

XFL51B-D1-105 Technical Specifications

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1. Specifications

Model	XFL51B-D1-105	Power	7.5HP
Displacement(m ³ /h)	25.4	Refrigerant	R404A
Cooling Cap.(W) ^(a)	6783	Input Power(W) ^(a)	5129
Rated Load Amps(A) ^(a)	18.7	COP ^(a)	1.32
Max. Vibration(mm) ^(a)	<0.10	Sound Level (dBA) ^(a)	77
Test Power Source ^(a)	60Hz-220V	Rated Speed (RPM) ^(a)	3500
Max. Moisture (mg)	< 500	Max. Impurity (mg)	< 100
Oil Circulation (%) ^(a)	<1%	Weight (kg, With Oil)	35.3
Electrical Specification	Power Source	208V-230V 3~60Hz	
	Run Capacitor	/	
	Min. Operation Voltage(V) ^(b)	187	
	Max. Operation Voltage(V)	253	
	Min. Starting Voltage(V) ^(c)	177	
	Lock Rotor Amps(A)	240.00	
	Max. Operation Current ^(d)	28.8 (A)	
Terminal Resistance (Ω) (± 10%) At 25 °C	T1(C)-T2(S)	0.43	
	T2(S)-T3(R)	0.44	
	T3(R)-T1(C)	0.45	
Lubrication	Oil Type	POE	
	Initial Charge(L)	1.7	
	Recharge(L)	1.45	
Electrical Safety	Insulation Voltage(V)	2500	
	Leakage Current(mA)	≤5	
	Insulation Resistance(MΩ)	>20	
	Ground Resistance(Ω)	<0.1	
Max. Operation Pressure	High Side(MPa)	3.2	
	Low Side(MPa)	2.0	

Notes:

- a) Test Condition: Based On Test Power Voltage, First Rated Condition;
- b) Test Condition: ET 0°C, CT 60°C, SH 11.1K
- c) Test Condition: Discharge/Suction Pressure Set To Refrigeration Saturation Pressure At 40°C.
- d) Test Condition: ET 0°C, CT 60°C, SH11.1K, 90% Min. Rated Voltage;

2. Configuration

Suction/Discharge	Injection	Sight Glass	Thermal Tube
	Liquid		

3. Certifications

Certifications	Report N.O.
CB	/
CE	/
CCC	/
PED	/
UL	/

4. First Test Condition (°C)

Cooling Cap. and COP No Less Than **95%** of Nominal Value, Power and Current No More Than 105% of Nominal Value (Performance And Sound Power Need 24hrs Break In At High Load Running Condition).

Item	Parameter	Value
1	Evaporating Temp.	-31.7
2	Condensing Temp.	40.6
3	Ambient Temp.	35.0
4	Super Heat	50
5	Sub Cooling	0

5. Compressor Protection Parts

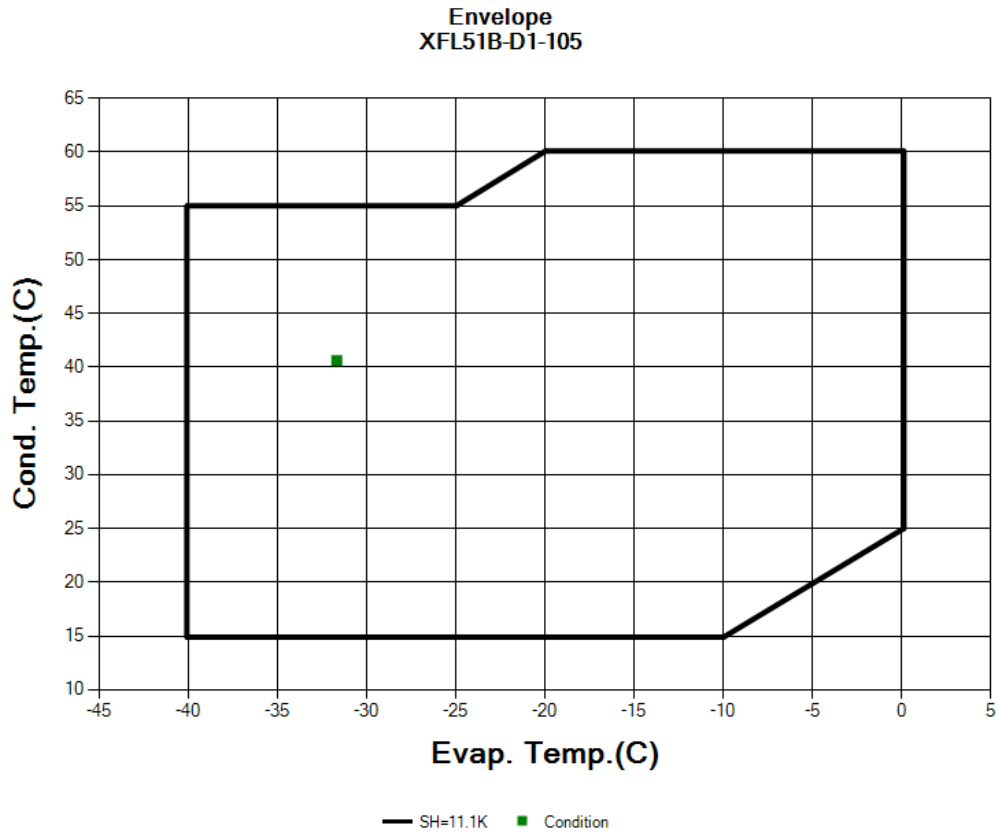
- a) Thermal Protection Inside;
- b) Internal Pressure Release Valve, Open Range (Pressure Difference Between Discharge And Suction) : 2.76~3.10Mpa

6. Performance Data

kW	Temp. Cond. (°C)	Temp. Evap. (°C)								
		-40	-35	-30	-25	-20	-15	-10	-5	0
Cooling Cap.	60					6.15	7.60	9.28	11.16	13.21
	55					7.26	8.96	10.91	13.09	15.48
	50	3.21	4.14	5.28	6.66	8.31	10.23	12.43	14.91	17.62
	45	3.62	4.66	5.93	7.47	9.30	11.43	13.88	16.63	19.63
	40	4.01	5.15	6.55	8.24	10.25	12.58	15.26	18.26	21.55
	35	4.39	5.64	7.16	9.00	11.17	13.70	16.60	19.84	23.38
	30	4.77	6.12	7.77	9.74	12.08	14.80	17.91	21.38	25.17
	25	5.17	6.62	8.39	10.51	13.01	15.92	19.23	22.92	26.95
	20	5.59	7.14	9.04	11.30	13.97	17.07	20.59	24.50	
	15	6.04	7.71	9.74	12.16	15.00	18.29	22.02		
Input Power	60					8.22	8.53	8.82	9.06	9.25
	55					7.48	7.77	8.03	8.25	8.42
	50	5.64	5.93	6.23	6.52	6.81	7.07	7.31	7.52	7.69
	45	5.15	5.40	5.67	5.93	6.19	6.44	6.67	6.87	7.03
	40	4.69	4.92	5.15	5.39	5.64	5.87	6.09	6.29	6.47
	35	4.27	4.47	4.68	4.91	5.14	5.37	5.59	5.80	5.98
	30	3.88	4.06	4.25	4.47	4.70	4.93	5.16	5.37	5.57
	25	3.52	3.68	3.87	4.09	4.31	4.55	4.79	5.03	5.25
	20	3.19	3.35	3.53	3.75	3.98	4.23	4.49	4.75	
	15	2.89	3.04	3.23	3.46	3.71	3.98	4.26		

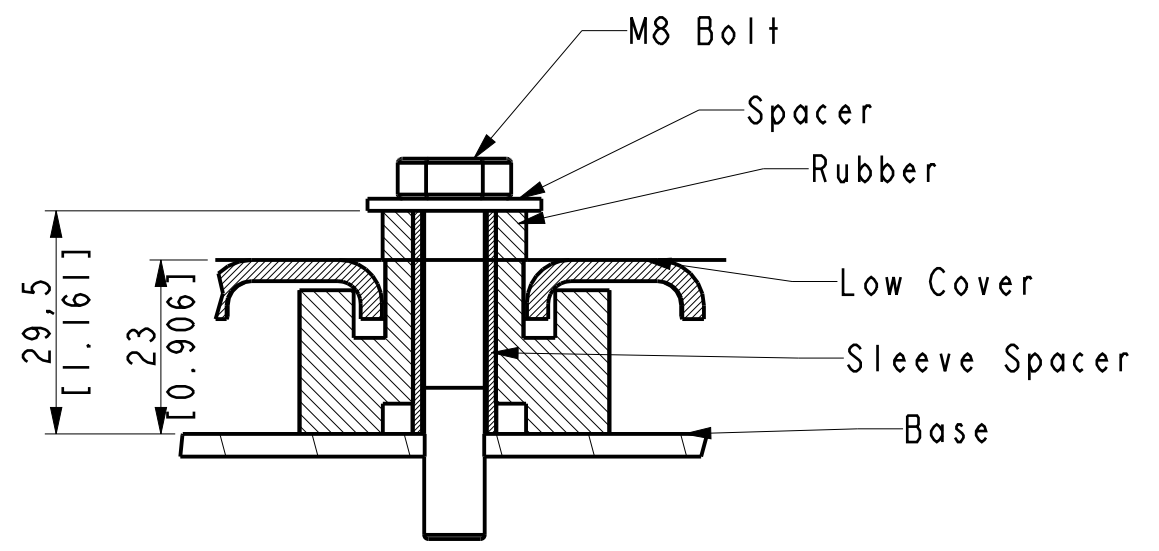
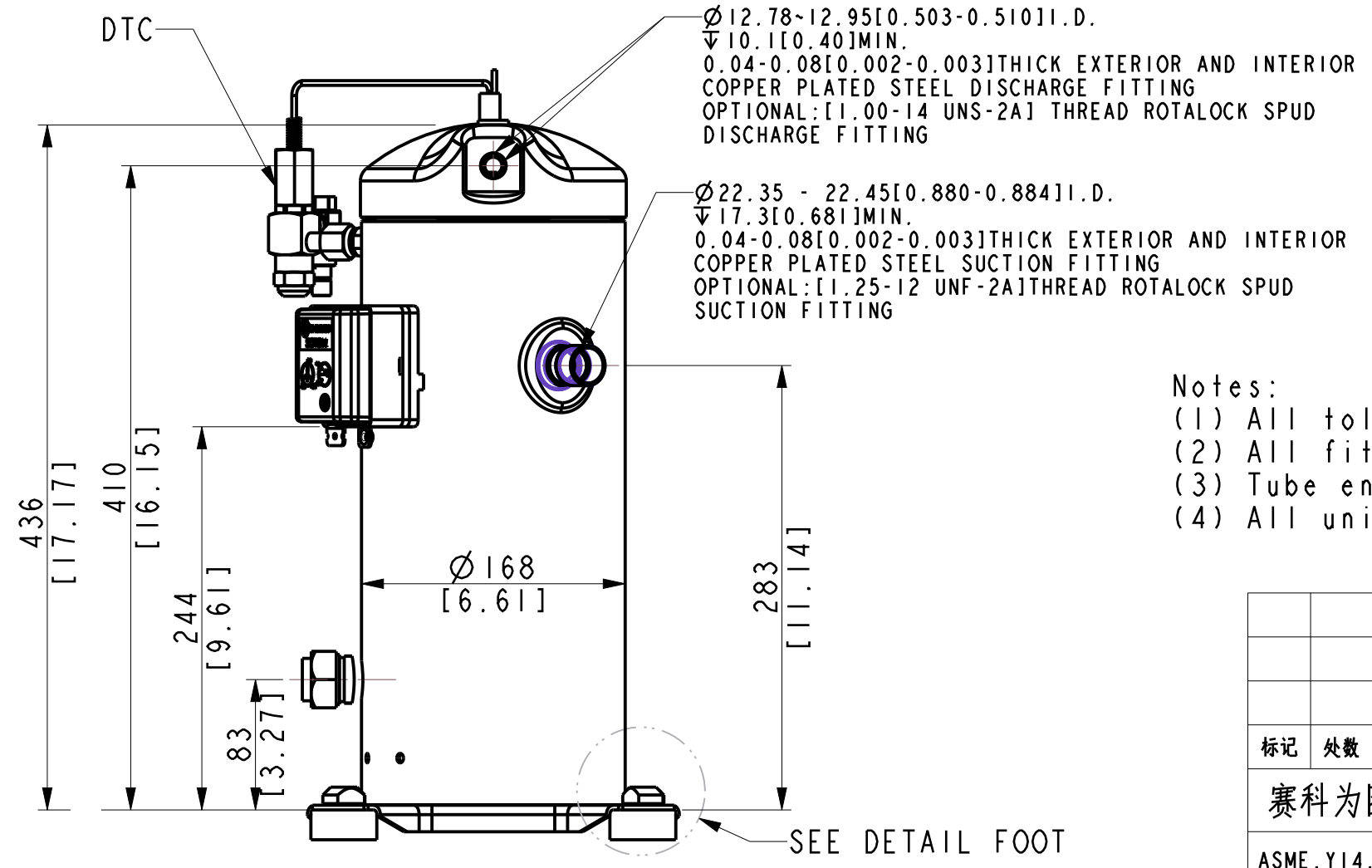
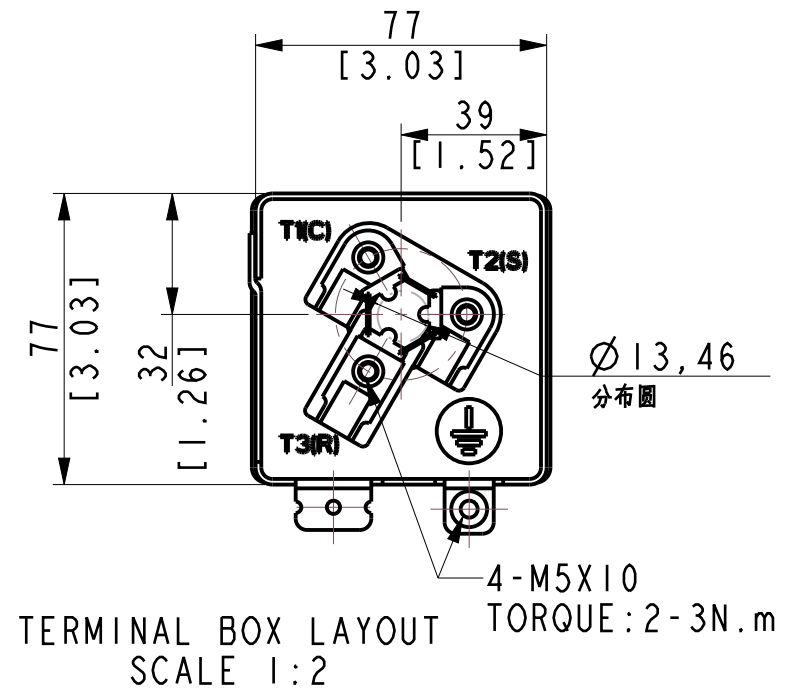
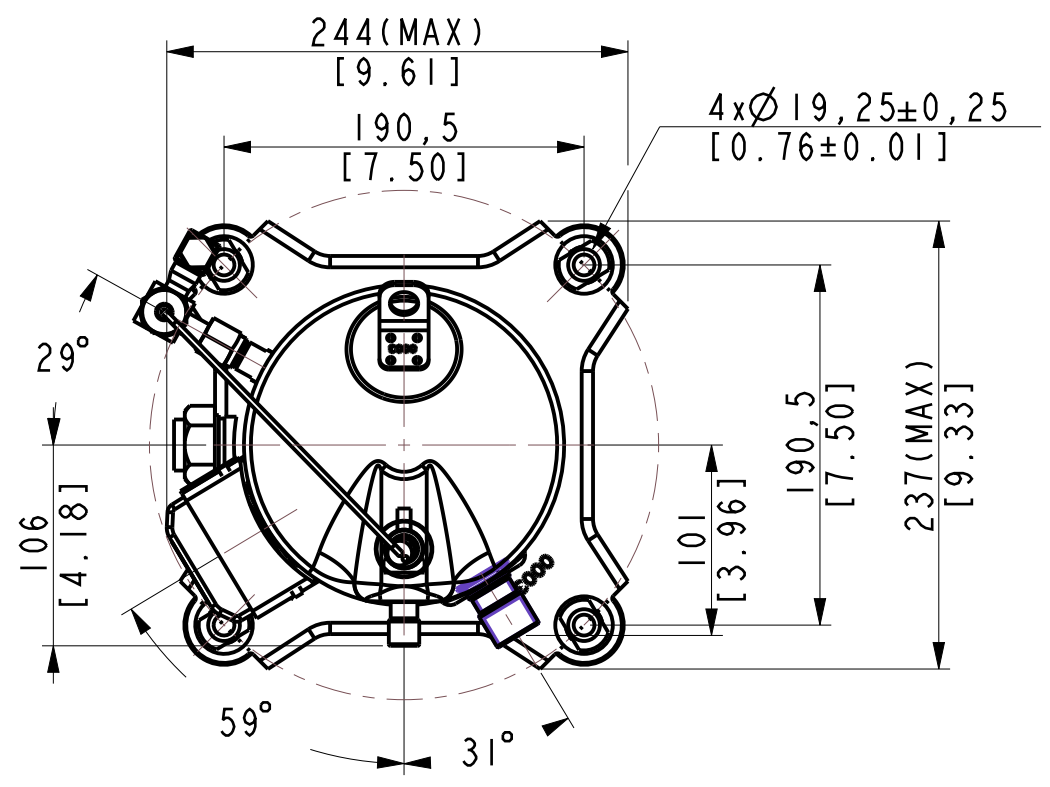
Notes: Capacity Calculation Based On SH=11.1K And Zero Sub Cooling

7. Application Envelope



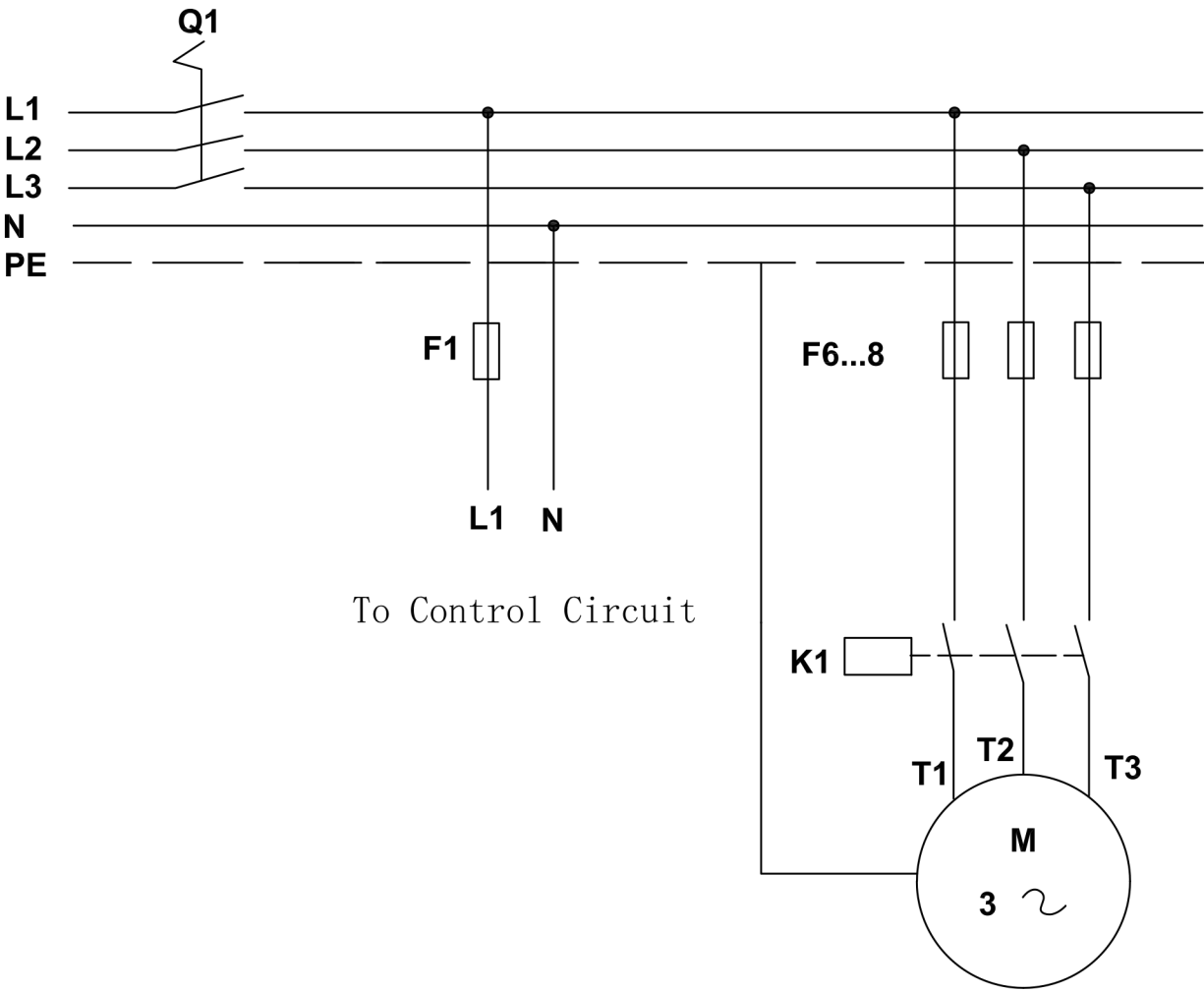
For Compressor Safty, Shutdown Compressor When DLT Above 125°C; When Compressor Running, Control DLT <= 110°C ;ReStart Compressor When DLT Below 85°C

8. Drawing



Notes:
 (1) All tolerances 1.5mm [0.06in] unless otherwise specified
 (2) All fittings: + 3.0mm 0.12in
 (3) Tube ends must be plugged
 (4) All units are in mmlinch]

						常州赛科为能源科技有限公司 Xecom Energy Technologies Ltd.		
标记	处数	视图	ECN代码	签字	日期	163外形图 (XFL)		
赛科为图纸通用标准				绘图	版本标记	重量	比例	801-0001-04EN
ASME.Y14.5		20°C测量		校对	0	0,125		
第三 视角	默认 公差	X ±0.4 X.X ±0.15 X.XX ±0.15 mm: ±0.5		批准	共 1 张 第 1 张			

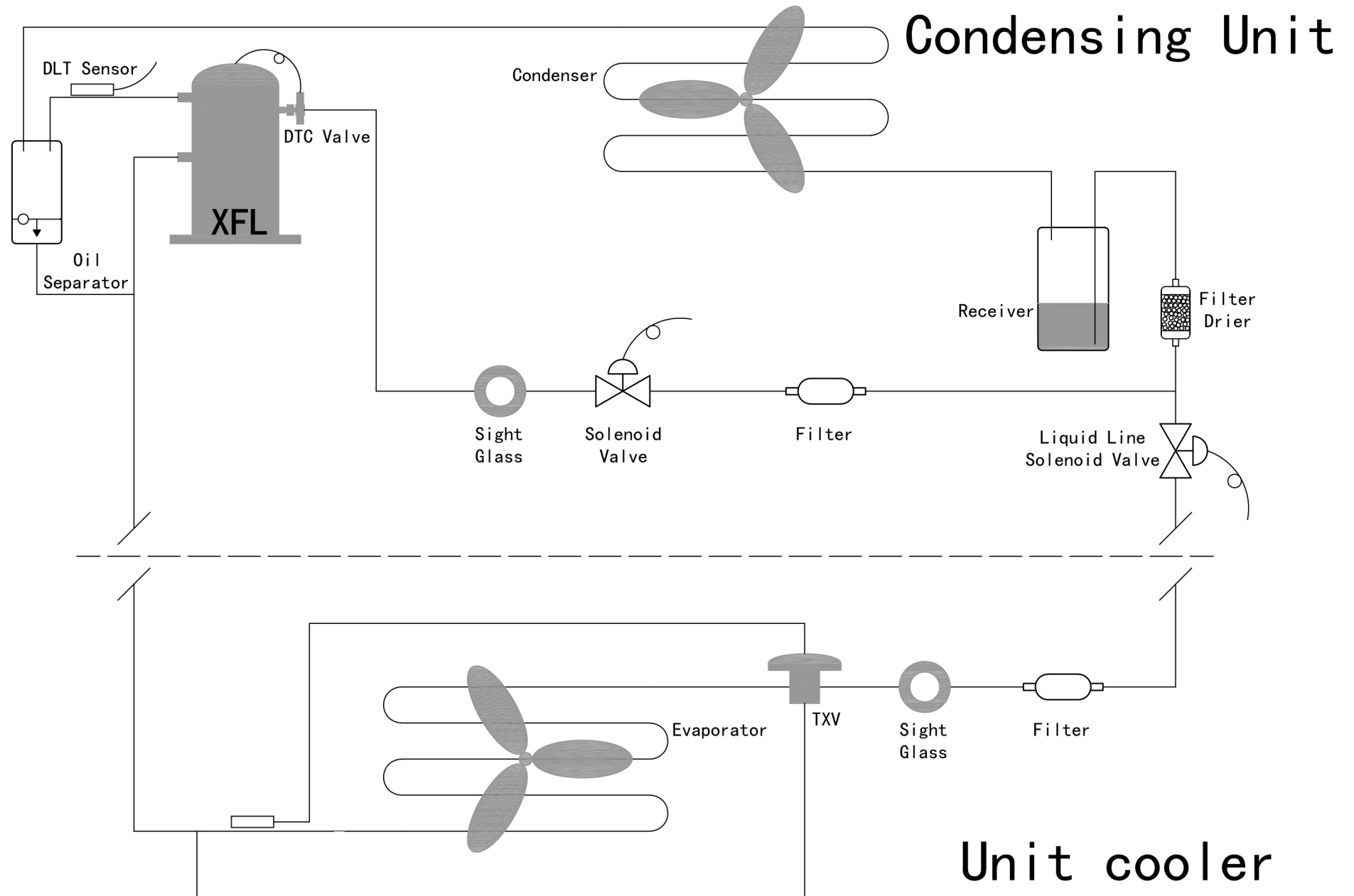


Electrical Schematics




L1/L2/L3/N/PE: 3 Phase Lines(line/neutral/ground)

- Q1: Manual Switch
- F1/F6...8: Fuse
- K1: Compressor Contactor
- M: Compressor Motor
- T1/T2/T3: Compressor Terminal




Liquid injection schematic



附件列表
Accessories List

Part N.O.	Specification	Qty	Part Name	Picture	Type	Description
505-0006-00	90°C	DTC Valve		1	Standard	
009-0015-00	11.5*14.5*1.3	DTC Seal		1	Standard	
019-0002-00	11.1*29.5	Sleeve Spacer		4	Standard	

附件列表
Accessories List

020- 0001-00		Terminal Seal		1	Standard	
200- 0001-00		Rubber		4	Standard	
100- 0006-00	M5x8,GB/T5789	Bolt		4	Standard	
017- 0000-00		Terminal Cover		1	Standard	

附件列表
Accessories List

016- 0001-00		T-Box		1	Standard	
034- 0001-03		Sound Jacket		1	Optional	
028- 0001-00	165 外径, 70W, 220V, 长度 518.1	Crank Heater		1	Optional	
031- 0015-00		Oil Adapter		1	Optional	
033- 0005-00	OUT580R/GOA114	Oil Regulator		1	Optional	

附件列表
Accessories List

031-0019-00	1"-14UN 2A 螺纹口	RotoLock Connector		1	Optional	
031-0017-00	螺纹 1-1/4"-12UNF-A	RotoLock Connector		1	Optional	
030-0000-00	1-1/4"-12UNF	Sight glasses		1	Standard	
200-0002-00		Steel		4	Optional	