

WITH MORE THAN 60 YEARS OF EXPERIENCE IN COMPRESSOR TECHNOLOGY AND HIGHLY DEDICATED EMPLOYEES, OUR FOCUS IS ON DEVELOPING AND

APPLYING ADVANCED COMPRESSOR TECHNOLOGIES TO ACHIEVE STANDARD SETTING PERFORMANCE FOR LEADING PRODUCTS AND BUSINESSES AROUND THE WORLD.



# NO MORE ENERGY WASTE WITH VARIABLE SPEED COMPRESSORS

**R290**  
NLV-CN COMPRESSORS



**GLOBAL VOLTAGE RANGE**  
**WIDE OPERATING VOLTAGE RANGE**  
NEW 105N4760 CONTROLLER CAN BE USED FOR ALL VOLTAGES AND FREQUENCIES GLOBALLY

up to **40%**

**ENERGY REDUCTION**  
POSSIBLE WITH VARIABLE SPEED CONTROL IN SUPERMARKET AND CONVENIENCE STORE CABINETS, COMPARED TO NON-OPTIMISED COMPRESSORS.

**IP54**  
HIGH PROTECTION CLASS  
AGAINST DUST AND WATER JETS



# NLV-CN WITH INTELLIGENT MULTI VOLTAGE CONTROLLER

Secop's variable speed NLV propane compressor solution provides perfect cooling efficiency, tailor-made features, and easy integration within a single unit while ensuring considerable energy savings.

It is the right choice if you are looking for a green solution using the environmentally-friendly refrigerant propane (R290) with a low global warming potential (GWP 3).

The new °CCD® controller features a high IP54 protection class and easy integration by using speed control through Adaptive Energy Optimization (AEO), frequency signal or serial communication.

The controller also provides a high starting torque and can start against a differential pressure.

Only the variable speed design can obtain energy savings of up to 40% when compared to fixed speed compressors in on/off operation mode.

## Benefits

- Energy savings of up to 40%
- IP54 controller housing
- Suitable for LBP and MBP applications
- High starting torque
- Easy customization via TOOL4COOL® software

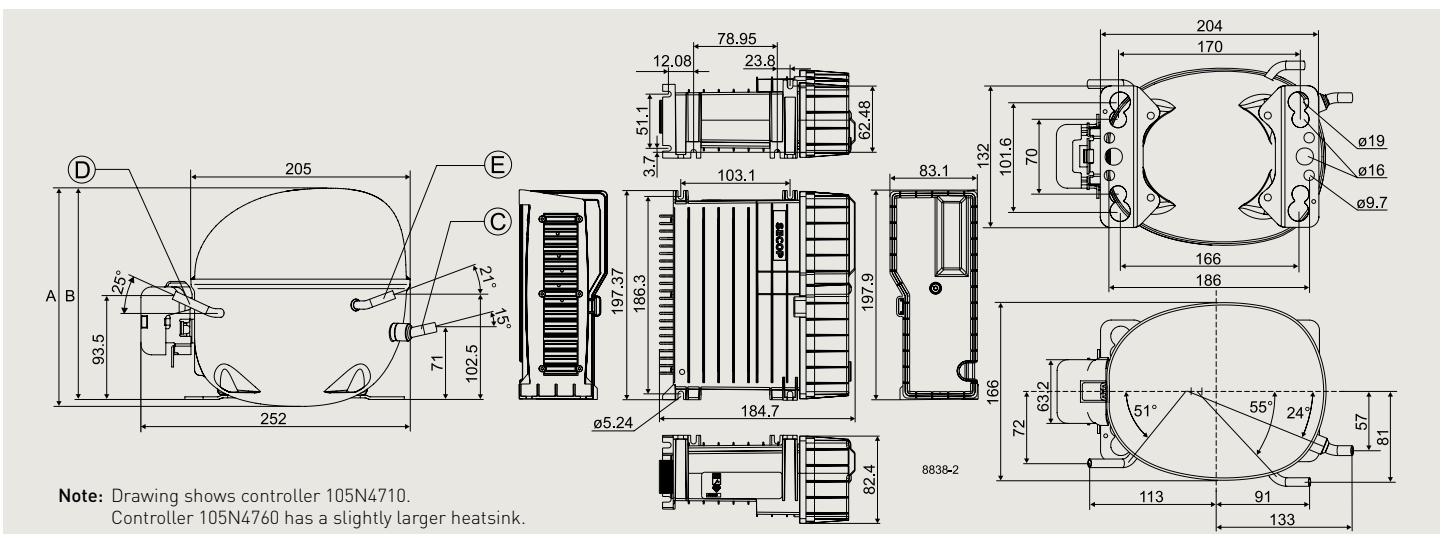
General (code numbers)		NLV8.0CN	NLV10CN	NLV12.6CN	
Compressor connectors: metric   inch		105H7800	105H7801	105H7000 105H7001	
Electronic unit - Standard	220-240 V	105N4710 (with Power Factor Correction according to EN 61000-3-2:2014)			
Approvals	50/60 Hz	EN 60335-2-34 with Annex AA, CCC			
Electronic unit - Multi Voltage	100-240 V	105N4760 (with Power Factor Correction according to EN 61000-3-2:2014)			
Approvals	50/60 Hz	EN 60335-2-34 with Annex AA, UL 60335-2-34 with Annex AA, CB IEC 60335-2-34			

Application		Electronic unit - Standard	Electronic unit - Multi Voltage
Application		LBP/MBP	LBP/MBP
Evaporating temperature	°C (°F)	-40 to 7.2 (-40 to 45)	-40 to 7.2 (-40 to 45)
Voltage range / frequency	V/Hz	180 - 270 / 50/60	90 - 270 / 50/60
Speed range	rpm	2000 - 4500	2000 - 4500

Performance data ASHRAE LBP (115/220 V, 50/60 Hz • fan cooling) @ -23.3 °C [-10 °F] evaporating temperature													
Speed	rpm	2000	2500	3000	4500	2000	2500	3000	4500	2000	2500	3000	4500
Cooling capacity	W	266	346	384	558	352	439	514	749	422	541	653	938
	BTU/h	907	1182	1313	1905	1202	1498	1756	2559	1442	1846	2232	3204
Power consumption	W	153	188	217	324	203	243	289	425	251	309	371	566
COP	W/W	1.73	1.84	1.78	1.72	1.74	1.81	1.78	1.76	1.68	1.75	1.76	1.66
EER	BTU/Wh	5.91	6.28	6.06	5.88	5.93	6.18	6.07	6.02	5.75	5.97	6.02	5.66
Test conditions		Condensing temperature: 54.4°C (130°F)   Suction gas temperature: 32.2°C (90°F)   Ambient temperature: 32.2°C (90°F)   Liquid temperature: 32.2°C (90°F)											

Performance data ASHRAE MBP (115/220 V, 50/60 Hz • fan cooling) @ -6.7 °C [20 °F] evaporating temperature													
Speed	rpm	2000	2500	3000	4500	2000	2500	3000	4500	2000	2500	3000	4500
Cooling capacity	W	489	616	718	1049	636	781	929	1357	753	952	1137	1675
	BTU/h	1671	2103	2453	3581	2172	2665	3173	4635	2572	3250	3882	5719
Power consumption	W	216	262	306	458	289	341	408	612	348	441	520	818
COP	W/W	2.27	2.35	2.35	2.29	2.21	2.29	2.28	2.22	2.17	2.16	2.19	2.05
EER	BTU/Wh	7.74	8.02	8.02	7.82	7.53	7.81	7.79	7.57	7.40	7.37	7.46	6.99
Test conditions		Condensing temperature: 54.4°C (130°F)   Suction gas temperature: 35°C (95°F)   Ambient temperature: 35°C (95°F)   Liquid temperature: 46.1°C (115°F)											

Dimensions		105H7800 / 105H7000 / 105H6355 (metric connectors)	105H7801 / 105H7001 / 105H6356 (inch connectors)	
Height	mm (in.)	A	203	203 (7.99)
		B	197	197 (7.76)
Suction connector	location/I.D. mm (in.)   angle	C	8.2   15°	8.2 (0.320-0.327)   15°
	material   seal		Copper   Rubber plug	Copper   Rubber plug
Process connector	location/I.D. mm (in.)   angle	D	6.2   25°	6.5 (0.252-0.259)   25°
	material   seal		Copper   Rubber plug	Copper   Rubber plug
Discharge connector	location/I.D. mm (in.)   angle	E	6.2   21°	6.5 (0.252-0.259)   21°
	material   seal		Copper   Rubber plug	Copper   Rubber plug
Conn. tolerance	I.D. mm		±0.09	-



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