

BUILT TO A HIGHER STANDARD[®]

American Standard[®]

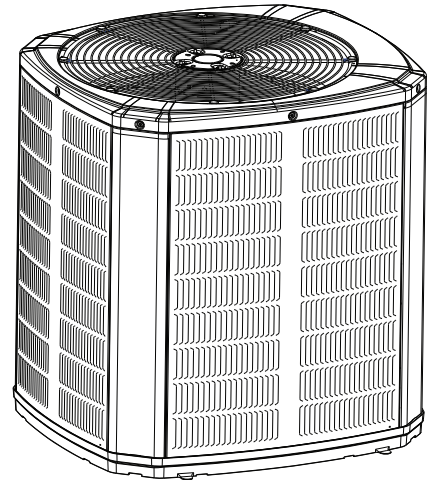
HEATING & AIR CONDITIONING

Product and Submittal Data

Multi-Speed Heat Pumps and Air Conditioners Featuring ComfortSeek[™]

5A6H7024A
5A6H7036A
5A6H7048A
5A6H7060A

5A7A7024A
5A7A7036A
5A7A7048A
5A7A7060A



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

Introduction

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Revision History

Updated the Product Specifications table.

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Product Specifications

Table 1. Heat pump models - 5A6H7024A, 5A6H7036A, 5A6H7048A, and 5A6H7060A

Outdoor Unit ^{(a) (b)}	5A6H7024A	5A6H7036A	5A6H7048A	5A6H7060A
Power Connections – V/PH/Hz ^(c)	208/230/1/60	208/230/1/60	208/230/1/60	208/230/1/60
Minimum BRCH. CIR. Ampacity	18	29	33	39
BR. CIR. PROT. RTG - Rec/Max (Amps)	20/30	30/40	35/50	40/60
Compressor	Inverter Scroll	Inverter Scroll	Inverter Scroll	Inverter Scroll
No. used – No. Speeds	1–Multi	1–Multi	1–Multi	1–Multi
MRC	17.8	27.1	39.2	46.1
Factory Installed	–	–	–	–
Start Components ^(d)	N/A	N/A	N/A	N/A
Insulation/Sound Blanket	No	No	No	No
Compressor Heat	Yes	Yes	Yes	Yes
Outdoor Fan				
Diameter (in.) – No. Used	23 – 1	23 – 1	27.5 – 1	27.5 – 1
Type Drive – No. Speeds	Direct – Variable	Direct – Variable	Direct – Variable	Direct – Variable
No. Motors – HP	1 – 1/3	1 – 1/3	1 – 1/2	1 – 1/2
Speed (RPM)	600-1050	600-1050	600-1050	600-1050
Volts/Ph/Hz	245–385/3/60	245–385/3/60	245–385/3/60	245–385/3/60
Full Load Amps	1.5	1.5	2.3	2.3
Outdoor Coil – Type	Spine Fin™	Spine Fin™	Spine Fin™	Spine Fin™
Rows– F.P.I.	1 – 24	1 – 24	1 – 24	1 – 24
Face Area (Sq. Ft.)	23.75	23.75	27.87	27.87
Tube Size (in.)	3/8	3/8	3/8	3/8
Refrigerant	R-454B	R-454B	R-454B	R-454B
Lbs. – R-454B (O.D. Unit) ^(e)	5 lb, 4 oz	5 lb, 8 oz	7 lb, 4 oz	7 lb, 4 oz
Factory Supplied	Yes	Yes	Yes	Yes
Rated Line Size – in. O.D. Gas (in.) ^(f)	3/4	3/4	7/8	7/8
Rated Line Size – in. O.D. LIQ. (in.) ^(f)	5/16	5/16	5/16	3/8
Charging Specifications				
Subcooling	10° F	12° F	12° F	10° F
Dimensions	H × W × D	H × W × D	H × W × D	H × W × D
Crated (in.)	46 × 30 × 33	46 × 30 × 33	46 × 35 × 38	46 × 35 × 38
Weight				
Shipping (Lbs.)	213	213	254	254
Net (Lbs.)	194	194	231	231

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

^(b) Rated in accordance with AHRI standard 270/275.

^(c) Calculated in accordance with Natl. Elec. Codes. Use only HACR circuit breakers or fuses.

^(d) NA means no start components. Yes means quick start kit components. PTC means positive temperature coefficient starter.

^(e) This value approximate. For more precise value see unit nameplate.

^(f) The maximum length of refrigerant lines from outdoor to indoor varies depending on application. See Installer's Guide Table 4 for allowable applications.

Table 2. Air conditioner models - 5A7A7024A, 5A7A7036A, 5A7A7048A, and 5A7A7060A

Outdoor Unit ^{(a) (b)}	5A7A7024A	5A7A7036A	5A7A7048A	5A7A7060A
Power Connections. – V/PH/HZ ^(c)	208/230/1/60	208/230/1/60	208/230/1/60	208/230/1/60
Minimum BRCH. CIR. Ampacity	18	29	33	39
BR. CIR. PROT. RTG - Rec/Max (Amps)	20/30	30/40	35/50	40/60
Compressor	Inverter Scroll	Inverter Scroll	Inverter Scroll	Inverter Scroll
No. Used – No. Speeds	1–Multi	1–Multi	1–Multi	1–Multi
MRC	17.8	27.1	39.2	46.1
Factory Installed	–	–	–	–
Start Components ^(d)	N/A	N/A	N/A	N/A
Insulation/Sound Blanket	No	No	No	No
Compressor Heat	Yes	Yes	Yes	Yes
Outdoor Fan				
Diameter (in.) – No. Used	23 – 1	23 – 1	27.5 – 1	27.5 – 1
Type Drive – No. Speeds	Direct – Variable	Direct – Variable	Direct – Variable	Direct – Variable
No. Motors – HP	1 – 1/3	1 – 1/3	1 – 1/2	1 – 1/2
Speeds (RPM)	600-1050	600-1050	600-1050	600-1050
Volts/Ph/Hz	245–385/3/60	245–385/3/60	245–385/3/60	245–385/3/60
Full Load Amps	1.5	1.5	2.3	2.3
Outdoor Coil-Type	Spine Fin™	Spine Fin™	Spine Fin™	Spine Fin™
Rows – F.P.I.	1 – 24	1 – 24	1 – 24	1 – 24
Face Area (Sq. Ft.)	23.75	23.75	27.87	27.87
Tube Size (in.)	3/8	3/8	3/8	3/8
Refrigerant	R-454B	R-454B	R-454B	R-454B
Lbs. – R-454B (O.D. Unit) ^(e)	5 lb, 1 oz	5 lb, 5 oz	7 lb, 1 oz	7 lb, 1 oz
Factory Supplied	Yes	Yes	Yes	Yes
Rated Line Size – in. O.D. Gas (in.) ^(f)	3/4	3/4	7/8	7/8
Rated Line Size – in. O.D. LIQ. (in.) ^(f)	5/16	5/16	5/16	3/8
Charging Specifications				
Subcooling	10° F	12° F	12° F	10° F
Dimensions	H × W × D	H × W × D	H × W × D	H × W × D
Crated (in.)	46 × 30 × 33	46 × 30 × 33	46 × 35 × 38	46 × 35 × 38
Weight				
Shipping (Lbs.)	213	213	254	254
Net (Lbs.)	194	194	231	231

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

^(b) Rated in accordance with AHRI standard 270/275.

^(c) Calculated in accordance with Natl. Elec. Codes. Use only HACR circuit breakers or fuses.

^(d) NA means no start components. Yes means quick start kit components. PTC means positive temperature coefficient starter.

^(e) This value approximate. For more precise value see unit nameplate.

^(f) The maximum length of refrigerant lines from outdoor to indoor varies depending on application. See Installer's Guide Table 4 for allowable applications.

Sound Data

Table 3. Models 5A6H7024A, 5A6H7036A, 5A6H7048A, and 5A6H7060A

Model	Mode	Speed	A-Weighted Sound Power Level [dB (A)]	Full Octave Sound Power [dB]							
				63 Hz	125 Hz	250 Hz	500 Hz	1000 Hz	2000 Hz	4000 Hz	8000 Hz
5A6H7024A	Cool	Min	63	57.7	59.1	56.8	59.4	59.5	53.6	45.1	43.8
	Cool	Max	71	59.1	70.4	63.7	65.5	68.4	63.4	53.2	49.7
	Heat	Min	69	56.7	60.7	58.1	62.8	66.1	60.9	51.7	49.0
	Heat	Max	73	76.0	74.8	68.0	68.1	69.7	64.5	56.6	55.1
5A6H7036A	Cool	Min	67	69.5	58.8	56.2	60.1	59.5	63.5	46.1	47.4
	Cool	Max	72	76.0	69.1	64.5	67.1	69.7	63.6	53.6	52.6
	Heat	Min	72	87.4	71.1	66.5	68.6	68.5	61.7	52.8	52.6
	Heat	Max	75	76.0	73.8	67.6	70.9	71.4	65.0	56.1	53.6
5A6H7048A	Cool	Min	70	69.5	71.0	66.2	70.1	64.1	57.7	55.7	48.8
	Cool	Max	75	76.0	79.8	75.0	74.3	69.1	63.0	61.3	53.7
	Heat	Min	72	87.4	72.3	72.3	69.2	67.2	61.2	60.2	52.5
	Heat	Max	75	76.0	79.8	75.0	74.3	69.1	63.0	61.3	53.7
5A6H7060A	Cool	Min	70	69.5	71.0	66.2	70.1	64.1	57.7	55.7	48.8
	Cool	Max	75	76.0	79.8	75.0	74.3	69.1	63.0	61.3	53.7
	Heat	Min	72	87.4	72.3	72.3	69.2	67.2	61.2	60.2	52.5
	Heat	Max	75	76.0	79.8	75.0	74.3	69.1	63.0	61.3	53.7

Note: Rated in accordance with AHRI Standard 270.

Table 4. Models 5A7A7024A, 5A7A7036A, 5A7A7048A, and 5A7A7060A

Model	Mode	Speed	A-Weighted Sound Power Level [dB (A)]	Full Octave Sound Power [dB]							
				63 Hz	125 Hz	250 Hz	500 Hz	1000 Hz	2000 Hz	4000 Hz	8000 Hz
5A7A7024A	Cool	Min	63	57.7	59.1	56.8	59.4	59.5	53.6	45.1	43.8
	Cool	Max	71	49.1	70.4	63.7	65.5	68.4	63.4	53.2	49.7
5A7A7036A	Cool	Min	67	69.5	58.8	56.2	60.1	59.5	63.5	46.1	47.4
	Cool	Max	72	76.0	69.1	64.5	67.1	69.7	63.6	53.6	52.6
5A7A7048A	Cool	Min	70	69.5	71.0	66.2	70.1	64.1	57.7	55.7	48.8
	Cool	Max	75	76.0	79.8	75.0	74.3	69.1	63.0	61.3	53.7
5A7A7060A	Cool	Min	70	69.5	71.0	66.2	70.1	64.1	57.7	55.7	48.8
	Cool	Max	75	76.0	79.8	75.0	74.3	69.1	63.0	61.3	53.7

Note: Rated in accordance with AHRI Standard 270.

Optional Accessories

Table 5. Optional accessories

Rubber Isolator Kit	BAYISLT101
Snow Leg — Base and Cap 4 in. High	BAYLEGS002
Snow Leg — 4 in. Extension	BAYLEGS003
Extreme Condition Mounting Kit	BAYECMT023
Refrigerant Lineset ^(a)	

^(a) 25, 30, 35, and 50 foot linesets available. For a complete listing of lineset options available from equipment or supply stores, refer to the Trane Residential and Light Commercial Product Handbook.

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.

Model Nomenclature

Outdoor Units

Digit 1 — Refrigerant Type

5 = R-454B

Digit 2 — Brand

A = American Standard

Digit 3 — System Type

5 = Cold Climate HP

6 = AC

7 = HP

Digit 4 — Product Family

A = Silver/Gold AC

C = Light Commercial

H = Silver/Gold HP

V = Platinum VSPD

Digit 5 — Nominal Rated SEER2

0 = 20 SEER2

3 = 13 SEER2

4 = 14 SEER2

5 = 15 SEER2

6 = 16 SEER2

7 = 17 SEER2

8 = 18 SEER2

Digit 6 — Field Connection

0 = Brazed

X = Link™

Digit 7, 8 — Nominal Tonnage

12 = 1.0

18 = 1.5

19 = 1.5

24 = 2.0

25 = 2.0

30 = 2.5

31 = 2.5

36 = 3.0

37 = 3.0

42 = 3.5

43 = 3.5

48 = 4.0

49 = 4.0

60 = 5.0

61 = 5.0

Digit 9 — Major Design Change

A Thru Z Mode = No F, I, 0

Digit 10 — Power Supply (Voltage/Phz/Hz)

1 = 200-208-230/1/60

3 = 200-230/3/60

4 = 460/3/60

Digit 11, 12, 13 — Other Functions

000 = Typical-no meaning

Digit 14 — Minor Design Change

A Thru Z Mode = No F, I, 0

Digit 15 — Service Digit - Not Orderable

A Thru Z Mode = No F, I, 0

Figure 1. Wiring diagram



Dimensional Data

Figure 2. Dimensional drawing

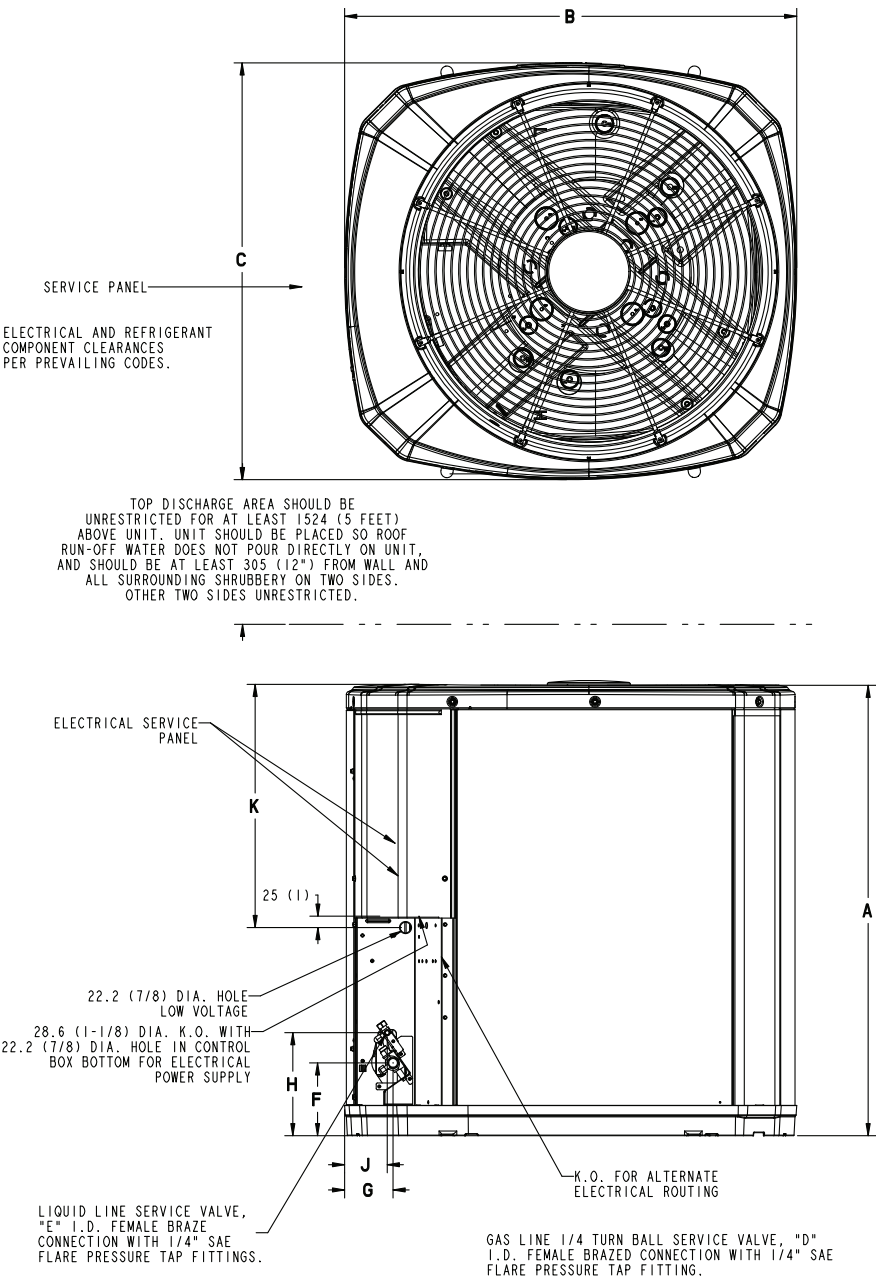


Table 6. Dimensions — mm (inches)

Model	Base	A	B	C	D	E	F	G	H	J	K
5A7A7024A/ 5A6H7024A	3	1035 (40-3/4)	829 (32-5/8)	756 (29-3/4)	16-5/8	8-5/16	127 (5)	76 (3)	197 (7-3/4)	57 (2-1/4)	813 (32)
5A7A7036A/ 5A6H7036A	3	1035 (40-3/4)	829 (32-5/8)	756 (29-3/4)	16-5/8	8-5/16	127 (5)	76 (3)	197 (7-3/4)	57 (2-1/4)	813 (32)

Table 6. Dimensions — mm (inches) (continued)

Model	Base	A	B	C	D	E	F	G	H	J	K
5A7A7048A/ 5A6H7048A	4	1035 (40-3/4)	946 (37-1/4)	870 (34-1/4)	19-3/4	8-5/16	127 (5)	76 (3)	197 (7-3/4)	57 (2-1/4)	813 (32)
5A7A7060A/ 5A6H7060A	4	1035 (40-3/4)	946 (37-1/4)	870 (34-1/4)	19-3/4	8-5/16	127 (5)	76 (3)	197 (7-3/4)	57 (2-1/4)	813 (32)

Mechanical Specification Options

General

This unit is designed to operate at outdoor ambient temperatures from 55°F to 120°F in cooling. From – 0°F to 66°F in heating (heat pumps only). Only AHRI approved indoor matches are approved for use with these models.

Casing

Unit casing is constructed of heavy gauge. G60 galvanized steel and painted with a weather-resistant powder paint on all louvered panels and prepaint on all other panels. Corrosion and weatherproof CMBP-G30 DuraTuff™ base.

Refrigerant Controls

Refrigeration system controls include condenser fan, compressor inverter drive, and high and low pressure switches. A factory-supplied, field-installed filter is standard.

Compressor

Inverter-driven compressor with variable output capacities. Compressor protections reduce operating speed and current draw to maintain operation while protecting the compressor.

Condenser Coil

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

Low Ambient Cooling

As manufactured, this system has built in freeze protection that will allow cooling operation below 55°F but will reduce capacity or shutdown completely to prevent operation under adverse conditions.



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