EMMEGI®
HEAT-EXCHANGERS

Scambiatori a Piastre Saldobrasate

Brazed Plate Heat Exchangers

APPLICAZIONI:
APPLICATIONS:

Dove è possibile impiegare acqua per il raffreddamento dei fluidi di processo, gli scambiatori a piastre saldobrasate della gamma PB, si prestano come la soluzione di raffreddamento ottimale per svariate applicazioni industriali quali:

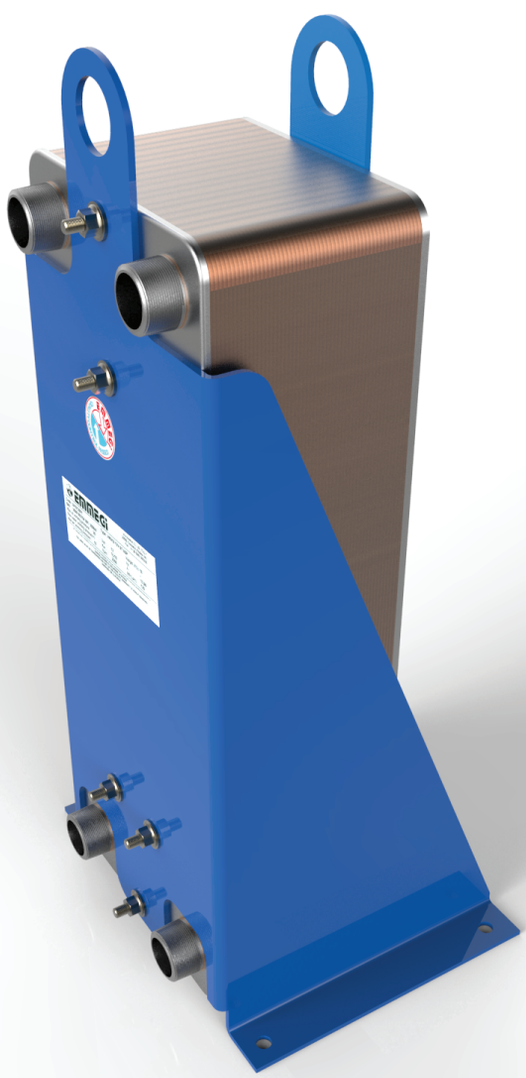
When water can be used to cool the process fluids, the PB range of heat exchangers with brazed plates are the optimal cooling solution for various industrial

Impianti oleodinamici.
Macchine utensili.
Altro su richiesta.

Hydraulic systems.
Machine tools.
Others on request.

Serie PB - *PB Series*

Modello *Model*
PB014
PB022
PB031
PB034
PB047
PB060
PB110
PB170



Scambiatori a Piastre Saldobrasate

Blazed Plate Heat Exchangers

Vantaggi degli scambiatori a piastre saldobrasate

- *Alto coefficiente di scambio termico;*
- *Dimensioni contenute con alte performance;*
- *Alta resistenza alla pressione e temperatura;*
- *Connessioni in AISI 321;*
- *Facile installazione;*

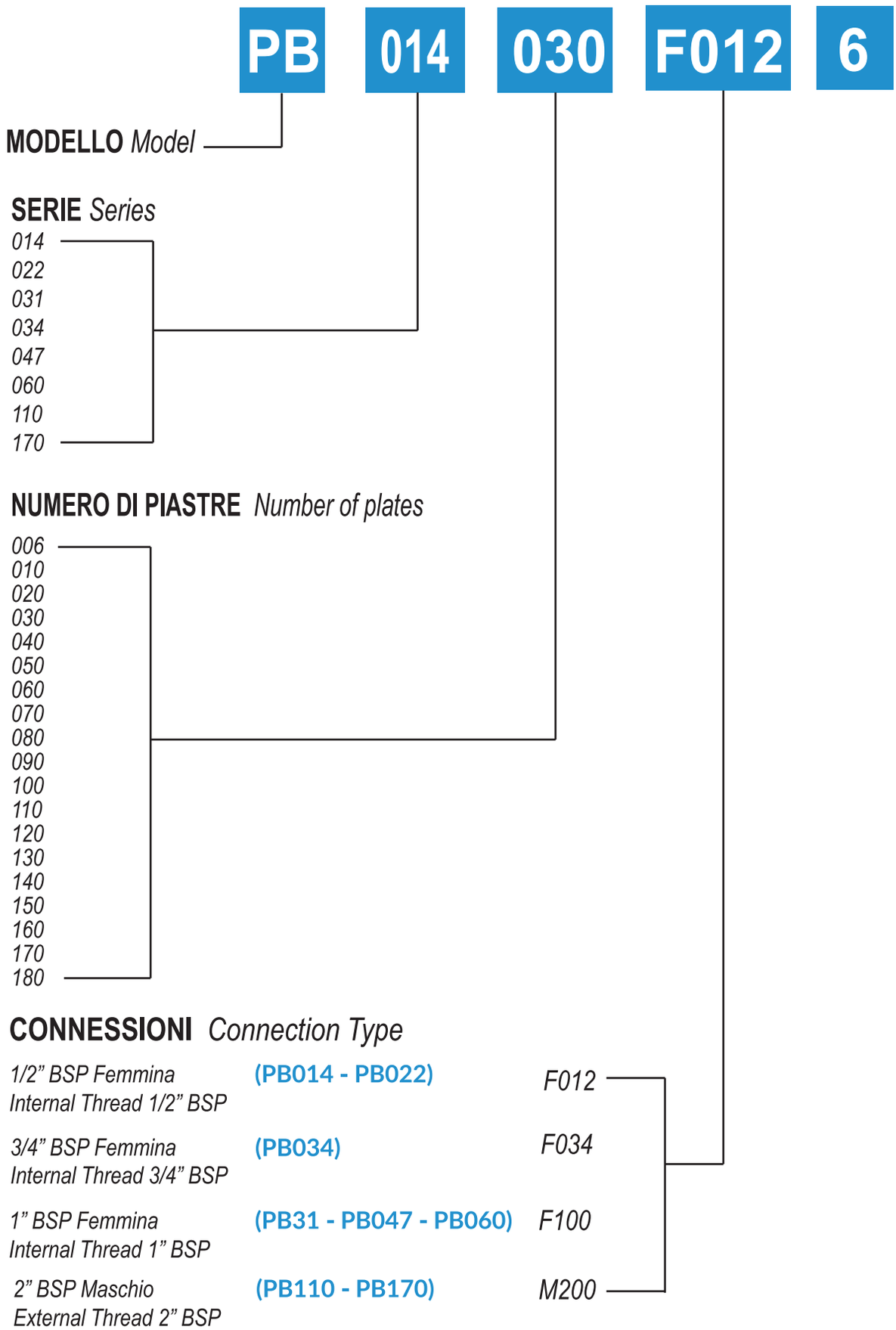
Gli scambiatori a piastre sono costituiti da piastre corrugate.
Le piastre sono ruotate di 180° l'una dall'altra al fine di creare un reticolo di canali intersecati.
I fluidi possono fluire sia in controcorrente che equicorrente.
Le piastre sono unite insieme tra loro con materiale brasante in speciali forni sottovuoto.
La speciale corrugazione permette al fluido di turbolare aumentando lo scambio termico e riducendo i depositi di sporco nelle piastre.

Advantages of Brazed Plate Heat Exchangers

- *High heat transfer coefficient;*
- *Small unit size with high heat transfer capacity;*
- *High resistance to pressure and temperature fluctuations;*
- *Stainless steel connections;*
- *Easy installation;*

Brazed plate heat exchangers consist of stainless steel plate packs, which have embossed chevron patterns.
The plates are turned 180°to each other, causing the plate ridges to intersect, and creating a lattice of intersecting channels. The fluids can flow in counter-current or co-current way.
The entire construction is sealed together by the means of brazing in a special vacuum furmace.
Special corrugation patterns promote high turbulence flow. Turbulence dramatically improves heat transfer rates and reduces the amount of deposits inside the unit.

Denominazione codice prodotto
Ordering code



PB Series

PB014

Dimensioni *Dimensions*

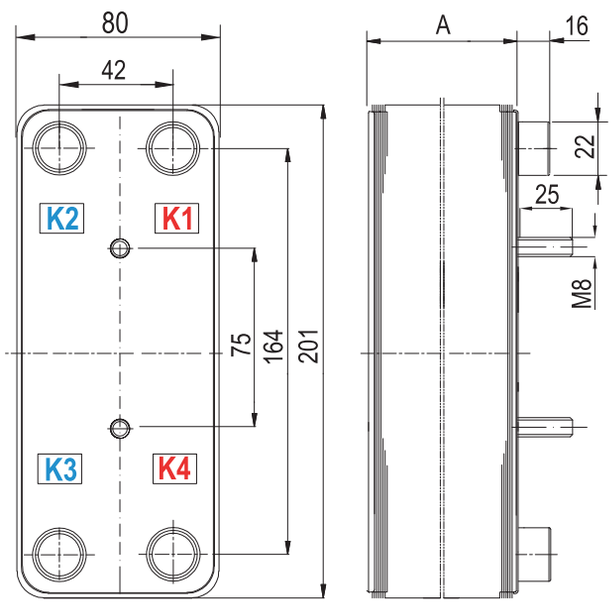
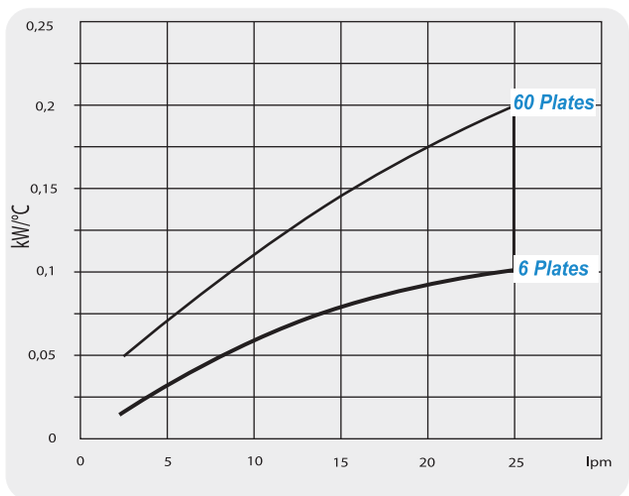


Diagramma rendimento *Performance diagram - ISO VG46 @50°C*



Rapporto portata olio/acqua 2:1 - flow ratio 2:1

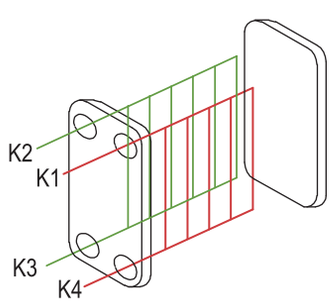
Per informazioni inerenti la perdita di carico contattare EMMEGI.
For pressure drop information please contact EMMEGI.

Collegamenti Standard Standard of Connection Location	Connessioni Connection Types
K1 / K4 - Ingresso/uscita caldo K1 / K4 - Inlet/Outlet Hot Side	G 1/2" Femmina Internal Thread G 1/2"
K3 / K2 - Ingresso/uscita freddo K3 / K2 - Inlet/Outlet Cold Side	G 1/2" Femmina Internal Thread G 1/2"

A richiesta connessioni speciali
Special connections on request

Condizioni di esercizio Working Conditions	
Massima Temperatura Max. Working Pressure	230°C
Minima Temperatura Min. Working Temperature	-10°C
Massima Pressione Max. Working Pressure	30 bar

Materiali Utilizzati Materials	
Piastre Plate	Aisi 316
Attacchi Connection	Aisi 316
Brasatura Brazing Material	Cu 99,95%



N° Piastre Plate No.	A (mm)	Peso (kg) Weight (kg)	Capacità per circuito Channel Volume (lt)
6	23	0.9	0.1
10	32	1.1	0.1
20	55	1.6	0.2
30	78	2.1	0.33
40	101	2.6	0.4
50	124	3.1	0.6
60	147	3.5	0.7

Le dimensioni di ingombro e le caratteristiche tecniche non sono impegnative
Overall dimensions and technical characteristic are not binding

Dimensioni *Dimensions*

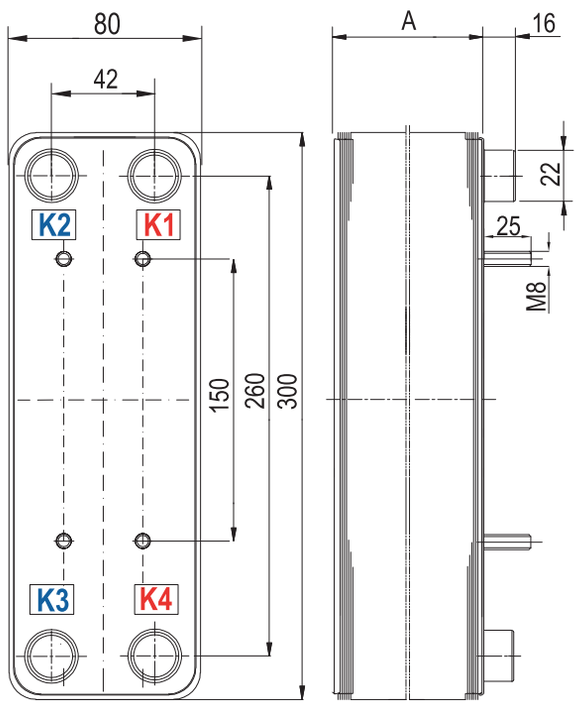
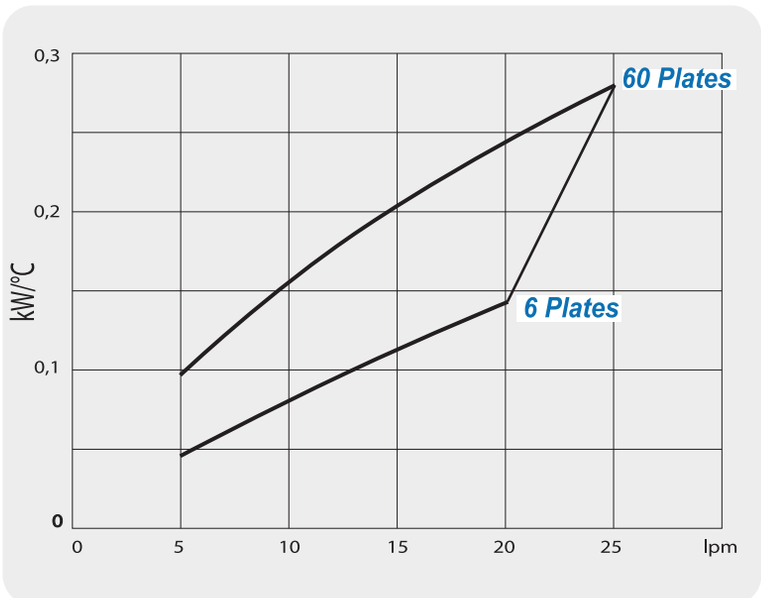


Diagramma rendimento *Performance diagram - ISO VG46 @50°C*

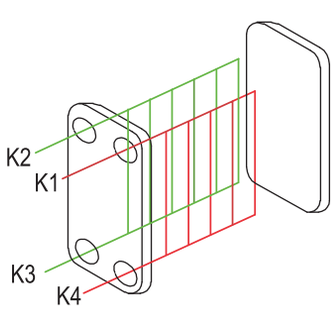


Rapporto portata olio/acqua 2:1 - flow ratio 2:1

Per informazioni inerenti la perdita di carico contattare EMMEGI.
For pressure drop information please contact EMMEGI.

Collegamenti Standard Standard of Connection Location	Connessioni Connection Types
K1 / K4 - Ingresso/uscita caldo **K1 / K4** - Inlet/Outlet Hot Side	G 1/2" Femmina Internal Thread G 1/2"
K3 / K2 - Ingresso/uscita freddo **K3 / K2** - Inlet/Outlet Cold Side	G 1/2" Femmina Internal Thread G 1/2"

A richiesta connessioni speciali
Special connections on request



Condizioni di esercizio Working Conditions	
Massima Temperatura Max. Working Pressure	230°C
Minima Temperatura Min. Working Temperature	-10°C
Massima Pressione Max. Working Pressure	30 bar

Materiali Utilizzati Materials	
Piastre Plate	Aisi 316
Attacchi Connection	Aisi 316
Brasatura Brazing Material	Cu 99,95%

N° Piastre Plate No.	A (mm)	Peso (kg) Weight (kg)	Capacità per circuito Channel Volume (lt)
6	23	1.2	0.1
10	32	1.5	0.2
20	55	2.3	0.4
30	78	3.0	0.5
40	101	3.7	0.7
50	124	4.5	0.9
60	147	5.2	1.1

Le dimensioni di ingombro e le caratteristiche tecniche non sono impegnative
Overall dimensions and technical characteristic are not binding

PB Series

PB031

Dimensioni *Dimensions*

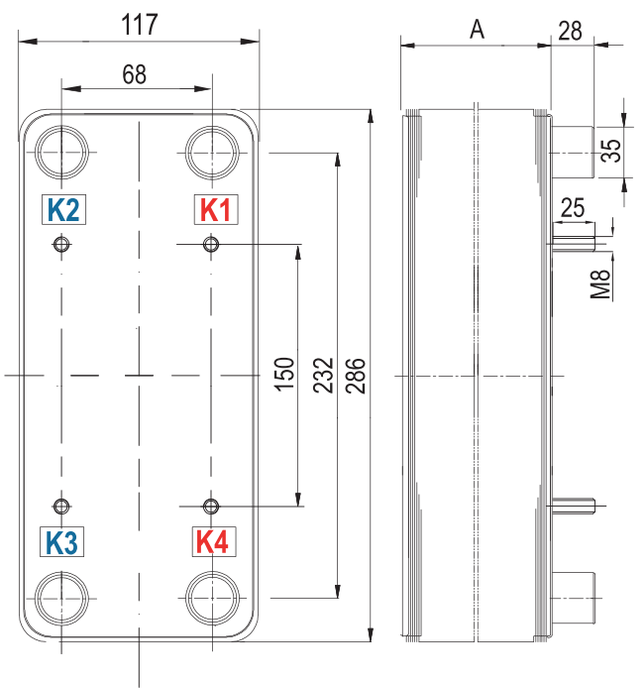
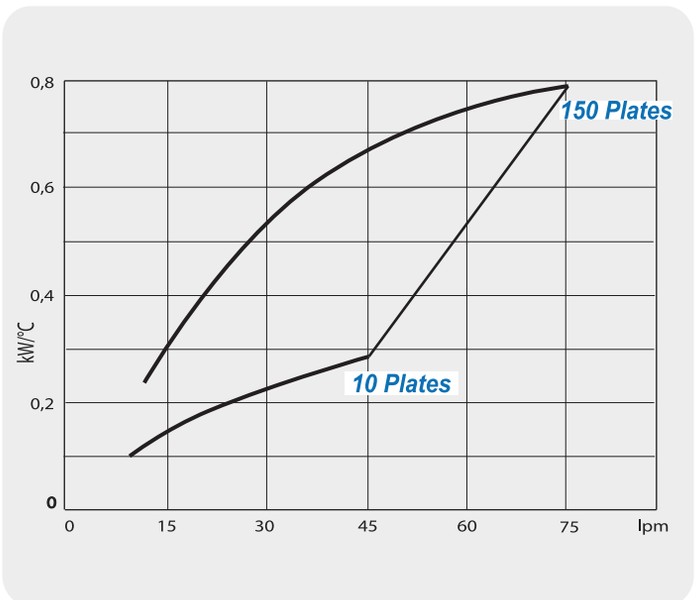


Diagramma rendimento *Performance diagram - ISO VG46 @50°C*



Rapporto portata olio/acqua 2:1 - flow ratio 2:1

Per informazioni inerenti la perdita di carico contattare EMMEGI.
For pressure drop information please contact EMMEGI.

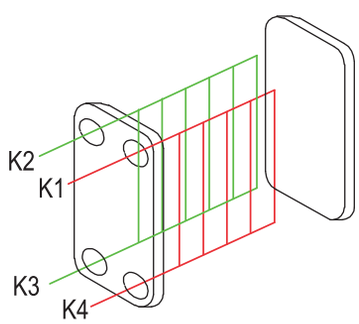
Collegamenti Standard Standard of Connection Location	Connessioni Connection Types
K1 / K4 - Ingresso/uscita caldo K1 / K4 - Inlet/Outlet Hot Side	G 1" Femmina Internal Thread G 1"
K3 / K2 - Ingresso/uscita freddo K3 / K2 - Inlet/Outlet Cold Side	G 1" Femmina Internal Thread G 1"

A richiesta connessioni speciali
Special connections on request

N° Piastre Plate No.	A (mm)	Peso (kg) Weight (kg)	Capacità per circuito Channel Volume (lt)
10	33	2.7	0.3
20	57	3.9	0.6
30	81	5.0	0.9
40	104	6.2	1.2
50	128	7.3	1.5
60	151	8.4	1.8
70	175	9.6	2.1
80	198	10.7	2.4
90	222	11.9	2.7
100	245	13.0	3.1
110	269	14.1	3.4
120	292	15.3	3.7
130	316	16.4	4.0
140	339	17.6	4.3
150	363	18.7	4.6

Condizioni di esercizio Working Conditions	
Massima Temperatura Max. Working Pressure	230°C
Minima Temperatura Min. Working Temperature	-10°C
Massima Pressione Max. Working Pressure	30 bar

Materiali Utilizzati Materials	
Piastre Plate	Aisi 316
Attacchi Connection	Aisi 316
Brasatura Brazing Material	Cu 99,95%



Le dimensioni di ingombro e le caratteristiche tecniche non sono impegnative
Overall dimensions and technical characteristic are not binding

Dimensioni *Dimensions*

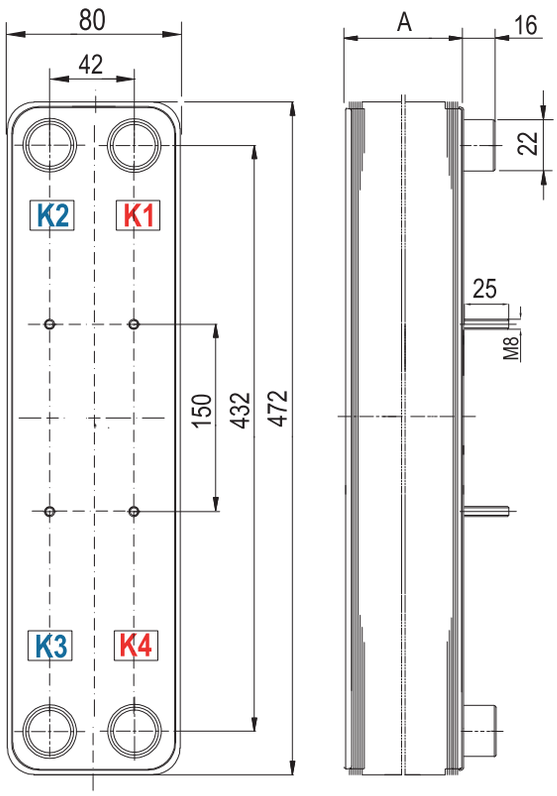
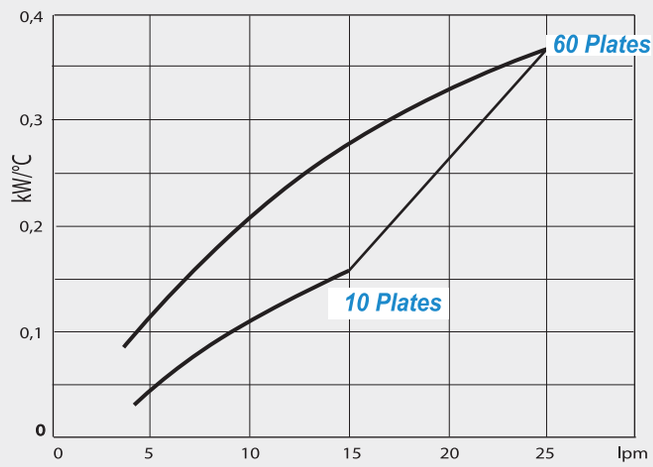


Diagramma rendimento *Performance diagram - ISO VG46 @50°C*



Rapporto portata olio/acqua 2:1 - flow ratio 2:1

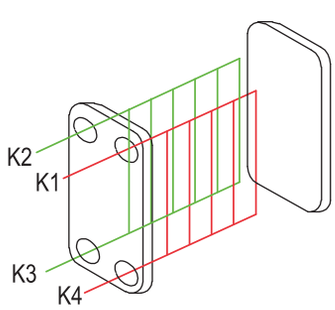
Per informazioni inerenti la perdita di carico contattare EMMEGI.
For pressure drop information please contact EMMEGI.

Collegamenti Standard Standard of Connection Location	Connessioni Connection Types
K1 / K4 - Ingresso/uscita caldo K1 / K4 - Inlet/Outlet Hot Side	G 3/4" Femmina Internal Thread G 3/4"
K3 / K2 - Ingresso/uscita freddo K3 / K2 - Inlet/Outlet Cold Side	G 3/4" Femmina Internal Thread G 3/4"

A richiesta connessioni speciali
Special connections on request

Condizioni di esercizio Working Conditions	
Massima Temperatura Max. Working Pressure	230°C
Minima Temperatura Min. Working Temperature	-10°C
Massima Pressione Max. Working Pressure	30 bar

Materiali Utilizzati Materials	
Piastre Plate	Aisi 316
Attacchi Connection	Aisi 316
Brasatura Brazing Material	Cu 99,95%



N° Piastre Plate No.	A (mm)	Peso (kg) Weight (kg)	Capacità per circuito Channel Volume (lt)
10	32	2.4	0.3
20	55	3.5	0.5
30	78	4.7	0.8
40	101	5.8	1.1
50	124	7.0	1.3
60	147	8.2	1.6

Le dimensioni di ingombro e le caratteristiche tecniche non sono impegnative
Overall dimensions and technical characteristic are not binding

PB Series

PB047

Dimensioni *Dimensions*

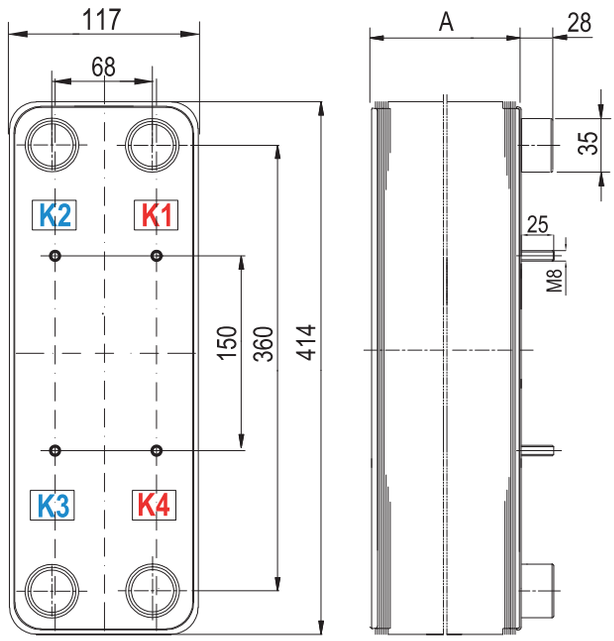
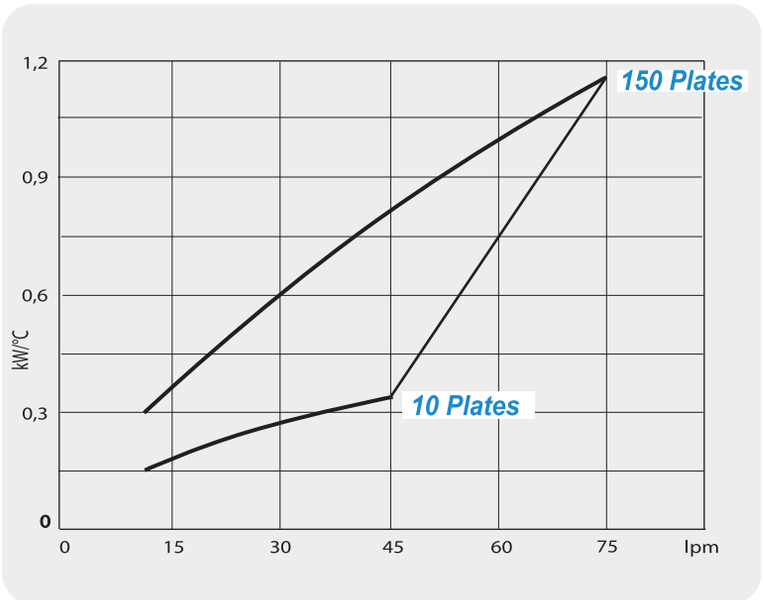


Diagramma rendimento

Performance diagram - ISO VG46 @50°C



Rapporto portata olio/acqua 2:1 - flow ratio 2:1

Per informazioni inerenti la perdita di carico contattare EMMEGI.
For pressure drop information please contact EMMEG.

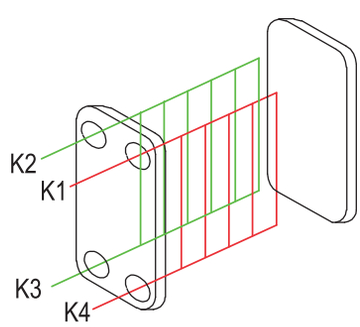
Collegamenti Standard Standard of Connection Location	Connessioni Connection Types
K1 / K4 - Ingresso/uscita caldo K1 / K4 - Inlet/Outlet Hot Side	G 1" Femmina Internal Thread G 1"
K3 / K2 - Ingresso/uscita freddo K3 / K2 - Inlet/Outlet Cold Side	G 1" Femmina Internal Thread G 1"

A richiesta connessioni speciali
Special connections on request

N° Piastre Plate No.	A (mm)	Peso (kg) Weight (kg)	Capacità per circuito Channel Volume (lt)
10	34	3.8	0.5
20	57	5.5	0.9
30	81	7.1	1.4
40	104	8.8	1.9
50	128	10.5	2.3
60	151	12.2	2.8
70	175	13.9	3.3
80	198	15.5	3.7
90	222	19.2	4.2
100	245	18.9	4.7
110	269	20.6	5.1
120	292	22.3	5.6
130	316	23.9	6.0
140	339	25.6	6.5
150	363	27.3	7.0

Condizioni di esercizio Working Conditions	
Massima Temperatura Max. Working Pressure	230°C
Minima Temperatura Min. Working Temperature	-10°C
Massima Pressione Max. Working Pressure	30 bar

Materiali Utilizzati Materials	
Piastre Plate	Aisi 316
Attacchi Connection	Aisi 316
Brasatura Brazing Material	Cu 99,95%



Le dimensioni di ingombro e le caratteristiche tecniche non sono impegnative
Overall dimensions and technical characteristic are not binding

Dimensioni *Dimensions*

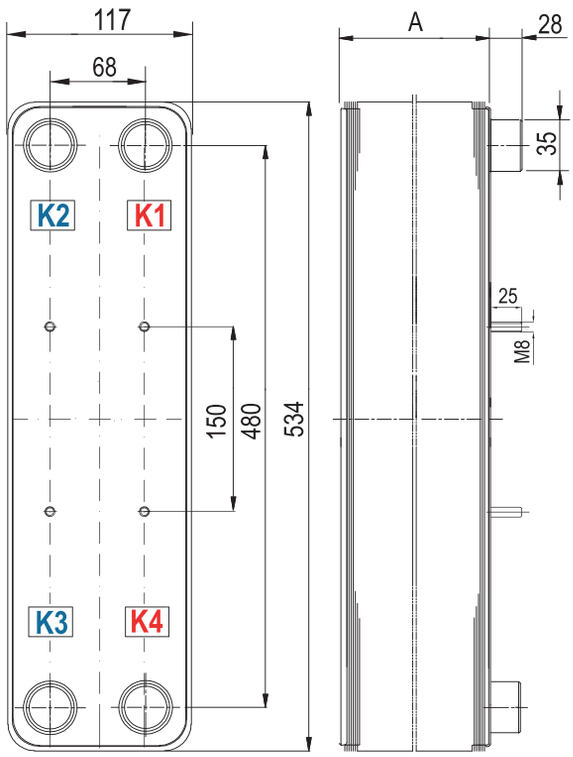
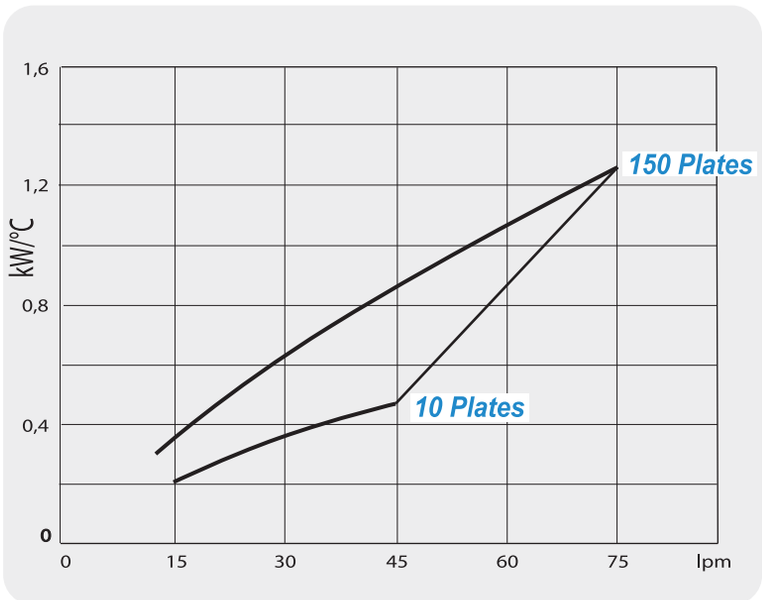


Diagramma rendimento
Performance diagram - ISO VG46 @50°C



Rapporto portata olio/acqua 2:1 - flow ratio 2:1

Per informazioni inerenti la perdita di carico contattare EMMEGI.
For pressure drop information please contact EMMEG.

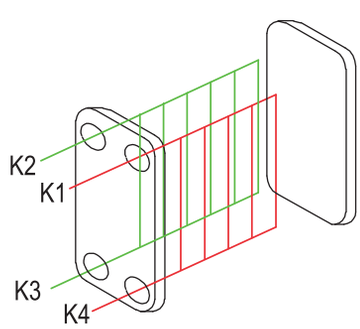
Collegamenti Standard Standard of Connection Location	Connessioni Connection Types
K1 / K4 - Ingresso/uscita caldo K1 / K4 - Inlet/Outlet Hot Side	G 1" Femmina Internal Thread G 1"
K3 / K2 - Ingresso/uscita freddo K3 / K2 - Inlet/Outlet Cold Side	G 1" Femmina Internal Thread G 1"

A richiesta connessioni speciali
Special connections on request

N° Piastre Plate No.	A (mm)	Peso (kg) Weight (kg)	Capacità per circuito Channel Volume (lt)
10	34	4.3	0.6
20	57	7.0	1.2
30	81	9.2	1.8
40	104	11.4	2.4
50	128	13.6	3.0
60	151	15.7	3.6
70	175	17.9	4.2
80	198	20.1	4.8
90	222	22.3	5.4
100	245	24.5	6.0
110	269	26.7	6.5
120	292	28.9	7.1
130	316	31.1	7.7
140	339	33.3	8.3
150	363	35.5	8.9

Condizioni di esercizio Working Conditions	
Massima Temperatura Max. Working Pressure	230°C
Minima Temperatura Min. Working Temperature	-10°C
Massima Pressione Max. Working Pressure	30 bar

Materiali Utilizzati Materials	
Piastre Plate	Aisi 316
Attacchi Connection	Aisi 316
Brasatura Brazing Material	Cu 99,95%



Le dimensioni di ingombro e le caratteristiche tecniche non sono impegnative
Overall dimensions and technical characteristic are not binding

Dimensioni *Dimensions*

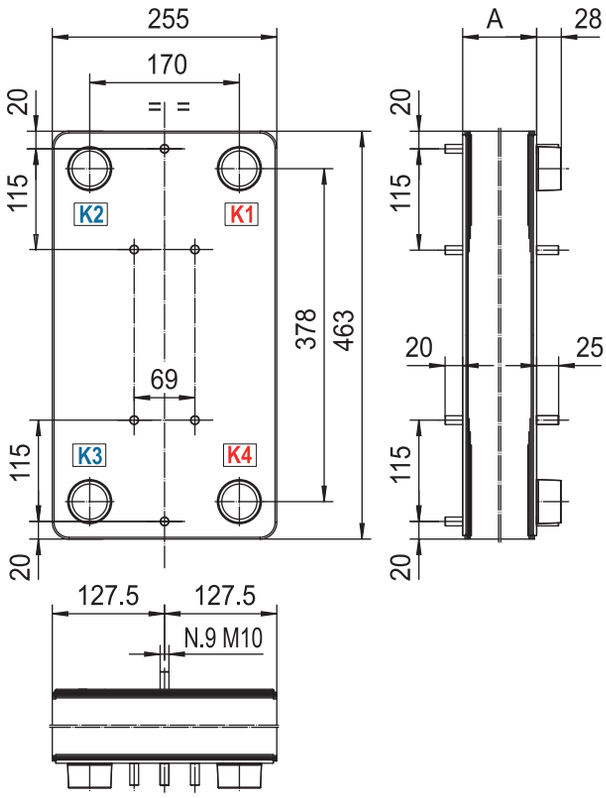
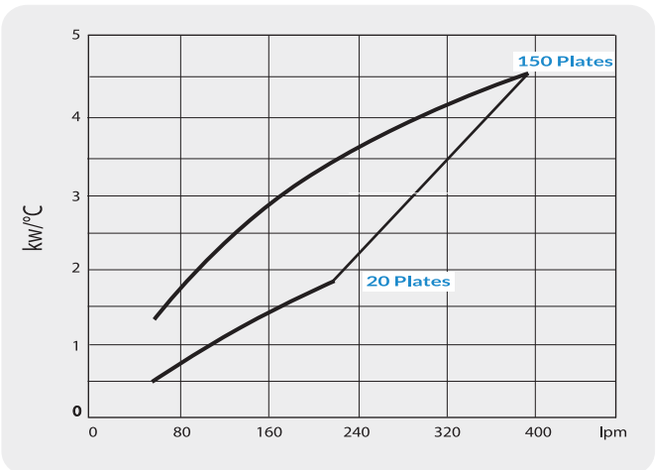


Diagramma rendimento *Performance diagram - ISO VG46 @50°C*



Rapporto portata olio/acqua 2:1 - flow ratio 2:1

Per informazioni inerenti la perdita di carico contattare EMMEGI.
For pressure drop information please contact EMMEGI.

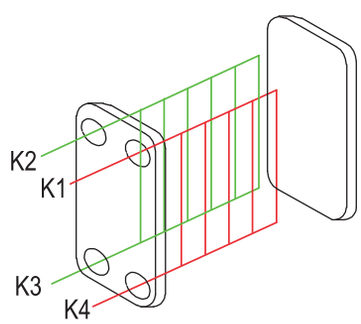
Collegamenti Standard Standard of Connection Location	Connessioni Connection Types
K1 / K4 - Ingresso/uscita caldo **K1 / K4** - Inlet/Outlet Hot Side	G 2" Maschio External Thread G 2"
K3 / K2 - Ingresso/uscita freddo **K3 / K2** - Inlet/Outlet Cold Side	G 2" Maschio External Thread G 2"

A richiesta connessioni speciali
Special connections on request

N° Piastre Plate No.	A (mm)	Peso (kg) Weight (kg)	Capacità per circuito Channel Volume (lt)
20	59	16.9	1.6
30	83	20.9	2.4
40	107	25.0	3.2
50	131	29.1	4.0
60	155	33.2	4.8
70	179	37.3	5.6
80	203	41.3	6.4
90	227	45.4	7.2
100	251	49.5	8.0
110	275	53.6	8.8
120	299	57.7	9.6
130	323	61.7	10.4
140	347	65.8	11.2
150	371	69.9	12.0

Condizioni di esercizio Working Conditions	
Massima Temperatura Max. Working Pressure	230°C
Minima Temperatura Min. Working Temperature	-10°C
Massima Pressione Max. Working Pressure	30 bar

Materiali Utilizzati Materials	
Piastre Plate	Aisi 316
Attacchi Connection	Aisi 316
Brasatura Brazing Material	Cu 99,95%



Le dimensioni di ingombro e le caratteristiche tecniche non sono impegnative
Overall dimensions and technical characteristic are not binding

Dimensioni *Dimensions*

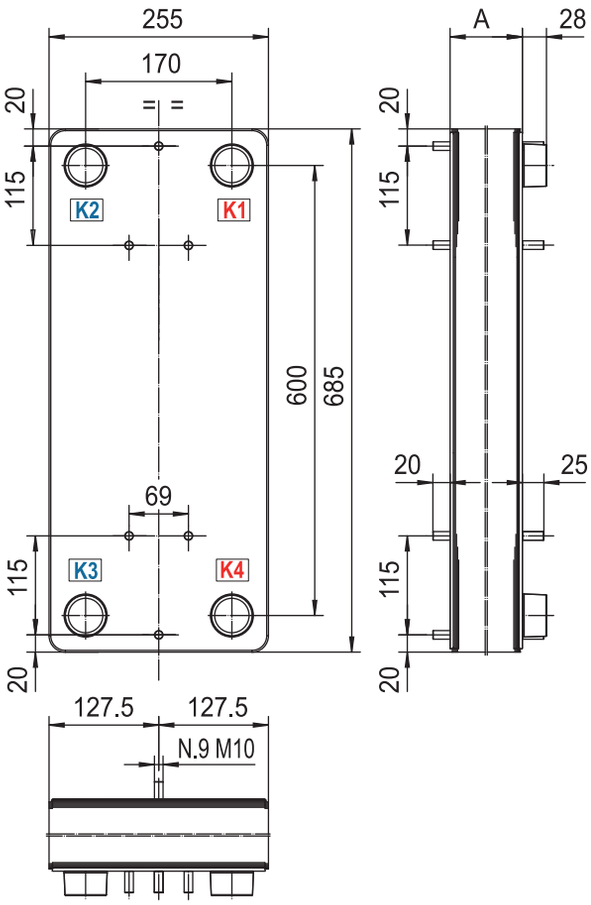
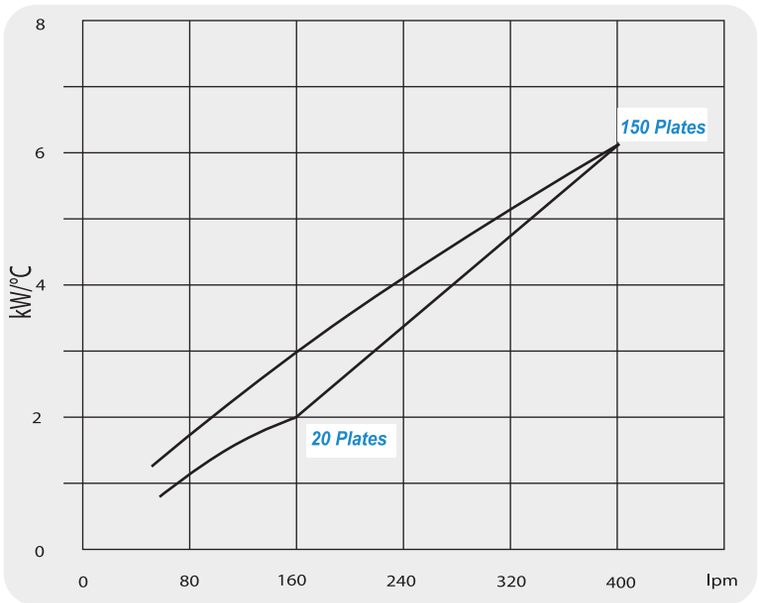


Diagramma rendimento *Performance diagram - ISO VG46 @50°C*



Rapporto portata olio/acqua 2:1 - flow ratio 2:1

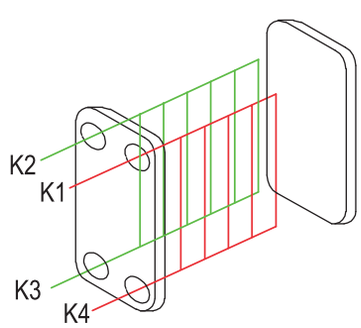
Per informazioni inerenti la perdita di carico contattare EMMEGI.
For pressure drop information please contact EMMEGI.

Collegamenti Standard Standard of Connection Location	Connessioni Connection Types
K1 / K4 - Ingresso/uscita caldo **K1 / K4** - Inlet/Outlet Hot Side	G 2" Maschio External Thread G 2"
K3 / K2 - Ingresso/uscita freddo **K3 / K2** - Inlet/Outlet Cold Side	G 2" Maschio External Thread G 2"

N° Piastre Plate No.	A (mm)	Peso (kg) Weight (kg)	Capacità per circuito Channel Volume (lt)
20	59	23.8	2.5
30	83	30.0	3.8
40	107	36.2	5.1
50	131	42.4	6.3
60	155	48.5	7.6
70	179	54.7	8.9
80	203	60.9	10.1
90	227	67.0	11.4
100	251	73.2	12.7
110	275	79.4	13.9
120	299	85.5	15.2
130	323	91.7	16.4
140	347	97.9	17.7
150	371	104.1	19.0

Condizioni di esercizio Working Conditions	
Massima Temperatura Max. Working Pressure	230°C
Minima Temperatura Min. Working Temperature	-10°C
Massima Pressione Max. Working Pressure	30 bar

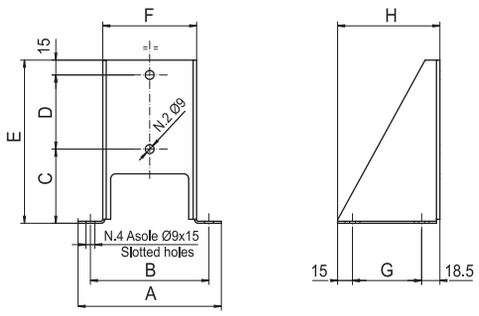
Materiali Utilizzati Materials	
Piastre Plate	Aisi 316
Attacchi Connection	Aisi 316
Brasatura Brazing Material	Cu 99,95%



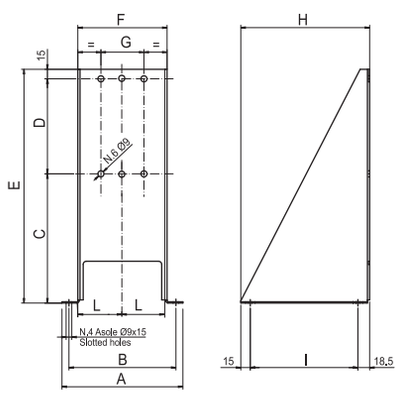
Le dimensioni di ingombro e le caratteristiche tecniche non sono impegnative
Overall dimensions and technical characteristic are not binding

STAFFE DI FISSAGGIO SERIE PB (OPTIONAL) assemblaggio a cura del cliente

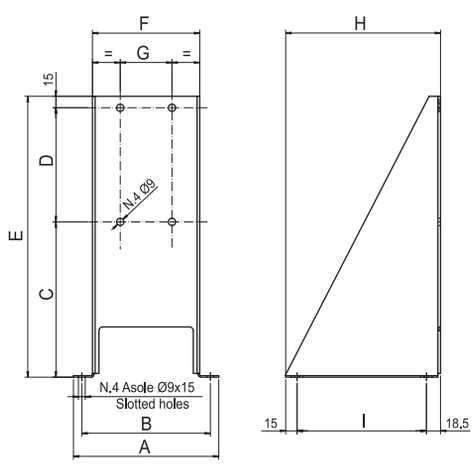
PB Series Supporting frame (OPTIONAL) the assembling is at customer care



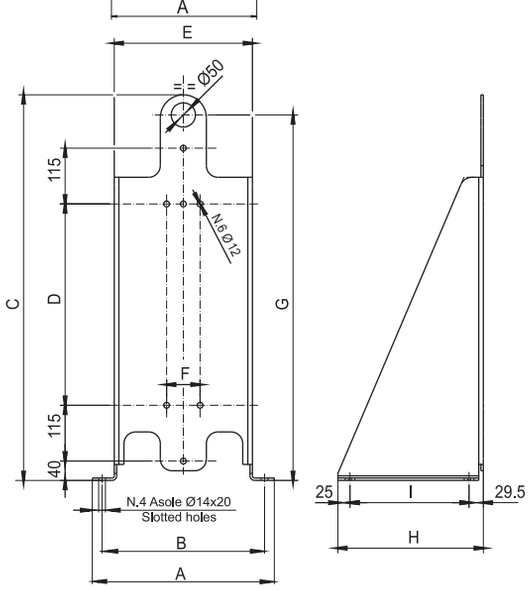
MODELLO MODEL	Dimensioni Dimensions								Staffe di fissaggio Supporting frame
	A	B	C	D	E	F	G	H	P/N
PB014	145	120	75	165	165	95	70	104	0533920



MODELLO MODEL	Dimensioni Dimensions								Staffe di fissaggio Supporting frame
	A	B	C	D	E	F	G	H	P/N
PB022	145	120	87	150	252	95	42	103.5	053393A



MODELLO MODEL	Dimensioni Dimensions									Staffe di fissaggio Supporting frame
	A	B	C	D	E	F	G	H	I	P/N
PB031	191	169	80	150	245	141	68	204	170	0533940
PB034	145	120	173	150	338	95	42	104	170	0533950
PB047	191	169	144	150	309	141	68	204	170	0533960
PB034	145	169	204	150	369	141	68	204	170	0533970



MODELLO MODEL	Dimensioni Dimensions									Staffe di fissaggio Supporting frame
	A	B	C	D	E	F	G	H	I	P/N
PB110	375	335	573	193	285	69	532	300	245	053398A
PB170	375	335	795	415	285	69	754	300	245	053399A