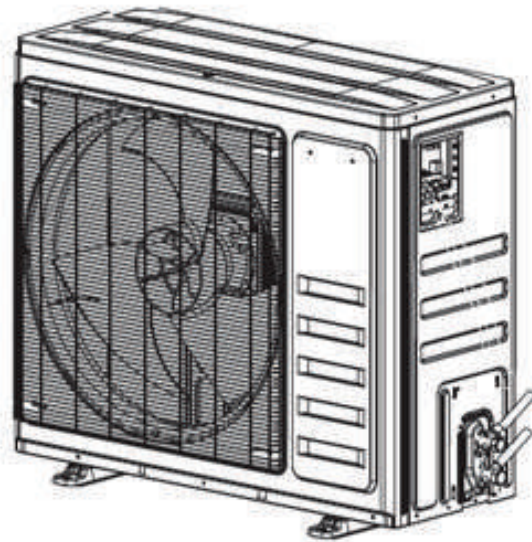


# Product and Submittal Data

## Split System Heat Pumps

A5HL5024A1  
A5HL5036A1  
A5HL5048A1  
A5HL5060A1



**Note:** Graphics in this document are for representation only. Actual model may differ in appearance.

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# Data Notes

This document supersedes and includes data from the documents listed below.

Table 1. Data notes

Literature Number	Title
A5HL5024A1-SUB-1*	Submittal - Split System Heat Pump A5HL5024A1
A5HL5036A1-SUB-1*	Submittal - Split System Heat Pump A5HL5036A1
A5HL5048A1-SUB-1*	Submittal - Split System Heat Pump A5HL5048A1
A5HL5060A1-SUB-1*	Submittal - Split System Heat Pump A5HL5060A1

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# Model Number Description

## Digits 1 — Brand

A = RunTru by Trane  
E = RunTru

## Digit 2 — Refrigerant Type

4 = R-410A  
5 = R-454B

## Digits 3, 4 — Product Family

AC = Air Conditioner  
HP = Heat Pump  
HL = Side Discharge

## Digit 5 — Nominal Efficiency Rating

3 = 13.4 SEER2  
4 = 14.3 SEER2  
5 = 15.2 SEER2

## Digit 6, 7, 8 — Nominal Capacity

BTU/Hour x 1000

## Digit 9 — Major Development Sequence

Primary Design / Form Series  
Alphabetic Character "A" through "Z"

## Digit 10 — Electrical Power Supply

1 = 200-203V/1PH/60Hz or 208-230V/1PH/60Hz

## Digit 11, 12, 13 — Secondary Function

000 = No Secondary Function

## Digit 14, 15 — Minor Design Sequence/ Series- Design Changes

Alphabetic Character "A" through "Z"

# General Data

## **AHRI standard 210/240 rating conditions:**

- Cooling: 80°F DB; air entering indoor coil: 67°F WB; air entering outdoor coil: 95°F DB
- High temperature heating: 47°F DB; air entering outdoor coil: 43°F WB; entering indoor coil: 70°F DB
- Low temperature heating: 17°F DB; air entering outdoor coil: 15°F WB; air entering indoor coil: 70°F DB
- Rated indoor airflow for heating is the same as for cooling.

## **AHRI standard 270 rating conditions:**

The noise rating numbers are determined with the unit in cooling operation. Standard Noise Rating number is at 95°F outdoor air.

# Product Specifications

**Table 2. A5HL5 models**

OUTDOOR UNIT <sup>(a)</sup> <sup>(b)</sup>	A5HL5024A1	A5HL5036A1	A5HL5048A1	A5HL5060A1
POWER CONNS. – V/PH/HZ <sup>(c)</sup>	208/230/1/60	208/230/1/60	208/230/1/60	208/230/1/60
MIN. BRCH. CIR. AMPACITY	20	25	35	35
MAX. OVER CURRENT PROTECTION	30	40	55	55
<b>COMPRESSOR</b>	ROTARY-INVERTER	ROTARY-INVERTER	ROTARY-INVERTER	ROTARY-INVERTER
NO. USED — NO. STAGES	1-MULTI	1-MULTI	1-MULTI	1-MULTI
VOLTS/PH/HZ	208/230/1/60	208/230/1/60	208/230/1/60	208/230/1/60
R.L. AMPS <sup>(d)</sup>	9.4	10.5	16.5	16.5
<b>FACTORY INSTALLED</b>	—			
START COMPONENTS <sup>(e)</sup>	NA	NA	NA	NA
INSULATION/SOUND BLANKET	YES	YES	YES	YES
COMPRESSOR HEAT	YES	YES	YES	YES
<b>OUTDOOR FAN</b>	PROPELLER	PROPELLER	PROPELLER	PROPELLER
DIA. (IN.) – NO. USED	21-5/8-1	23-5/8-1	20-7/8-2	20-7/8-2
TYPE DRIVE – NO. SPEEDS	DIRECT-MULTI	DIRECT-MULTI	DIRECT-MULTI	DIRECT-MULTI
NO. MOTORS – HP	1-1/8	1-1/4	2-1/8	2-1/8
CFM @ 0.0 IN. W.G. <sup>(f)</sup>	2350	3000	4200	4200
MOTOR SPEED R.P.M.	200 — 1200	200 — 1200	200 — 1200	200 — 1200
VOLTS/PH/HZ	245–385/3/60	245–385/3/60	245–385/3/60	245–385/3/60
F.L. AMPS	1.1	2.1	1.45	1.45
<b>OUTDOOR COIL – TYPE</b>	PLATE FIN™	PLATE FIN™	PLATE FIN™	PLATE FIN™
ROWS – F.P.I.	2-18	3-17	3-17	3-17
FACE AREA (SQ. FT.)	8.09	9.72	12.56	12.56
TUBE SIZE (IN.)	0.275	0.275	0.275	0.275
REFRIGERANT CONTROL	ELEC. EXPANSION VALVE	ELEC. EXPANSION VALVE	ELEC. EXPANSION VALVE	ELEC. EXPANSION VALVE
<b>REFRIGERANT</b>	—			
LBS. – R-454B (O.D. UNIT) <sup>(g)</sup>	5 lb – 5 oz	7 lb – 10 oz	8 lb — 13 oz	8 lb — 13 oz
FACTORY SUPPLIED	YES	YES	YES	YES
LINE SIZE – IN. O.D. GAS <sup>(h)</sup>	3/4	3/4	7/8	7/8
LINE SIZE — IN. O.D. LIQ.	3/8	3/8	3/8	3/8
<b>DIMENSIONS</b>	H X W X D	H X W X D	H X W X D	H X W X D
CRATED (IN.)	36-11/16 x 40-1/4 x 18-15/16	38-3/16 x 44-11/16 x 20-7/8	57-3/8 x 42-17/32 x 16-15/16	57-3/8 x 42-17/32 x 16-15/16
UNCRATED (IN.)	31-11/32 x 38-1/2 x 16-9/16	33-25/32 x 42-1/2 x 19-15/32	52-11/16 x 40-23/32 x 16-1/8	52-11/16 x 40-23/32 x 16-1/8
<b>WEIGHT</b>	—			
SHIPPING (LBS.)	146	192	260	260
NET (LBS.)	135	181	247	247

<sup>(a)</sup> Certified in accordance with the Air-Source Unitary Air-conditioner Equipment certification program, which is based on AHRI standard 210/240.

<sup>(b)</sup> Rated in accordance with AHRI standard 270/275.

<sup>(c)</sup> Calculated in accordance with Natl. Elec. Codes. Use only HACR circuit breakers or fuses.

<sup>(d)</sup> This value shown for compressor RLA on the unit nameplate and on this specification sheet is used to compute minimum branch circuit ampacity and max. fuse size. The value shown is the branch circuit selection current.

<sup>(e)</sup> NA means no start components. Yes means quick start kit components. PTC means positive temperature coefficient starter.

<sup>(f)</sup> Standard Air - Dry Coil - Outdoor.

<sup>(g)</sup> This value approximate. For more precise value see unit nameplate.

<sup>(h)</sup> Reference the outdoor unit ship-with literature for refrigerant piping length and lift guidelines. Reference the refrigerant piping software pub # 32-3312-xx or *Refrigerant Piping Manual for Small Split Cooling and Heat Pump Systems Application Guide* (SS-APG006\*-EN) for long line sets or specialty applications (xx denotes latest revision).

# Sound Power Level

**Table 3. Sound power level**

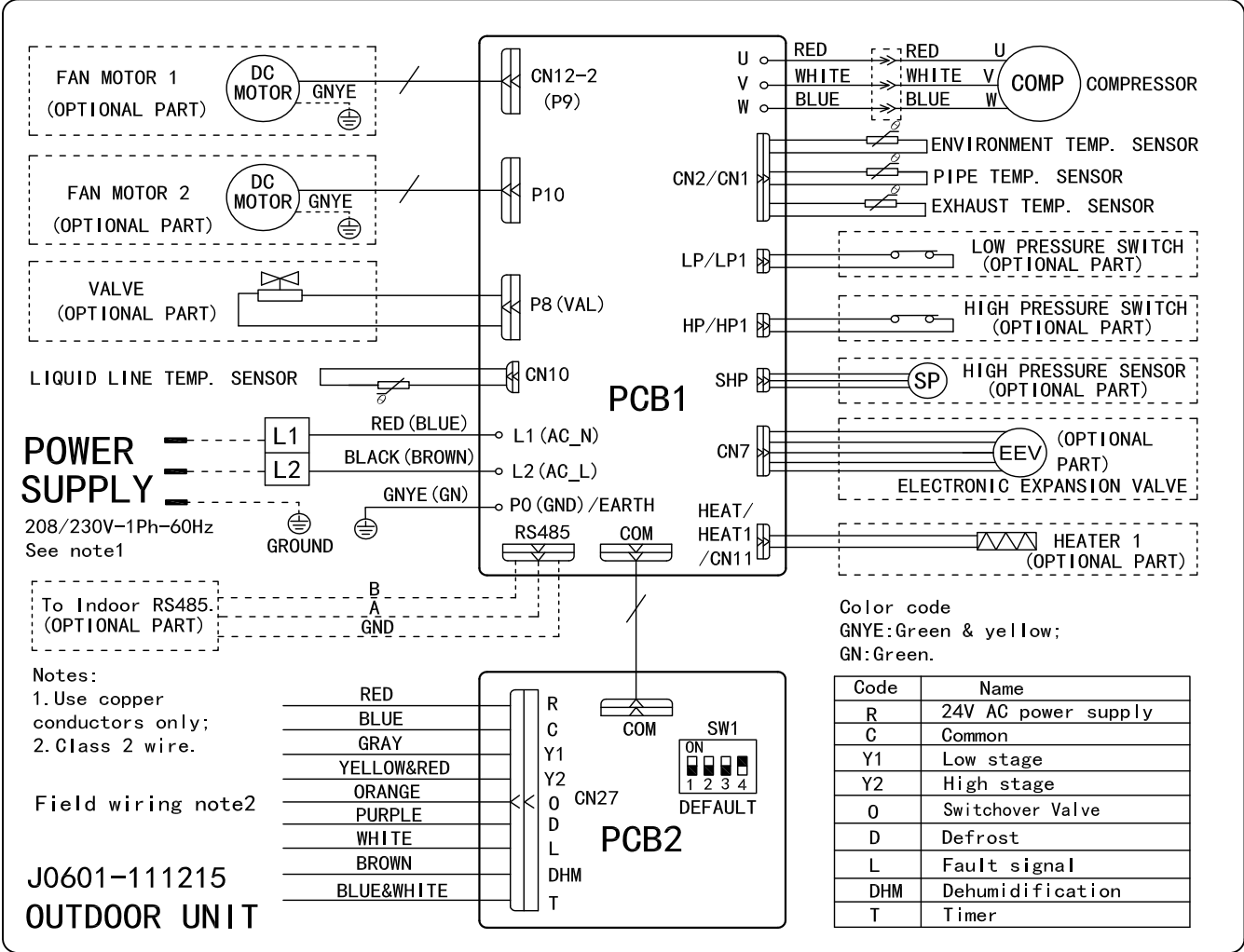
Model <sup>(a)</sup>	A-Weighted Sound Power Level [dB (A)]	Full Octave Sound Power [dB]							
		63Hz <sup>(b)</sup>	125Hz	250Hz	500Hz	1000Hz	2000Hz	4000Hz	8000Hz
A5HL5024A1	58	55	47	44	43	52	49	37	29
A5HL5036A1	60	57	40	47	51	56	45	32	30
A5HL5048A1	66	60	59	58	60	58	52	42	35
A5HL5060A1	68	63	61	56	62	60	57	46	39

<sup>(a)</sup> Rated in accordance with AHRI Standard 270–2015.

<sup>(b)</sup> For reference only.

# Wiring Diagrams

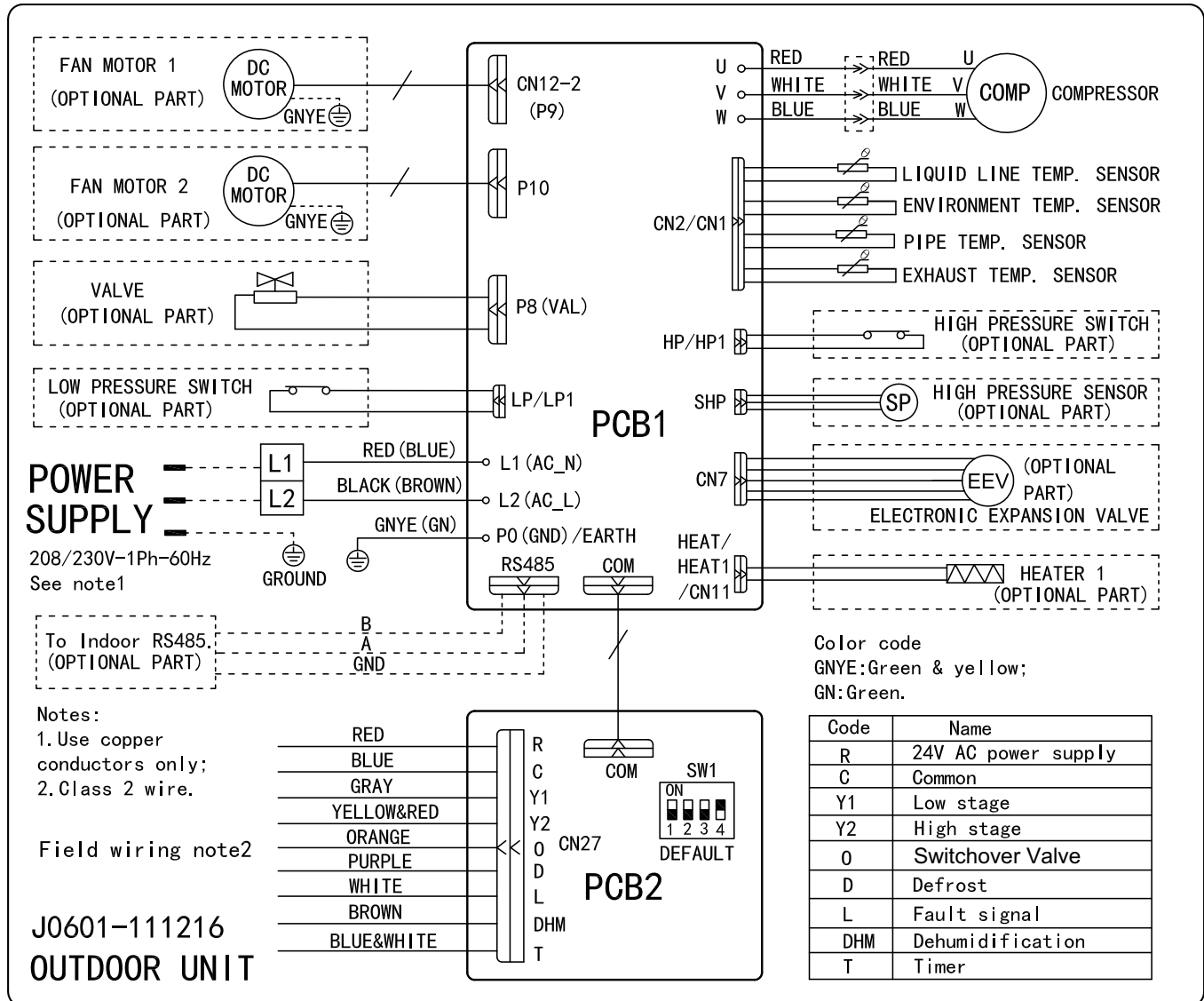
Figure 1. Wiring diagram – 2-ton and 3-ton



**Note:** Class 2 low voltage control wiring should not be run in conduit with main power wiring and should be separated.



Figure 2. Wiring diagram – 4-ton and 5-ton



**Note:** Class 2 low voltage control wiring should not be run in conduit with main power wiring and should be separated.

# Dimensional Data

Figure 3. Dimensional drawing – 024 and 036 models

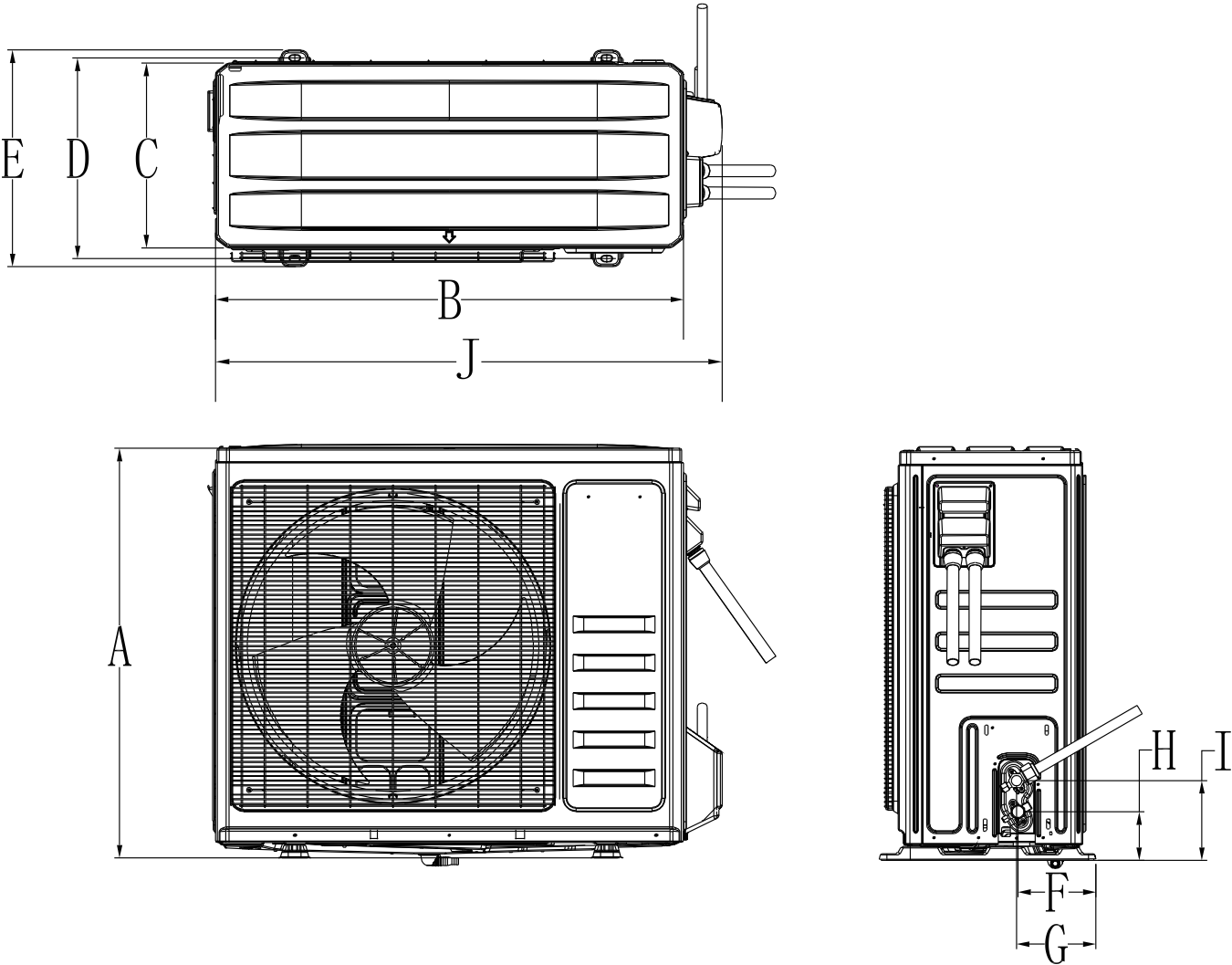


Table 4. Unit dimensions – 024 and 036 models

Model	A	B	C	D	E	F	G	H	I	J
A5HL5024A1	31.35	35.83	14.13	15.36	16.59	5.97	6.07	3.71	6.09	38.54
A5HL5036A1	33.77	39.54	15.89	18.19	19.45	8.30	9.67	3.70	6.10	42.28

**Note:** All dimensions are in inches.

Figure 4. Dimensional drawing – 048 and 060 models

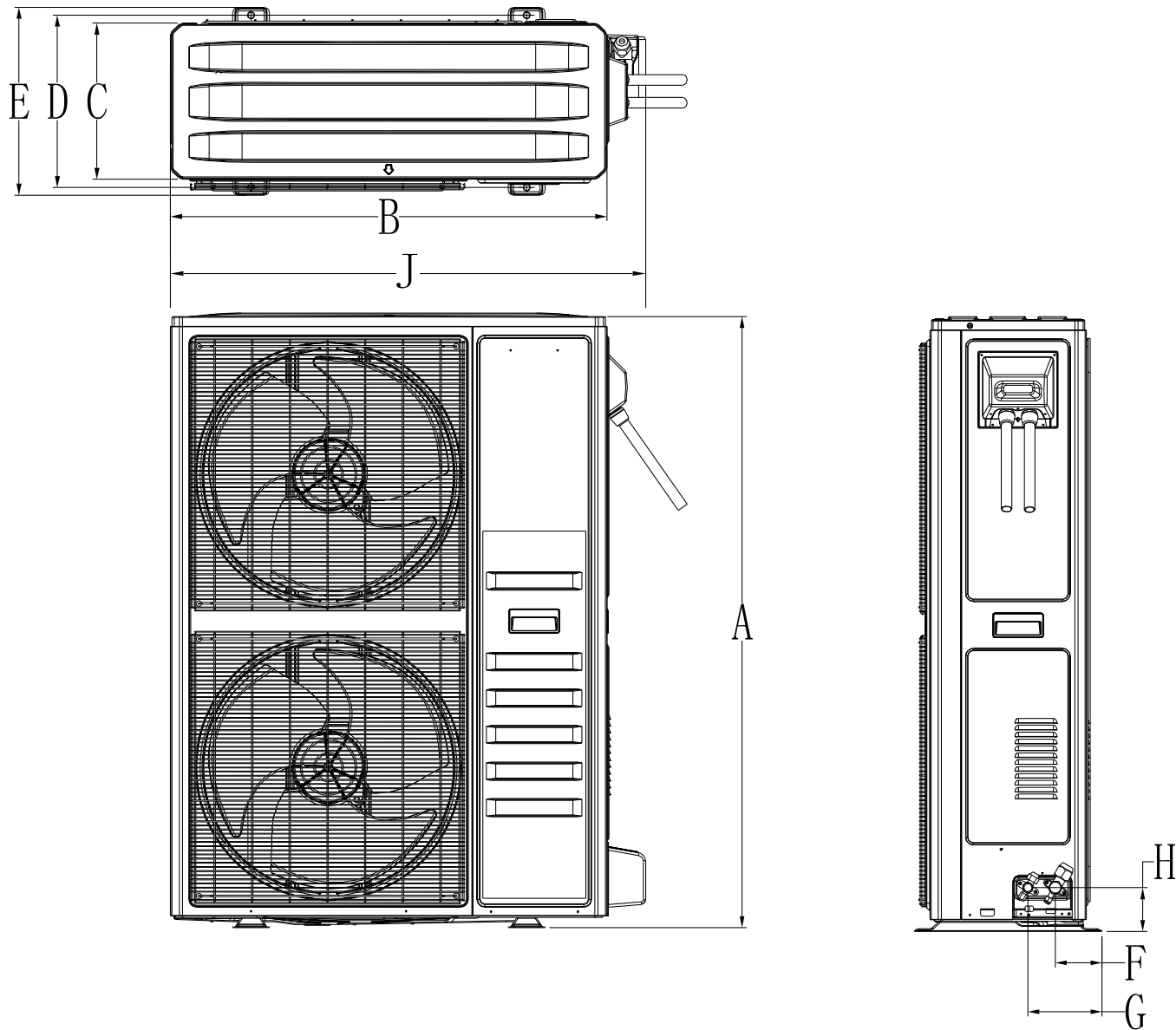


Table 5. Unit dimensions – 048 and 060 models

Model	A	B	C	D	E	F	G	H	J
A5HL5048A1	52.40	37.40	13.39	14.76	16.10	4.00	6.37	3.75	40.71
A5HL5060A1	52.40	37.40	13.39	14.76	16.10	4.00	6.37	3.75	40.71

**Note:** All dimensions are in inches.

# Mechanical Specification Options

## **General**

The outdoor condensing units are factory charged with the system charge required for the outdoor condensing unit, ten (10) feet of tested connecting line, and the smallest rated indoor evaporative coil match. This unit is designed to operate at outdoor ambient temperatures as high as 115°F. Cooling capacities are matched with a wide selection of air handlers and furnace coils that are AHRI certified. The unit is certified to UL 60335-2-40. Exterior is designed for outdoor application.

## **Refrigerant Controls**

Refrigeration system controls include condenser fan, compressor drive and low and high pressure switches.

## **Compressor**

The compressor features external over temperature and pressure protection. Other features include: Centrifugal oil pump and low vibration and noise.

## **Condenser Coil**

The outdoor coil provides low airflow resistance and efficient heat transfer. The coil is protected on all four sides by grilles and panels.

## **Low Ambient Cooling**

As manufactured, this system has a cooling capacity to 5°F.







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