

SPECIFICATIONS OF COMPRESSOR

Model No: 5CF277SA04

Output : 25HP



Temporary

Panasonic Appliances Compressor (Dalian) Co., Ltd.

May 2021

GENERAL SPECIFICATIONS

Model No:	5CF277SA04		
Application			
Evaporating Temp Range	(°C)	-25.0 ~ 20.0	
Refrigerant		R410A	
Compressor Cooling		Natural Cooling	
Rated Performance			
Capacity	(W)	73060	
Input	(W)	22270	
Current	(A)	38.4	
Revolution	(min ⁻¹)	2920	
Sound Level	(dB(A))	79 Max	
Rating Conditions			
Power Source		3-PH	50Hz 380V
Evaporating Temp	(°C)	7.2	
Condensing Temp	(°C)	54.4	
Suction Gas Temp	(°C)	18.3	
Liquid Temp	(°C)	46.1	
Ambient Temp	(°C)	35.0	
Measuring Point of Sound Level			
Distance from the Compressor	(m)	1.0	
Compressor			
Design		Hermetic Scroll	
Displacement	(cm ³)	277.0	
Suction Line Connection	(Φ mm OD)	41.2	
Discharge Line Connection	(Φ mm OD)	34.9	
Oil	(ml)	4500 (FV68S)	
Mass(Incl.Oil)	(kg)	102	
Motor			
Type		3-PH Induction Motor(3IR)	
Pole		2	
Rated Power Source		3-PH 50Hz 380-415	
Voltage Range	(V)	342~456	
Starting Current	(A)	—	

Panasonic Appliances Compressor (Dalian) Co., Ltd.

PERFORMANCE DATA

Compressor Model	5CF277SA04
Power Source	3PH 50Hz 380-415V
Suction Gas Superheat(K)	11.1
Sub Cooling(K)	8.3
Compressor Cooling	Natural Cooling
Refrigerant	R410A

CAPACITY (W)

Condensing Temperature(°C)	Evaporating Temperature(°C)							
	-15	-10	-6.7	0	4.4	7.2	10	15
35.0	42,850	51,220	57,630	73,210	85,660	94,670	104,620	125,070
40.5	40,010	47,780	53,720	68,160	79,680	88,020	97,220	116,110
45.0	37,800	45,110	50,700	64,250	75,070	82,880	91,510	109,210
50.0	35,490	42,310	47,520	60,160	70,230	77,510	85,530	101,990
54.4		39,990	44,890	56,770	66,230	73,060	80,590	96,020
60.0			41,750	52,730	61,470	67,770	74,720	88,950
65.0				49,400	57,550	63,420	69,890	83,120

POWER (W)

Condensing Temperature(°C)	Evaporating Temperature(°C)							
	-15	-10	-6.7	0	4.4	7.2	10	15
35.0	14,380	14,570	14,700	14,950	15,120	15,230	15,340	15,540
40.5	16,030	16,220	16,350	16,620	16,800	16,910	17,030	17,240
45.0	17,550	17,760	17,890	18,170	18,360	18,480	18,590	18,810
50.0	19,450	19,660	19,800	20,090	20,280	20,400	20,530	20,750
54.4		21,500	21,650	21,950	22,140	22,270	22,400	22,630
60.0			24,230	24,540	24,740	24,870	25,000	25,240
65.0				27,070	27,280	27,410	27,550	27,790

CURRENT (A)

@380V

Condensing Temperature(°C)	Evaporating Temperature(°C)							
	-15	-10	-6.7	0	4.4	7.2	10	15
35.0	27.3	27.3	27.2	27.3	27.3	27.4	27.5	27.7
40.5	29.7	29.7	29.8	29.9	30.0	30.1	30.2	30.4
45.0	31.9	32.0	32.1	32.3	32.4	32.6	32.7	32.9
50.0	34.5	34.7	34.9	35.2	35.4	35.6	35.7	36.0
54.4		37.3	37.5	38.0	38.2	38.4	38.6	38.9
60.0			41.2	41.8	42.2	42.4	42.6	42.9
65.0				45.5	45.9	46.2	46.5	46.9

Flow(kg/H)

@380V

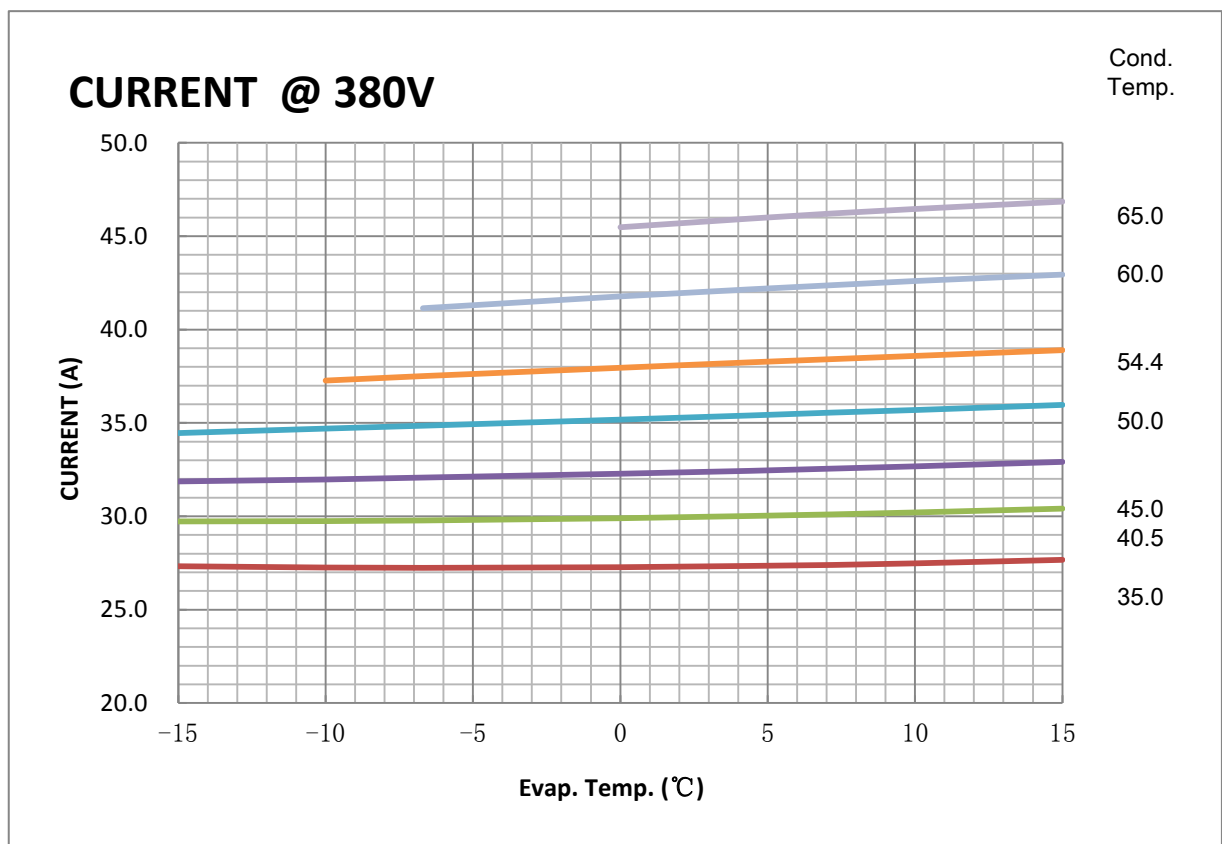
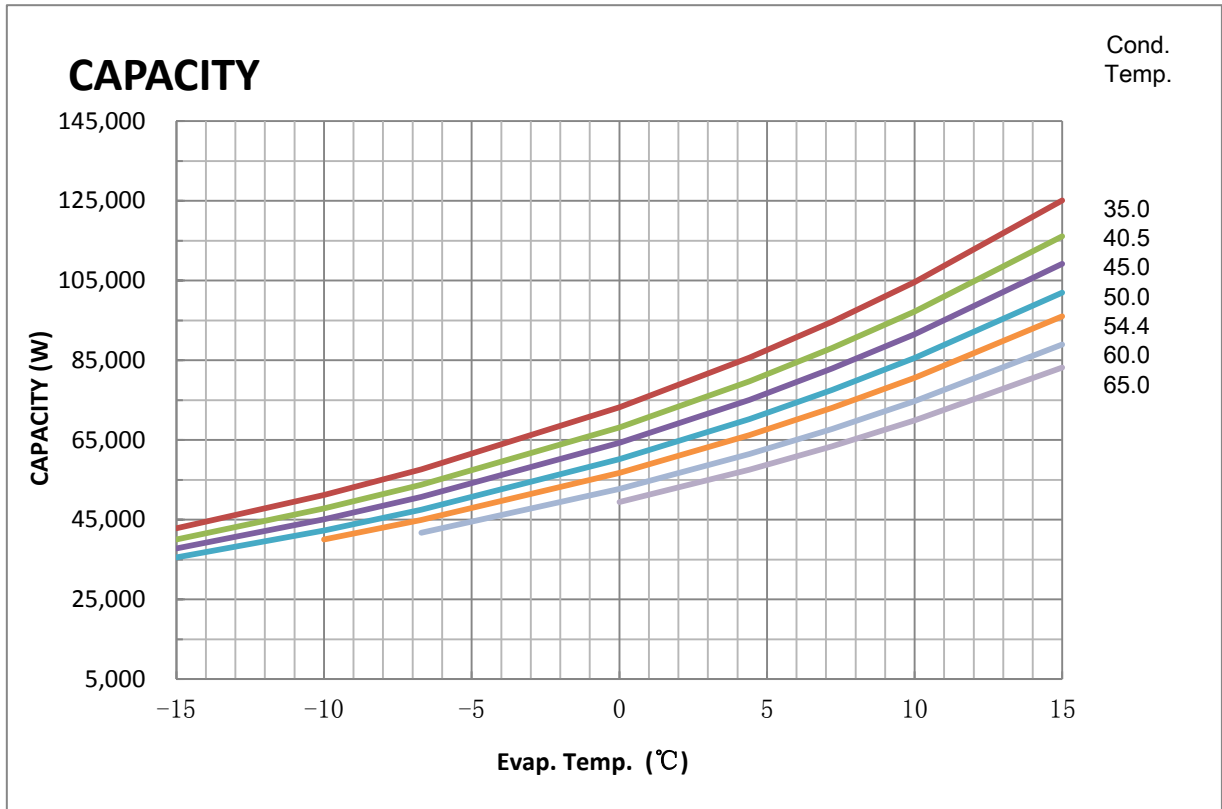
Condensing Temperature(°C)	Evaporating Temperature(°C)							
	-15	-10	-6.7	0	4.4	7.2	10	15
35.0	814	974	1,093	1,368	1,573	1,713	1,861	2,144
40.5	799	957	1,075	1,349	1,554	1,695	1,844	2,130
45.0	787	942	1,059	1,333	1,539	1,680	1,830	2,119
50.0	774	927	1,043	1,315	1,522	1,664	1,815	2,107
54.4		913	1,028	1,300	1,507	1,650	1,802	2,096
60.0			1,010	1,281	1,488	1,632	1,786	2,082
65.0				1,265	1,472	1,617	1,771	2,070

Compressor Model (Code)

5CF277SA04

Power Source

3PH 50Hz 380-415V



COEFFICIENTS OF PERFORMANCE CURVES

Compressor Model **5CF277SA04**
 Power Source **3PH 50Hz 380-415V**
 Suction Gas Superheat (K) **11.1**
 Sub Cooling (K) **8.3**
 Compressor Cooling **Natural Cooling**
 Refrigerant **R410A**

$$X=C1+C2*(S)+C3*D+C4*(S^2)+C5*(S*D)+C6*(D^2)+C7*(S^3)+C8*(D*S^2)+C9*(S*D^2)+C10*(D^3)$$

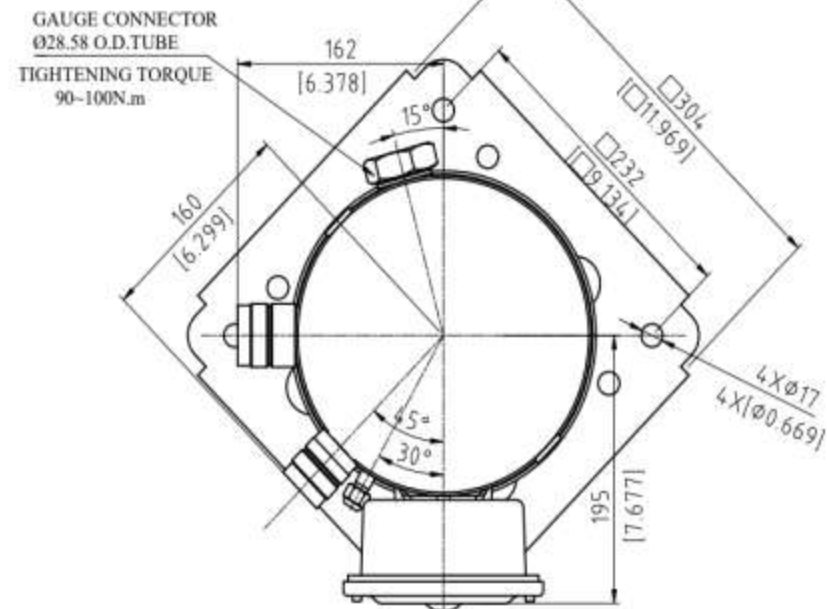
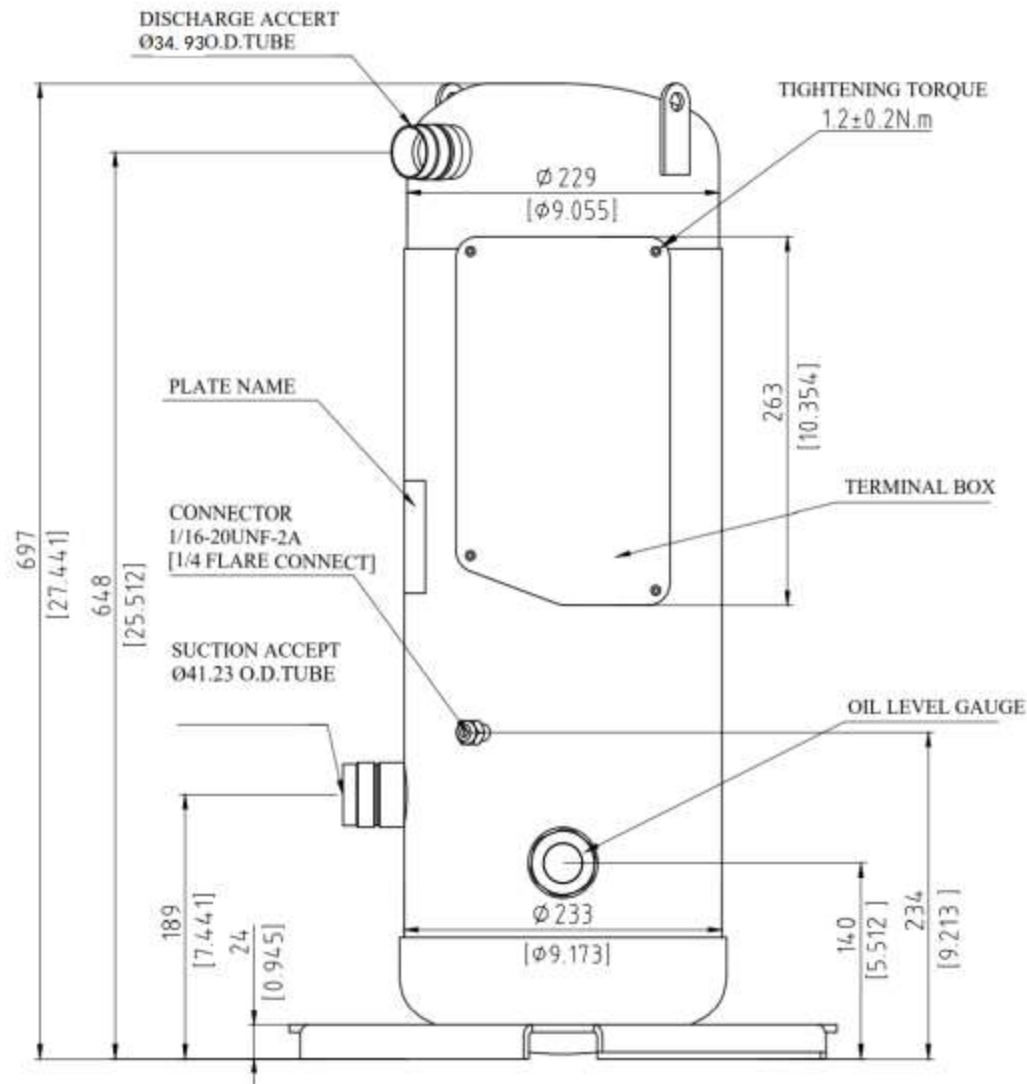
X——CAPACITY(W) OR POWER(W) OR CURRENT(A) OR FLOW(kg/h)

S——EVAPORATING TEMP, ° C

D——CONDENSING TEMP, ° C

380V-50Hz	CAPACITY (W)	POWER (W)	CURRENT (A)	FLOW (kg/h)
C1	1.125431E+05	1.012326E+04	1.791200E+01	1.498714E+03
C2	4.288220E+03	2.322060E+01	-4.802309E-03	4.395402E+01
C3	-1.305425E+03	-5.340989E+00	8.386704E-02	-3.869835E+00
C4	7.072330E+01	5.680322E-02	3.633438E-03	3.467780E-01
C5	-5.663308E+01	5.092225E-01	-1.030124E-03	1.472026E-02
C6	5.147909E+00	4.093087E+00	5.233279E-03	4.092321E-03
C7	4.923564E-01	5.967180E-04	-3.244563E-06	-4.480614E-05
C8	-6.541743E-01	-2.023321E-04	-7.141031E-05	4.158859E-03
C9	2.614710E-01	-2.140962E-03	4.286498E-05	-1.034642E-04
C10	-6.225328E-08	-3.810779E-09	1.530051E-11	1.575122E-09

Note: The polynomial coefficients subject to change without notice.



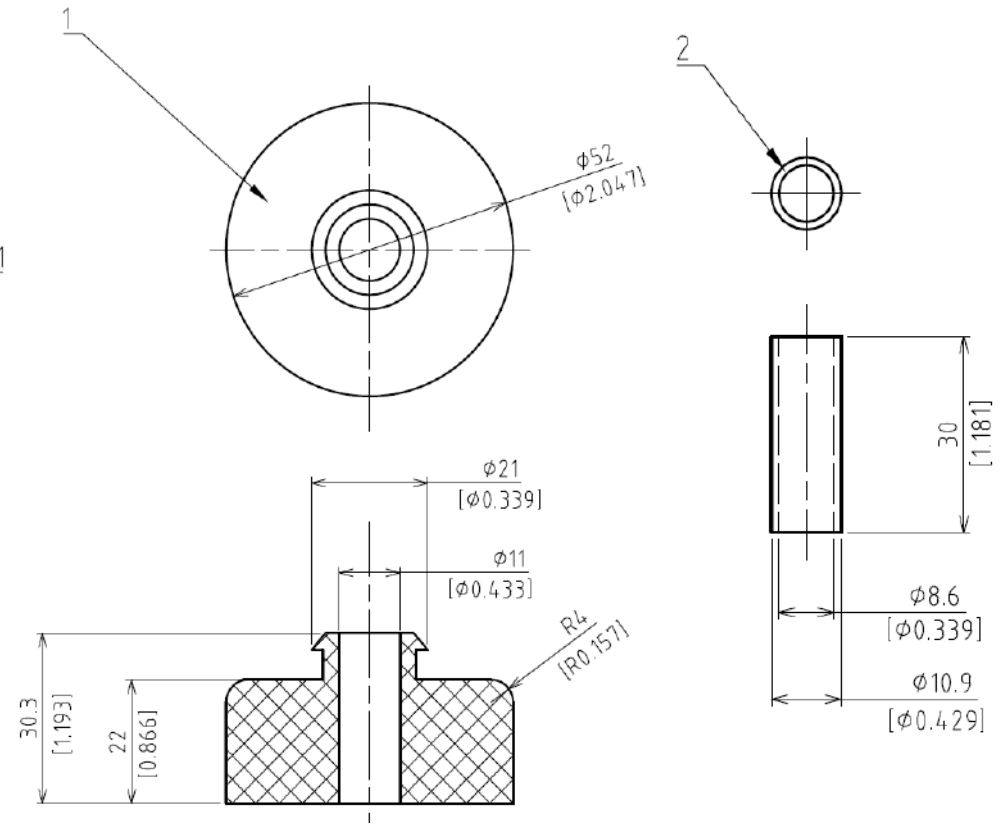
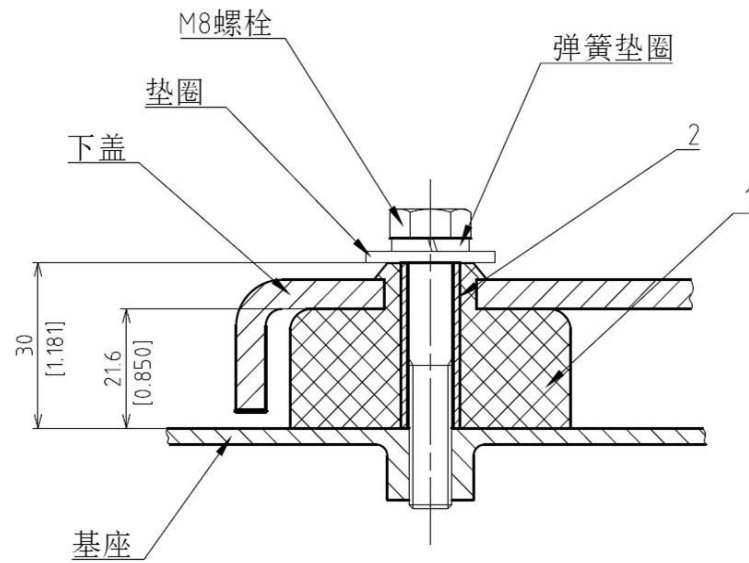
Part Code

D-0105-DSF-0

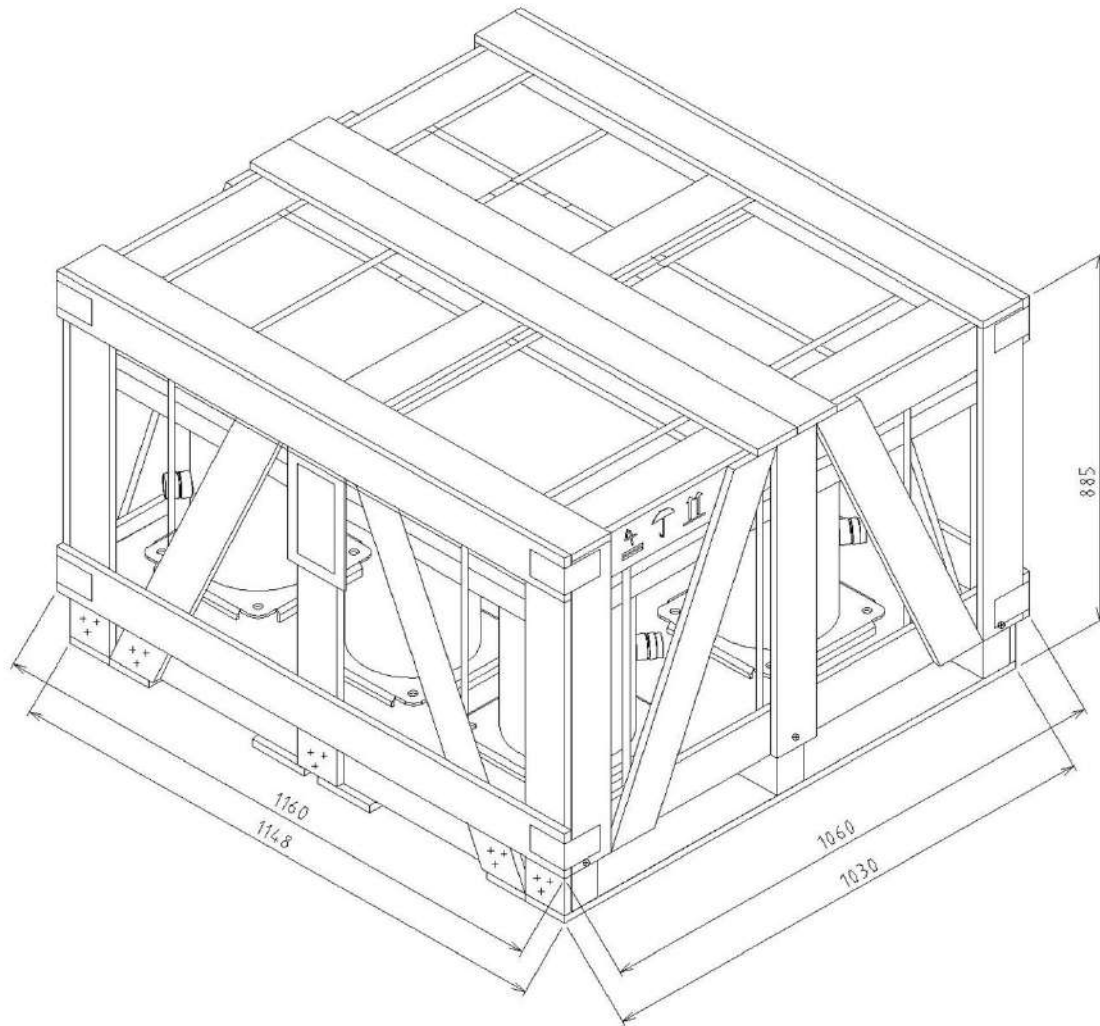
Name

Compressor Outline Drawing

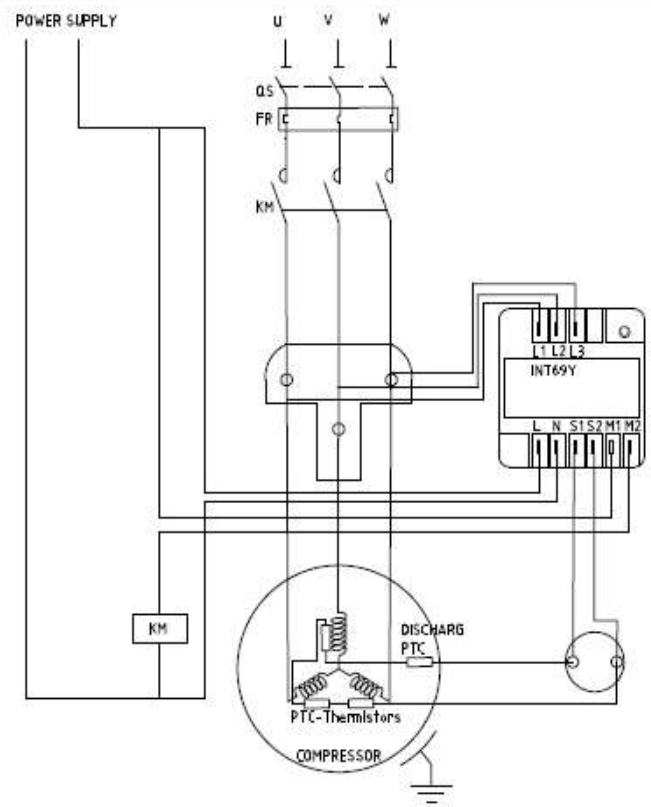
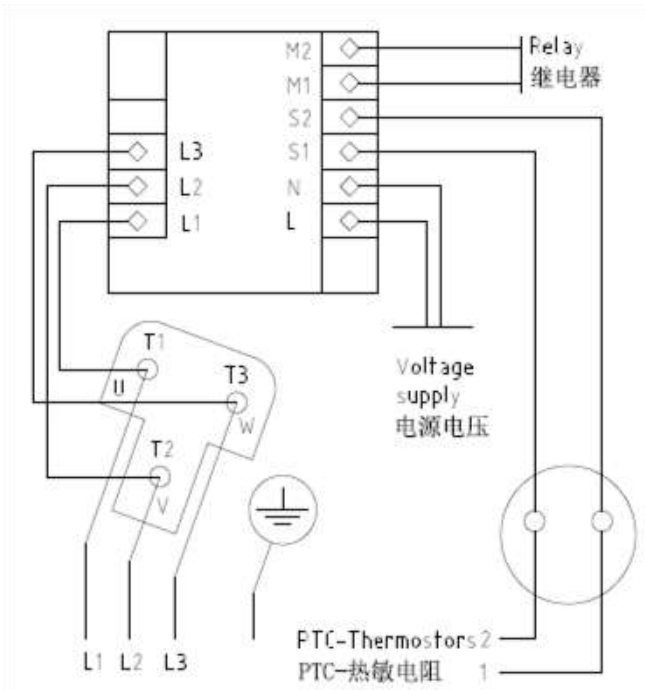
No.	QTY	Name
1	4	Cushion Rub.
2	4	Collar



Part Code
M-5102-DSB-0
Name
Mounting Parts Listing



Part Code
D-0202-DSB
Name
Packing Dimensions



Part Code
E-0910-DSB
Name
Wiring Diagram

Operation Envelope

Suction Gas Superheat: 11.1K
Refrigerant: R410A

