 42x2.5
- [3] Thread for mounting the service unit component on a wall

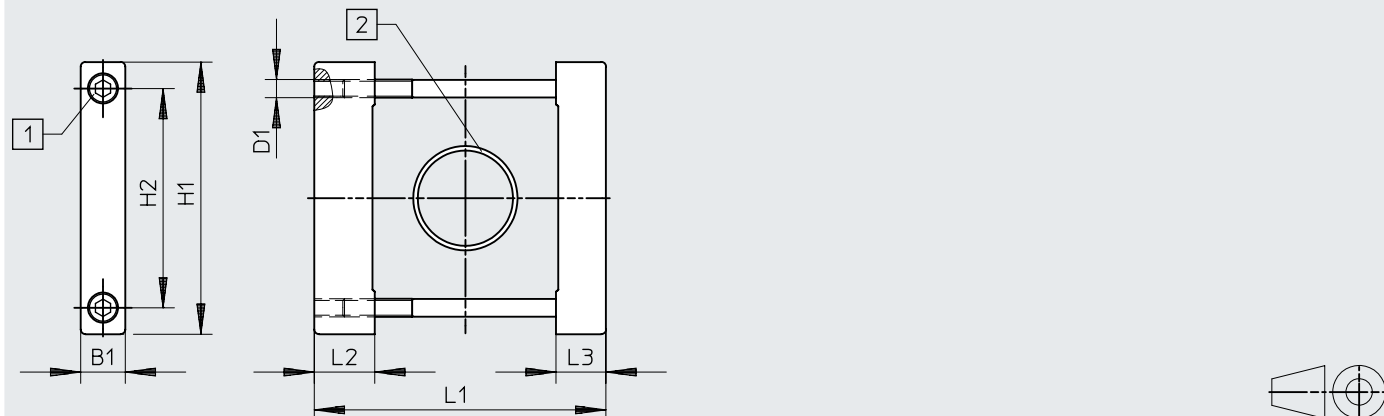
	B1	D1	D2	H1	H2	H3	L1 <sup>1)</sup>	L2	L3	L4 <sup>1)</sup>
PAML-MK-90-HP3	13	M6	M5x9	88	66	45	99	24,4	17	~53

1) Dimension when mounted

## Dimensions

### Dimensions – Mounting bracket PAML-MK-186

Download CAD data [www.festo.com](http://www.festo.com)



[1] Cylinder screw M12x160

[2] O-ring 63x3

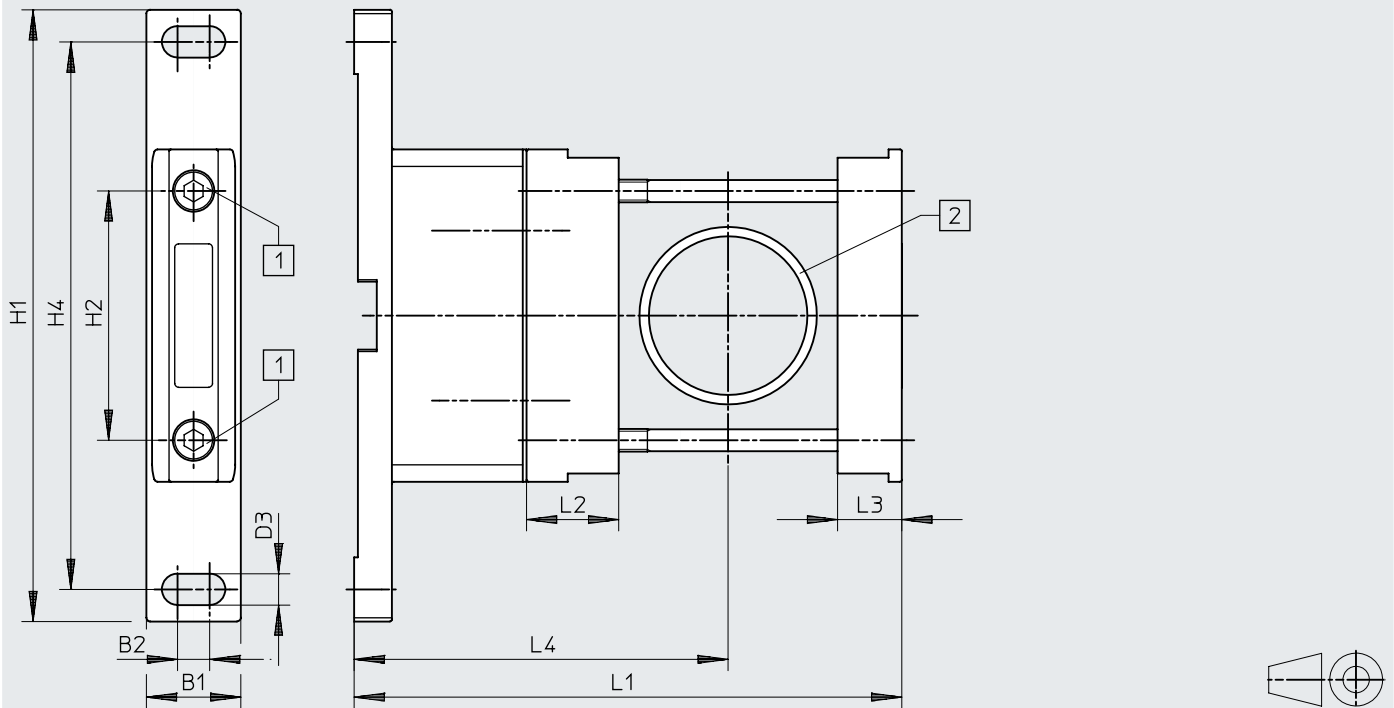
	B1	D1	H1	H2	L1 <sup>1)</sup>	L2	L3
PAML-MK-186-HP3	29,5	M12	180	145	193	40	33

1) Dimension when mounted

## Dimensions

### Dimensions – Module connector PAML-MB

Download CAD data [www.festo.com](http://www.festo.com)



- [1] Cylinder screw M5x18
- [2] O-ring 42x2.5

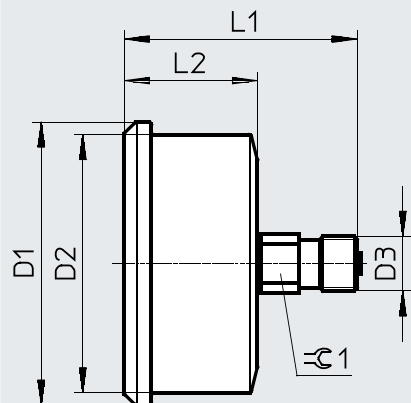
	B1	B2	D3	H1	H2	H4	L1 <sup>1)</sup>	L2	L3	L4 <sup>1)</sup>
PAML-MB-90-HP3	25	8,5	8,3	162	66	145	~145	24,4	17	~99

1) Dimension when mounted

## Dimensions

Dimensions – Pressure gauge PAGL-HP3-63-60-G14

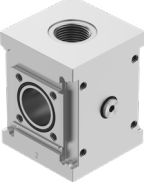
Download CAD data [www.festo.com](http://www.festo.com)



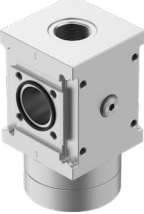
	D1	D2	D3	L1	L2	⌀ 1
	∅	∅		±0,5	±0,5	
PAGL-HP3-63-60-G14	68	62	G1/4	56	32	14

Ordering data


Ordering data – PMBL-90-HP3

	Size	Design	Additional function	Product weight	Part no.	Type
	90	Branching module	None	2,000 g	<b>1401366</b>	<b>PMBL-90-HP3</b>

Ordering data – PMBL-90-HP3-E

	Size	Design	Additional function	Product weight	Part no.	Type
	90	Branching module	Pneumatically actuated exhaust	2,600 g	<b>2663892</b>	<b>PMBL-90-HP3-E</b>

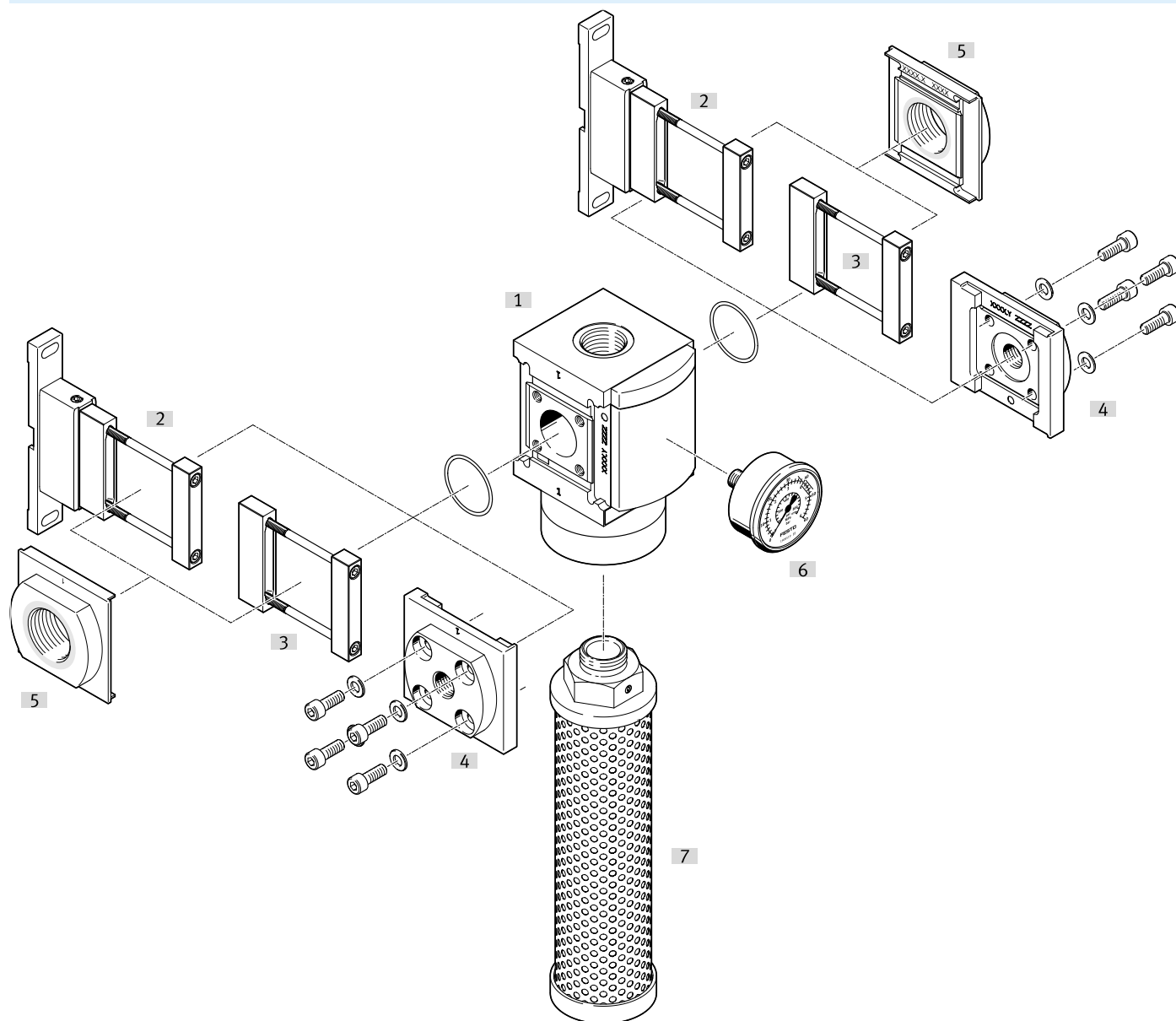
Ordering data – PMBL-186-HP3-H

	Size	Design	Additional function	Product weight	Part no.	Type
	186	Branching module	None	7,500 g	<b>1609073</b>	<b>PMBL-186-HP3-H</b>



## Peripherals

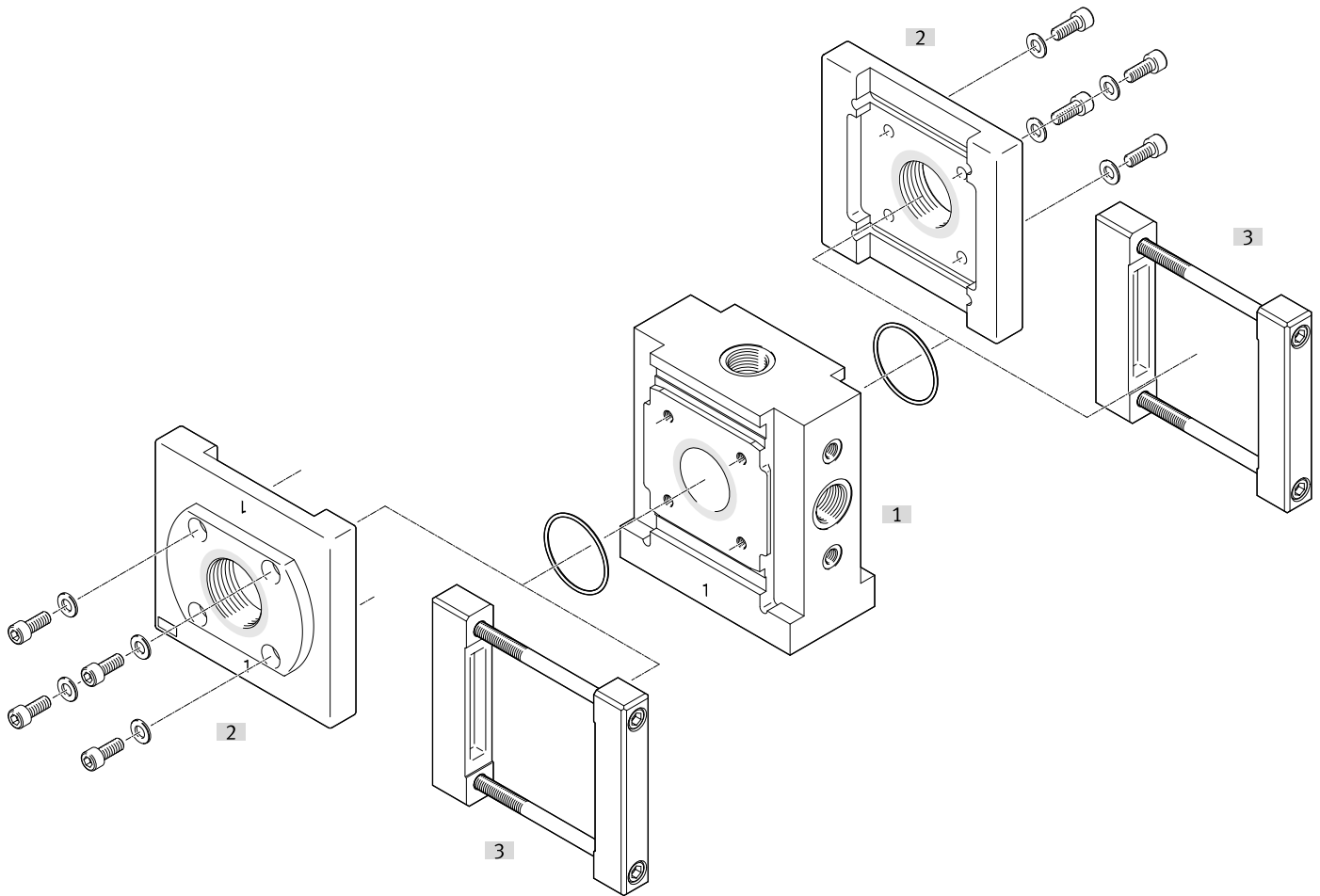
Size 90



Accessories		→ Link
Type/order code	Description	
[1]	Branching modules PMBL	<a href="#">pmb1</a>
[2]	Sub-bases PAML-CP...-G14/G12/G34/G1	<a href="#">19</a>
[3]	Module connector PAML-MK	<a href="#">19</a>
[4]	Mounting bracket PAML-MB	<a href="#">19</a>
[5]	Sub-bases PAML-CP...-G114	<a href="#">19</a>
[6]	Pressure gauge PAGL	<a href="#">19</a>
[7]	Silencer U-G1-HD-SA	On request


Peripherals


Size 186




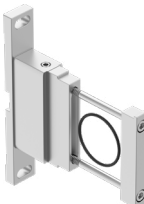
Accessories		→ Link
Type/order code	Description	
[1] Branching modules PMBL		<a href="#">pmb1</a>
[2] Connecting plate PAML-CP		<a href="#">19</a>
[3] Module connector PAML-MK		<a href="#">19</a>

## Accessories

Pressure gauge PAGL						
	Nominal size of pressure gauge	Pneumatic connection	Position of connection	Product weight	Part no.	Type
	63	G1/4	Radial underneath	80 g	1908519	PAGL-HP3-63-60-G14-RC
			Centred, rear side		1166938	PAGL-HP3-63-60-G14

Connecting plates PAML-CP						
	Size	Pneumatic connection, port 1	Pneumatic connection, port 2	Product weight	Part no.	Type
	90	G1/4	G1/4	800 g	1651540	PAML-CP-90-HP3-G14
		G1/2	G1/2	770 g	1651541	PAML-CP-90-HP3-G12
		G3/4	G3/4	750 g	1651542	PAML-CP-90-HP3-G34
		G1	G1	730 g	1651543	PAML-CP-90-HP3-G1
	186	G1 1/4	G1 1/4	500 g	1448978	PAML-CP-90-HP3-G114
		G1/4	G1/4	4,700 g	1629300	PAML-CP-186-HP3-G14
		G1 1/4	G1 1/4	4,600 g	1629296	PAML-CP-186-HP3-G114
		G1 1/2	G1 1/2	4,500 g	1629297	PAML-CP-186-HP3-G112
	G2	G2	4,400 g	1629298	PAML-CP-186-HP3-G2	
	G2 1/2	G2 1/2	4,900 g	1629299	PAML-CP-186-HP3-G212	

Module connector PAML-MK				
	Size	Product weight	Part no.	Type
	90	150 g	1367005	PAML-MK-90-HP3
	186	1,300 g	1629377	PAML-MK-186-HP3

Mounting bracket PAML-MB				
	Size	Product weight	Part no.	Type
	90	300 g	1367323	PAML-MB-90-HP3