

Air Handler Heat Pump System			
Location:		Approval:	
Engineer:		Date:	
Submitted to:		Construction:	
Submitted by:		Unit #:	
Reference:		Drawing #:	



INDOOR SPECIFICATION			
Indoor Air Flow (High/Low) (CFM)		1690/750	
Indoor Noise Level (High/Low) (dBA)		51/44	
Dimension (W×D×H)	inch	24-31/64×21-1/32×53-3/16	
	mm	622×534×1346	
Package (W×D×H)	inch	27-7/8×26-37/64×54-9/64"	
	mm	708×675×1375	
Net/Gross Weight	lbs	164/181	
	kg	74.5/82	

OUTDOOR SPECIFICATION			
Compressor Type		TWIN-ROTARY	
Compressor Model		KTQ420D41SN5A1	
Refrigerant		R32	
Refrigerant Oil Charge(mL)		1000	
Refrigerant Oil		VG74	
Outdoor Air Flow (Max) (CFM)		3050.0	
Outdoor Noise Level (dBA)		60	
Dimension (W×D×H)	inch	29-9/64×29-9/64×32-7/8	
	mm	740×740×835	
Package (W×D×H)	inch	30-5/16×30-5/16×34-1/16	
	mm	770×770×865	
Net/Gross Weight	lbs	187/196	
	kg	85/89	

EFFICIENCY			
Cooling		Heating	
SEER2	18.5	HSPF2-4	8.1
EER2	9.7	COP	3.39

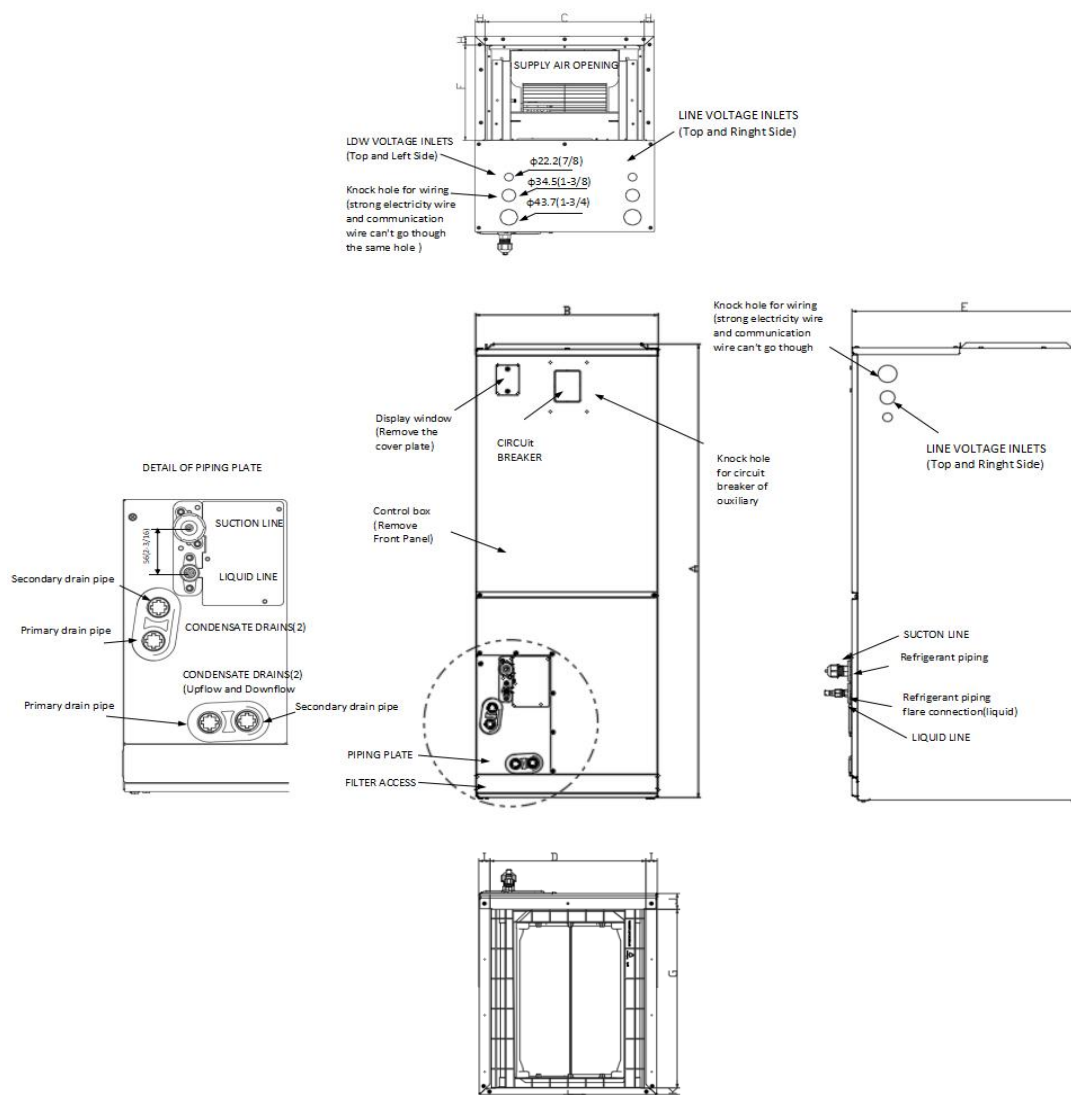
PERFORMANCE of Cooling	
Cooling (Btu/hr)	
Rated Capacity	48000
Min/Max Capacity	15000~49000
Moisture Removal(L/h)	0
Standard Operating Range(°F/°C)	5~131(-15~55)
Rated Cooling Conditions:	Indoor: 80°F DB/67°F WB Outdoor: 95°F DB/75°F WB

PERFORMANCE of Heating	
Heating (Btu/hr)	
1. @ 47°F Rated	48000
2. @ 47°F Min/Max Capacity	11000~52000
3. @ 17°F Rated	30000
4. @ 5°F Rated: Capacity / COP	36000/1.76
5. @ 5°F Max: Capacity	36000
Standard Operating Range(°F/°C)	-4~75(-20 ~ 24)
1. Rated Heating Conditions:	Indoor: 70°F DB/60°F WB Outdoor: 47°F DB/43°F WB
2. Rated Heating Conditions:	Indoor: 70°F DB/60°F WB Outdoor: 17°F DB/15°F WB
3. Heating Conditions, Compressor	Indoor: 70°F DB/60°F WB
Operating at Max. Frequency	Outdoor: 5°F DB/5°F WB

ELECTRICAL	
Indoor Power Supply	208/230V, 60Hz, 1Ph
Indoor MCA	7
Indoor MOP	15
Outdoor Power Supply	208/230V, 60Hz, 1Ph
Outdoor MCA	36
Outdoor MOP	40
Communication Wiring	AWG 25×3 Shielded
Compressor RLA	6.8
Outdoor Fan Motor RLA	2.3
Outdoor Fan Motor W	200
Indoor Fan Motor RLA	5.4
Indoor Fan Motor W	560
System Power Input @ Cooling (W)	4159.29203539823(830~5700)
System Power Input @ Heating (W)	4320(830~5700)
MCA: Min. circuit amps (A)	MOCP: Max. over current protection (A)
RLA: Rated load amps (A)	W: Fan motor rated output (W)

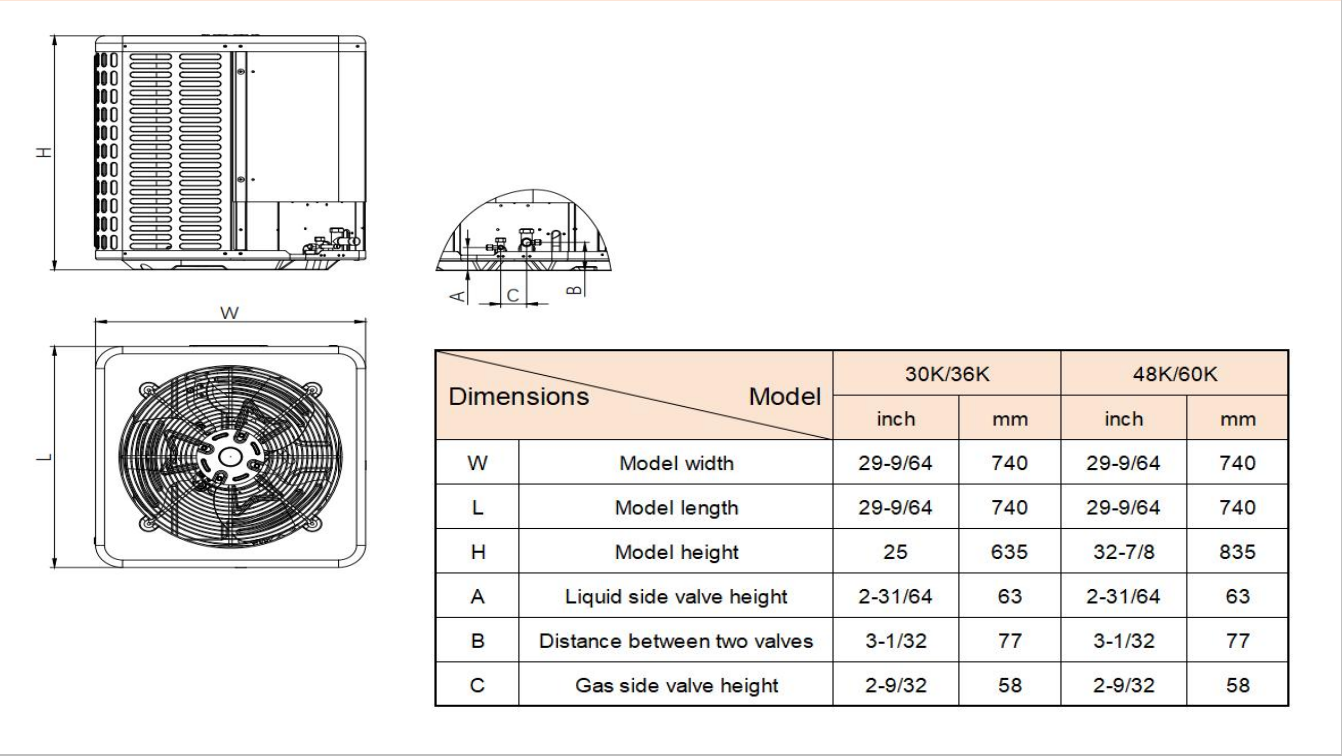
PIPING	
Throttle type(Indoor)	Piston
Throttle type(Outdoor)	EXV
Liquid Size	9.52mm(3/8in)
Gas Size	19mm(3/4in)
Max. Piping Length(ft/m)	246(75)
Max. Height Difference(ft/m)	98.4(30)
Max. Pre-charged Length(ft/m)	24.6(7.5)
Refrigerant Pre-charged Amount(oz/kg)	119.9(3.4)
Additional Charge of Refrigerant((oz/ft)/(g/m))	0.52(48)
Connection Method	Flared

Indoor Unit Dimension

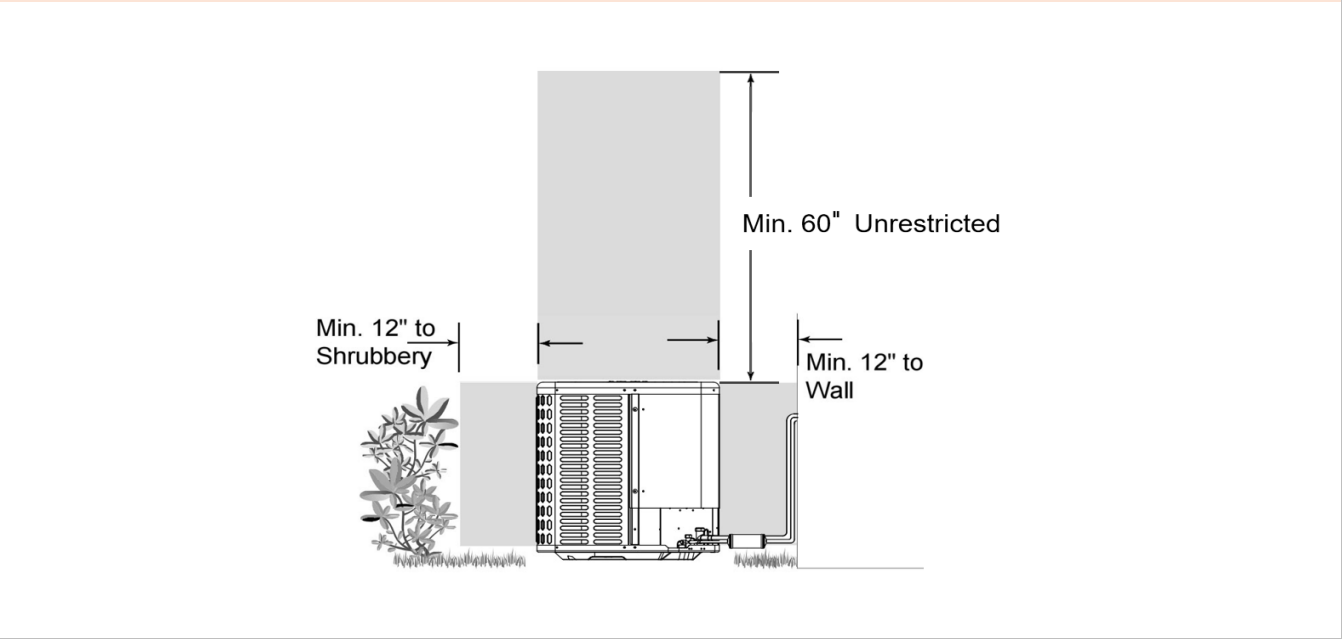


Dimensions		Model	24K/36K	48K/60K
			inch	inch
A	Model Height		49-7/32	52-63/64
B	Model Width		21-1/32	24-31/64
C	Supply air opening width		19-9/64	22-19/32
D	Return air opening width		18-47/64	22-23/64
E	Model Depth		21-1/32	21-1/32
F	Supply air opening Depth		10-9/32	10-9/32
G	Return air opening Depth		18-23/32	18-23/32
H	Supply air opening Clearance		15/16	15/16
I	Return air opening side Clearance		1-1/8	1-1/8
J	Return air opening front Clearance		1-21/32	1-21/32
K	Return air opening back Clearance		45/64	45/64

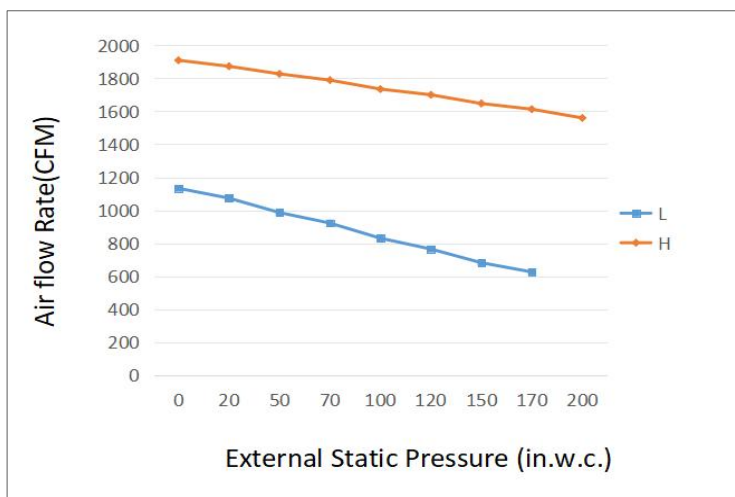
Outdoor Unit Dimension



Installation Instruction For Outdoor Unit



Fan Performance For Indoor Unit



Features

- DC inverter technology and energy-saving, SEER2 up to 19.7
- ECM fan motor with constant torque technology,
- Multi-position installation: horizontal(left or right), vertical(up or down)
- External static pressure up to 0.80 In.W.G
- 1 inch R4.2 fiberglass free insulation reduces condensation and boosts efficiency(optional)
- High precision electrical expansion valve (outdoor unit)
- Built-in thermal expansion valve (indoor unit)
- Optional Auxiliary heat kit up to 20kW
- Easy Maintenance
- Multiple control options available:
 - Wired controller with built-in WiFi
 - Third-Party 24V Thermostat
- Adaptive Control System
- Crankcase heater equipped as standard