

SECOP, DANFOSS, 1/2 hp, lbp, SC15CL, compressor, 104L2853, 15.28 cm³, R404a/R507, 104L 2853

Category: compressor

written by Lilianne | 12 November 2023



Private Picture Copyright : WWW.MBSM.PRO

Refrigerants: R404A; R507

Gross weight	13.48 Kg
Net weight	13.48 Kg
Oil	POE
Height total [mm]	219 mm
Applications	LBP
Auxiliary winding resistance (start winding) for single-phase compressors [Ohm]	13.7 Ohm
Amount of oil	550 cm ³
Capacity of capacitor B	80 uF
Capacity control	Fixed speed
Refrigerant charge [kg] [Max]	1.3 kg
Color	Black
Comments on the suction connection	Cover of The
Comments on the discharge connection	Cover of The
Comments on the process connection	Cover of The
Current connection HST [A]	20.4 To
Configuration code	Individual

Description	SC15CL
Description	SC
Discharge connection height [mm]	110 mm
Diameter of the suction connection [mm]	10.2 mm
Diameter discharge connection [mm]	6.2 mm
Economizer	Not
Packaging format	Industrial package
Frequency [Hz]	Fifty
Height from baseplate [mm]	213 mm
LRA HST [A]	20.4 To
Material of the discharge connection	Steel-plated Cu
Material of the process connection	Steel-plated Cu
Merged Approval standard and	CE en 60335-2-34 with Annex AA
N. ° of phases (compressor)	One
N. ° of phases (fan)	One
Energy level of the application	Compressor LBP standard
Number of scheme	Eight thousand two hundred fifty eight
Model number	SC15CL
Oil charge [L]	550 L
Phase	One
Process connection diameter [mm]	6.2 mm
Refrigerants	R404A R507
Resistance of the primary winding for compressors in single-phase [Ohm]	3.7 Ohm
RLA	3.9 To
Start capacitor capacitance	80 µF
Suction connection height [mm]	193 mm
Swept volume [cm3]	15.28 cm3
Technology	Alternative
Temperature of the winding, the short-term [°C] [Max]	135 °C
Winding temperature, stable [°C] [Max]	125 °C
Voltage, 50 Hz [V]	220 V
Voltage, 50 Hz [V] [max.]	240 V
Engine type	CSIR
Type of motherboard	Universal
Type designation	Compressor
Technique of the brand	Reciprocating compressors, type
Units of packing	Eighty
Use of segment	Refrigeration LT
High value of nominal voltage at 50 Hz [V]	230 V
High value of the nominal voltage at 60 Hz [V]	0 V
High value of voltage range at 50hz [V]	254 V

High value of the voltage range at 60 Hz [V]	0 V
Low value of the rated voltage at 50 Hz [V]	220 V
Low value of the nominal voltage at 60 Hz [V]	0 V
Low value of voltage range at 50hz [V]	198 V
Low value of the voltage range at 60 Hz [V]	0 V
Rotation speed at 50 Hz [rpm]	2900 rpm
Rotation speed at 60 Hz [rpm]	0 rpm
Volume of free gas [cm3]	1510 cm3
Angle of the connection suction [°]	37 °
Angle of the discharge connection [°]	37 °
Angle of the connection process	37 °

Application: Refrigerator
Cooling table
Warming display cabinet
rapid chiller
Fridge/freezer
Freezer
Freezer table

Design type: fully hermetic

CODE: 104L2853

Type of use: LBP

Frequency: 50Hz

Displacement: 15.28 cm³

Height: 219mm

Refrigerant: R404a/R507

Perfomance: 1/2 HP

Performance at -10°C: 1,251W

Performance at -15°C: 1,017W

Performance at -20°C: 813W

Performance at -25°C: 637W

Performance at -30°C: 486W

Performance at -35°C: 358W

Performance at -40°C: 175W

Performance at -5°C: 1,699W

Engine system: CSIR

Tension: 220-240V

Test procedure: ASHRAE

Application:

- laboratory and medical equipment
- compressed air dryers
- glass door merchandisers
- display cabinets
- freezers and fridge
- ice cream cabinets
- vending machines
- drinks dispensers

- ice making machines
- bottle coolers
- heat pumps
- milk cooling tanks
- wine cellars

Description:

hermetic, piston, refrigeration compressor type LBP / MBP, for R404A / R507 refrigerant p>

Specification:

- application: LBP/MBP compressor
- refrigerants: R404A, R507
- power: 220-240V, 50Hz
- displacement: 15.28 cm³
- oil quantity: 550 ml
- oil type: polyolester
- winding resistance (main): 3.7 Ohm
- winding resistance (start): 14.4 Ohm
- evaporating temperature: -40°C to -5°C
- cooling capacity range: 151 – 1458 W
- cooling capacity depending on the evaporation temperature (EN 12900, 50Hz):
 - -40°C: 151 W
 - -35°C: 299 W
 - -30°C: 452 W
 - -25°C: 615 W
 - -23.3°C: 673 W
 - -20°C: 792 W
 - -15°C: 988 W
 - -10°C: 1208 W
 - -6.7°C: 1370 W
 - -5°C: 1458 W
- compressor weight: 13.8 kg
- singlepack kit weight: 14.4 kg

Additional information:

kit includes:

- compressor: [104L2853]
- starting device: [117U6019]
- cover: [103N2009]
- run capacitor: 80µF [117U5017]
- cord relief: [103N1004]
- mounting accessories: [118-1917]

NL10FT 105G6829 105G6839 3/8 113 158 213 235 281 361 455 217 327 10.10



Private Picture Copyright : WWW.MBSM.PRO

SC12FT	104G8205	104G8215	3/8	103	163	233	259	314	408	517	645	265	380	12.87	
SC15FT	104G8505	1/2	126	197	280	311	376	489	620	772	311	451	15.28		
SC18FTX	104G8805	5/8	144	229	325	361	437	567	719	896	365	517	17.68		
SC21FTX	104G8105	3/4	192	296	415	460	553	713	901	1119	428	613	20.95		
60 Hz															
PL35G	101G0250	1/16	34	39	48	64	82	104	52	79	2.00				
TL2.5G	102G4251	1/16	14	27	42	48	60	80	105	134	67	96	2.61		
TL3G	102G4350	1/12	30	47	54	69	95	125	70	111	3.13				
TL4G	102G4452	1/10	48	70	78	96	127	166	87	135	3.86				
TL5G	102G4550	1/8	65	92	102	123	162	207	106	170	5.08				
FR6G	103G6660	1/6	51	93	108	141	199	266	119	197	6.23				
FR7.5G	103G6680	103G6690	1/5	67	112	130	166	228	300	138	229	6.93			
FR8.5G	103G6780	103G6790	1/4	92	138	156	195	263	345	164	273	7.95			
FR10G	103G6880	103G6890	1/3	99	153	173	217	292	381	194	314	9.05			
SC12FT	104G8205	104G8215	1/2	125	192	272	302	366	477	608	761	298	458	12.87	
SC15FT	104G8505	5/8	154	235	330	365	441	571	724	904	356	537	15.28		
SC18FTX	104G8805	3/4	187	280	390	432	520	675	857	1071	420	622	17.68		
SC21FTX	104G8106	7/8	240	345	470	518	620	800	1012	1262	475	707	20.95		
R404A/R507															
50 Hz															
TL4CL	102U2071	1/8	52	65	84	110	142	155	182	230	286	352	140	198	3.86
FR6CL	103U2670	1/6	77	108	145	189	243	263	307	383	473	578	242	353	6.23
FR7.5CL	103U2790	1/5	86	114	154	202	262	285	333	418	515	630	267	395	6.93
FR8.5CL	103U2890	1/4	99	126	168	222	290	317	372	468	577	315	472	7.95	
NL7CLX	105F3710	1/3	102	146	199	263	340	369	430	536	657	796	274	381	7.27
SC10CLX	104L2533	1/3	166	255	360	400	483	625	789	977	352	508	10.29		

SC12CL 104L2623 3/8 58 140 237 353 490 541 650 835 1048 1292 445 654 12.87
SC12CLX.2 104L2697 1/2 130 205 294 399 522 569 666 834 1026 475 659 12.87
SC15CL 104L2853 1/2 151 299 452 615 673 792 988 1208 1458 560 790 15.28
SC15CLX.2 104L2896 1/2 159 250 358 486 637 694 813 1017 1251 1519 565 783 15.28
SC18CL 104L2123 5/8 167 271 395 542 715 781 918 1154 1425 1735 615 894 17.68
SC18CLX.2 104L2197 3/4 194 306 439 595 780 849 995 1245 1532 680 949 17.68
SC21CL 104L2322 7/8 226 325 455 617 813 887 1042 1306 1606 702 989 20.95
GS26CLX 107B0500 1 325 497 703 949 1240 1348 1580 1974 2427 888 1285 26.30
GS34CLX 107B0501 1 1/4 729 1003 1330 1715 1857 2165 2687 3289 1196 1721 33.80

60 Hz

SC10CLX 104L2533 3/8 224 335 455 499 588 738 906 1096 430 623 10.29
SC12CLX 104L2695 1/2 146 282 429 590 649 770 972 1200 540 748 12.87
SC12CLX.2 104L2697 1/2 155 233 343 473 626 683 804 1011 1248 541 777 12.87
SC15CLX 104L2854 5/8 179 351 530 720 788 928 1158 1417 610 864 15.28
SC15CLX.2 104L2897 5/8 194 305 437 593 776 846 991 1239 1525 611 848 15.28
SC18CLX.2 104L2195 7/8 113 338 542 737 938 1010 1157 1410 1708 752 990 17.68
GS21CLX J 107B0506 1 475 674 905 1172 1270 1480 1873 2246 868 1180 21.20

R290

50 Hz

TL3CN J 102H4380 1/10 106 200 106 140 3.13
TL4CN J 102H4490 1/8 56 126 255 128 155 3.86
TL5CN 102H4590 1/6 81 109 143 183 198 230 283 345 416 162 211 5.08
NL7CN 105H6756 1/4 118 166 223 290 315 368 458 561 679 221 291 7.27
NL9CN 105H6856 1/3 138 194 259 335 364 423 526 643 778 250 334 8.35
SC10CNX 104H8065 1/3 126 179 245 325 355 420 531 660 809 274 362 10.29
SC12CNX 104H8265 3/8 178 250 331 426 462 540 678 846 1050 344 456 12.87
SC12CNX.2 104H8266 3/8 186 258 346 453 493 578 725 895 379 502 12.87
SC15CNX 104H8565 1/2 195 297 415 550 601 707 887 1093 1328 420 560 15.28
SC15CNX.2 104H8566 1/2 252 332 434 560 609 714 900 1120 445 610 15.28

Compressor	Code number	Application	Capacity [W] T _c =45°C, T _{liq} =45°C, T _{suc} =32°C Evaporating temperature [°C]						LBP rating point -35°C / 40°C		MBP rating point -10°C / 45°C		HBP rating 5°C / 50	
			-35	-15	-5	0	10	15	Cooling capacity	COP	Cooling capacity	COP	Cooling capacity	
			[W]	[W]	[W]	[W]	[W]	[W]	[W/W]	[W/W]	[W]	[W/W]	[W]	[W]
SC10CL	104L2523	LBP	168	634	991				183	0.70	694	1.24		
SC12CL	104L2623	LBP	237	835	1292				262	0.78	909	1.32		
SC15CL	104L2853	LBP ✓	299	988	1458				329	0.76	1048	1.26		
SC18CL ✓	104L2123	LBP ✓	395	1154	1735				405	0.86	1236	1.31		
SC21CL	104L2322	LBP ✓	455	1306					472	0.87	1393	1.34		
SC10CLX	104L2533	L/MBP	166	625	977	1190			180	0.65	685	1.28	1096	
SC12CLX.2	104L2697	LBP ✓	294	834					298	0.79	890	1.28		
SC15CLX.2	104L2896	LBP ✓	358	1017					364	0.81	1086	1.32		
SC18CLX.2	104L2197	LBP	439	1245					446	0.83	1329	1.33		
SC10DL	104L2525	M/HBP		611	968	1192	1747	2085			673	1.33	1100	
SC12DL	104L2625	M/HBP		806	1279	1565	2258	2674			892	1.36	1441	
SC15DL	104L2856	M/HBP		964	1493	1825	2652	3156			1047	1.38	1682	
SC15DLX.2	104L2871	M/HBP		983	1504	1824	2604	3071			1063	1.37	1669	
SC10MLX	104L2506	MBP		687	1051	1278					742	1.36	1162	
SC12MLX	104L2606	MBP		838	1272	1542					900	1.38	1401	
SC15MLX	104L2869	MBP		1038	1574	1909					1114	1.36	1752	
SC18MLX	104L2139	MBP		1210	1832	2220					1299	1.43	2037	
SC18MLX.3	104L2146	MBP		1266	1898	2292					1351	1.46	2109	
SC10/10CL	104L4087	LBP	336	1268	1981				365	0.70	1389	1.24		
SC12/12CL	104L4088	LBP	475	1670	2583				524	0.78	1818	1.32		