

COMPRESSOR DEFINITION

Designation	NE X6222UA
Nominal Voltage/Frequency	220-240 V 50 Hz
Engineering Number	865BA46

A - APPLICATION / LIMIT WORKING CONDITIONS

1 Type	Hermetic reciprocating compressor		
2 Refrigerant	R-290		
3 Nominal voltage and frequency	220-240 / 50	[V / Hz]	
4 Application type	Medium Back Pressure (Commercial Compressors)		
4.1 Evaporating temperature range	-20°C to 10°C	(-4°F to 50°F)	
5 Motor type	CSCR		
6 Starting torque	HST - Hight starting torque		
7 Expansion device	Capillary tube or Expansion valve		
8 Compressor cooling	Operating voltage range		
		50 Hz	60 Hz
8.1 LBP (32°C Ambient temperature)	-	-	-
8.2 LBP (43°C Ambient temperature)	-	-	-
8.3 HBP (32°C Ambient temperature)	-	-	-
8.4 HBP (43°C Ambient temperature)	-	-	-
9 Maximum condensing temperature			
9.1 Operating	18.4	[kgf/cm ²] (262 psig)	/ °C - °F
9.2 Peak	20.6	[kgf/cm ²] (293 psig)	/ °C - °F
10 Maximum winding temperature	130	[°C]	

B - MECHANICAL DATA

1 Commercial designation	1	[hp]
2 Displacement	18.70	[cm ³] (1.141 cu.in)
2.1 Bore [mm]	32.186	
2.2 Stroke [mm]	23.000	
3 Lubricant charge	350	[ml] (11.84 fl.oz.)
3.1 Lubricants approved		
3.2 Lubricants type/viscosity	ESTER / ISO22	
4 Weight (with oil charge)	11.6	[kg] (25.57 lb.)
5 Nitrogen charge	-	[kgf/cm ²]

C - ELETRICAL DATA

1 Nominal Voltage/Frequency/Number of Phases	220-240 V 50 Hz 1 ~ (Single phase)	
2 Starting device type	Voltage Relay	
2.1 Starting device	RVA4AL3C-649	
3 Start capacitor	108-130(330)	[µF(VAC minimum)]
4 Run capacitor	17.5(400)	[µF(VAC minimum)]
5 Motor protection	USP-523-83	
6 Start winding resistance	8.40	[Ω at 25°C (77°F)] +/- 8%
7 Run winding resistance	4.27	[Ω at 25°C (77°F)] +/- 8%
8 LRA - Locked rotor amperage (50 Hz)	24.00	[A] - Measured according to UL 984
9 FLA - Full load amperage L/MBP (50 Hz)	-	[A] - Measured according to UL 984
10 FLA - Full Load Amperage HBP (50 Hz)	-	[A] - Measured according to UL 984
11 Approval boards certification	VDE	

D - PERFORMANCE - CHECK POINT DATA

TEST CONDITIONS: @220V50Hz			EN12900MBP Fan		Evaporating temperature (Condensing temperature		-10°C (14°F) 45°C (113°F)		
Cooling capacity +/- 5%			Power consumption +/- 5%	Current consumption +/- 5%	Gas flow rate +/- 5%	EFFICIENCY RATE +/- 7%			
[Btu/h]	[kcal/h]	[W]	[W]	[A]	[kg/h]	[Btu/Wh]	[kcal/Wh]	[W/W]	
4877	1229	1429	668	3.11	17.55	7.30	1.84	2.14	

E - PERFORMANCE - CURVES

TEST CONDITIONS: @220V50Hz		EN12900 Fan			(Condensing temperature 35°C (+95°F))					
Evaporating temperature		Cooling capacity +/- 5%			Power consumption +/- 5%	Current consumption +/- 5%	Gas flow rate +/- 5%	EFFICIENCY RATE +/- 7%		
°C	(°F)	[Btu/h]	[kcal/h]	[W]	[W]	[A]	[kg/h]	[Btu/Wh]	[kcal/Wh]	[W/W]
-20	(- 4)	3715	936	1089	525	2.42	12.04	7.07	1.78	2.07
-15	(+ 5)	4548	1146	1333	563	2.62	14.83	8.08	2.04	2.37
-10	(+14)	5552	1399	1627	598	2.79	18.20	9.28	2.34	2.72
-5	(+23)	6726	1695	1971	632	2.95	22.21	10.66	2.69	3.12
0	(+32)	8071	2034	2365	662	3.09	26.87	12.20	3.07	3.57
+5	(+41)	9585	2415	2809	690	3.21	32.23	13.89	3.50	4.07
+10	(+50)	11270	2840	3302	716	3.32	38.33	15.74	3.97	4.61

TEST CONDITIONS: @220V50Hz		EN12900 Fan			(Condensing temperature 45°C (+113°F))					
Evaporating temperature		Cooling capacity +/- 5%			Power consumption +/- 5%	Current consumption +/- 5%	Gas flow rate +/- 5%	EFFICIENCY RATE +/- 7%		
°C	(°F)	[Btu/h]	[kcal/h]	[W]	[W]	[A]	[kg/h]	[Btu/Wh]	[kcal/Wh]	[W/W]
-20	(- 4)	3223	812	945	569	2.63	11.45	5.68	1.43	1.66
-15	(+ 5)	3966	999	1162	620	2.87	14.18	6.40	1.61	1.88
-10	(+14)	4852	1223	1422	668	3.10	17.46	7.25	1.83	2.12
-5	(+23)	5881	1482	1723	714	3.31	21.33	8.22	2.07	2.41
0	(+32)	7054	1778	2067	757	3.51	25.82	9.31	2.35	2.73
+5	(+41)	8370	2109	2453	797	3.70	30.97	10.50	2.65	3.08
+10	(+50)	9830	2477	2880	836	3.88	36.82	11.78	2.97	3.45

TEST CONDITIONS: @220V50Hz		EN12900 Fan			(Condensing temperature 55°C (+131°F))					
Evaporating temperature		Cooling capacity +/- 5%			Power consumption +/- 5%	Current consumption +/- 5%	Gas flow rate +/- 5%	EFFICIENCY RATE +/- 7%		
°C	(°F)	[Btu/h]	[kcal/h]	[W]	[W]	[A]	[kg/h]	[Btu/Wh]	[kcal/Wh]	[W/W]
-20	(- 4)	2729	688	800	610	2.83	10.80	4.47	1.13	1.31
-15	(+ 5)	3377	851	989	674	3.13	13.44	5.01	1.26	1.47
-10	(+14)	4141	1044	1213	736	3.42	16.60	5.63	1.42	1.65
-5	(+23)	5022	1265	1471	796	3.70	20.31	6.32	1.59	1.85
0	(+32)	6019	1517	1764	853	3.96	24.60	7.07	1.78	2.07
+5	(+41)	7133	1797	2090	907	4.22	29.51	7.87	1.98	2.31
+10	(+50)	8363	2108	2451	959	4.46	35.07	8.71	2.19	2.55

F - EXTERNAL CHARACTERISTICS

1 Base plate	Universal		
2 Tray holder	No		
3 Connectors			
3.1 SUCTION	8.1 +0.10/+0.00	[mm]	(0.319" +0.004"/+0.000")
3.1.1 Material	Copper		
3.1.2 Shape	Slanted 42°		
3.2 DISCHARGE	6.45 +0.10/+0.00	[mm]	(0.254" +0.004"/+0.000")
3.2.1 Material	Copper		
3.2.2 Shape	Straight		
3.3 PROCESS	6.45 +0.10/+0.00	[mm]	(0.254" +0.004"/+0.000")
3.3.1 Material	Copper		
3.3.2 Shape	Slanted 42°		
3.4 Oil cooler (Copper)	No	[mm]	
3.5 Connector sealing	Rubber Plugs		