

Technical Data Sheet

Compressor model **GPT18RG**
 Voltage **200-220/230V 50/60Hz ~1**
 Refrigerant **R134a**

APPLICATION		COMPRESSOR		MOTOR	
Application	High Back Pressure	Displacement	18,00 cm ³	Nominal Power	1/2 hp
Refrigerant	R134a	Diameter	32,60 mm	Voltage/Frequency	200-220V 50Hz
Evaporating Temp.	-15,0 °C to 10,0 °C	Stroke	21,11 mm	Voltage range	180-242 V
Expansion	Capillar/Valve	Net Weight	12,84 Kg	Type	CSR
Comp. Cooling	Fan cooled	Oil type	ISO VG 32 ESTER	Phase number	1 PH
Max. ambient temp.	43,0 °C	Oil charge	400 cm ³	Locked Rotor Amps (LRA)	19,50 A
Compatible refriger.	R1234yf			Max. Cont. Current (MCC)	5,00 A
				Main W. resist. at 25°C	3,08 Ω
				Start W. resist. at 25°C	7,22 Ω

NOMINAL PERFORMANCE

	ASHRAE	CECOMAF
Cooling Capacity	1.488 kCal/h	1.443 W
COP	2,37 W/W	2,04 W/W
EER	2,04 kCal/Wh	1,76 kCal/Wh
Input Power	730 W	708 W
Current	3,40 A	3,30 A

APPROVALS

TEST CYCLE CONDITIONS

	ASHRAE HBP (D)	CECOMAF HBP (C)
Evaporating temp. (T _e)	7,2 °C	5,0 °C
Condensing temp. (T _c)	55,0 °C	55,0 °C
Liquid temp. (T _{liq.})	46,0 °C	55,0 °C
Ambient temp. (T _{amb.})	35,0 °C	32,0 °C
Suction temp. (T _{suction})	35,0 °C	32,0 °C
Voltage/Frequency	220 V 50 Hz	220 V 50 Hz

ELECTRICAL COMPONENTS

Starting capacitor	47- 56 µF 330 V			
Run capacitor	20 µF 420 V			
Relay	Option 1			
Reference	2014 166. + NTC15Ω			
Pick-Up	11,00 A			
Drop-Out	9,35 A			
Protector	Option 1			
Reference	T0088			
Current	14,70 A			
Time check	7,5-14 seg			
Disc temp. (Open/Close)	115,00 / 62,00 °C			

ASHRAE

Tc °C	Te °C	Cooling Capacity kCal/h	Consumption W	Current A	COP W/W	EER kCal/Wh
40	-15	688	457	2,14	1,75	1,51
40	-10	858	500	2,33	2,00	1,72
40	-5	1.062	544	2,53	2,27	1,95
40	0	1.301	591	2,75	2,56	2,20
40	5	1.575	639	2,97	2,87	2,46
40	7,2	1.706	661	3,07	3,00	2,58
40	10	1.883	689	3,21	3,18	2,73

45	-15	648	465	2,17	1,62	1,40
45	-10	811	511	2,38	1,84	1,59
45	-5	1.007	559	2,60	2,10	1,80
45	0	1.239	609	2,83	2,37	2,03
45	5	1.505	661	3,07	2,65	2,28
45	7,2	1.633	684	3,18	2,78	2,39
45	10	1.806	714	3,33	2,94	2,53

50	-15	609	472	2,21	1,50	1,29
50	-10	763	522	2,43	1,70	1,46
50	-5	953	574	2,67	1,93	1,66
50	0	1.177	627	2,92	2,18	1,88
50	5	1.436	682	3,17	2,45	2,10
50	7,2	1.561	707	3,29	2,57	2,21
50	10	1.729	739	3,44	2,72	2,34

55	-15	569	480	2,24	1,38	1,19
55	-10	716	533	2,48	1,56	1,34
55	-5	898	588	2,74	1,78	1,53
55	0	1.115	645	3,00	2,01	1,73
55	5	1.366	704	3,28	2,26	1,94
55	7,2	1.488	730	3,40	2,37	2,04
55	10	1.652	764	3,56	2,52	2,16

60	-15	529	488	2,27	1,26	1,09
60	-10	669	544	2,53	1,43	1,23
60	-5	844	603	2,80	1,63	1,40
60	0	1.053	663	3,08	1,85	1,59
60	5	1.297	725	3,38	2,08	1,79
60	7,2	1.415	753	3,51	2,19	1,88
60	10	1.576	789	3,68	2,32	2,00

65	-15	490	495	2,31	1,15	0,99
65	-10	622	555	2,58	1,30	1,12
65	-5	789	617	2,87	1,49	1,28
65	0	991	681	3,17	1,69	1,46
65	5	1.228	747	3,48	1,91	1,64
65	7,2	1.343	776	3,62	2,01	1,73
65	10	1.499	814	3,80	2,14	1,84

CECOMAF

Tc °C	Te °C	Cooling Capacity W	Consumption W	Current A	COP W/W	EER kCal/Wh
40	-15	741	460	2,15	1,61	1,39
40	-10	925	503	2,34	1,84	1,59
40	-5	1.145	548	2,55	2,09	1,81
40	0	1.402	594	2,76	2,36	2,04
40	5	1.695	643	2,99	2,64	2,28
40	7,2	1.836	665	3,09	2,76	2,38
40	10	2.025	694	3,23	2,92	2,52

45	-15	695	467	2,18	1,49	1,28
45	-10	869	514	2,39	1,69	1,46
45	-5	1.080	562	2,62	1,92	1,66
45	0	1.328	613	2,85	2,17	1,87
45	5	1.611	665	3,09	2,42	2,09
45	7,2	1.748	688	3,20	2,54	2,19
45	10	1.932	719	3,35	2,69	2,32

50	-15	648	475	2,22	1,36	1,18
50	-10	813	525	2,45	1,55	1,34
50	-5	1.015	577	2,68	1,76	1,52
50	0	1.253	631	2,93	1,99	1,72
50	5	1.527	686	3,19	2,23	1,92
50	7,2	1.660	712	3,31	2,33	2,02
50	10	1.838	744	3,47	2,47	2,13

55	-15	602	483	2,25	1,25	1,08
55	-10	758	536	2,50	1,41	1,22
55	-5	950	592	2,75	1,61	1,39
55	0	1.178	649	3,02	1,82	1,57
55	5	1.443	708	3,30	2,04	1,76
55	7,2	1.572	735	3,42	2,14	1,85
55	10	1.745	769	3,59	2,27	1,96

60	-15	556	490	2,29	1,13	0,98
60	-10	702	547	2,55	1,28	1,11
60	-5	885	606	2,82	1,46	1,26
60	0	1.104	667	3,10	1,65	1,43
60	5	1.359	730	3,40	1,86	1,61
60	7,2	1.483	758	3,53	1,96	1,69
60	10	1.651	794	3,71	2,08	1,80

65	-15	509	498	2,32	1,02	0,88
65	-10	646	559	2,60	1,16	1,00
65	-5	819	621	2,89	1,32	1,14
65	0	1.029	685	3,19	1,50	1,30
65	5	1.275	751	3,50	1,70	1,47
65	7,2	1.395	781	3,64	1,79	1,54
65	10	1.558	819	3,83	1,90	1,64

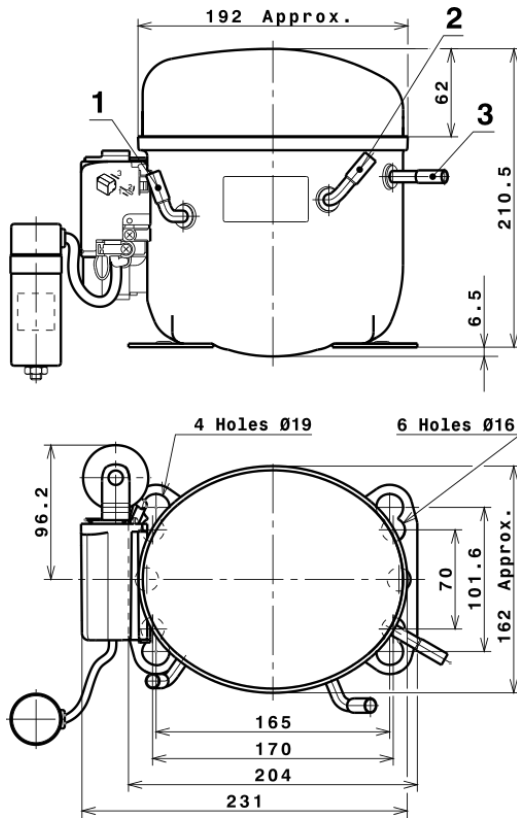
EN12900

X	Cooling Capacity (W)	Consumption (W)	Current (A)	Mass Flow (kg/h)
1	2.007,6522654819	460,7360659447	2,1324238840	32,325906564837
2	70,6852491554	4,2377220574	0,0188336134	1,2219805034857
3	-15,6060907716	3,7275781234	0,0175400777	-0,038322611606487
4	0,7187156915	0,0442261543	0,0002628060	0,021491810070197
5	-0,4066794513	0,1433236777	0,0006916223	0,0019445577886624

Equation	$x_1 + x_2Te + x_3Tc + x_4Te^2 + x_5TeTc$
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Technical Data Sheet

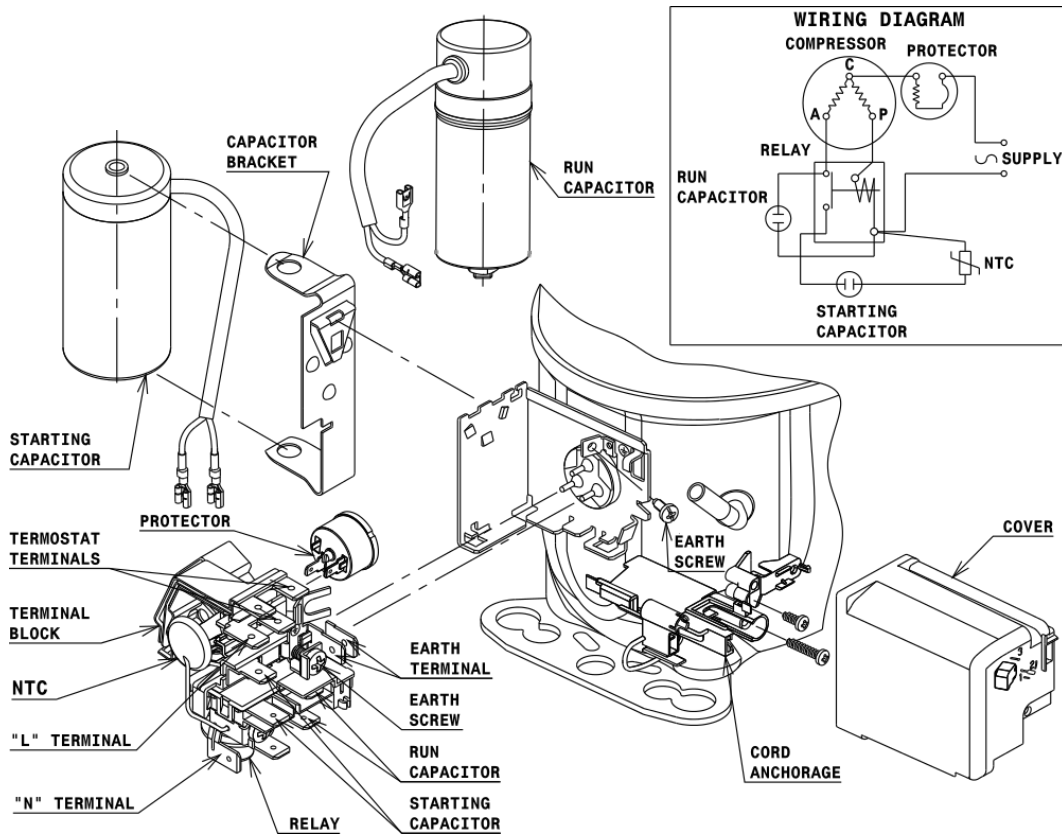
COMPRESSOR DIMENSIONS



DESIGNATION	INTERNAL DIAM.
1 Suction	8,1 mm
2 Service	8,1 mm
3 Discharge	6,5 mm

WIRING DIAGRAMS AND ELECTRICAL ASSEMBLY

CSR CONNECTION (CURRENT RELAY + NTC) (L, P ranges)



FIXINGS



SILENT BLOCKS (MOUNTING ACCESSORIES)

STANDARD

$\varnothing 16$ holes (170x70 net)



AMERICAN FEET

$\varnothing 19$ holes (165x101.6 net)



SNAP-ON

$\varnothing 16$ holes (170x70 net)



SOA

SOA R134a HBP

