

# Ego

## THREADED CIRCULATORS

Ego (T) (ER) -/40, -/60, -/80, single and twin



High performance wet-rotor circulation pump with threaded connection, motor with permanent magnets and built-in electronic controller.

### APPLICATIONS

Residential heating and air-conditioning systems.

### FEATURES

- Minimum power consumption only 5W
- Built-in frequency converter
- Two operating modes ("ΔP-v" and "constant speed")
- Automatic venting function
- High input torque (with consequent automatic release of the rotor)
- Easy installation and adjustment by means of a single LED button
- 0-10V contact (optional, see versions "ER")

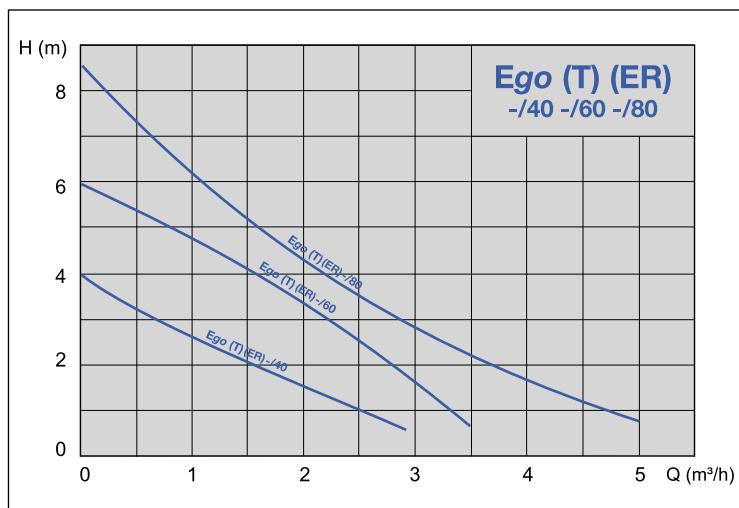
### PUMP TECHNICAL DATA

- Liquid temperature: -10 to ÷110 °C
- Room temperature: 0 ÷ +40 °C
- Relative air humidity: ≤ 95%
- Allowed fluids: clean, not aggressive and not flammable, free of solid particles or fibres
- Maximum pressure: 10 bar
- Minimum suction pressure:
  - 0,05 bar a 50 °C
  - 0,4 bar a 80 °C
  - 1,1 bar a 110 °C
- Maximum amount of glycol: 20%\*
- Threaded inlets: G1 - 1"½ - 2" (in accordance with ISO 228)
- Protection degree: IP44

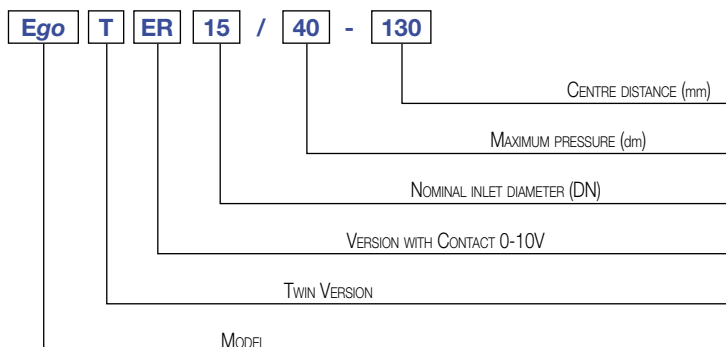
### MOTOR TECHNICAL DATA

- Type: synchronous with permanent magnets
- Motor speed: variable
- Supply voltage: 1~230V
- Frequency: 50/60 Hz
- Insulation class: F

\* For greater amounts please check the final viscosity and the conditions of use



### IDENTIFICATION CODE

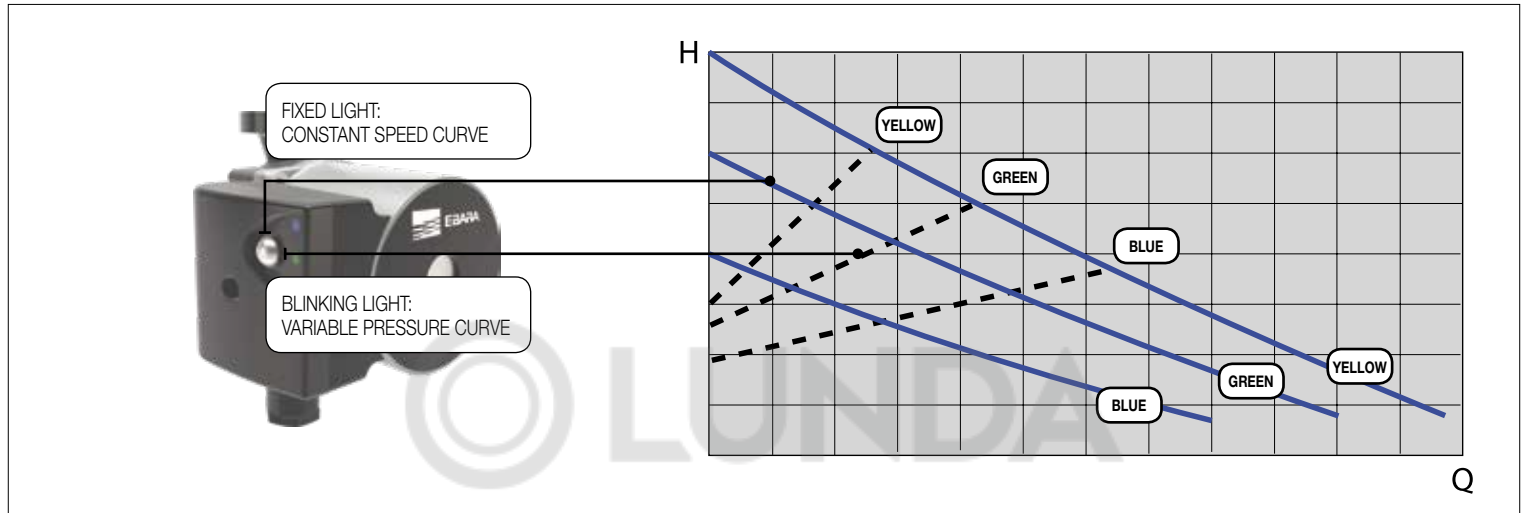


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### OPERATING MODES

Two operating modes that can be selected using the LED button located on terminal box:



#### • $\Delta P$ -v Proportional pressure (factory setting)

The circulators of this range can work in variable pressure **mode on 3 preset curves**. When this operating mode is enabled **the LED button blinks**, with a frequency that varies according to instant flow rate. **The colour of the LED identifies the selected curve** (“blue” indicates the lowest curve, “green” the intermediate curve, while “yellow” indicates the highest curve); to switch from one curve to another just press the button briefly.

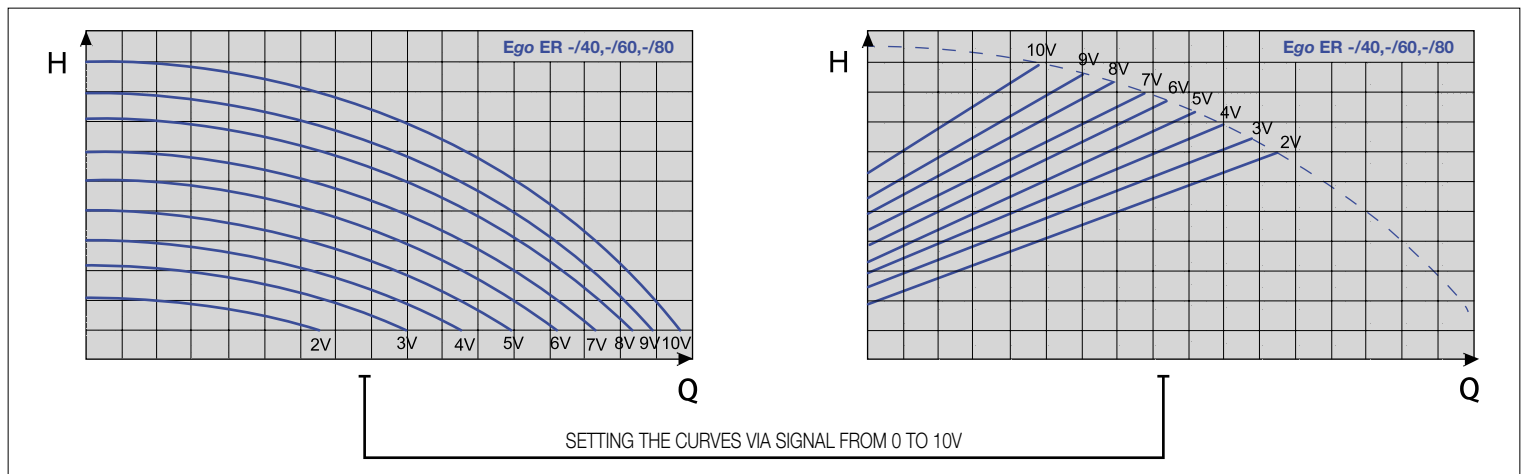
From variable pressure modes (LED blinking) you can switch to constant speed mode (LED light steadily lit) keeping the LED button pressed for at least 5 seconds.

#### • Constant speed

The circulators of this range can work at constant speed **on 3 preset curves**. In this case, the pump works as a usual pump without regulation and the power consumption remains constant. When this mode is active **the LED remains steadily lit**; in this case the colour of the LED indicates the selected curve (“blue” the lowest curve, “green” the intermediate curve, and “yellow” the highest curve). To switch from one curve to another, briefly press the button to return to variable pressure mode, select the desired curve (indicated by the colour of the LED) and then press and hold down the button.

#### VERSIONS WITH ANALOG REGULATION 0-10V (mod. Ego ER -/40, -/60, -/80)

The special versions **Ego ER**, equipped with 0-10V contact inside the terminal box, enable setting the desired work curve remotely (both the fixed speed and the variable differential pressure). In this case, as shown in the diagrams below, the work curves are more numerous.



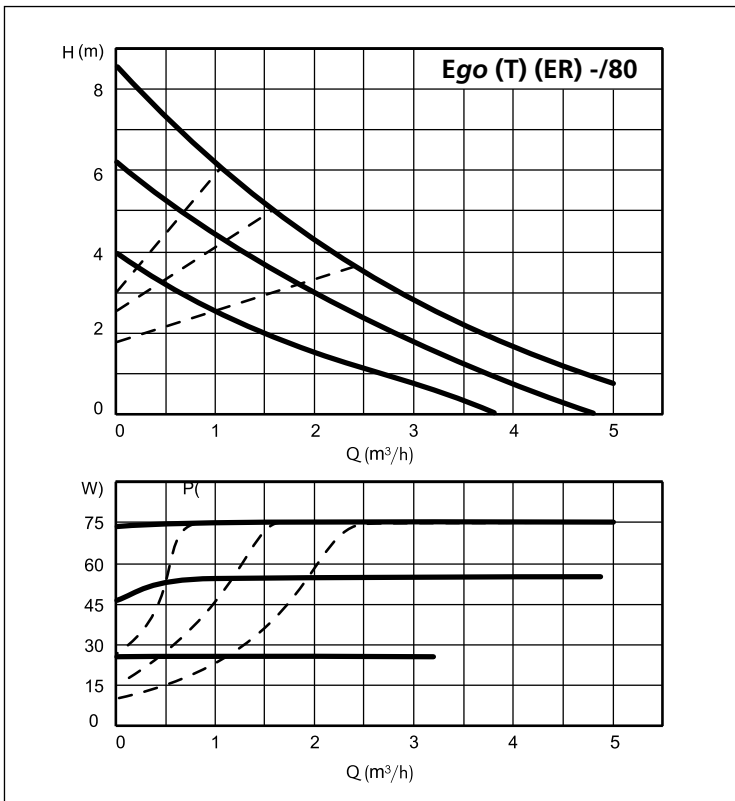
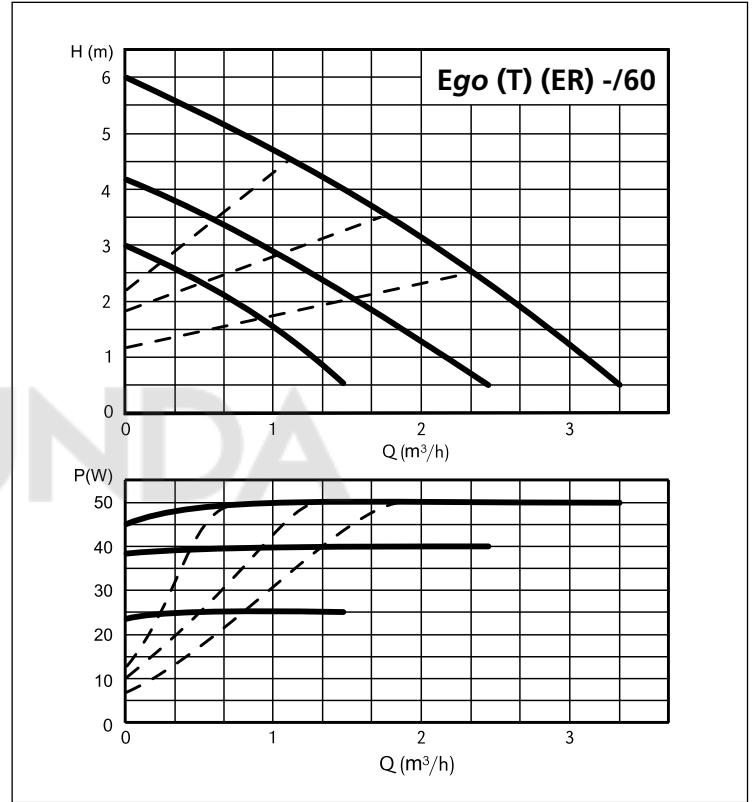
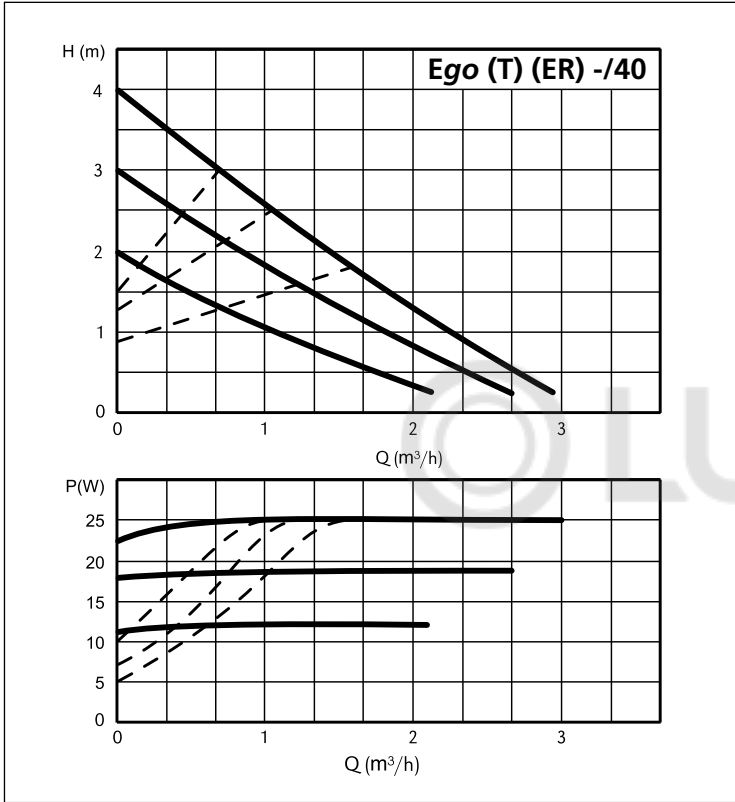


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### PERFORMANCE CURVES

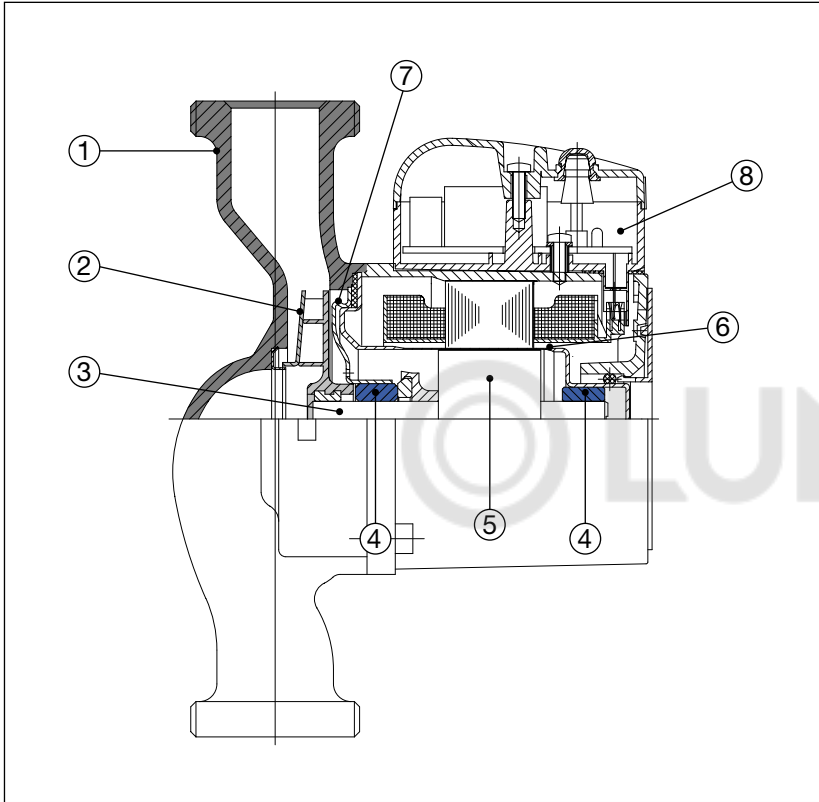


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### SECTIONAL VIEW



### TABLE OF MATERIALS

Ref.	Part	Material
1	Pump body	Cast iron with cataphoresis coating
2	Impeller	Technopolymer
3	Shaft	Ceramic
4	Bearings	Ceramic
5	Rotor	Coated in stainless steel
6	Rotor can	AISI 316 Stainless Steel
7	Bearing plate	AISI 316 Stainless Steel
8	Electronic board	-

### TECHNICAL FEATURES - single

Model	EEI (energy efficiency index)	Pipe connection	Inlet fitting	Power P <sub>1</sub> [W] P <sub>max</sub>	Current consumption [A] I <sub>min</sub> - I <sub>max</sub>	Weight [kg]
Ego (ER) 15/40-130	≤ 0,15	G1	Rp ½"	25	0,05 ÷ 0,2	1,9
Ego (ER) 25/40-130	≤ 0,15	G1½	Rp 1"	25	0,05 ÷ 0,2	2,1
Ego (ER) 15/60-130	≤ 0,17	G1	Rp ½"	50	0,05 ÷ 0,4	1,9
Ego (ER) 25/60-130	≤ 0,17	G1½	Rp 1"	50	0,05 ÷ 0,4	2,1
Ego (ER) 25/80-130	≤ 0,19	G1½	Rp 1"	75	0,05 ÷ 0,6	2,1
Ego (ER) 25/40-180	≤ 0,15	G1½	Rp 1"	25	0,05 ÷ 0,2	2,4
Ego (ER) 32/40-180	≤ 0,15	G2	Rp 1"¼"	25	0,05 ÷ 0,2	2,5
Ego (ER) 25/60-180	≤ 0,17	G1½	Rp 1"	50	0,05 ÷ 0,4	2,4
Ego (ER) 32/60-180	≤ 0,17	G2	Rp 1"¼"	50	0,05 ÷ 0,4	2,5
Ego (ER) 25/80-180	≤ 0,19	G1½	Rp 1"	75	0,05 ÷ 0,6	2,4
Ego (ER) 32/80-180	≤ 0,19	G2	Rp 1"¼"	75	0,05 ÷ 0,6	2,5

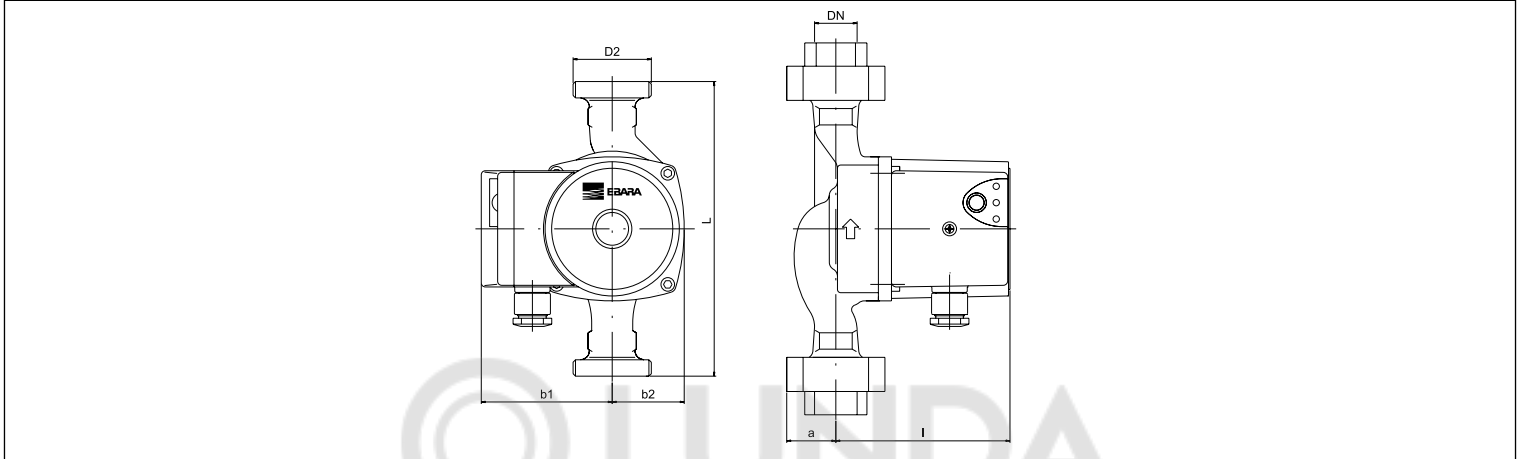
### TECHNICAL FEATURES - twin

Model	EEI (energy efficiency index)	Pipe connection	Inlet fitting	Power P <sub>1</sub> [W] P <sub>max</sub>	Current consumption [A] I <sub>min</sub> - I <sub>max</sub>	Weight [kg]
Ego T 25/60-180	≤ 0,17	G1½	Rp 1"	50	0,05 ÷ 0,4	5,5
Ego T 32/60-180	≤ 0,17	G2	Rp 1"¼"	50	0,05 ÷ 0,4	5,5
Ego T 25/80-180	≤ 0,19	G1½	Rp 1"	75	0,05 ÷ 0,6	5,7
Ego T 32/80-180	≤ 0,19	G2	Rp 1"¼"	75	0,05 ÷ 0,6	5,7

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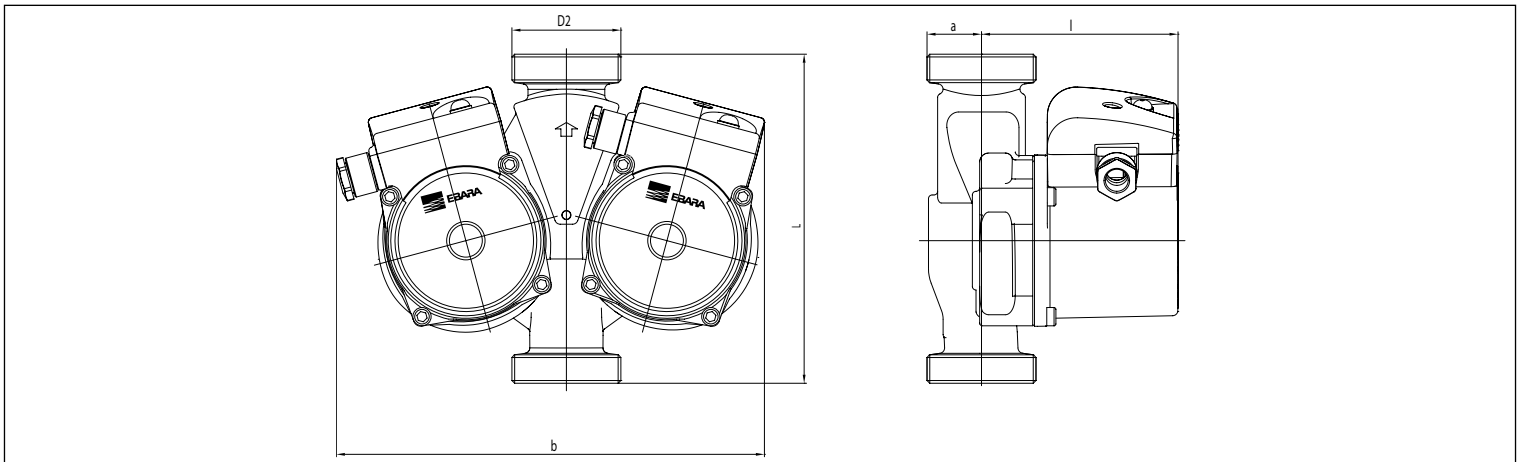
### DIMENSIONS - single



### TABLE OF DIMENSIONS - single

Model	Dimensions [mm]						
	L	DN	b1	b2	l	a	D2
Ego (ER) 15/40-130	130	15	80	48	108	27	1"
Ego (ER) 25/40-130	130	25	80	48	108	32	1½"
Ego (ER) 15/60-130	130	15	80	48	108	27	1"
Ego (ER) 25/60-130	130	25	80	48	108	32	1½"
Ego (ER) 25/80-130	130	25	80	48	108	32	1½"
Ego (ER) 25/40-180	180	25	80	48	108	32	1½"
Ego (ER) 32/40-180	180	32	80	48	108	40	2"
Ego (ER) 25/60-180	180	25	80	48	108	32	1½"
Ego (ER) 32/60-180	180	32	80	48	108	40	2"
Ego (ER) 25/80-180	180	25	80	48	108	32	1½"
Ego (ER) 32/80-180	180	32	80	48	108	40	2"

### DIMENSIONS - twin



### TABLE OF DIMENSIONS - twin

Modello	Dimensions [mm]						
	L	DN	b	l	a	D2	
Ego T 25/80-180	180	25	234	107,2	29,8	1½"	
Ego T 32/80-180	180	32	234	107,2	29,8	2"	
Ego T 25/60-180	180	25	234	107,2	29,8	1½"	
Ego T 32/60-180	180	32	234	107,2	29,8	2"	

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### ASSEMBLY POSITION

