

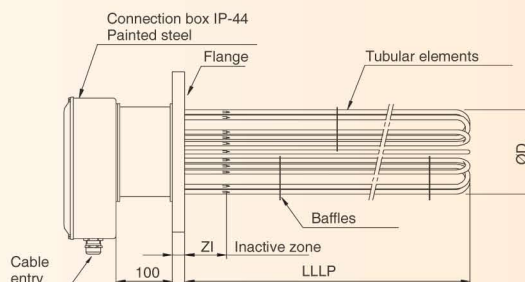


The GCB heating groups consist of a group of hairpin shaped elements soldered to standardised DIN2527 or ANSI flange of suitable diameter and nominal pressure, with its corresponding connection box.

The GCB heating groups are specifically adapted for heating and temperature maintenance of large volumes or for heating of fluids in circulation, such as water, heavy fuel-oil, thermal oils, air or gas.

Installation may be carried out indistinctly in vats or cisterns, in boilers or pass superheaters.

They represent an optimum electric heating system for such diverse industries as agroalimentary, chemical, textile, etc.



General characteristics

- Power according to your specifications
- Voltage supply 3-400 V Δ
- Density load up to 16 W/cm². Recommended density load according to applications
 - 1 to 3 W/cm² → Air, ovens
 - 1,2 W/cm² → Heavy fuel-oil
 - 2 to 4 W/cm² → Thermic oil, light fuel-oil
 - 6 to 8 W/cm² → Water
- Shape "U" tubular elements
- Tube material in stainless steel AISI 321, AISI 316L or Incoloy®-825
- Standardized tube diameters: Ø10 mm
- Maximum length flat plate: Standardized models until 1750 mm, on demand until 3300 mm
- Inactive zone (ZI) standardized models: 100 mm
- Standard flanges: DIN 2527 in steel
- Connection box IP-44.
- 2 Sheats of Øint6,5 mm for thermostat, limiter, thermocouple or PT100 sensor.
- Optionally, temperature control with thermostat, limiter, thermocouple or PT100 sensor
- Optionally, we can supply the GCB group with the cabinet of electrical set-up with all the components and necessary protections for its connection: Controllers, switches, relays, circuit breakers, etc...

IMPORTANT: When the heating groups GCB settle in a container affected by the Pressure Equipment Directive PED 97/23/EC, they will only be able to be used in equipment with a maximum design pressure according to the following parameters (extracted from the standard EN 1092-1, Table G.2.1-3 - PN10)

Design temperature	Maximum design pressure
Up to 99 °C	10 bar
From 100 °C to 149 °C	9,2 bar
From 150 °C to 199 °C	8,8 bar
From 200°C to 249 °C	8,3 bar

STANDARDIZED MODELS GCB-V, RANGE FOR STEAM GENERATOR. MAXIMUM WORK TEMPERATURE: 250 °C

DN Flange	ØD in mm	Nº elements. (Tube ly-825® Ø10 mm)								Length flat plate (LLL in mm)						
		6	9	12	15	18	21	24	27	30	600	800	1000	1250	1500	1750
DN Flange	100	X									6 kW	7,5 kW	9 kW	12 kW	15 kW	20 kW
	150		X								9 kW	11,25 kW	13,5 kW	18 kW	22,5 kW	30 kW
	200			X							12 kW	15 kW	18 kW	24 kW	30 kW	40 kW
					X						15 kW	18,75 kW	22,5 kW	30 kW	37,5 kW	50 kW
250					X					18 kW	22,5 kW	27 kW	36 kW	45 kW	60 kW	
						X				21 kW	26,25 kW	31,5 kW	42 kW	52,5 kW	70 kW	
							X			24 kW	30 kW	36 kW	48 kW	60 kW	80 kW	
								X		27 kW	33,75 kW	40,5 kW	54 kW	67,5 kW	90 kW	
								X		30 kW	37,5 kW	45 kW	60 kW	75 kW	100 kW	

STANDARDIZED MODELS GCB-AT, RANGE FOR THERMIC OIL. MAXIMUM WORK TEMPERATURE: 250 °C

DN Flange	ØD in mm	Nº elements. (Tube AISI 321 Ø10 mm)								Length flat plate (LLL in mm)						
		6	9	12	15	18	21	24	27	30	600	800	1000	1250	1500	1750
DN Flange	100	X									8 kW	10,5 kW	13,5 kW	18 kW	21 kW	25,5 kW
	150		X								12 kW	15,75 kW	20,25 kW	27 kW	31,5 kW	38,25 kW
					X						16 kW	21 kW	27 kW	36 kW	42 kW	51 kW
	200					X					20 kW	26,25 kW	33,75 kW	45 kW	52,5 kW	63,75 kW
						X				24 kW	31,5 kW	40,5 kW	54 kW	63 kW	76,5 kW	
250						X				28 kW	36,75 kW	47,25 kW	63 kW	73,5 kW	89,25 kW	
							X			32 kW	42 kW	54 kW	72 kW	84 kW	102 kW	
								X		36 kW	47,25 kW	60,75 kW	81 kW	94,5 kW	114,75 kW	
									X	40 kW	52,5 kW	67,5 kW	90 kW	105 kW	127,5 kW	

STANDARDIZED MODELS GCB-A, RANGE FOR WATER. MAXIMUM WORK TEMPERATURE: 150 °C

DN Flange	ØD in mm	Nº elements. (Tube AISI 316L Ø10 mm)								Length flat plate (LLL in mm)						
		6	9	12	15	18	21	24	27	30	600	800	1000	1250	1500	1750
DN Flange	100	X									15 kW	21 kW	27 kW	33,3 kW	42 kW	50 kW
	150		X								22,5 kW	31,5 kW	40,5 kW	50 kW	63 kW	75 kW
					X						30 kW	42 kW	54 kW	66,7 kW	84 kW	100 kW
	200					X					37,5 kW	52,5 kW	67,5 kW	83,3 kW	105 kW	125 kW
						X				45 kW	63 kW	81 kW	100 kW	126 kW	150 kW	
250							X			52,5 kW	73,5 kW	94,5 kW	116,7 kW	147 kW	175 kW	
								X		60 kW	84 kW	108 kW	133,3 kW	168 kW	200 kW	
									X	67,5 kW	94,5 kW	121,5 kW	150 kW	189 kW	225 kW	
										75 kW	105 kW	135 kW	166,7 kW	210 kW	250 kW	

