



Elmo Rietschle

IE3

CEC US



G-BH 7 N Data sheet 2BH7 610-0A

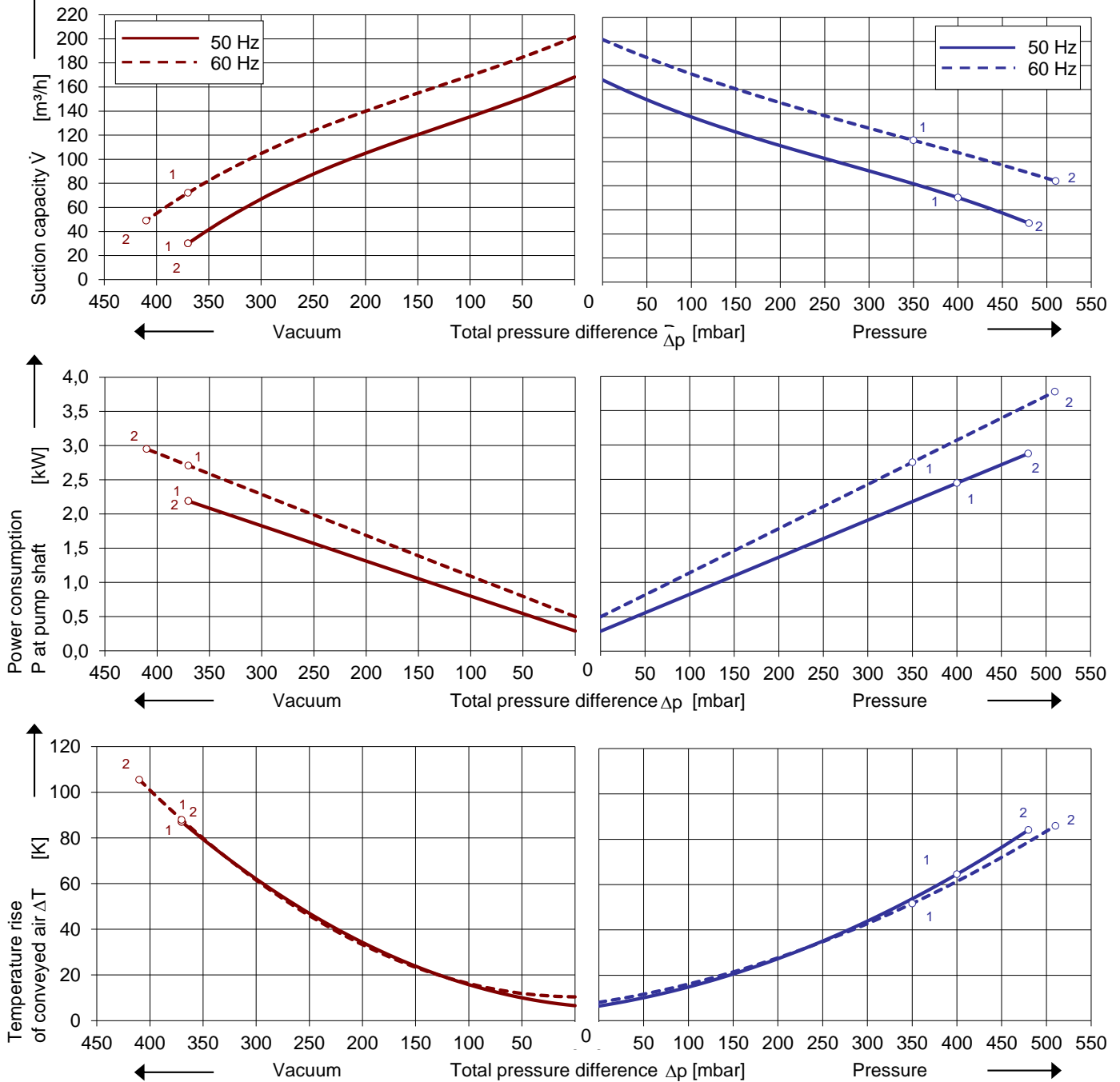
Side channel blower with IE3-motors



Performance curves

Vacuum operation

Compressor operation



The performance curves are based on air at a temperature of 15 °C and an atmospheric pressure of 1013 mbar with a tolerance of $\pm 10\%$. The total pressure differences are valid for suction and ambient temperature up to 25 °C. For other conditions please get in touch with us.

Every G-BH pump can be used both as vacuum pump and compressor in continuous operation over the total performance curve range. The motors are available as standard in protection category IP 55 and insulation class F. The vacuum pumps / compressors are UL and CSA approved.

Selection and ordering data

Type 2BH7 610-0A

No.	Fre- quency	Rated			Max. differential pressure ²⁾		Sound pressure level ³⁾	Efficiency ⁴⁾	Weight Approx.	Order No.
		Voltage ¹⁾	Current	Power	Vacuum	Pressure				
					mbar					
Hz	V	A	kW			dB(A)	kg			
IE3 3~ 50/60 Hz, IP55, Insulation material class F, UL 1450 and CAN/CSA C22.2 No. 68-09 (certificate number E225239)										
1	50	190-210 Δ	9,9 Δ	2,5	-370	400	63	IE3	41	2BH7610-0AK11-2
	60	190-210 YY / 380-420 Y	12,0 YY / 6,0 Y	3,0	-370	350	68	IE3		
	60	200 YY	12,0 YY	3,0	-370	350	68	NP		
2	50	190-210 Δ	13,3 Δ	3,5	-370	480	67	IE3	45	2BH7610-0AK21-2
	60	190-210 YY / 380-420 Y	15,2 YY / 7,6 Y	4,0	-410	510	72	IE3		
	60	200 YY	15,2 YY	4,0	-410	510	72	NP		
IE3 3~ 50/60 Hz, IP55, Insulation material class F, UL 1450 and CAN/CSA C22.2 No. 68-09 (certificate number E225239)										
1	50	220-240 Δ / 380-420 Y	8,6 Δ / 5,0 Y	2,5	-370	400	63	IE3	41	2BH7610-0AK16-2
	60	220-240 YY / 440-480 Y	10,4 YY / 5,2 Y	3,0	-370	350	68	IE3		
	60	230 YY / 460 Y	10,4 YY / 5,2 Y	3,0	-370	350	68	NP		
2	50	220-240 Δ / 380-420 Y	11,6 Δ / 6,7 Y	3,5	-370	480	67	IE3	45	2BH7610-0AK26-2
	60	220-240 YY / 440-480 Y	13,2 YY / 6,6 Y	4,0	-410	510	72	IE3		
	60	230 YY / 460 Y	13,2 YY / 6,6 Y	4,0	-410	510	72	NP		
IE3 3~ 50/60 Hz, IP55, Insulation material class F, UL 1450 and CAN/CSA C22.2 No. 68-09 (certificate number E225239)										
1	50	500 Y	4,0 Y	2,5	-370	400	63	IE3	41	2BH7610-0AQ13-2
	60	575 Y	4,1 Y	3,0	-370	350	68	NP		
2	50	500 Y	5,4 Y	3,5	-370	480	67	IE3	45	2BH7610-0AQ23-2
	60	575 Y	5,3 Y	4,0	-410	510	72	NP		
IE3 3~ 50/60 Hz, IP55, Insulation material class F, UL 1450 and CAN/CSA C22.2 No. 68-09 (certificate number E225239)										
1	50	380-420 Δ / 660-725 Y	5,0 Δ / 2,9 Y	2,5	-370	400	63	IE3	41	2BH7610-0AQ17-2
	60	440-480 Δ	5,2 Δ	3,0	-370	350	68	IE3		
	60	460 Δ	5,2 Δ	3,0	-370	350	68	NP		
2	50	380-420 Δ / 660-725 Y	6,7 Δ / 3,9 Y	3,5	-370	480	67	IE3	45	2BH7610-0AQ27-2
	60	440-480 Δ	6,6 Δ	4,0	-410	510	72	IE3		
	60	460 Δ	6,6 Δ	4,0	-410	510	72	NP		
IE3 3~ 50/60 Hz, IP55, Insulation material class F, UL 1450 and CAN/CSA C22.2 No. 68-09 (certificate number E225239)										
1	50	220-240 Δ / 380-420 Y	8,6 Δ / 5,0 Y	2,5	-370	400	63	IE3	41	2BH7610-0AQ16-2
	60	440-480 Y	5,2 Y	3,0	-370	350	68	IE3		
2	50	220-240 Δ / 380-420 Y	11,8 Δ / 6,8 Y	3,45	-370	480	67	IE3	45	2BH7610-0AQ26-2
	60	440-480 Y	6,7 Y	4,0	-410	510	72	IE3		

- 1) In case of frequency converter operation the standard motor insulation system is suitable for converter input voltages up to 500 V.
- 2) Relief valves available for limiting differential pressure.
- 3) Measuring surface sound pressure level acc. to EN ISO 3744, measured with an equivalent unit at a distance of 1 m. The pump is throttled to an average suction pressure, with piping connected, but no relief valves fitted, tolerance ±3 dB (A).
- 4) The motors according to NEMA MG1-12. NP=NEMA Premium; NEMA Premium includes IE3.

All G-BH match the 2006/42/EC (machinery) and 2014/35/EU (low voltage) directives and the EN 60034 norm "Rotating electrical machines".

Service factor (SF) and motor efficiency according NEMA MG1-12.
Voltage tolerances for three phase motors are +/-10%.

The frequency tolerance is +/- 2 % maximum.

Motor for alternate voltages

50 Hz	60Hz	Efficiency ⁴⁾	60 Hz	2BH7...-.. □ . □ -2	
				□	□
3~					
200 VΔ	200 V YY / 230 VΔ / 400 VY	NEMA Premium	•	K	1
190-210 VΔ	190-210 VYY / 220-240 VΔ / 380-420VY	IE3	•	K	6
200 V YY / 230 VΔ / 400 VY	230 V YY / 460 VY	NEMA Premium	•	K	6
190-210 VYY / 220-240 VΔ / 380-420VY	220-240 VYY / 440-480VY	IE3	•	K	6
475-525 V Y	550-600 V Y	NEMA Premium	•	Q	3
475-525 VΔ	550-600 VΔ	NEMA Premium	•	Q	5
220-240 VD / 380-420VY	440-480VY	IE3	•	Q	6
400 VΔ / 690 V Y	460 VΔ	NEMA Premium	•	Q	7

Changes in particular of the quoted performance curve, data and weights may occur without prior notice. The data given does not constitute an obligation from our side to deliver as shown.



Your Ultimate Source for Vacuum and Pressure

Gardner Denver Deutschland GmbH
Industriestraße 26
97616 Bad Neustadt - Germany
Tel.: +49 9771 6888-0
Fax: +49 9771 6888-4000
www.gd-elmorietschle.com

Gardner Denver Schopfheim GmbH
Johann-Sutter-Straße 6+8
79650 Schopfheim - Germany
Tel.: +49 7622 392-0
Fax: +49 7622 392-300

er.de@gardnerdenver.com