

SUBMITTAL DATA SHEET

innovair®

Series Name: SLIM4 Heat Pump Series
Model Numbers: [SOV18H2BA](#) / [SAV18BDA](#)

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



INDOOR SPECIFICATION		
Indoor Air Flow (Turbo/H/M/L/Si) (CFM)		618.03 / 576.83 / 529.74 / 488.54 / N/A
Indoor Noise Level (Turbo/H/M/L/Si) (dBA)		44/43/41/33/N/A
Dimension (W×D×H)	inch	21.02 x 17.52 x 45.00
	mm	534.0×445.0×1143.0
Package (W×D×H)	inch	26.57 x 20.87 x 48.62
	mm	675×530×1235
Net/Gross Weight	lbs	105.82/126.76
	kg	48/57.5

OUTDOOR SPECIFICATION		
Compressor Type		ROTARY
Compressor Model		KSN140D58UFZ
Refrigerant		R454B
Refrigerant Oil Charge(mL)		440
Refrigerant Oil		VG74
Outdoor Air Flow (Max) (CFM)		1450.9
Outdoor Noise Level (dBA)		55
Dimension (W×D×H)	inch	31.69 x 12.99 x 21.81
	mm	805.0×330.0×554.0
Package (W×D×H)	inch	36.02 x 14.57 x 24.21
	mm	915×370×615
Net/Gross Weight	lbs	77.16/83.77
	kg	35/38

EFFICIENCY			
Cooling		Heating	
SEER2	18.8	HSPF2-4	9.1
EER2	11.0	COP	3.15

PERFORMANCE of Cooling	
Cooling (Btu/hr)	
Rated Capacity	18000
Min/Max Capacity	5350~20000
Moisture Removal(L/h)	1.71
Standard Operating Range(°F/°C)	-13~122(-25 ~ 50)
Rated Cooling Conditions:	Indoor: 80°F DB/67°F WB Outdoor: 95°F DB/75°F WB

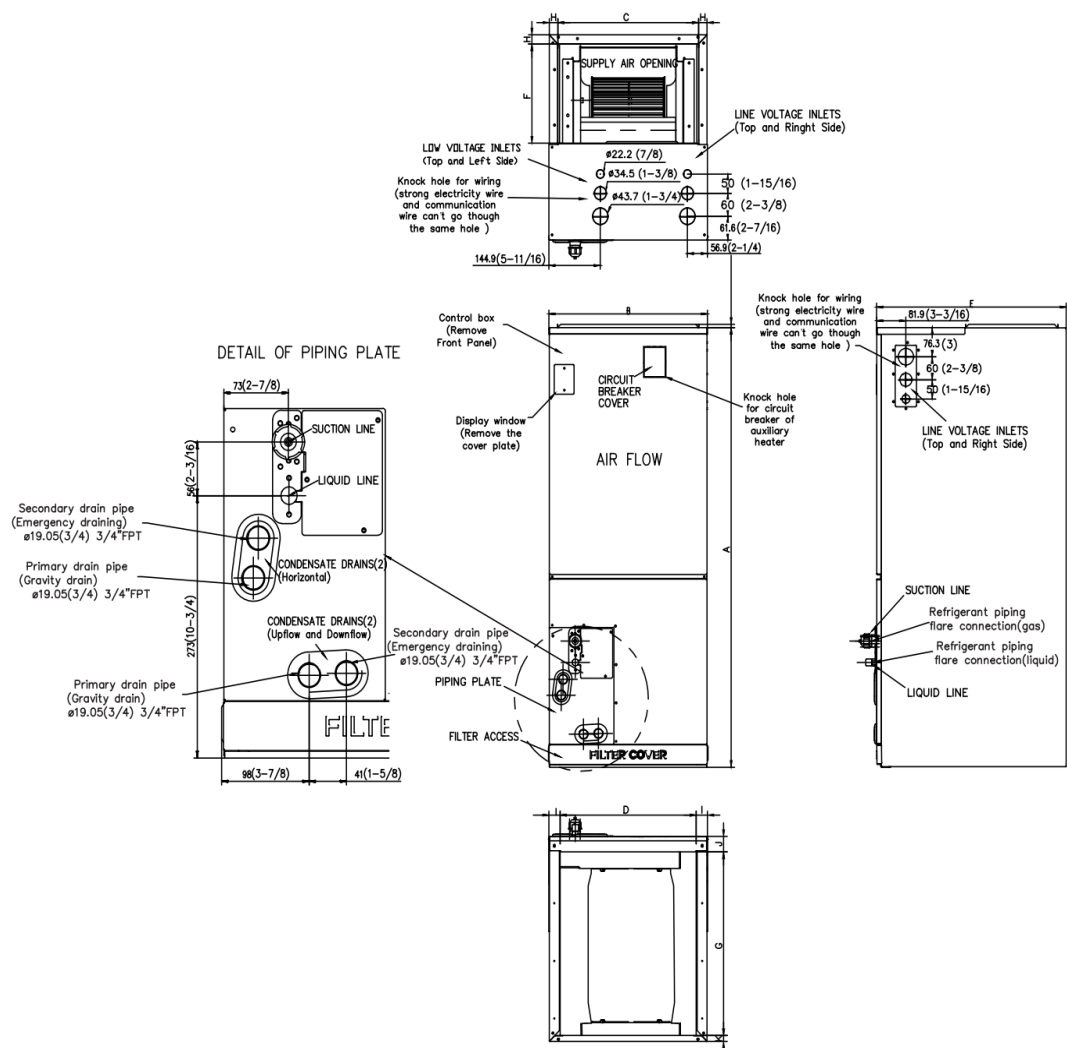
PERFORMANCE of Heating	
Heating (Btu/hr)	
1. @ 47°F Rated	18000
2. @ 47°F Min/Max Capacity	5600~19000
3. @ 17°F Rated	12600
4. @ 5°F Rated: Capacity / COP	11200/2
5. @ 5°F Max: Capacity	11200
Standard Operating Range(°F/°C)	-13~75(-25 ~ 24)
1. Rated Heating Conditions:	Indoor: 70°F DB/60°F WB Outdoor: 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	115/208/230V,60Hz,1Ph
Indoor MCA 115V/(208/230V)	5.5/4.0
Indoor MOP	15
Outdoor Power Supply	208/230V,60Hz,1Ph
Outdoor MCA	16
Outdoor MOP	20
Communication Wiring	AWG 20-2
Compressor RLA	10
Outdoor Fan Motor RLA	0.8
Outdoor Fan Motor W	34
Indoor Fan Motor RLA	2
Indoor Fan Motor W	250
System Power Input @ Cooling (W)	1635(400 ~ 1900)
System Power Input @ Heating (W)	1675(340 ~ 1650)
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)	EXV
Throttle type(Outdoor)	EXV
Liquid Size	9.52mm(3/8in)
Gas Size	19mm(3/4in)
Max. Piping Length(ft/m)	98.4(30)
Max. Height Difference(ft/m)	65.6(20)
Max. Pre-charged Length(ft/m)	24.6(7.5)
Refrigerant Pre-charged Amount(oz/kg)	51.15(1.45)
Additional Charge of Refrigerant((oz/ft)/(g/m))	0.7(65)
Connection Method	Flared*

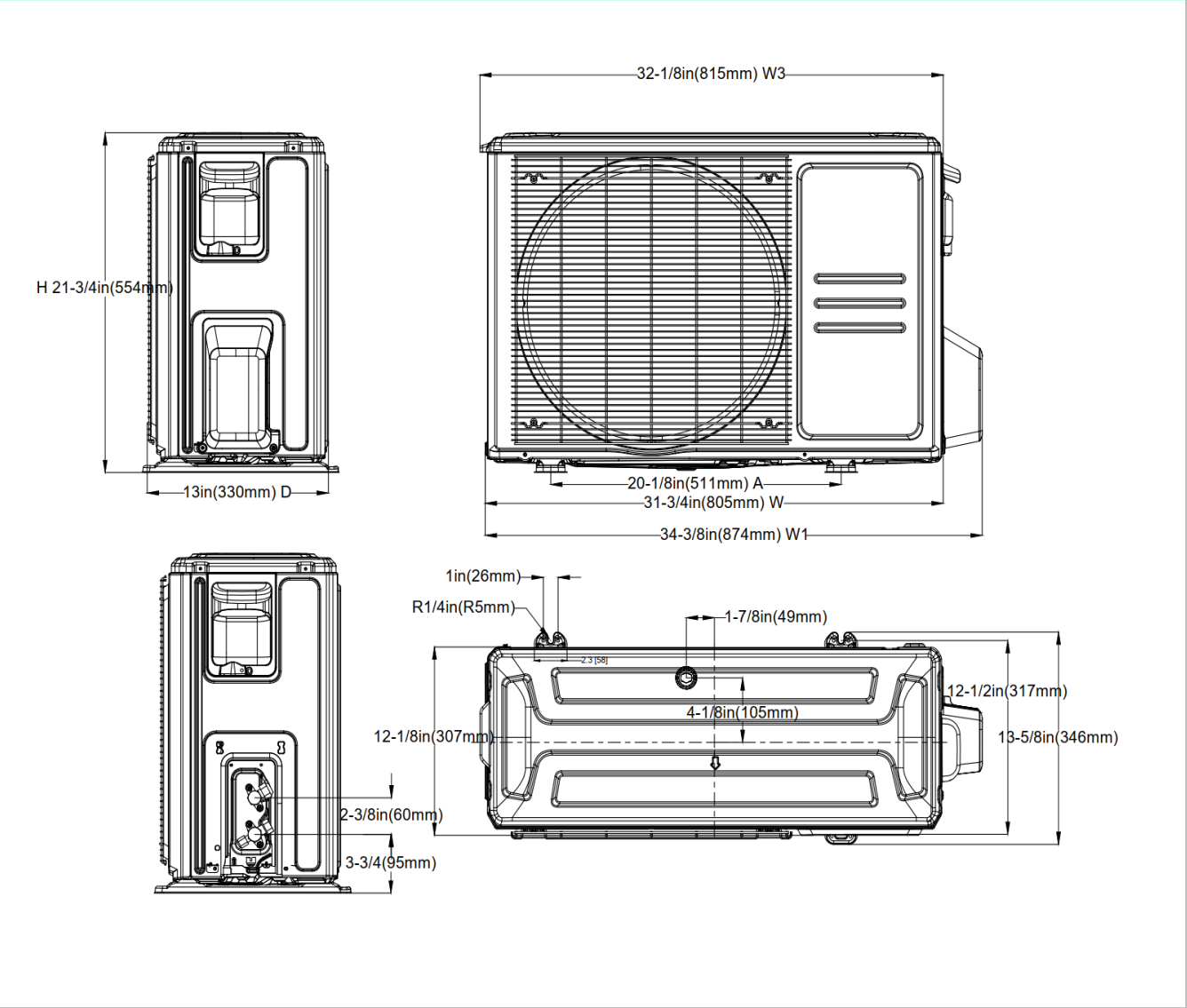
*The gas valve of the outdoor unit is 5/8", 5/8" to 3/4" flare to flare connector is required for the installation.

Indoor Unit Dimension

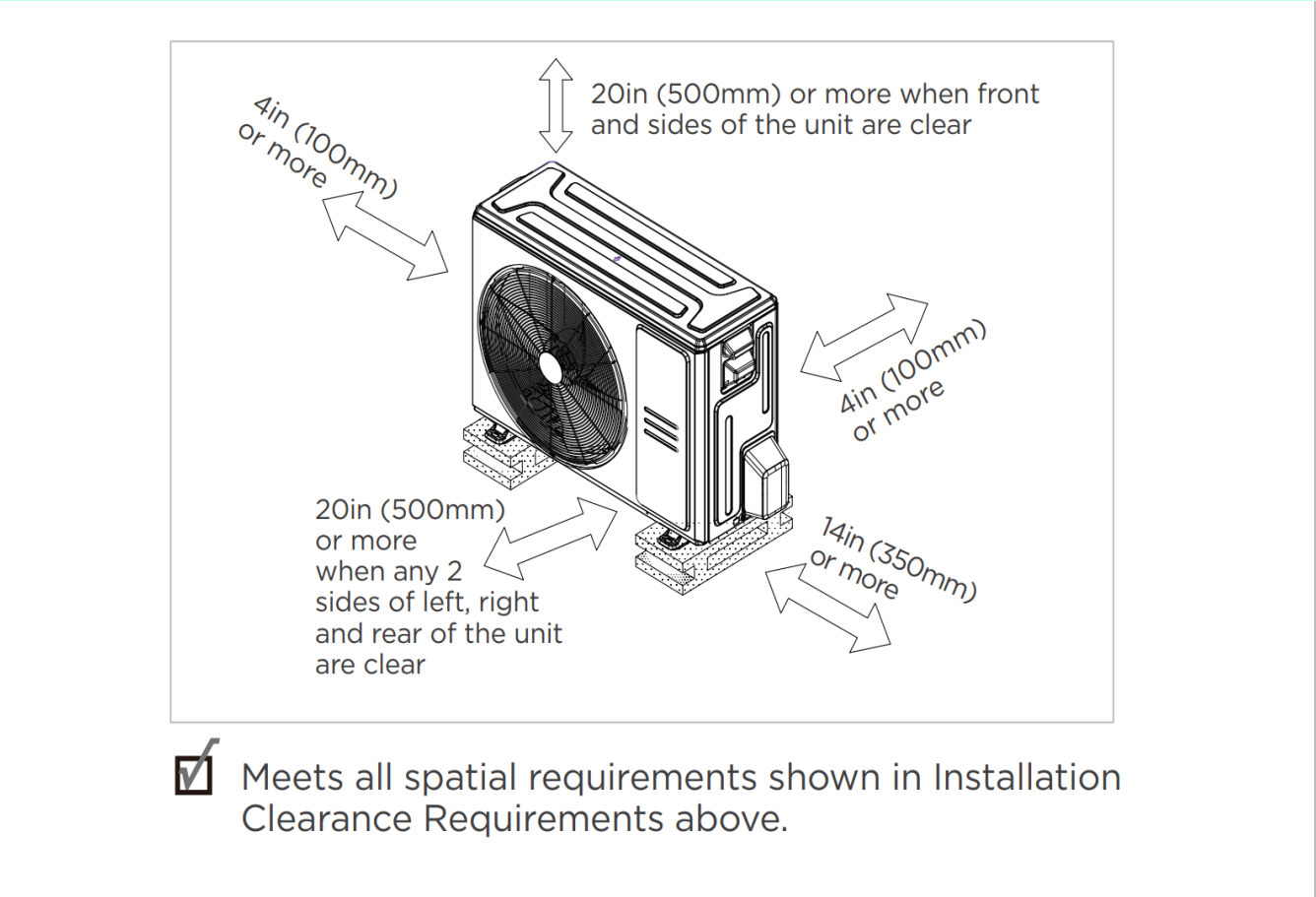


Dimensions		18k/24k		30k/36k		48k/60k	
		inch	mm	inch	mm	inch	mm
A	Model Height	45	1143	49	1245	53	1346
B	Model Width	17-1/2	445	21	534	24-1/2	622
c	Supply Air Opening Width	15-5/8	397	19-1/8	486	22-5/8	575
D	Return Air Opening Width	15-1/8	384	18-5/8	473	22-1/8	562
E	Model Depth	21	534	21	534	21	534
F	Supply Air Opening Depth	10-1/4	260	10-1/4	260	10-1/4	260
G	Return Air Opening Depth	18-3/4	476	18-3/4	476	18-3/4	476
H	Supply Air Opening Clearance	15/16	24	15/16	24	15/16	24
I	Return Air Opening Side Clearance	1-1/4	32	1-1/4	32	1-1/8	28
J	Return Air Opening Front Clearance	1-1/2	38	1-5/8	41	1-5/8	41
K	Return Air Opening Back Clearance	5/8	16	3/4	16	3/4	19

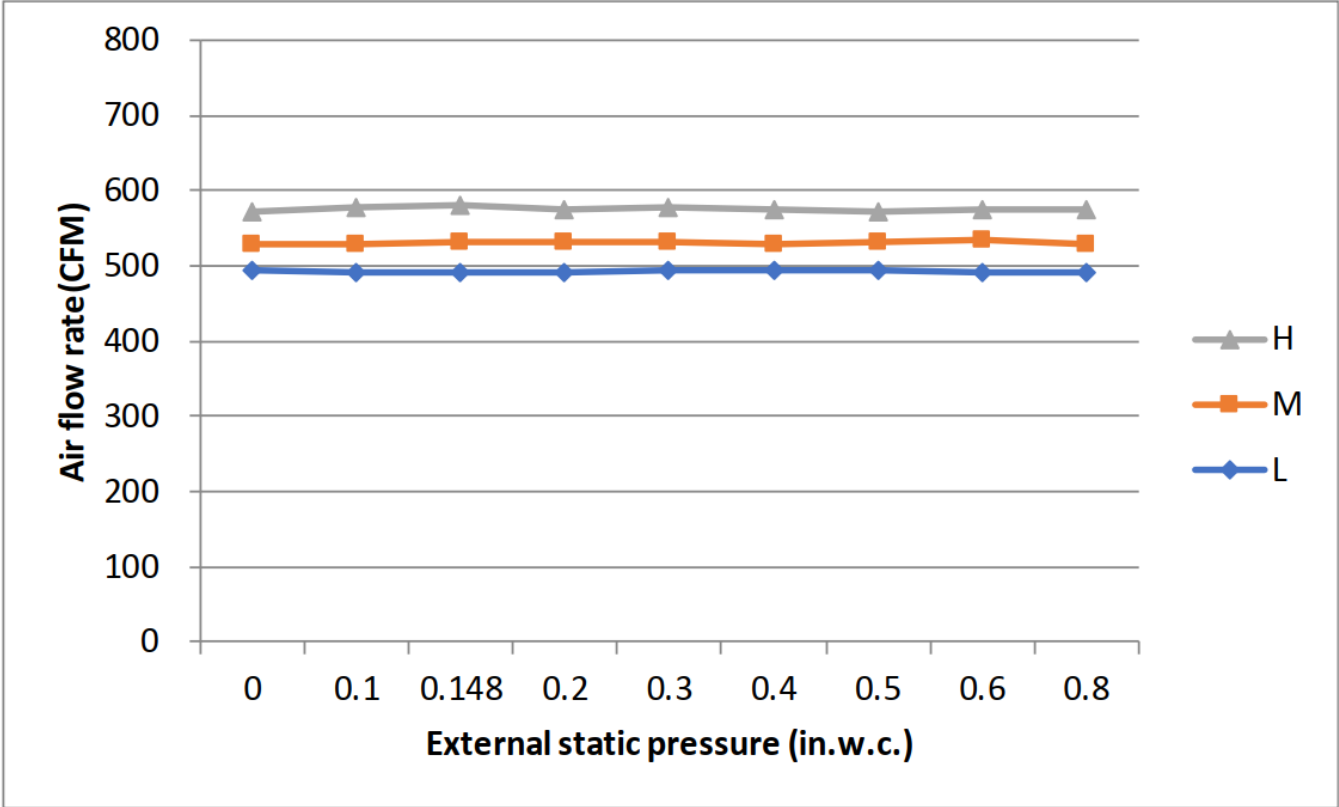
Outdoor Unit Dimension



Installation Instruction For Outdoor Unit



Fan Performance For Indoor Unit



Features

- Multi-position installation: horizontal(left or right), vertical(up or down)
- Aluminum Coil
- Constantly Air Flow system up to 0.80 In.W.G
- 1 inch R4.2 fiberglass free insulation reduces condensation and boosts efficiency(optional)
- Optional Auxiliary heat kit up to 25kW
- Easy Maintenance
- Multiple control options available:
 - Two way communication wired controller:120N(X6)
 - Two way communication wired controller with built-in WiFi:120N(X6W)
 - Wireless remote controller
 - Third-Party 24V Thermostat
- Adaptive Control System
- High efficiency up to 18.8 SEER2, 11 EER2, 9.7 HSPF2
- Chassis heater and crankcase heater equipped as standard

SUBMITTAL DATA SHEET

innovair®

Series Name: SLIM4 Heat Pump Series
Model Number: SOV24H2BA / SAV24BDA

Air Handler Heat Pump System

Location:	Approval:
Engineer:	Date:
Submitted to:	Construction:
Submitted by:	Unit #:
Reference:	Drawing #:



INDOOR SPECIFICATION

Indoor Air Flow (Turbo/H/M/L/Si) (CFM)		824.04 / 759.29 / 694.55 / 629.80 / -
Indoor Noise Level (Turbo/H/M/L/Si) (dBA)		N/A/44/42/28/N/A
Dimension (W×D×H)	inch	21.02 x 17.52 x 45.00
	mm	534.0×445.0×1143.0
Package (W×D×H)	inch	26.57 x 20.87 x 48.62
	mm	675×530×1235
Net/Gross Weight	lbs	105.60/127.43
	kg	47.9/57.8

OUTDOOR SPECIFICATION

Compressor Type		ROTARY
Compressor Model		KTM240D46UKT2
Refrigerant		R454B
Refrigerant Oil Charge(mL)		620
Refrigerant Oil		VG74
Outdoor Air Flow (Max) (CFM)		1765.7
Outdoor Noise Level (dBA)		60
Dimension (W×D×H)	inch	35.04 x 13.46 x 26.50
	mm	890.0×342.0×673.0
Package (W×D×H)	inch	39.17 x 15.67 x 29.13
	mm	995×398×740
Net/Gross Weight	lbs	102.29/109.13
	kg	46.4/49.5

EFFICIENCY

Cooling		Heating	
SEER2	18.1	HSPF2-4	9.7
EER2	11.0	COP	3.18

PERFORMANCE of Cooling

Cooling (Btu/hr)	
Rated Capacity	24000
Min/Max Capacity	7200~27000
Moisture Removal(L/h)	2.38
Standard Operating Range(°F/°C)	-13~122(-25 ~ 50)
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	26000
2. @ 47°F Min/Max Capacity	7100~30000
3. @ 17°F Rated	20000
4. @ 5°F Rated: Capacity / COP	21600/1.87
5. @ 5°F Max: Capacity	21600
Standard Operating Range(°F/°C)	-13~75(-25 ~ 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 Operating at Max. Frequency	Indoor: 70°F DB/60°F WB Outdoor: 5°F DB/5°F WB

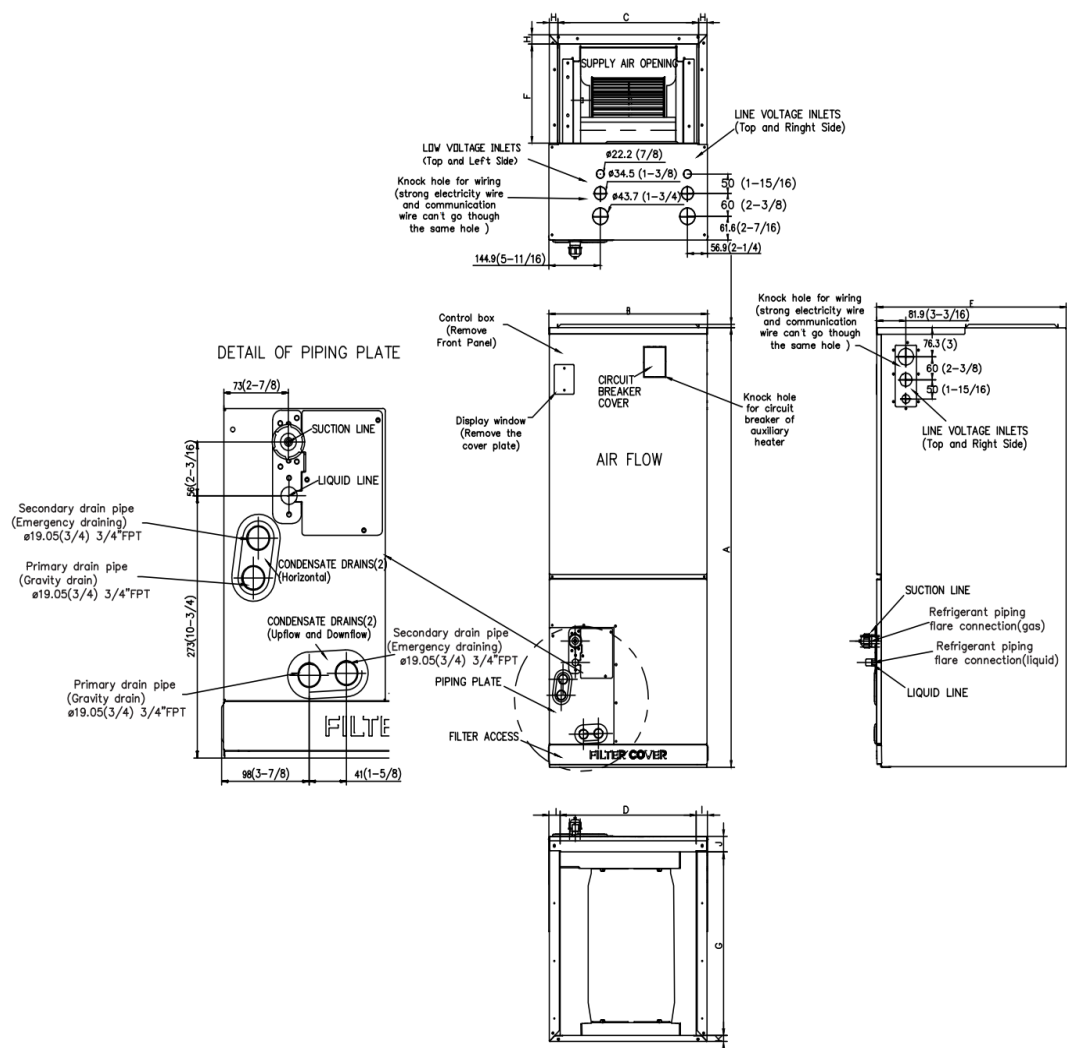
ELECTRICAL

Indoor Power Supply	115/208/230V,60Hz,1Ph
Indoor MCA 115V/(208/230V)	5.5/4.0
Indoor MOP	15
Outdoor Power Supply	208/230V,60Hz,1Ph
Outdoor MCA	19
Outdoor MOP	20
Communication Wiring	AWG 20-2
Compressor RLA	14
Outdoor Fan Motor RLA	1
Outdoor Fan Motor W	80
Indoor Fan Motor RLA	3
Indoor Fan Motor W	250
System Power Input @ Cooling (W)	2181(530 ~ 2870)
System Power Input @ Heating (W)	2396(440 ~2730)
MCA: Min. circuit amps (A)	MOCP: Max. over current protection (A)
RLA: Rated load amps (A)	W: Fan motor rated output (W)

PIPING

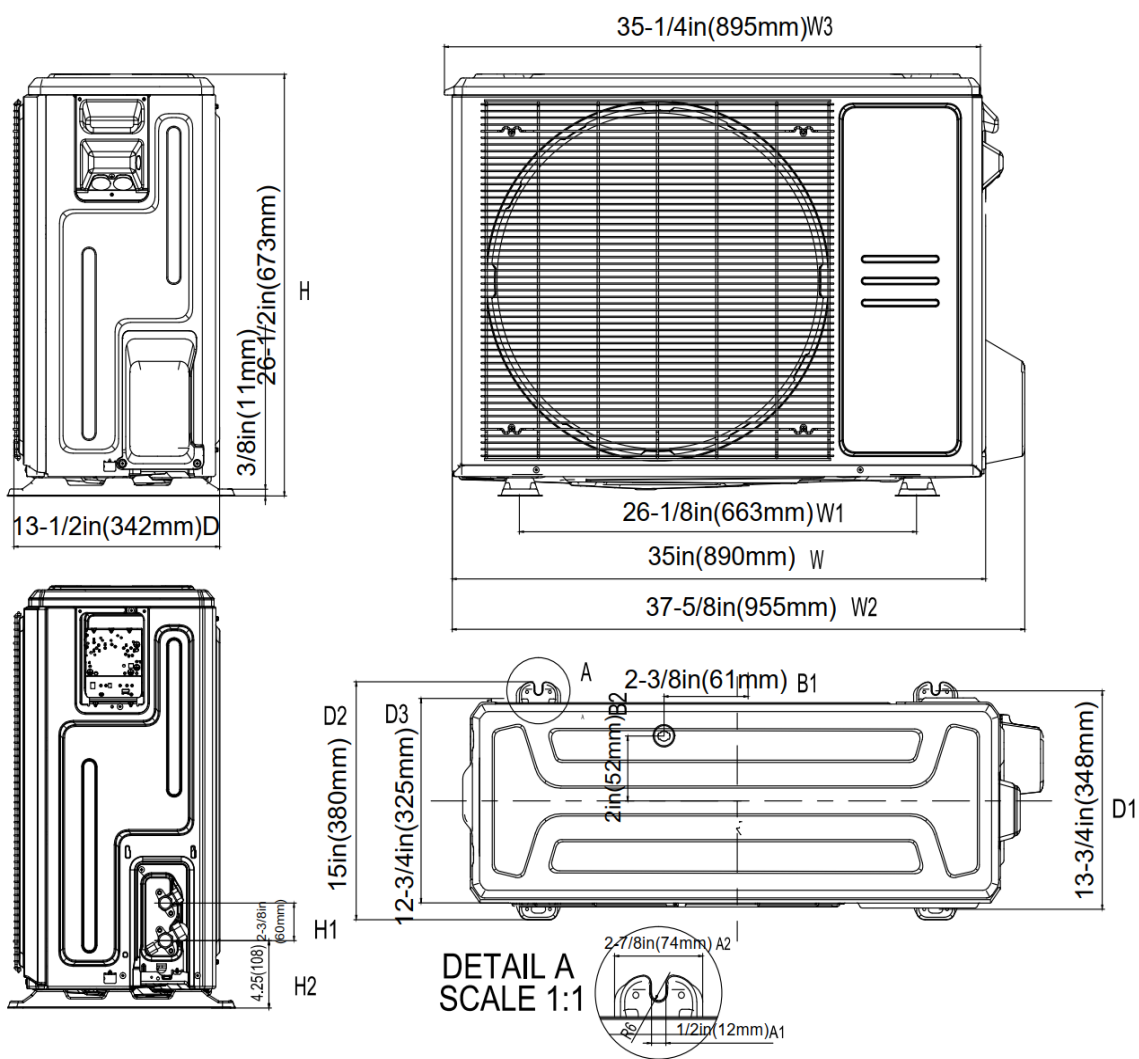
Throttle type(Indoor)	EXV
Throttle type(Outdoor)	EXV
Liquid Size	9.52mm(3/8in)
Gas Size	19mm(3/4in)
Max. Piping Length(ft/m)	164(50)
Max. Height Difference(ft/m)	82(25)
Max. Pre-charged Length(ft/m)	24.6(7.5)
Refrigerant Pre-charged Amount(oz/kg)	74.08(2.1)
Additional Charge of Refrigerant((oz/ft)/(g/m))	0.7(65)
Connection Method	Flared

Indoor Unit Dimension

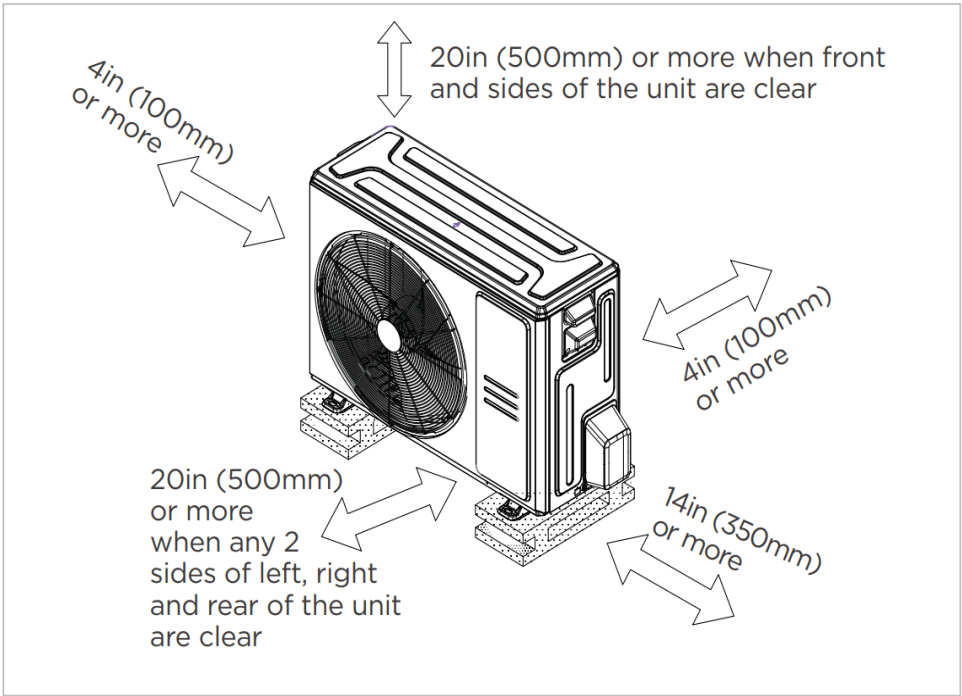


Dimensions		18k/24k		30k/36k		48k/60k	
		inch	mm	inch	mm	inch	mm
A	Model Height	45	1143	49	1245	53	1346
B	Model Width	17-1/2	445	21	534	24-1/2	622
c	Supply Air Opening Width	15-5/8	397	19-1/8	486	22-5/8	575
D	Return Air Opening Width	15-1/8	384	18-5/8	473	22-1/8	562
E	Model Depth	21	534	21	534	21	534
F	Supply Air Opening Depth	10-1/4	260	10-1/4	260	10-1/4	260
G	Return Air Opening Depth	18-3/4	476	18-3/4	476	18-3/4	476
H	Supply Air Opening Clearance	15/16	24	15/16	24	15/16	24
I	Return Air Opening Side Clearance	1-1/4	32	1-1/4	32	1-1/8	28
J	Return Air Opening Front Clearance	1-1/2	38	1-5/8	41	1-5/8	41
K	Return Air Opening Back Clearance	5/8	16	3/4	16	3/4	19

Outdoor Unit Dimension

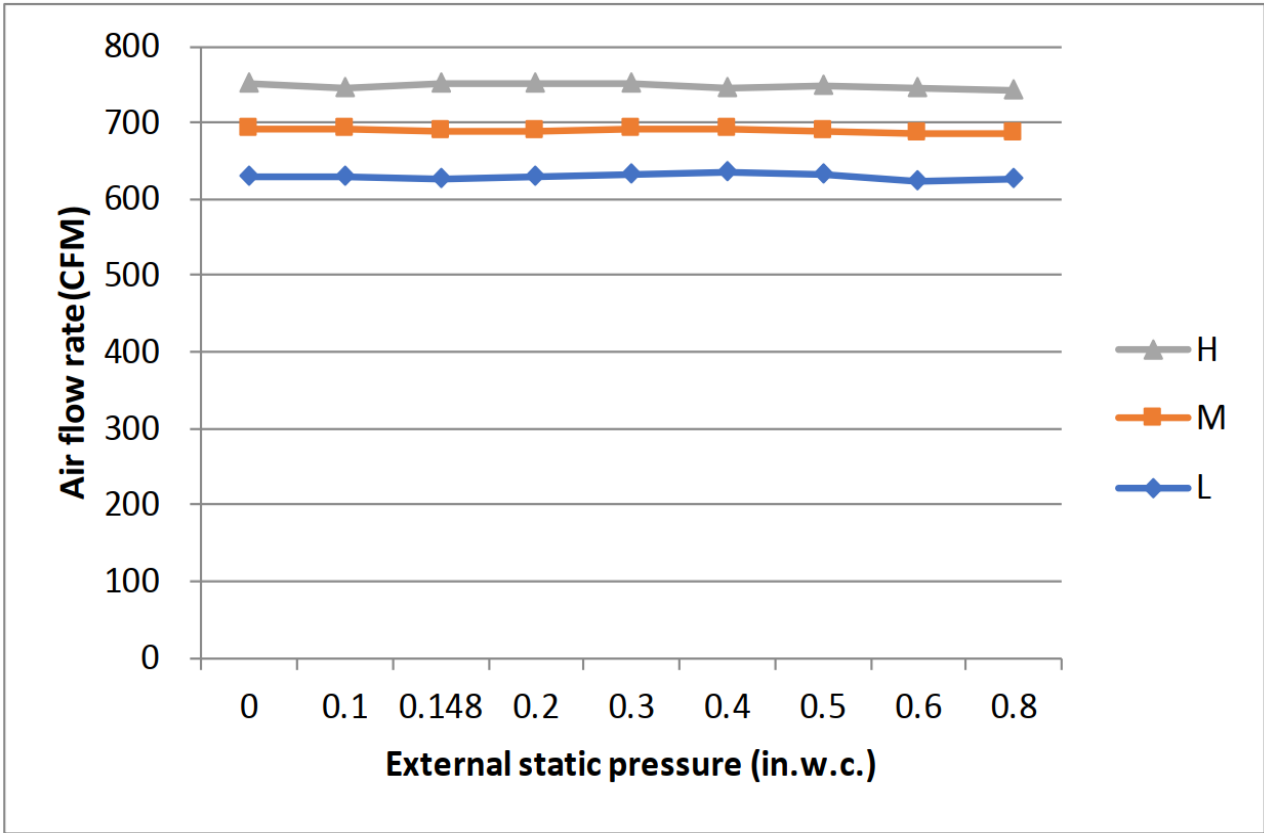


Installation Instruction For Outdoor Unit



☒ Meets all spatial requirements shown in Installation Clearance Requirements above.

Fan Performance For Indoor Unit



Features

- Multi-position installation: horizontal(left or right), vertical(up or down)
- Aluminum Coil
- Constantly Air Flow system up to 0.80 In.W.G
- 1 inch R4.2 fiberglass free insulation reduces condensation and boosts efficiency(optional)
- Optional Auxiliary heat kit up to 25kW
- Easy Maintenance
- Multiple control options available:
 - Two way communication wired controller:120N(X6)
 - Two way communication wired controller with built-in WiFi:120N(X6W)
 - Wireless remote controller
 - Third-Party 24V Thermostat
- Adaptive Control System
- High efficiency up to 18.8 SEER2, 11 EER2, 9.7 HSPF2
- Chassis heater and crankcase heater equipped as standard

SUBMITTAL DATA SHEET

innovair®

Series Name: SLIM4 Heat Pump Series
Model Number: SOV30H2BA / SAV30BDA

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



INDOOR SPECIFICATION		
Indoor Air Flow (Turbo/H/M/L/Si) (CFM)		988.85 / 894.67 / 806.38 / 712.21 / N/A
Indoor Noise Level (Turbo/H/M/L/Si) (dBA)		N/A/46/42/29/N/A
Dimension (W×D×H)	inch	21.02 x 21.02 x 49.02
	mm	534.0×534.0×1245.0
Package (W×D×H)	inch	26.57 x 24.41 x 52.56
	mm	675×620×1335
Net/Gross Weight	lbs	128.97/153.44
	kg	58.5/69.6

OUTDOOR SPECIFICATION		
Compressor Type		ROTARY
Compressor Model		KTF250D22UMT
Refrigerant		R454B
Refrigerant Oil Charge(mL)		670
Refrigerant Oil		VG74
Outdoor Air Flow (Max) (CFM)		3001.8
Outdoor Noise Level (dBA)		60
Dimension (W×D×H)	inch	37.24 x 16.14 x 31.89
	mm	946.0×410.0×810.0
Package (W×D×H)	inch	42.91 x 19.68 x 34.84
	mm	1090×500×885
Net/Gross Weight	lbs	141.76/152.34
	kg	64.3/69.1

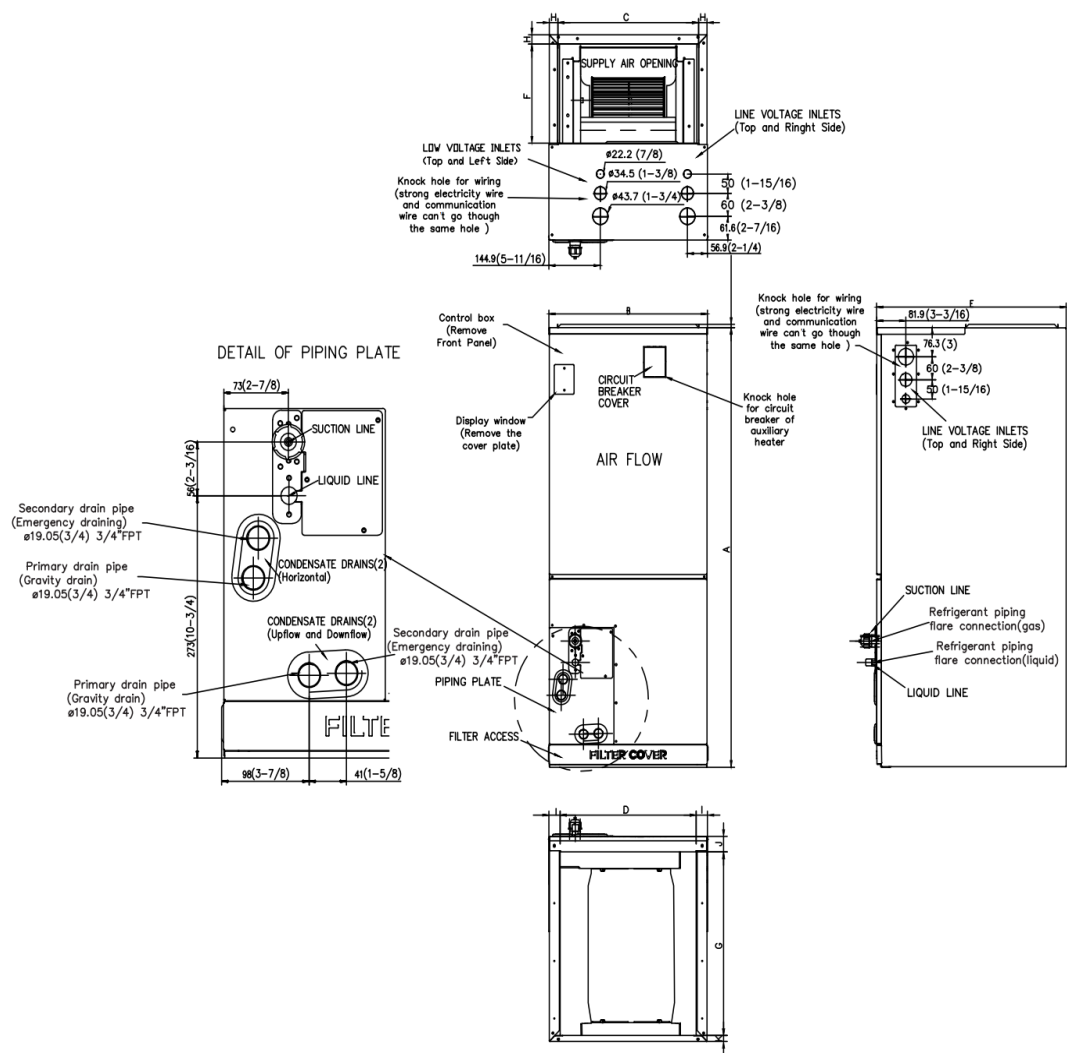
EFFICIENCY			
Cooling		Heating	
SEER2	17.0	HSPF2-4	8.5
EER2	10.7	COP	3.50

PERFORMANCE of Cooling	
Cooling (Btu/hr)	
Rated Capacity	30000
Min/Max Capacity	10400~34000
Moisture Removal(L/h)	3.57
Standard Operating Range(°F/°C)	-13~122(-25 ~ 50)
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	31000
2. @ 47°F Min/Max Capacity	6400~32000
3. @ 17°F Rated	18500
4. @ 5°F Rated: Capacity / COP	19100/2
5. @ 5°F Max: Capacity	19100
Standard Operating Range(°F/°C)	-13~75(-25 ~ 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 Operating at Max. Frequency	Indoor: 70°F DB/60°F WB Outdoor: 5°F DB/5°F WB

ELECTRICAL	
Indoor Power Supply	115/208/230V,60Hz,1Ph
Indoor MCA 115V/(208/230V)	8.0/6.0
Indoor MOP	15
Outdoor Power Supply	208/230V,60Hz,1Ph
Outdoor MCA	22.5
Outdoor MOP	25
Communication Wiring	AWG 20-2
Compressor RLA	17
Outdoor Fan Motor RLA	1.1
Outdoor Fan Motor W	120
Indoor Fan Motor RLA	4.5
Indoor Fan Motor W	375
System Power Input @ Cooling (W)	2778(735 ~ 3230)
System Power Input @ Heating (W)	2595(455 ~2550)
MCA: Min. circuit amps (A)	MOCP: Max. over current protection (A)
RLA: Rated load amps (A)	W: Fan motor rated output (W)

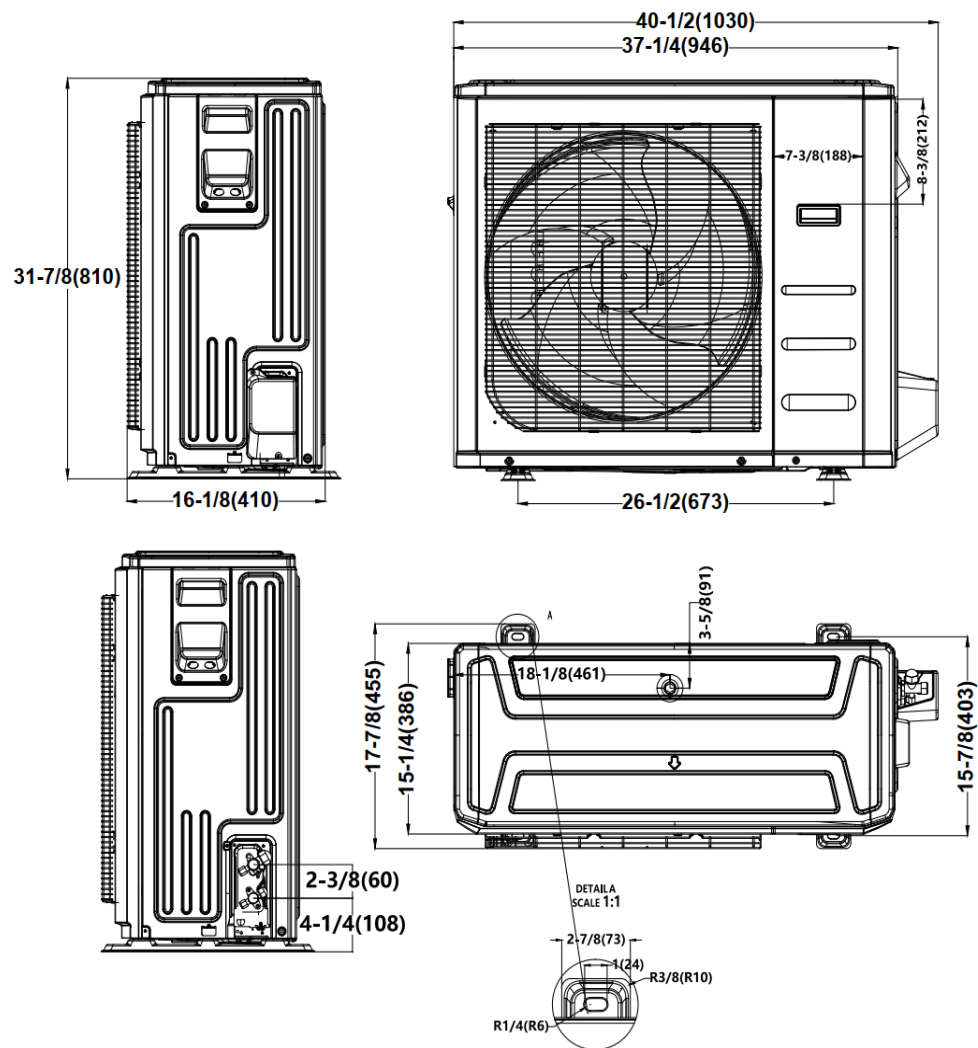
PIPING	
Throttle type(Indoor)	EXV
Throttle type(Outdoor)	EXV
Liquid Size	9.52mm(3/8in)
Gas Size	19mm(3/4in)
Max. Piping Length(ft/m)	164(50)
Max. Height Difference(ft/m)	82(25)
Max. Pre-charged Length(ft/m)	24.6(7.5)
Refrigerant Pre-charged Amount(oz/kg)	91.71(2.6)
Additional Charge of Refrigerant((oz/ft)/(g/m))	0.7(65)
Connection Method	Flared

Indoor Unit Dimension

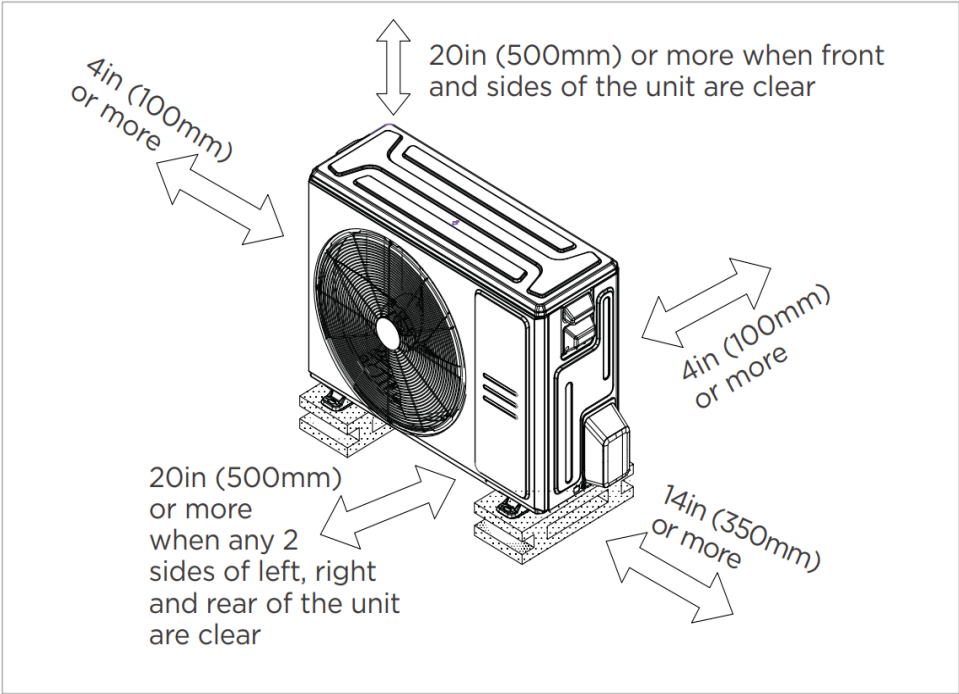


Dimensions		18k/24k		30k/36k		48k/60k	
		inch	mm	inch	mm	inch	mm
A	Model Height	45	1143	49	1245	53	1346
B	Model Width	17-1/2	445	21	534	24-1/2	622
c	Supply Air Opening Width	15-5/8	397	19-1/8	486	22-5/8	575
D	Return Air Opening Width	15-1/8	384	18-5/8	473	22-1/8	562
E	Model Depth	21	534	21	534	21	534
F	Supply Air Opening Depth	10-1/4	260	10-1/4	260	10-1/4	260
G	Return Air Opening Depth	18-3/4	476	18-3/4	476	18-3/4	476
H	Supply Air Opening Clearance	15/16	24	15/16	24	15/16	24
I	Return Air Opening Side Clearance	1-1/4	32	1-1/4	32	1-1/8	28
J	Return Air Opening Front Clearance	1-1/2	38	1-5/8	41	1-5/8	41
K	Return Air Opening Back Clearance	5/8	16	3/4	16	3/4	19

Outdoor Unit Dimension

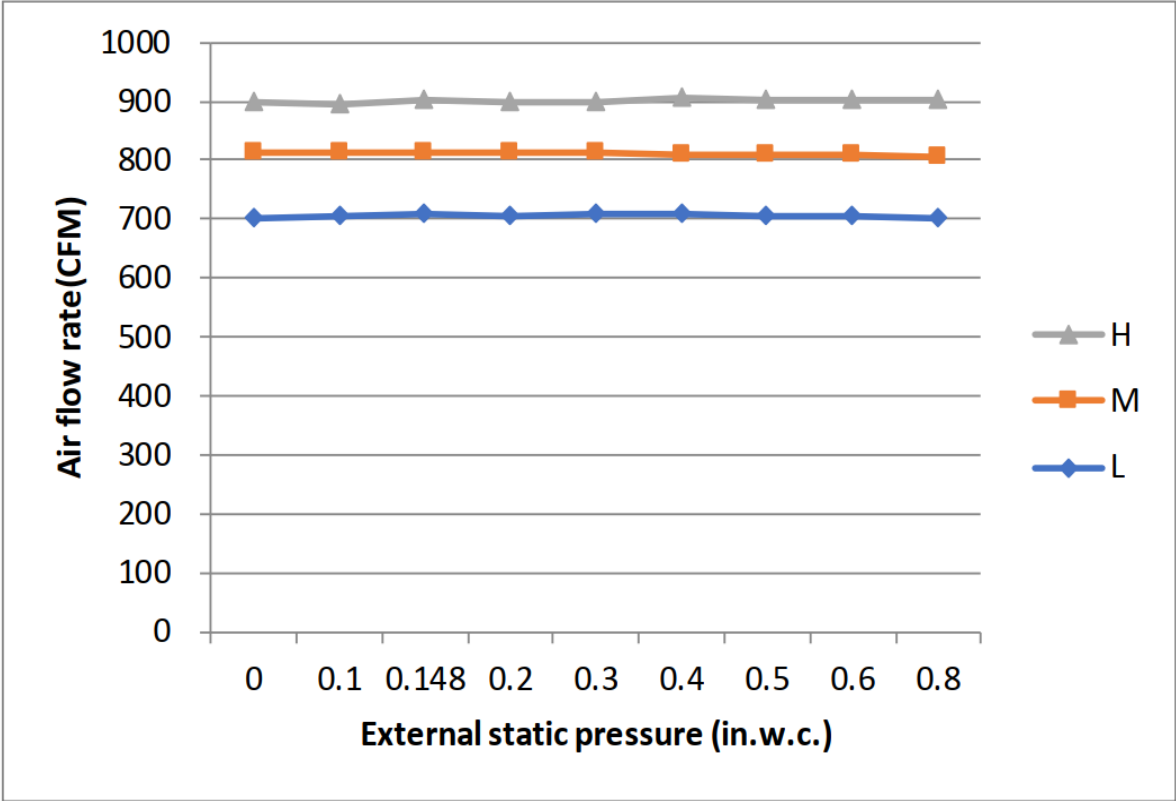


Installation Instruction For Outdoor Unit



☒ Meets all spatial requirements shown in Installation Clearance Requirements above.

Fan Performance For Indoor Unit



Features

- Multi-position installation: horizontal(left or right), vertical(up or down)
- Aluminum Coil
- Constantly Air Flow system up to 0.80 In.W.G
- 1 inch R4.2 fiberglass free insulation reduces condensation and boosts efficiency(optional)
- Optional Auxiliary heat kit up to 25kW
- Easy Maintenance
- Multiple control options available:
 - Two way communication wired controller:120N(X6)
 - Two way communication wired controller with built-in WiFi:120N(X6W)
 - Wireless remote controller
 - Third-Party 24V Thermostat
- Adaptive Control System
- High efficiency up to 18.8 SEER2, 11 EER2, 9.7 HSPF2
- Chassis heater and crankcase heater equipped as standard

SUBMITTAL DATA SHEET

innovair®

Series Name: SLIM4 Heat Pump Series
Model Number: SOV36H2BA / SAV36BDA

Air Handler Heat Pump System

Location:	Approval:
Engineer:	Date:
Submitted to:	Construction:
Submitted by:	Unit #:
Reference:	Drawing #:



INDOOR SPECIFICATION

Indoor Air Flow (Turbo/H/M/L/Si) (CFM)		1188.97 / 1083.02 / 971.19 / 865.24 / N/A
Indoor Noise Level (Turbo/H/M/L/Si) (dBA)		N/A/48/45/28/N/A
Dimension (W×D×H)	inch	21.02 x 21.02 x 49.02
	mm	534.0×534.0×1245.0
Package (W×D×H)	inch	26.57 x 24.41 x 52.56
	mm	675×620×1335
Net/Gross Weight	lbs	129.41/153.88
	kg	58.7/69.8

OUTDOOR SPECIFICATION

Compressor Type		ROTARY
Compressor Model		KTF310D43UMT
Refrigerant		R454B
Refrigerant Oil Charge(mL)		1000
Refrigerant Oil		VG74
Outdoor Air Flow (Max) (CFM)		2413.2
Outdoor Noise Level (dBA)		63
Dimension (W×D×H)	inch	37.24 x 16.14 x 31.89
	mm	946.0×410.0×810.0
Package (W×D×H)	inch	42.91 x 19.68 x 34.84
	mm	1090×500×885
Net/Gross Weight	lbs	153.22/163.58
	kg	69.5/74.2

EFFICIENCY

Cooling		Heating	
SEER2	16.1	HSPF2-4	8.7
EER2	10.0	COP	3.40

PERFORMANCE of Cooling

Cooling (Btu/hr)	
Rated Capacity	36000
Min/Max Capacity	8300~38900
Moisture Removal(L/h)	3.62
Standard Operating Range(°F/°C)	-13~122(-25 ~ 50)
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	36000
2. @ 47°F Min/Max Capacity	6700~41300
3. @ 17°F Rated	25600
4. @ 5°F Rated: Capacity / COP	27000/2
5. @ 5°F Max: Capacity	27000
Standard Operating Range(°F/°C)	-13~75(-25 ~ 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 Operating at Max. Frequency	Indoor: 70°F DB/60°F WB Outdoor: 5°F DB/5°F WB

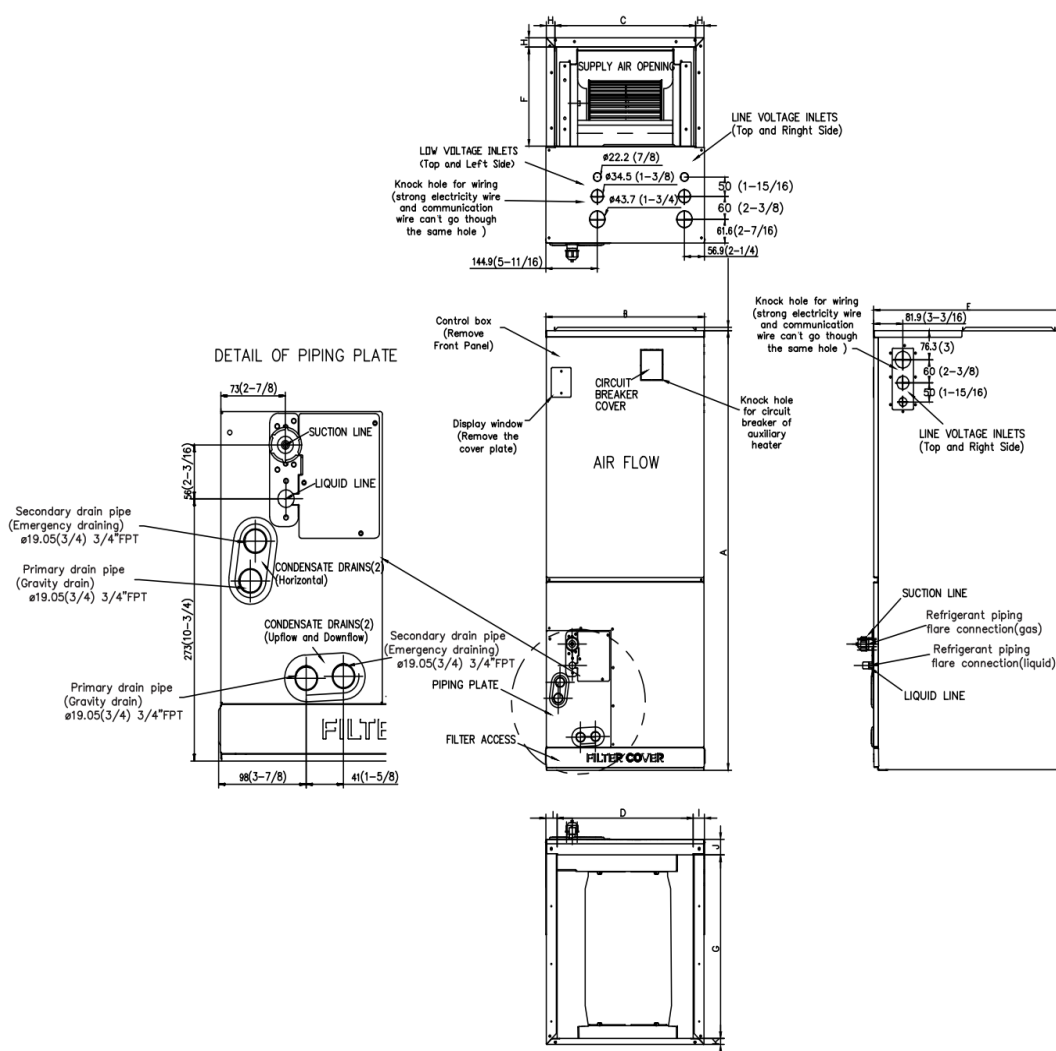
ELECTRICAL

Indoor Power Supply	115/208/230V,60Hz,1Ph
Indoor MCA 115V/(208/230V)	8.0/6.0
Indoor MOP	15
Outdoor Power Supply	208/230V,60Hz,1Ph
Outdoor MCA	24
Outdoor MOP	30
Communication Wiring	AWG 20-2
Compressor RLA	17.5
Outdoor Fan Motor RLA	1.5
Outdoor Fan Motor W	120
Indoor Fan Motor RLA	4.5
Indoor Fan Motor W	375
System Power Input @ Cooling (W)	3600(710 ~ 4500)
System Power Input @ Heating (W)	3100(460 ~3550)
MCA: Min. circuit amps (A)	MOCP: Max. over current protection (A)
RLA: Rated load amps (A)	W: Fan motor rated output (W)

PIPING

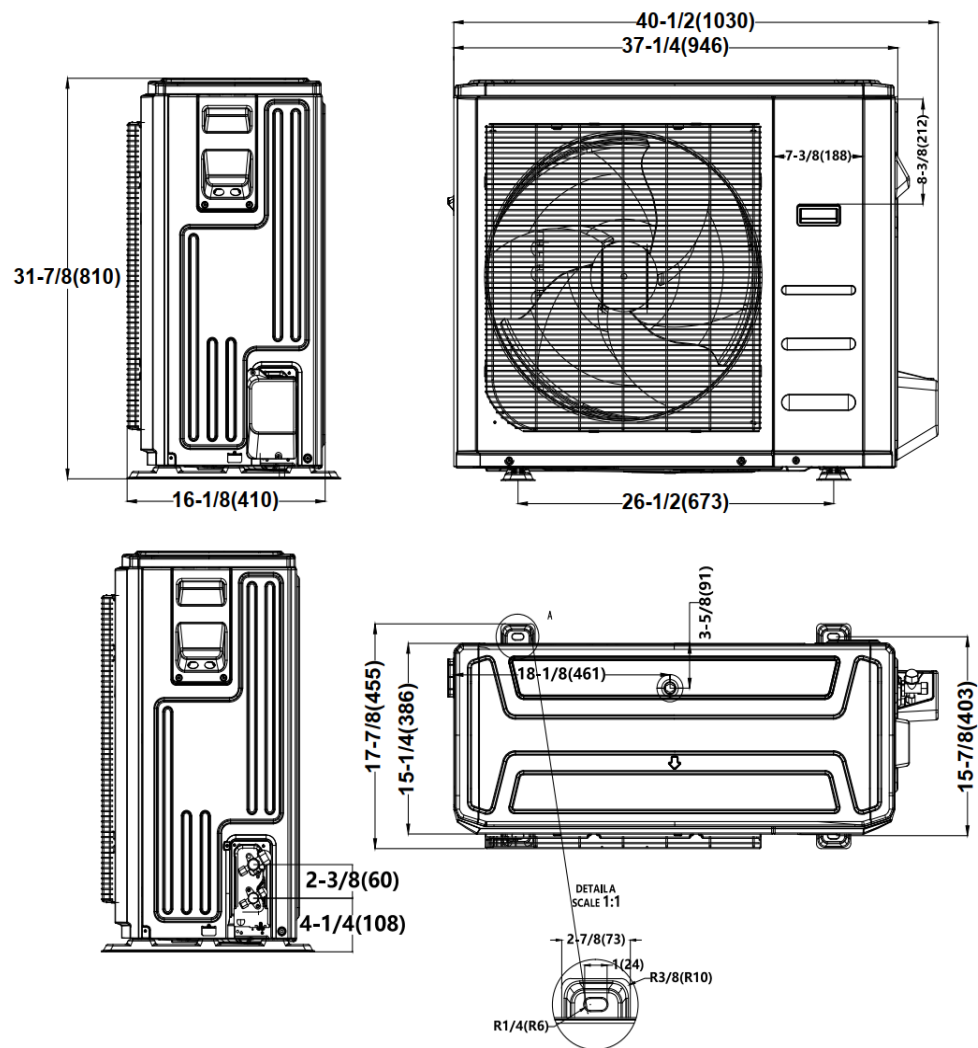
Throttle type(Indoor)	EXV
Throttle type(Outdoor)	EXV
Liquid Size	9.52mm(3/8in)
Gas Size	19mm(3/4in)
Max. Piping Length(ft/m)	246(75)
Max. Height Difference(ft/m)	98.4(30)
Max. Pre-charged Length(ft/m)	24.6(7.5)
Refrigerant Pre-charged Amount(oz/kg)	116.4(3.3)
Additional Charge of Refrigerant((oz/ft)/(g/m))	0.7(65)
Connection Method	Flared

Indoor Unit Dimension

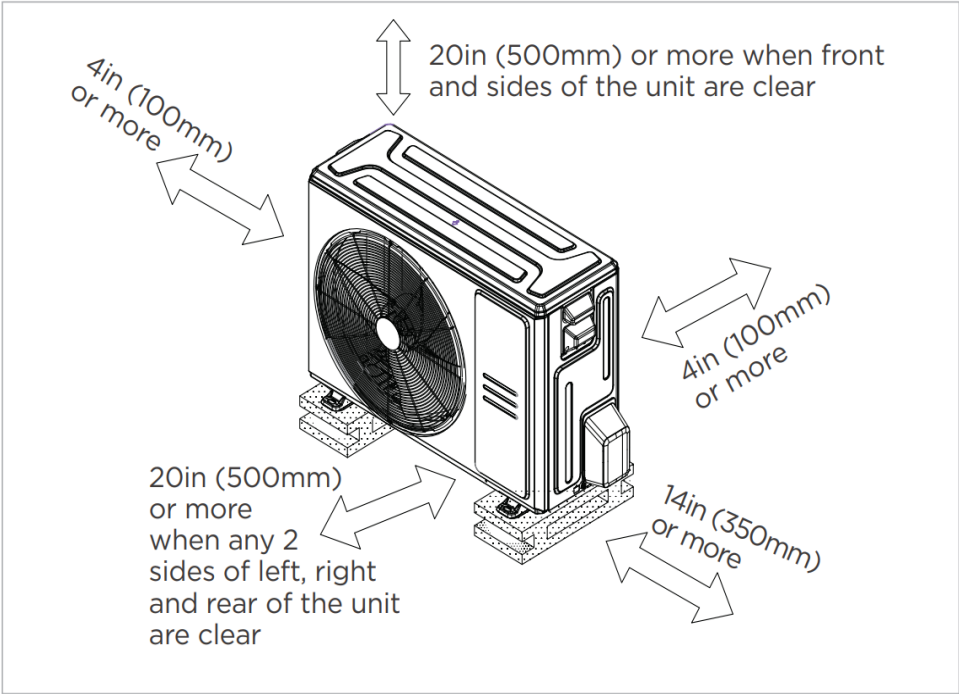


Dimensions		18k/24k		30k/36k		48k/60k	
		inch	mm	inch	mm	inch	mm
A	Model Height	45	1143	49	1245	53	1346
B	Model Width	17-1/2	445	21	534	24-1/2	622
c	Supply Air Opening Width	15-5/8	397	19-1/8	486	22-5/8	575
D	Return Air Opening Width	15-1/8	384	18-5/8	473	22-1/8	562
E	Model Depth	21	534	21	534	21	534
F	Supply Air Opening Depth	10-1/4	260	10-1/4	260	10-1/4	260
G	Return Air Opening Depth	18-3/4	476	18-3/4	476	18-3/4	476
H	Supply Air Opening Clearance	15/16	24	15/16	24	15/16	24
I	Return Air Opening Side Clearance	1-1/4	32	1-1/4	32	1-1/8	28
J	Return Air Opening Front Clearance	1-1/2	38	1-5/8	41	1-5/8	41
K	Return Air Opening Back Clearance	5/8	16	3/4	16	3/4	19

Outdoor Unit Dimension

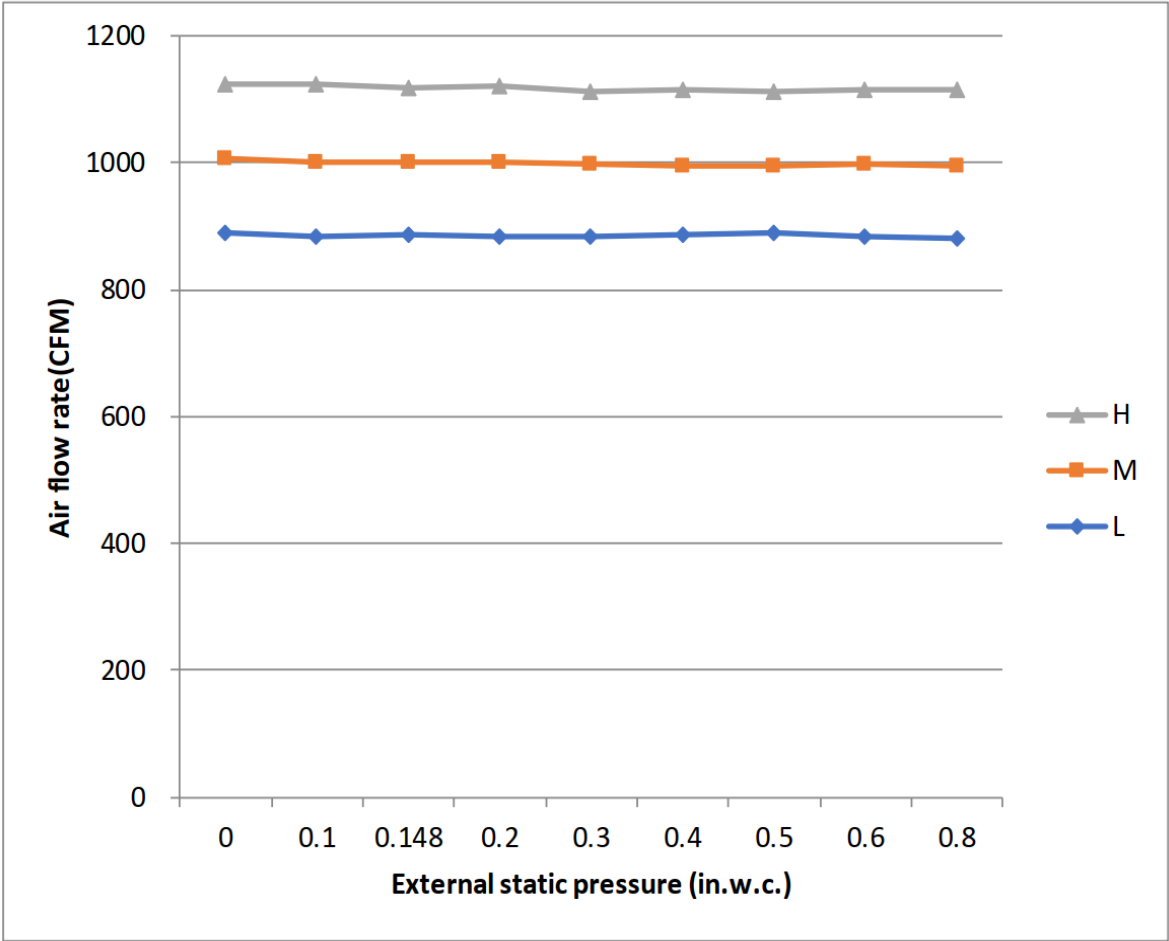


Installation Instruction For Outdoor Unit



☒ Meets all spatial requirements shown in Installation Clearance Requirements above.

Fan Performance For Indoor Unit



Features

- Multi-position installation: horizontal(left or right), vertical(up or down)
- Aluminum Coil
- Constantly Air Flow system up to 0.80 In.W.G
- 1 inch R4.2 fiberglass free insulation reduces condensation and boosts efficiency(optional)
- Optional Auxiliary heat kit up to 25kW
- Easy Maintenance
- Multiple control options available:
 - Two way communication wired controller:120N(X6)
 - Two way communication wired controller with built-in WiFi:120N(X6W)
 - Wireless remote controller
 - Third-Party 24V Thermostat
- Adaptive Control System
- High efficiency up to 18.8 SEER2, 11 EER2, 9.7 HSPF2
- Chassis heater and crankcase heater equipped as standard

SUBMITTAL DATA SHEET

innovair®

Series Name: SLIM4 Heat Pump Series
Model Number: SOV48H2BA / SAV48BDA

Air Handler Heat Pump System

Location:	Approval:
Engineer:	Date:
Submitted to:	Construction:
Submitted by:	Unit #:
Reference:	Drawing #:



INDOOR SPECIFICATION

Indoor Air Flow (Turbo/H/M/L/Si) (CFM)		1600.99 / 1471.50 / 1283.15 / 1094.80 / N/A
Indoor Noise Level (Turbo/H/M/L/Si) (dBA)		N/A/53/50/44/N/A
Dimension (W×D×H)	inch	21.02 x 24.49 x 52.99
	mm	534.0×622.0×1346.0
Package (W×D×H)	inch	27.95 x 26.77 x 56.50
	mm	710×680×1435
Net/Gross Weight	lbs	162.92/190.92
	kg	73.9/86.6

OUTDOOR SPECIFICATION

Compressor Type		ROTARY
Compressor Model		MTH550UKPC8FU
Refrigerant		R454B
Refrigerant Oil Charge(mL)		1800
Refrigerant Oil		HAF68D1C
Outdoor Air Flow (Max) (CFM)		3037.1
Outdoor Noise Level (dBA)		65
Dimension (W×D×H)	inch	38.58 x 16.34 x 38.39
	mm	980.0×415.0×975.0
Package (W×D×H)	inch	45.08 x 19.68 x 42.52
	mm	1145×500×1080
Net/Gross Weight	lbs	192.90/224.21
	kg	87.5/101.7

EFFICIENCY

Cooling		Heating	
SEER2	16.0	HSPF2-4	8.5
EER2	10.0	COP	3.45

PERFORMANCE of Cooling

Cooling (Btu/hr)	
Rated Capacity	48000
Min/Max Capacity	16600~49900
Moisture Removal(L/h)	5.29
Standard Operating Range(°F/°C)	-13~122(-25 ~ 50)
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	15300~49500
3. @ 17°F Rated	32400
4. @ 5°F Rated: Capacity / COP	38000/1.85
5. @ 5°F Max: Capacity	38000
Standard Operating Range(°F/°C)	-13~75(-25 ~ 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 Operating at Max. Frequency	Indoor: 70°F DB/60°F WB Outdoor: 5°F DB/5°F WB

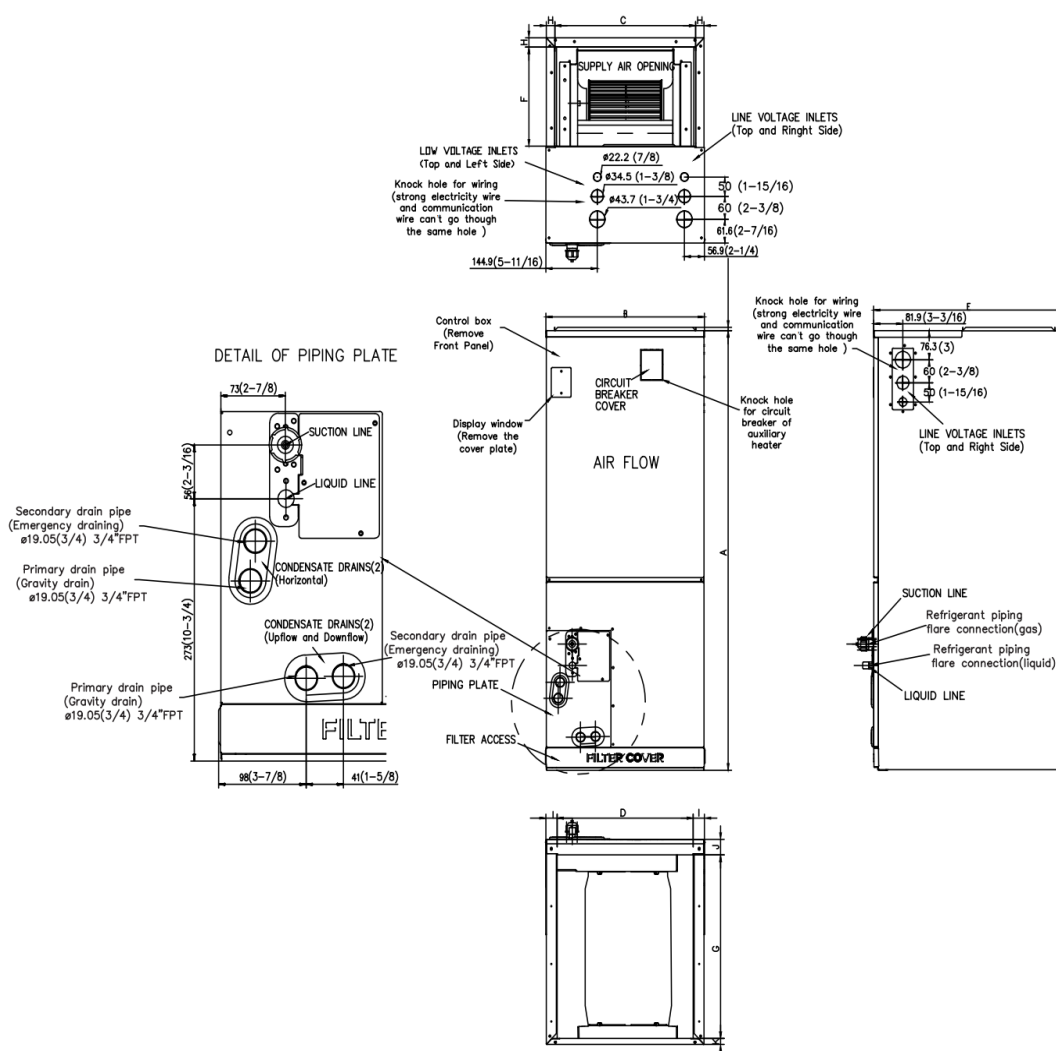
ELECTRICAL

Indoor Power Supply	115/208/230V,60Hz,1Ph
Indoor MCA 115V/(208/230V)	14.5/11.0
Indoor MOP	15
Outdoor Power Supply	208/230V,60Hz,1Ph
Outdoor MCA	36
Outdoor MOP	40
Communication Wiring	AWG 20-2
Compressor RLA	27
Outdoor Fan Motor RLA	2
Outdoor Fan Motor W	250
Indoor Fan Motor RLA	7.8
Indoor Fan Motor W	750
System Power Input @ Cooling (W)	4800(1400 ~ 5350)
System Power Input @ Heating (W)	4085(1025 ~4650)
MCA: Min. circuit amps (A)	MOCP: Max. over current protection (A)
RLA: Rated load amps (A)	W: Fan motor rated output (W)

PIPING

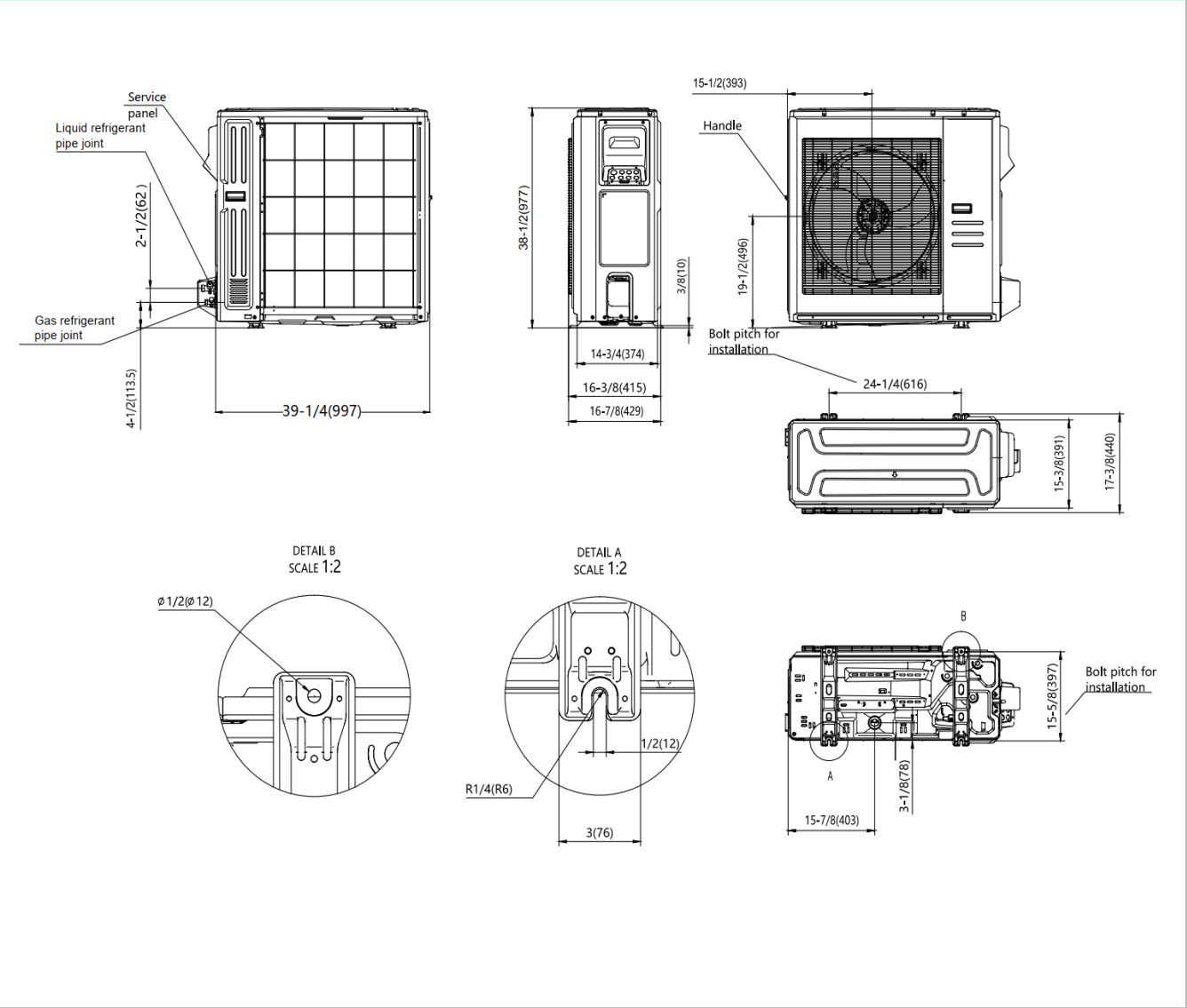
Throttle type(Indoor)	EXV
Throttle type(Outdoor)	EXV
Liquid Size	9.52mm(3/8in)
Gas Size	19mm(3/4in)
Max. Piping Length(ft/m)	246(75)
Max. Height Difference(ft/m)	98.4(30)
Max. Pre-charged Length(ft/m)	24.6(7.5)
Refrigerant Pre-charged Amount(oz/kg)	134.04(3.8)
Additional Charge of Refrigerant((oz/ft)/(g/m))	0.7(65)
Connection Method	Flared

Indoor Unit Dimension

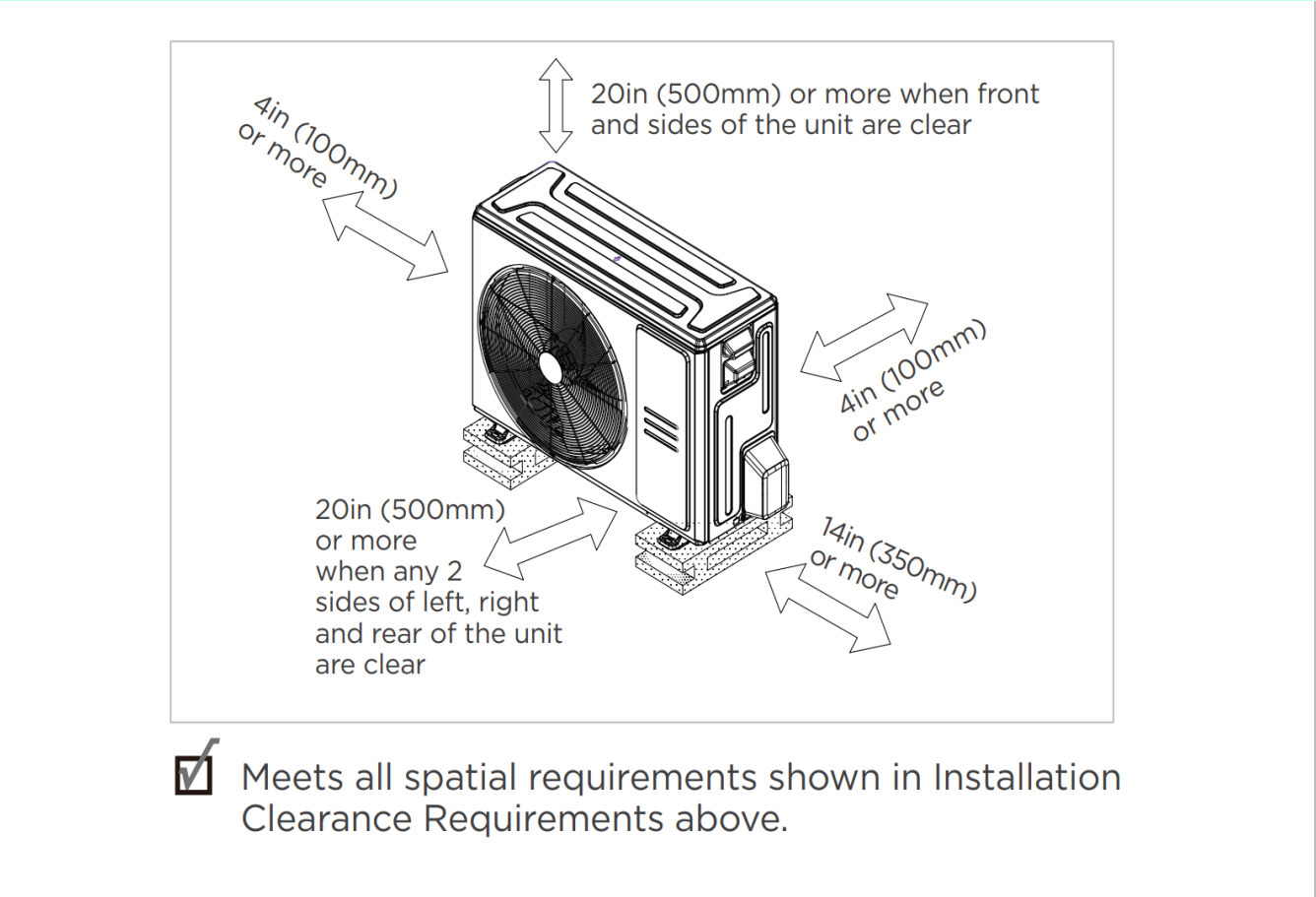


Dimensions		18k/24k		30k/36k		48k/60k	
		inch	mm	inch	mm	inch	mm
A	Model Height	45	1143	49	1245	53	1346
B	Model Width	17-1/2	445	21	534	24-1/2	622
c	Supply Air Opening Width	15-5/8	397	19-1/8	486	22-5/8	575
D	Return Air Opening Width	15-1/8	384	18-5/8	473	22-1/8	562
E	Model Depth	21	534	21	534	21	534
F	Supply Air Opening Depth	10-1/4	260	10-1/4	260	10-1/4	260
G	Return Air Opening Depth	18-3/4	476	18-3/4	476	18-3/4	476
H	Supply Air Opening Clearance	15/16	24	15/16	24	15/16	24
I	Return Air Opening Side Clearance	1-1/4	32	1-1/4	32	1-1/8	28
J	Return Air Opening Front Clearance	1-1/2	38	1-5/8	41	1-5/8	41
K	Return Air Opening Back Clearance	5/8	16	3/4	16	3/4	19

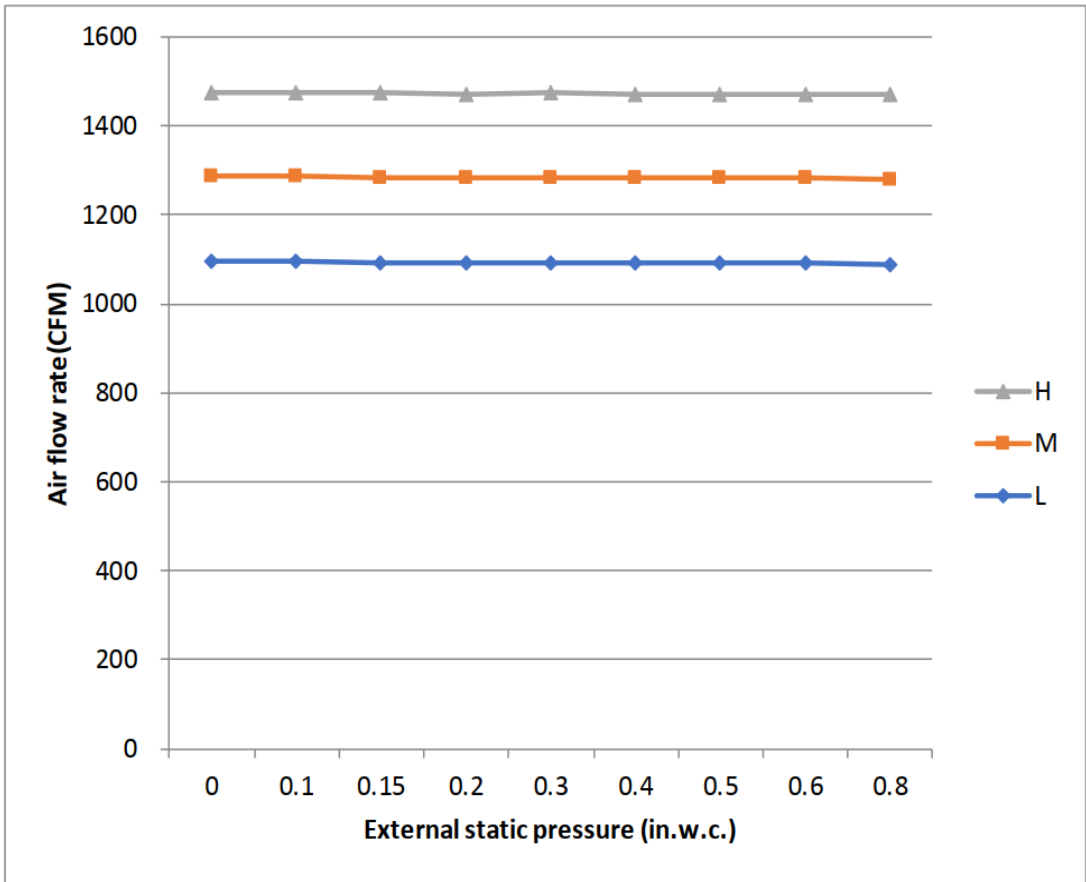
Outdoor Unit Dimension



Installation Instruction For Outdoor Unit



Fan Performance For Indoor Unit



Features

- Multi-position installation: horizontal(left or right), vertical(up or down)
- Aluminum Coil
- Constantly Air Flow system up to 0.80 In.W.G
- 1 inch R4.2 fiberglass free insulation reduces condensation and boosts efficiency(optional)
- Optional Auxiliary heat kit up to 25kW
- Easy Maintenance
- Multiple control options available:
 - Two way communication wired controller:120N(X6)
 - Two way communication wired controller with built-in WiFi:120N(X6W)
 - Wireless remote controller
 - Third-Party 24V Thermostat
- Adaptive Control System
- High efficiency up to 18.8 SEER2, 11 EER2, 9.7 HSPF2
- Chassis heater and crankcase heater equipped as standard

SUBMITTAL DATA SHEET

innovair®

Series Name: SLIM4 Heat Pump Series
Model Number: SOV60H2BA / SAV60BDA

Air Handler Heat Pump System

Location:	Approval:
Engineer:	Date:
Submitted to:	Construction:
Submitted by:	Unit #:
Reference:	Drawing #:



INDOOR SPECIFICATION

Indoor Air Flow (Turbo/H/M/L/Si) (CFM)		1807.00 / 1583.33 / 1359.67 / 1136.00 / N/A
Indoor Noise Level (Turbo/H/M/L/Si) (dBA)		56.0/52.0/49.0/34.5/N/A
Dimension (W×D×H)	inch	21.02 x 24.49 x 52.99
	mm	534.0×622.0×1346.0
Package (W×D×H)	inch	27.95 x 26.77 x 56.50
	mm	710×680×1435
Net/Gross Weight	lbs	162.92/190.92
	kg	73.9/86.6

OUTDOOR SPECIFICATION

Compressor Type		ROTARY
Compressor Model		MTH550UKPC8FU
Refrigerant		R454B
Refrigerant Oil Charge(mL)		1800
Refrigerant Oil		HAF68D1C
Outdoor Air Flow (Max) (CFM)		3037.1
Outdoor Noise Level (dBA)		65
Dimension (W×D×H)	inch	38.58 x 16.34 x 38.39
	mm	980.0×415.0×975.0
Package (W×D×H)	inch	45.08 x 19.68 x 42.52
	mm	1145×500×1080
Net/Gross Weight	lbs	192.90/224.21
	kg	87.5/101.7

EFFICIENCY

Cooling		Heating	
SEER2	15.2	HSPF2-4	8.4
EER2	8.6	COP	3.37

PERFORMANCE of Cooling

Cooling (Btu/hr)	
Rated Capacity	54000
Min/Max Capacity	21000~55000
Moisture Removal(L/h)	5.82
Standard Operating Range(°F/°C)	-13~122(-25 ~ 50)
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	54000
2. @ 47°F Min/Max Capacity	26000~55000
3. @ 17°F Rated	33000
4. @ 5°F Rated: Capacity / COP	38000/1.8
5. @ 5°F Max: Capacity	38000
Standard Operating Range(°F/°C)	-13~75(-25 ~ 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 Operating at Max. Frequency	Indoor: 70°F DB/60°F WB Outdoor: 5°F DB/5°F WB

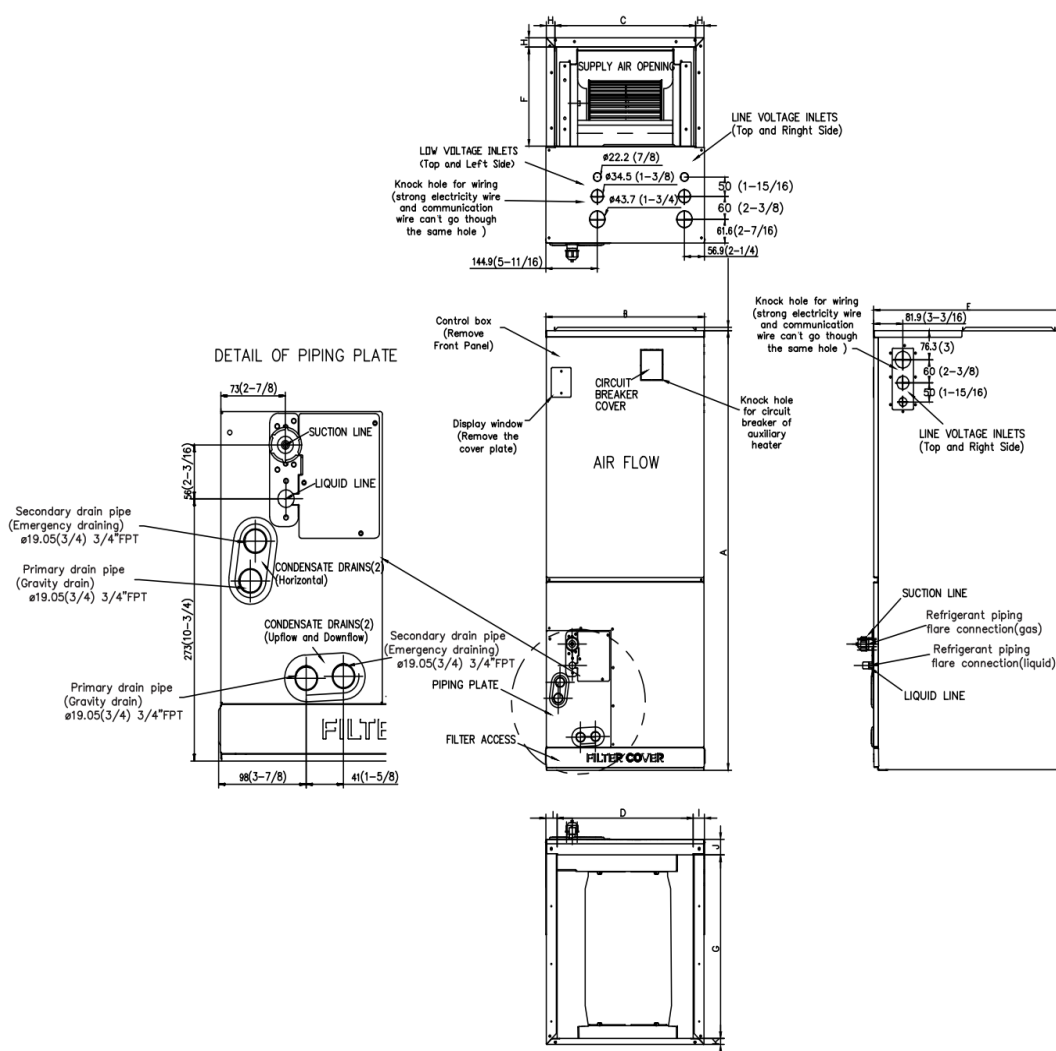
ELECTRICAL

Indoor Power Supply	115/208/230V,60Hz,1Ph
Indoor MCA 115V/(208/230V)	14.5/11.0
Indoor MOP	15
Outdoor Power Supply	208/230V,60Hz,1Ph
Outdoor MCA	39
Outdoor MOP	40
Communication Wiring	AWG 20-2
Compressor RLA	30
Outdoor Fan Motor RLA	1.2
Outdoor Fan Motor W	250
Indoor Fan Motor RLA	8.3
Indoor Fan Motor W	750
System Power Input @ Cooling (W)	6200(1800 ~ 6410)
System Power Input @ Heating (W)	4650(975 ~4810)
MCA: Min. circuit amps (A)	MOCP: Max. over current protection (A)
RLA: Rated load amps (A)	W: Fan motor rated output (W)

PIPING

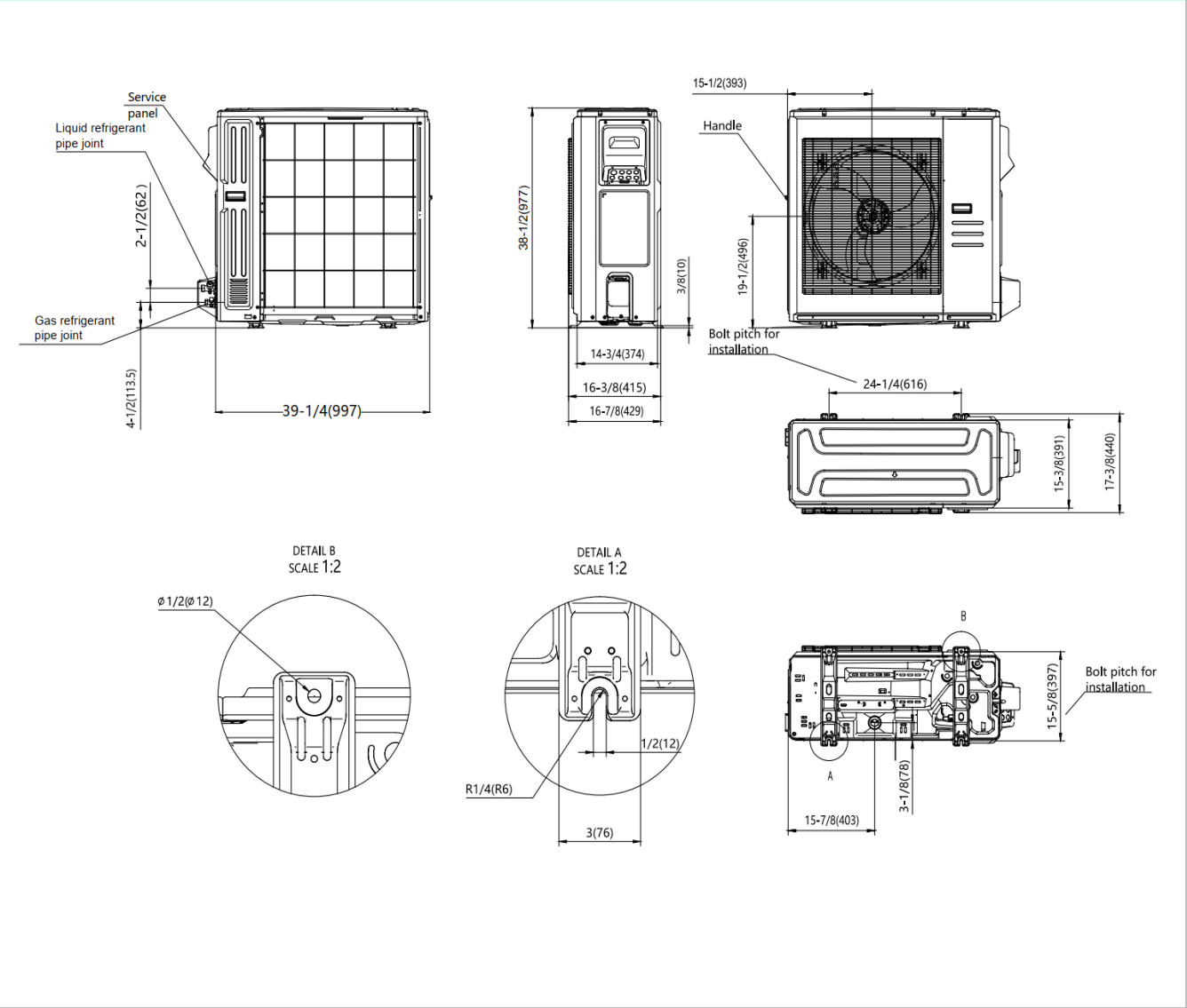
Throttle type(Indoor)	EXV
Throttle type(Outdoor)	EXV
Liquid Size	9.52mm(3/8in)
Gas Size	19mm(3/4in)
Max. Piping Length(ft/m)	246(75)
Max. Height Difference(ft/m)	98.4(30)
Max. Pre-charged Length(ft/m)	24.6(7.5)
Refrigerant Pre-charged Amount(oz/kg)	134.04(3.8)
Additional Charge of Refrigerant((oz/ft)/(g/m))	0.7(65)
Connection Method	Flared

Indoor Unit Dimension

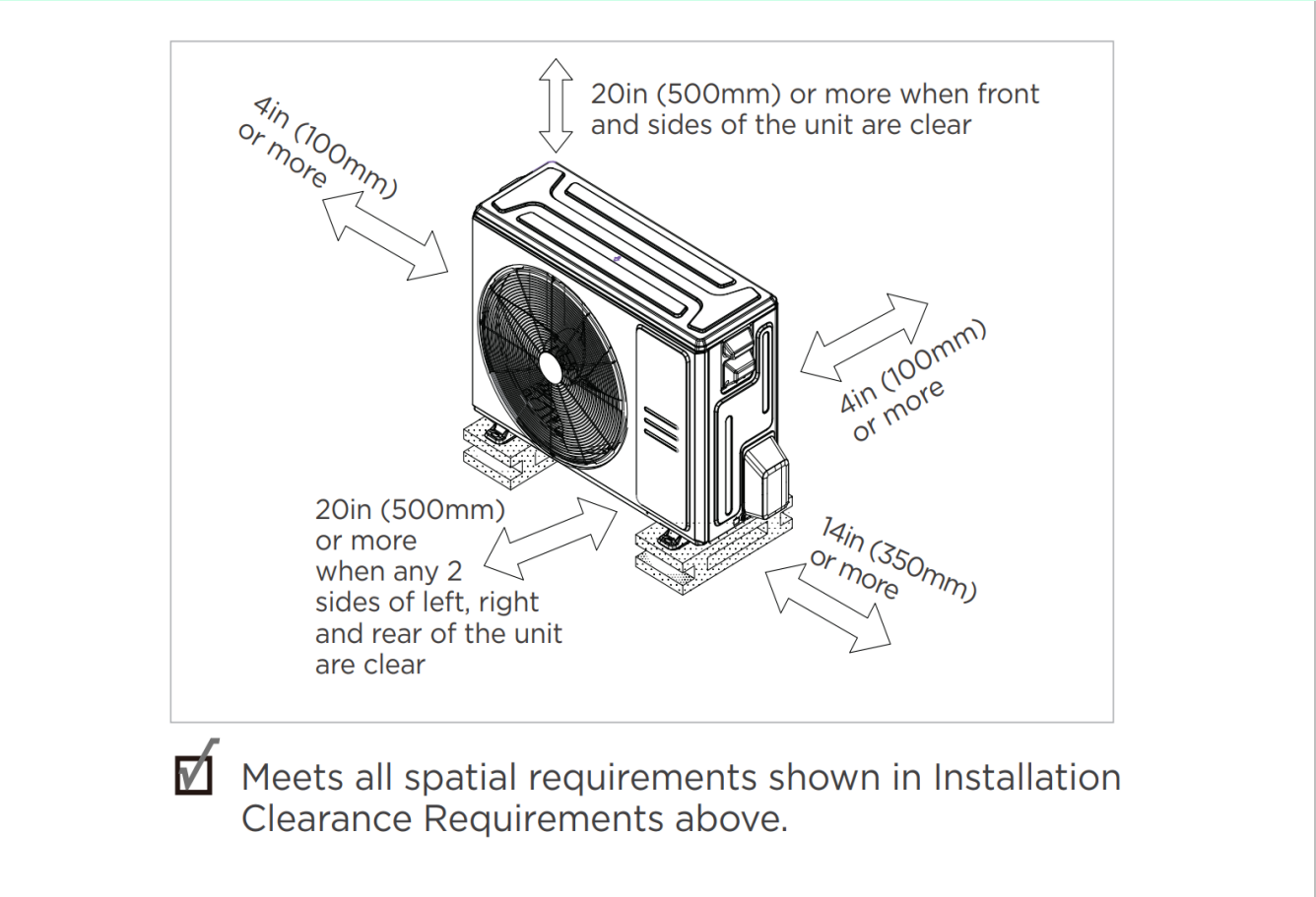


Dimensions		18k/24k		30k/36k		48k/60k	
		inch	mm	inch	mm	inch	mm
A	Model Height	45	1143	49	1245	53	1346
B	Model Width	17-1/2	445	21	534	24-1/2	622
c	Supply Air Opening Width	15-5/8	397	19-1/8	486	22-5/8	575
D	Return Air Opening Width	15-1/8	384	18-5/8	473	22-1/8	562
E	Model Depth	21	534	21	534	21	534
F	Supply Air Opening Depth	10-1/4	260	10-1/4	260	10-1/4	260
G	Return Air Opening Depth	18-3/4	476	18-3/4	476	18-3/4	476
H	Supply Air Opening Clearance	15/16	24	15/16	24	15/16	24
I	Return Air Opening Side Clearance	1-1/4	32	1-1/4	32	1-1/8	28
J	Return Air Opening Front Clearance	1-1/2	38	1-5/8	41	1-5/8	41
K	Return Air Opening Back Clearance	5/8	16	3/4	16	3/4	19

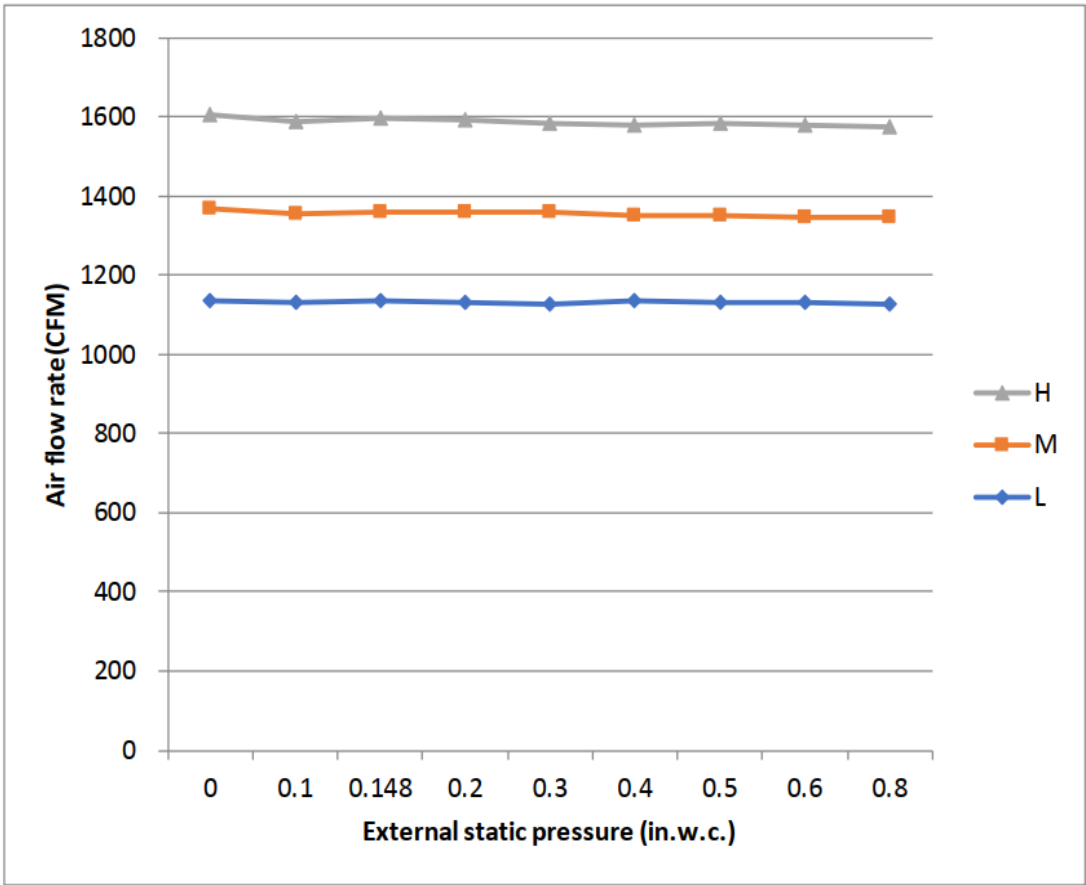
Outdoor Unit Dimension



Installation Instruction For Outdoor Unit



Fan Performance For Indoor Unit



Features

- Multi-position installation: horizontal(left or right), vertical(up or down)
- Aluminum Coil
- Constantly Air Flow system up to 0.80 In.W.G
- 1 inch R4.2 fiberglass free insulation reduces condensation and boosts efficiency(optional)
- Optional Auxiliary heat kit up to 25kW
- Easy Maintenance
- Multiple control options available:
 - Two way communication wired controller:120N(X6)
 - Two way communication wired controller with built-in WiFi:120N(X6W)
 - Wireless remote controller
 - Third-Party 24V Thermostat
- Adaptive Control System
- High efficiency up to 18.8 SEER2, 11 EER2, 9.7 HSPF2
- Chassis heater and crankcase heater equipped as standard