

Technical Data Sheet

Compressor model **NUT70CAb**
Voltage **220-240V 50Hz ~1**
Refrigerant **R290**
Compressor status

APPLICATION

Application	Low Back Pressure
Refrigerant	R290
Evaporating Temp.	-40,0 °C to -10,0 °C
Expansion	Capillar
Comp. Cooling	Fan cooled
Max. ambient temp.	43,0 °C

COMPRESSOR

Displacement	6,70 cm ³
Diameter	21,99 mm
Stroke	17,50 mm
Net Weight	9,41 Kg
Oil type	ISO VG 10 ESTER
Oil charge	200 cm ³
HP	1/4 hp

MOTOR

Voltage/Frequency	220-240V 50Hz
Voltage range	187-255 V
Type	RSCR
Phase number	1 PH
Locked Rotor Amps (LRA)	8,60 A
Max. Cont. Current (MCC)	1,85 A
Main W. resist. at 25°C	10,05 Ω
Start W. resist. at 25°C	18,26 Ω

NOMINAL PERFORMANCE

	ASHRAE	CECOMAF
Cooling Capacity	288 kCal/h	250 W
COP	1,80 W/W	1,39 W/W
EER	1,55 kCal/Wh	1,20 kCal/Wh
Input Power	186 W	179 W
Current	0,93 A	0,90 A

APPROVALS



TEST CYCLE CONDITIONS

	ASHRAE LBP (B)	CECOMAF LBP (A)
Evaporating temp. (T _e)	-23,3 °C	-25,0 °C
Condensing temp. (T _c)	55,0 °C	55,0 °C
Liquid temp. (T _{liq.})	32,0 °C	55,0 °C
Ambient temp. (T _{amb.})	32,0 °C	32,0 °C
Suction temp. (T _{suction})	32,0 °C	32,0 °C
Voltage/Frequency	220 V 50 Hz	220 V 50 Hz

ELECTRICAL COMPONENTS

Run capacitor	6 µF 400 V			
Relay	Option 1			
Reference	PTC K100			
Voltage	200-240 V			
Resistance	14 Ω			
Protector	Option 1	Option 2		
Reference	AE18FU	B65-135		
Current	6,30 A	6,50 A		
Time check	7,5-14 seg	7,5-16 seg		
Disc temp. (Open/Close)	120,00 / 62,00 °C	135,00 / 61,00 °C		

This product is approved for R290 and R600a regarding explosion safety according to standard EN 60335-1 and EN 60335-2-34

ASHRAE

Tc °C	Te °C	Cooling Capacity kCal/h	Consumption W	Current A	COP W/W	EER kCal/Wh
40	-40	131	118	0,63	1,30	1,11
40	-35	177	134	0,70	1,54	1,32
40	-30	231	149	0,77	1,80	1,55
40	-25	294	164	0,84	2,08	1,79
40	-23,3	317	169	0,86	2,18	1,87
40	-20	365	179	0,90	2,37	2,04
40	-15	446	193	0,96	2,68	2,31
40	-10	535	207	1,02	3,01	2,59

45	-40	126	118	0,64	1,24	1,07
45	-35	170	136	0,71	1,46	1,25
45	-30	223	153	0,78	1,70	1,46
45	-25	285	169	0,86	1,95	1,68
45	-23,3	307	175	0,88	2,04	1,76
45	-20	355	186	0,93	2,22	1,91
45	-15	434	201	1,00	2,51	2,16
45	-10	521	216	1,06	2,81	2,41

50	-40	121	119	0,64	1,19	1,02
50	-35	164	138	0,72	1,38	1,19
50	-30	215	156	0,80	1,60	1,38
50	-25	275	174	0,88	1,84	1,58
50	-23,3	298	180	0,91	1,92	1,65
50	-20	344	192	0,96	2,08	1,79
50	-15	421	209	1,03	2,35	2,02
50	-10	508	226	1,11	2,62	2,25

55	-40	116	119	0,64	1,13	0,97
55	-35	157	140	0,73	1,31	1,13
55	-30	207	160	0,82	1,51	1,30
55	-25	266	179	0,90	1,72	1,48
55	-23,3	288	186	0,93	1,80	1,55
55	-20	333	199	0,99	1,95	1,68
55	-15	409	217	1,07	2,19	1,89
55	-10	494	235	1,15	2,44	2,10

60	-40	111	120	0,64	1,08	0,93
60	-35	151	142	0,74	1,24	1,07
60	-30	200	163	0,83	1,42	1,22
60	-25	257	184	0,92	1,62	1,39
60	-23,3	278	192	0,95	1,69	1,45
60	-20	323	205	1,01	1,83	1,57
60	-15	397	225	1,10	2,05	1,77
60	-10	481	245	1,19	2,29	1,97

CECOMAF

Tc °C	Te °C	Cooling Capacity W	Consumption W	Current A	COP W/W	EER kCal/Wh
40	-40	142	118	0,63	1,21	1,05
40	-35	195	134	0,70	1,46	1,26
40	-30	256	149	0,77	1,71	1,48
40	-25	325	164	0,84	1,98	1,71
40	-23,3	350	169	0,86	2,07	1,79
40	-20	402	179	0,90	2,25	1,94
40	-15	487	193	0,96	2,52	2,18
40	-10	580	207	1,02	2,81	2,43

45	-40	131	118	0,64	1,11	0,96
45	-35	180	136	0,71	1,32	1,14
45	-30	236	153	0,78	1,54	1,33
45	-25	300	169	0,86	1,77	1,53
45	-23,3	324	175	0,88	1,85	1,60
45	-20	373	186	0,93	2,01	1,73
45	-15	453	201	1,00	2,25	1,95
45	-10	541	216	1,06	2,51	2,16

50	-40	120	119	0,64	1,01	0,88
50	-35	164	138	0,72	1,19	1,03
50	-30	216	156	0,80	1,38	1,19
50	-25	275	174	0,88	1,58	1,36
50	-23,3	297	180	0,91	1,65	1,42
50	-20	343	192	0,96	1,79	1,54
50	-15	419	209	1,03	2,00	1,73
50	-10	502	226	1,11	2,23	1,92

55	-40	109	119	0,64	0,92	0,79
55	-35	148	140	0,73	1,06	0,92
55	-30	195	160	0,82	1,22	1,06
55	-25	250	179	0,90	1,39	1,20
55	-23,3	271	186	0,93	1,46	1,26
55	-20	313	199	0,99	1,58	1,36
55	-15	384	217	1,07	1,77	1,53
55	-10	463	235	1,15	1,97	1,70

60	-40	98	120	0,64	0,82	0,71
60	-35	133	142	0,74	0,94	0,81
60	-30	175	163	0,83	1,07	0,93
60	-25	225	184	0,92	1,22	1,06
60	-23,3	244	192	0,95	1,28	1,10
60	-20	284	205	1,01	1,38	1,20
60	-15	350	225	1,10	1,56	1,34
60	-10	424	245	1,19	1,74	1,50

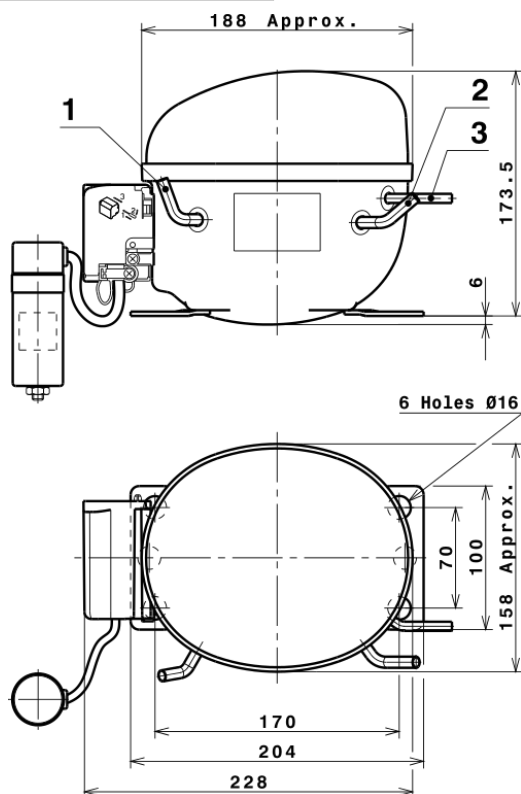
EN12900

X	Cooling Capacity (W)	Consumption (W)	Current (A)	Mass Flow (kg/h)
1	1.172,0921341170	135,4722354453	0,7007409267	10,961139140509
2	29,8537193354	0,0702885778	0,0008705498	0,31454012371179
3	-9,9045849553	2,5618933455	0,0116595121	-0,041121879616326
4	0,1562643395	-0,0104381724	-0,0000242615	0,0023188033037477
5	-0,1921866203	0,0614931571	0,0002806559	-0,00072212923986792

Equation

$$x_1 + x_2 Te + x_3 Tc + x_4 Te^2 + x_5 Te Tc$$

COMPRESSOR DIMENSIONS

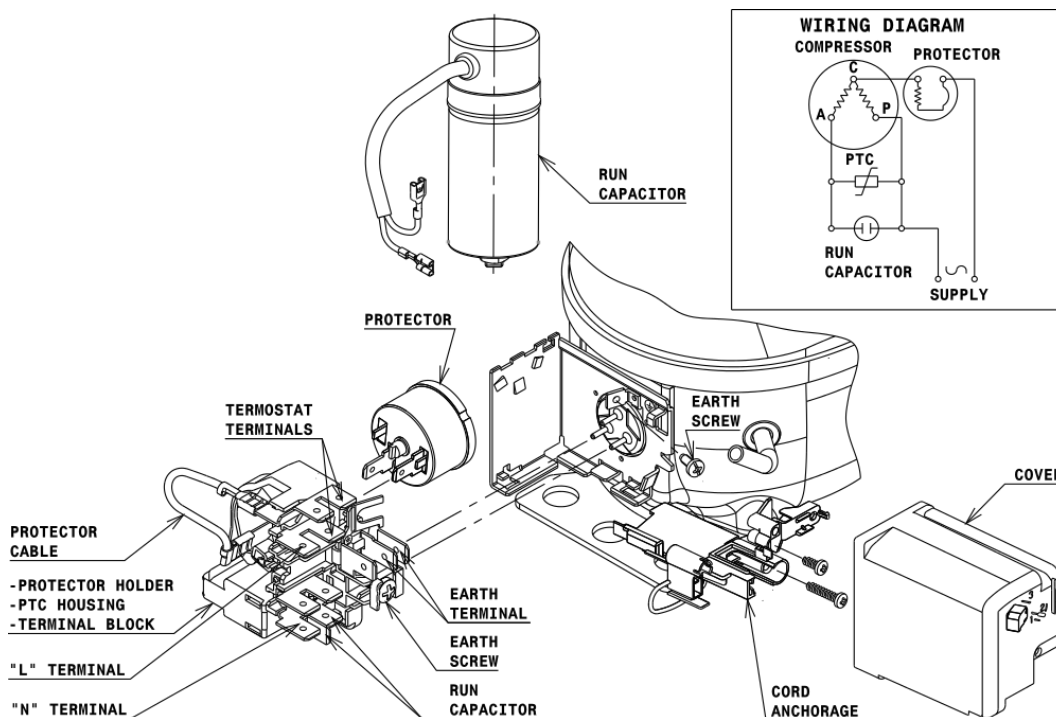


DESIGNATION INTERNAL DIAM.

1	Service	6,2 mm
2	Suction (Direct)	6,2 mm
3	Discharge	4,9 mm

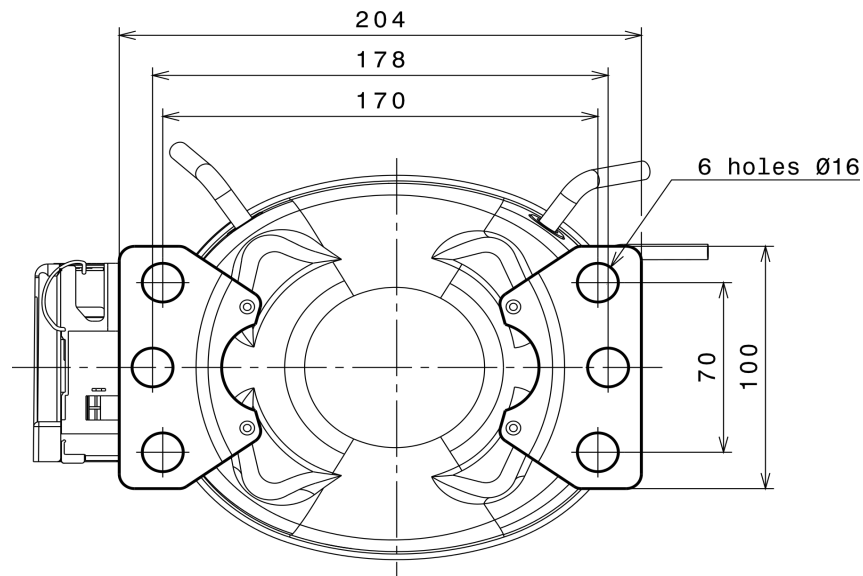
WIRING DIAGRAMS AND ELECTRICAL ASSEMBLY

RSCR CONNECTION (U range)



Technical Data Sheet

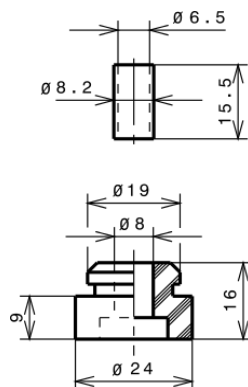
FIXINGS



SILENT BLOCKS (MOUNTING ACCESSORIES)

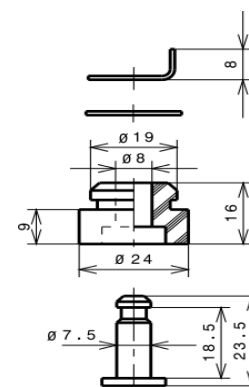
STANDARD

Ø16 holes (170x70 net)



SNAP-ON

Ø16 holes (170x70 net)



SOA

SOA R290 LBP

