



### 2-Ton Rooftop Packaged Air Conditioner

Model #: ACIQ-PHH1824000K000V

Location: \_\_\_\_\_  
 Engineer: \_\_\_\_\_  
 Submitted to: \_\_\_\_\_  
 Submitted by: \_\_\_\_\_  
 Reference: \_\_\_\_\_

Approval: \_\_\_\_\_  
 Date: \_\_\_\_\_  
 Construction: \_\_\_\_\_  
 Unit #: \_\_\_\_\_  
 Drawing #: \_\_\_\_\_

Rooftop AC Unit Product Code:	810175552408
ACIQ Model Number:	ACIQ-PHH1824000K000V
Certified	AHRI  UL 



System Performance		
Cooling Capacity	(Btu/hr)	24000
Cooling Capacity Range	(Btu/hr)	8400~25200
Heating Capacity	(Btu/hr)	24000
Heating Capacity Range	(Btu/hr)	8400~26400
SEER	(Btu/hr/W)	17.8
EER	(Btu/hr/W)	11
COP	(Btu/hr/W)	11.6
HSPF	(Btu/hr/W)	8.8
Ambient Temperature Range (Cooling Operation)	°F	23~125
	°C	-5~52
Ambient Temperature Range (Heating Operation)	°F	-22~75.2
	°C	-30~24
Defrosting Method	--	Automatic Defrosting

Evaporator & Fan Specifications		
Evaporator Material	--	Copper Tube-Aluminum Fin
Evaporator Fin Type	--	Hydrophilic-window
Evaporator Fin Color	--	Golden
Number of Evaporator Rows	No.	3
Number of Evaporator Circuits	No.	8
Evaporator Length (LxDxW)	in	25.87x2.24x28.23
	mm	657x57x717
Evaporator Pipe Diameter	inch	5/16 (.3125)
	mm	7.94
Evaporator Face Area	sq. ft.	4.93
	m <sup>2</sup>	0.46
Evaporator Tube Pitch (a)	inch	7/8 (0.87) x 3/4 (0.75)
x Row Pitch (b)	mm	22.00x19.05
Evaporator Fin Pitch	inch	0.06
	mm	1.40
Evaporator Fins per Inch (FPI)	--	18
Drainage Connection Size (O.D. x Wall Thickness)	in	3/4 (NPT)
	mm	19.05 (NPT)
Fan Type	--	Centrifugal
Fan Quantity	No.	1
Fan Motor Model	--	B-FGZ370C
Fan Motor Drive Type	--	Direct Drive
Fan Motor Insulation Class	--	B
Fan Motor Safe Class	--	IP20
Fan Motor Power Output	(HP)	1/2
Fan Motor FLA	(A)	2.70
Fan Motor Speed	rpm	920
Airflow (Hi/Med/Low)	(CFM)	880/700/600
External Static Pressure	Pa	125
External Static Pressure Range	Pa	0-175
Noise level (Hi)	dB(A)	73
Noise Pressure level (Hi)	dB(A)	63

Electrical Specifications		
Power Supply	(V, Ph, Hz)	208/230V, 1Ph, 60Hz
Recommended Power Cable (Core)	(N)	3
Fuse Current	(A)	40
Circuit Breaker	(A)	40
Max. Over Current Protection	(A)	40
Min. Current (MCA)	(A)	35
Cooling Power Input	(kW)	2.18
Heating Power Input	(W)	2.07
System Operation Control	--	Wired Controller

Compressor Specifications		
Model	--	QXFT-F310zN450B
Compressor Quantity	--	1
Type	--	Inverter Rotary
Brand	--	LANDA
Power Input of Compressor Crankcase	(W)	40
Rated Load Amps (RLA)	(A)	21.70
Compressor Refrigerant Oil Type	--	FW68L
Compressor Refrigerant Oil Volume	(L)	1.12

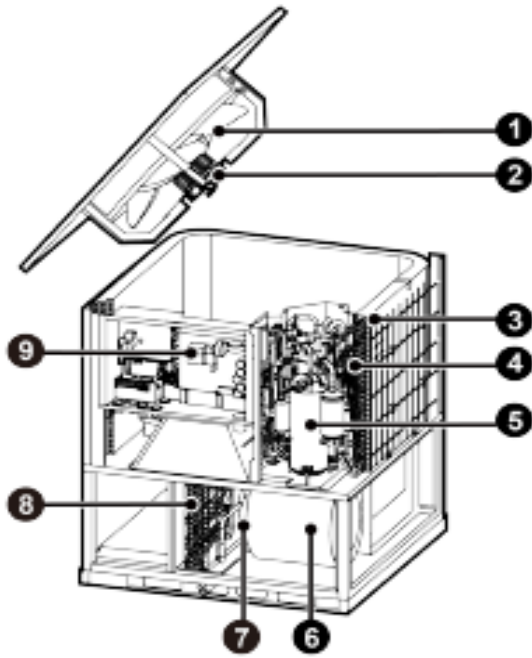
Refrigerant Specifications		
Refrigerant type	--	R410A
Refrigerant Charge Amount	oz	176.4
	kg	5.0
Throttling Method (Cooling/Heating)	--	EEV
Cooling Throttling Model	--	DPF(TS1)2.5C-19
Heating Throttling Model	--	DPF(TS1)2.0C-15
Maximum Allowable Pressure	MPa	5.1

Dimensions & Weight		
Unit Dimensions (WxDxH)	In.	44.09x35.43x49.21
	mm	1120x900x1250
Packaging Dimensions (WxDxH)	In.	44.60x35.94x50.79
	mm	1133x913x1290
Net/Gross Weight	lbs	523/545
	kg	237/247
Container Loading Quantity (20'/40'/40' High Cube)	unit	12/26/52

Air Filter Specifications		
Air Filter Material	--	Aluminum
Air Filter Size (LxW/No. of Filters)	inch	28x9/1
	mm	711x228/1
Air Filter Thickness	inch	5/8 (0.625)
	mm	15

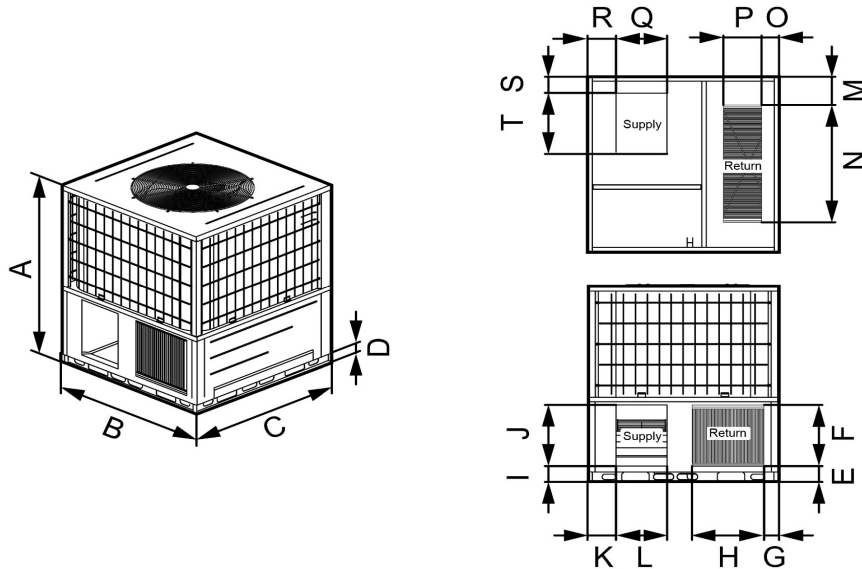
Condenser & Fan Specifications		
Condenser Material	--	Copper Tube-Aluminum Fin
Condenser Fin Type	--	Ripple
Condenser Fin Color	--	Black
Number of Condenser Rows	No.	3
Number of Condenser Circuits	No.	13
Condenser Length (LxDxW)	in	81.60x2.24x24.25
	mm	2072x57x616
Condenser Pipe Diameter	inch	5/16 (0.3125)
	mm	7.94
Condenser Face Area	sq. ft.	13.67
	m <sup>2</sup>	1.27
Condenser Tube Pitch (a)	inch	7/8 (0.87) x 3/4 (0.75)
x Row Pitch (b)	mm	22.00x19.05
Condenser Fin Pitch	inch	0.06
	mm	1.60
Condenser Fins per Inch (FPI)	--	16
Fan Type	--	Axial-Flow
Fan Quantity	No.	1
Fan Motor Model	--	B-SWZ250S
Fan Motor Drive Type	--	Direct Drive
Fan Diameter-Height	in	29.50
	mm	575±1
Fan Motor Insulation Class	--	B
Fan Motor Safe Class	--	IP44
Fan Motor Power Output	(HP)	1/3
Fan Motor FLA	(A)	4.9
Fan Motor Speed	rpm	720
Moisture Protection	--	IPX4

Unit Main Parts



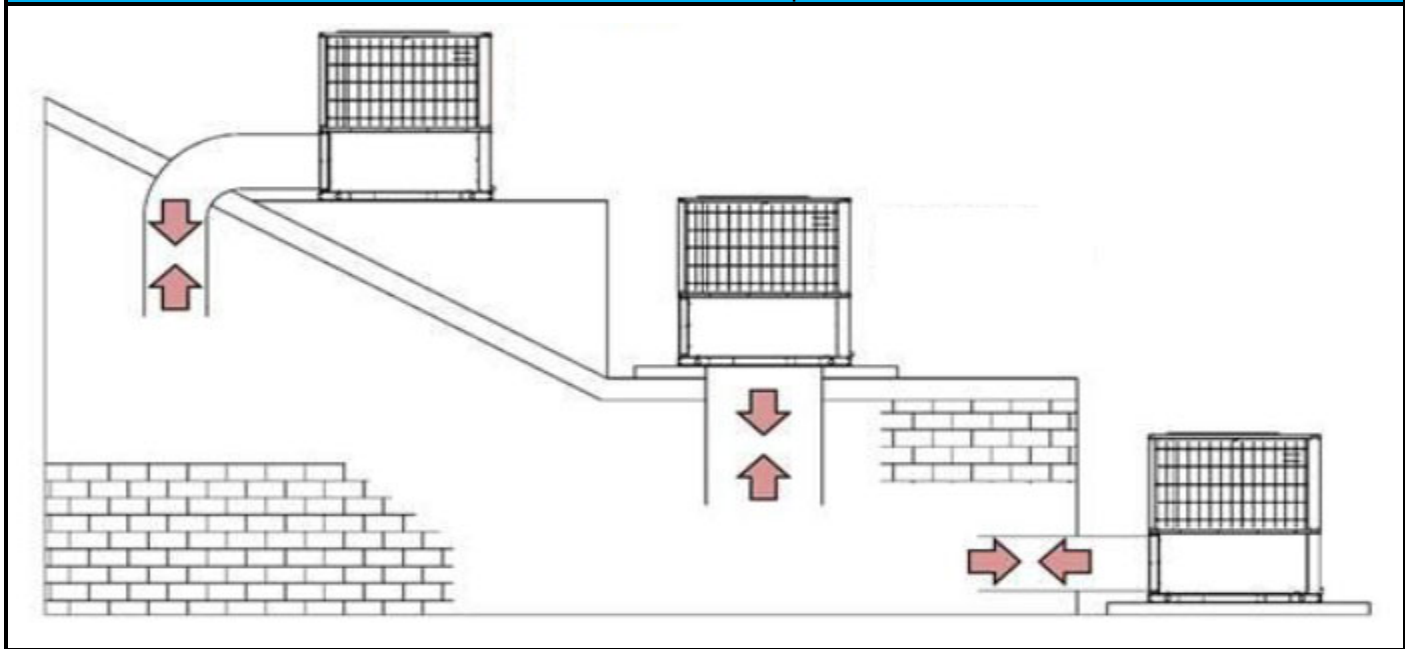
- 1 Condensate fan
- 2 Condensate motor
- 3 Condenser assy
- 4 Service valves
- 5 Compressor
- 6 Evaporation fan
- 7 Evaporation motor
- 8 Evaporator assy
- 9 Electric box assy

Unit Dimensions

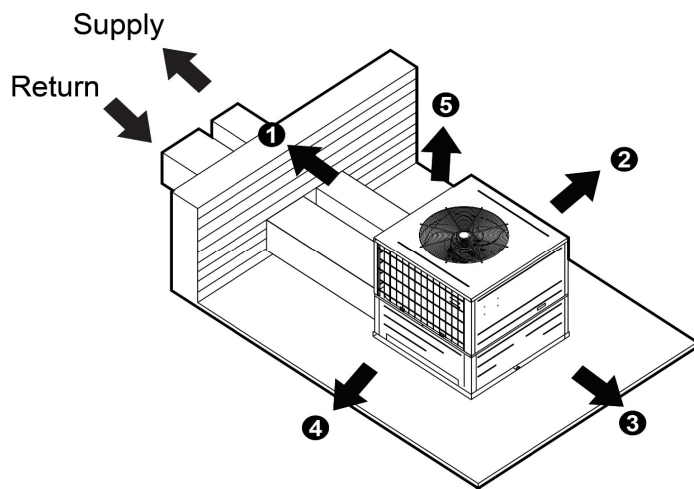


Dimension	A	B	C	D				
	49-1/4 (1250)	44 (1120)	35-7/16 (900)	2-1/2 (65)				
	Side air vents							
	E	size of air return		G	I	size of air supply		K
		F	H			J	L	
ACiQ-PHH1824000K000V	4-7/16 (113)	17-8/16 (445)	16-9/16 (420)	3-7/16 (87)	3-15/16 (101)	15-6/16 (390)	11-13/16 (300)	6-3/16 (157)
	Bottom air vents							
	M	size of air return		O	R	size of air supply		S
		N	P			Q	T	
	5-14/16 (149)	23-1/16 (586)	8-10/16 (219)	3-11/16 (93)	6-3/16 (156)	11-14/16 (302)	13-12/16 (350)	3-10/16 (92)

Unit Installation Position Options



Unit Minimum Clearance Requirements



DIMENSION(Minimum)	Installation Clearances	
	inch	mm
1	24	610
2	8	203
3	20	508
4	24	610
5	60	1524