

CHILLER SELECTION REPORT

Daikin Refrigeration Malaysia Sdn. Bhd.

Project : PProject1
Created By : pendy

Customer Input

Selected Model / Type : UAMH68A3F / Inverter Speed (Hybrid) Scroll Chiller Version A
Ambient Temperature : 25.0 °C Frequency : 50 Hz
Chilled Water : Flow Rate 50.00 m³/h Voltage : 400 V
LWT 8.00 °C Country of Origin : Malaysia

Generated Outputs

Full Load Performance		Nominal Data (MS Standard)		Input Conditions	
Cooling Capacity	:		69.70	70.00	TR
			245.1	246.2	kW
Current	:	Compressor	124	84	A
		Fan	9	9	A
		Total	133	93	A
Power Input	:	Compressor	74.64	45.63	kW
		Fan	5.400	5.400	kW
		Total	80.04	51.03	kW
COP	:		3.063	4.824	kW/kW
Flow Rate	:		38.03	50.00	m³/h
Pressure Drop	:		25.9	39.2	kPa

Note :
1. Nominal data is based on the MS2449 standard condition of EWT/LWT of 12.22/6.67°C, and ambient temperature of 35.0°C.
2. Input Condition data is based on customer's input condition of EWT/LWT , and ambient temperature.
3. Evaporator rating fouling factor = 0.018 m².K/kW, and rating altitude at 0 m.

Part Load Performance

MPLV	:	3.850										kW/kW
Point	:	1	2	3	4	5	6	7	8	9	10	
Corresponding Capacity	:	100.0	90.0	80.0	70.0	60.0	50.0	40.0	30.0	20.0	12.2	%
Total Cooling Capacity	:	70.00	63.00	56.00	49.00	42.00	35.00	28.00	21.00	14.00	8.573	TR
Total Cooling Capacity	:	246.2	221.6	197.0	172.3	147.7	123.1	98.48	73.86	49.24	30.15	kW
Total Power Input	:	51.03	46.92	41.28	36.49	30.89	25.50	20.94	15.84	10.69	7.263	kW
Total Current	:	93	83	75	67	54	47	39	27	20	14	A
COP	:	4.824	4.723	4.771	4.723	4.782	4.827	4.702	4.661	4.604	4.151	kW/kW
Ambient Temperature	:	25.0	25.0	25.0	25.0	25.0	25.0	25.0	25.0	25.0	25.0	°C
EEWT	:	12.24	11.82	11.39	10.97	10.54	10.12	9.70	9.27	8.85	8.52	°C
ELWT	:	8.00	8.00	8.00	8.00	8.00	8.00	8.00	8.00	8.00	8.00	°C
Flow Rate	:	50.00	50.00	50.00	50.00	50.00	50.00	50.00	50.00	50.00	50.00	m³/h
Pressure Drop	:	39.2	39.2	39.2	39.2	39.2	39.2	39.2	39.2	39.2	39.2	kPa

Others

MCA	:	175	A
No. of Refrigerant Circuit	:	2	-
Refrigerant Type	:	R410A	-
Refrigerant Charge	:	System 1/2	25.0 / 25.0
Chiller Dimension	:	W / D / H	2237 / 3263 / 2156
Weight	:	Shipping	2052
	:	Operating	2174

Evaporator

Type	:	S&T	-
Inlet/Outlet Diameter	:	4" Victaulic Joint	-
Flow Rate	:	Min / Max	15.00 / 56.70
Pressure Drop	:	Min / Max	5.00 / 47.0

Compressor

Quantity	:	System 1/2	2 / 2
Type	:		Hermetic-sealed (Scroll)
Oil Charge	:	System 1/2	13.4 / 13.4

Condenser

Coil	:		
Tube	:	Type	Copper
Fin	:	Type	Aluminium
Surface Area/ Coil	:		11.52
Fan	:		
Type/ Drive	:		Axial / Direct
Quantity per System	:		3