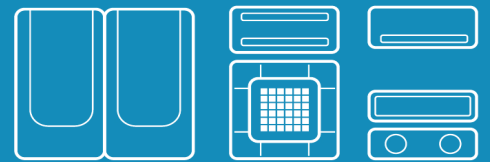


# SINGLE

## Technical Data Book

360 CST for North America (R410A, 60Hz, H/P)



Model : CNH\*\*4DN (AC\*\*\*KN4DCH/AA)  
CXH\*\*ADJ (AC\*\*\*JXADCH/AA)

# History

Version	Modification	Date	Remark
Ver.1.0	Release SINGLE 360 CST TDB for NA (R410A, 60Hz, HP)	16.02.16.	
Ver.1.1	Revision of specification and cycle diagram	16.03.18	
Ver.1.2	Revision of drwaing. (Note addition)	16.04.11	
Ver.1.3	Revision of Cycle Diagram	16.09.21	
Ver.1.4	Modified 'Electrical wiring diagram' of indoor unit (P.18)	18.01.05	
Ver.1.5	Updated the panel model code	19.01.07	
Ver.1.6	Updated the model code including US code	20.08.20	

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---

# 1 Nomenclature

## US Code

### Model Names

<b>C</b>	<b>N</b>	<b>H</b>	<b>18</b>	<b>4</b>	<b>D</b>	<b>K</b>
(1)	(2)	(3)	(4)	(5)	(6)	(7)

### (1) Classification

C	SINGLE
---	--------

### (2) Product Type

N	Indoor Unit (NASA)
X	Outdoor Unit (NASA)

### (3) Mode

H	Heat Pump(R410A)
C	Cooling Only(R410A)

### (4) Capacity

	x 1000 Btu/h (2 digits)
--	-------------------------

### (5-1) Feature1 (Indoor Unit)

1	1Way Cassette
4	4Way Cassette / 360 Cassette
A	Wall-Mounted
C	Ceiling
J	Console
L	LSP Duct
M	MSP Duct
H	HSP Duct
N	4Way Cassette (600 x 600)

### (5-2) Feature1 (Outdoor Unit)

A	Inv+Side+General Temp
S	Inv+Side+Low Temp
Q	Inv+Side+Tropical Temp
F	Inv+Top+Tropical Temp

### (6) Feature2

F	Flagship
S	Standard
D	Deluxe
P	Premium

### (7) Version

H	2014
J	2015
K	2016

# 1 Nomenclature

## Indoor Units

### Model Names

<b>AC</b>	<b>024</b>	<b>K</b>	<b>N</b>	<b>4</b>	<b>D</b>	<b>C</b>	<b>H</b>	/	<b>AA</b>
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)		Buyer

### (1) Classification

AC	SINGLE
AM	VRF

### (2) Capacity

x 1000 Btu/h (3 digits)
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### (3) Version

H	2014
J	2015
K	2016

### (4) Product Type

N	Indoor Unit (NASA)
X	Outdoor Unit (NASA)

### (5) Features

1	1Way Cassette
4	4Way Cassette / 360 Cassette
A	Wall-Mounted
C	Ceiling
J	Console
L	LSP Duct
M	MSP Duct
H	HSP Duct
N	4Way Cassette (600 x 600)

### (6) Features

F	Flagship
S	Standard
D	Deluxe
P	Premium

### (7) Rating Voltage

C	1Φ, 208~230V, 60Hz
H	3Φ, 400V, 60Hz

### (8) Model

H	Heat Pump(R410A)
C	Cooling Only(R410A)
E	Heat Pump(R22)
D	Cooling Only(R22)

# 2 Specifications

## 360 Cassette

Type				360 Cassette		360 Cassette				
Model Name	Indoor Unit			AC018KN4DCH/AA		AC024KN4DCH/AA				
	Outdoor Unit			AC018JXADCH/AA		AC024JXADCH/AA				
US Code	Indoor Unit			CNH184DK		CNH244DK				
	Outdoor Unit			CXH18ADJ		CXH24ADJ				
System	Mode			-		Heat Pump				
	Capacity	Cooling(Min/Std/Max)		kW		1.47 / 5.28 / 6.15		2.05 / 7.03 / 7.91		
				Btu/h		5,000 / 18,000 / 21,000		7,000 / 24,000 / 27,000		
				US RT		0.42 / 1.50 / 1.75		0.58 / 2.00 / 2.25		
		Heating(Min/Std/Max)		kW		1.11 / 5.86 / 7.33		1.52 / 7.91 / 9.09		
				Btu/h		3,800 / 20,000 / 25,000		5,200 / 27,000 / 31,000		
				US RT		0.32 / 1.67 / 2.08		0.43 / 2.25 / 2.58		
	Power	Power Input (Nominal)		Cooling(Min/Std/Max)		0.35 / 1.58 / 2.30		0.46 / 2.16 / 2.50		
				Heating(Min/Std/Max)		0.26 / 1.60 / 2.70		0.38 / 2.47 / 3.50		
		Current Input (Nominal)		Cooling(Min/Std/Max)		2.10 / 7.20 / 10.00		2.80 / 9.80 / 12.00		
				Heating(Min/Std/Max)		1.70 / 7.40 / 12.00		2.50 / 11.60 / 14.50		
		MCA		A		8.10		12.06		
		MOP		A		15.00		20.00		
	Energy Efficiency	EER (Nominal Cooling)		-		3.34		3.26		
		EER (Nominal Cooling, US)		Btu/Wh		11.39		11.11		
		COP (Nominal Heating)		-		3.66		3.20		
		Energy Grade		-		SEER 20.1		SEER 20.5		
		-		-		HSPF 10.0		HSPF 10.0		
	Piping Connections	Liquid Pipe		Ø, mm		6.35		6.35		
				Ø, inch		1/4"		1/4"		
		Gas Pipe		Ø, mm		12.70		15.88		
				Ø, inch		1/2"		5/8"		
		Installation Limitation	Max. Length		m		30		50	
					ft		98		164	
Max. Height			m		20		30			
			ft		66		98			
Refrigerant	Type		-		R410A		R410A			
	Control Method		-		-		-			
	Factory Charging		kg		1.30		2.10			
			lbs		2.87		4.63			
Power Supply	Type			Ø, #, V, Hz		1,2,208-230.60		1,2,208-230.60		
	Fan		Type		-		Turbo			
	Motor		Output		W x n		65 x 1			
	Air Flow Rate		High/Mid/Low		CFM		646.00 / 547.00 / 480.00		646.00 / 547.00 / 480.00	
Drain	Drain Pipe		Ø,mm		VP25 (OD 32,ID 25)		VP25 (OD 32,ID 25)			
Sound	Pressure		High/Mid/Low		dB(A)		35 / 32 / 29		36 / 33 / 29	
	Net Weight		kg		21.00		21.00			
External Dimension	Shipping Weight		lbs		46.30		46.30			
	Shipping Weight		kg		25.00		25.00			
	Shipping Weight		lbs		55.12		55.12			
	Net Dimensions (WxHxD)		mm		947 x 281 x 947		947 x 281 x 947			
	Shipping Dimensions (WxHxD)		inch		37.28 x 11.06 x 37.28		37.28 x 11.06 x 37.28			
	Shipping Dimensions (WxHxD)		mm		990 x 330 x 990		990 x 330 x 990			
Panel Size (see note 4 below)	Shipping Dimensions (WxHxD)		inch		38.98 x 12.99 x 38.98		38.98 x 12.99 x 38.98			
	Panel model (Square type)		-		PC4N*DM*N		PC4N*DM*N			
	Panel Net Weight		kg		3.60		3.60			
	Panel Net Weight		lbs		7.94		7.94			
	Shipping Weight		kg		6.30		6.30			
	Shipping Weight		lbs		13.89		13.89			
Additional Accessories	Net Dimensions (WxHxD)		mm		1,000 x 66 x 1,000		1,000 x 66 x 1,000			
	Shipping Dimensions (WxHxD)		inch		39.37 x 2.60 x 39.37		39.37 x 2.60 x 39.37			
	Shipping Dimensions (WxHxD)		mm		1,093 x 85 x 1,083		1,093 x 85 x 1,083			
	Shipping Dimensions (WxHxD)		inch		43.03 x 3.35 x 42.64		43.03 x 3.35 x 42.64			
Additional Accessories	Drain pump		Drain pump		-		Built-in			
	Air Filter		Max. Lifting		in. / gal/h		29.53 / 6.34			
Power Supply	Type			Ø, #, V, Hz		1,2,208-230.60		1,2,208-230.60		
	Compressor			Type		-		Twin BLDC Rotary		
Compressor	Model		-		UG4T150LNBEQ		UG4T200LNFE4			
	Output		kW		1.42		1.85			
Fan	Oil		Type		-		POE			
	Air Flow Rate		Cooling		CFM		1,549.00		2,189.00	
Sound	Pressure		Cooling/Heating		dB(A)		48 / 48		50 / 50	
	Net Weight		kg		45.00		64.50			
External Dimension	Shipping Weight		lbs		99.21		142.20			
	Shipping Weight		kg		48.00		69.50			
	Shipping Weight		lbs		105.82		153.22			
	Net Dimensions (WxHxD)		mm		880 x 638 x 310		940 x 998 x 330			
	Shipping Dimensions (WxHxD)		inch		34.65 x 25.12 x 12.20		37.01 x 39.29 x 12.99			
	Shipping Dimensions (WxHxD)		mm		: 1,023 x 730 x 413		995 x 1,096 x 426			
Operating Temp.	Cooling		°F		0.0 ~115.0		0.0 ~ 115.0			
	Heating		°F		-4.0 ~ 75.2		-4.0 ~ 75.2			

\* Specifications may be subject to change without prior notice.

1) Nominal capacity are based on (Refrigerant Piping : 24.6ft , Level Differences : 0ft);

. Cooling : Indoor temp. 80°F DB, 67°F WB / Outdoor temp. 95°F DB, 75°F WB . Heating : Indoor temp. 70°F DB, 60°F WB / Outdoor temp. 47°F DB, 43°F WB

2) Sound pressure level is acquired in an anechoic room. Thus actual noise level may be different depending on the installation conditions.

3) These products contain R410A which is fluorinated greenhouse gas.

4) Optional ceiling panels (Detailed specifications for other panels are available on dimensional drawing pages.)

. Square type : PC4NUDMAN, PC4NUDMUN (White), PC4NBDMAN, PC4NBDMUN (Black) . Circle type : PC4NUNMAN, PC4NUNMUN (White), PC4NBNMAN, PC4NBNMUN (Black)

# 2 Specifications

## 360 Cassette

Type				360 Cassette	360 Cassette	
Model Name	Indoor Unit			AC030KN4DCH/AA	AC036KN4DCH/AA	
	Outdoor Unit			AC030JXADCH/AA	AC036JXADCH/AA	
US Code	Indoor Unit			CNH304DK	CNH364DK	
	Outdoor Unit			CXH30ADJ	CXH36ADJ	
System	Mode		-	Heat Pump	Heat Pump	
	Capacity	Cooling(Min/Std/Max)		kW	2.73 / 8.79 / 10.26	4.10 / 10.55 / 12.02
				Btu/h	9,300 / 30,000 / 35,000	14,000 / 36,000 / 41,000
				US RT	0.78 / 2.50 / 2.92	1.17 / 3.00 / 3.42
		Heating(Min/Std/Max)		kW	2.64 / 9.38 / 11.14	3.37 / 11.72 / 14.07
				Btu/h	9,000 / 32,000 / 38,000	11,500 / 40,000 / 48,000
				US RT	0.75 / 2.67 / 3.17	0.96 / 3.33 / 4.00
	Power	Power Input (Nominal)	Cooling(Min/Std/Max)	kW	0.70 / 2.89 / 4.00	0.93 / 3.00 / 3.60
			Heating(Min/Std/Max)	A	0.65 / 3.06 / 5.50	0.72 / 3.45 / 5.00
		Current Input (Nominal)	Cooling(Min/Std/Max)	A	4.00 / 13.40 / 17.00	4.80 / 13.90 / 17.00
			Heating(Min/Std/Max)	A	3.40 / 14.40 / 21.80	3.70 / 16.10 / 23.00
		MCA	A		19.705	22.08
		MOP	A		30.00	35.00
	Energy Efficiency	EER (Nominal Cooling)		-	3.04	3.52
		EER (Nominal Cooling, US)		Btu/Wh	10.38	12.00
		COP (Nominal Heating)		-	3.06	3.40
		Energy Grade		-	SEER 19.2	SEER 20.7
				-	HSPF 9.9	HSPF 9.7
	Piping Connections	Liquid Pipe		Ø, mm	9.52	9.52
				Ø, inch	3/8"	3/8"
		Gas Pipe		Ø, mm	15.88	15.88
				Ø, inch	5/8"	5/8"
		Installation Limitation	Max. Length	m	50(50)	75 (75)
				ft	164(164)	246 (246)
		Max. Height	m	30 (30)	30 (30)	
			ft	98 (98)	98 (98)	
	Refrigerant	Type		-	R410A	R410A
		Control Method		-	-	-
Factory Charging		kg	2.60	2.80		
		lbs	5.73	6.17		
Power Supply			Ø, #, V, Hz	1,2,208-230,60	1,2,208-230,60	
Fan	Type		-	Turbo	Turbo	
	Motor	Output	W x n	97 x 1	97 x 1	
	Air Flow Rate	High/Mid/Low	CFM	904.00 / 741.00 / 632.00	1,179.00 / 943.00 / 710.00	
Drain	Drain Pipe		Ø,mm	VP25 (OD 32,ID 25)	VP25 (OD 32,ID 25)	
Sound	Pressure	High/Mid/Low	dB(A)	38 / 35 / 31	43 / 38 / 32	
External Dimension	Net Weight		kg	24.00	24.00	
			lbs	52.91	52.91	
	Shipping Weight		kg	28.50	28.50	
			lbs	62.83	62.83	
	Net Dimensions (WxHxD)		mm	947 x 365 x 947	947 x 365 x 947	
			inch	37.28 x 14.37 x 37.28	37.28 x 14.37 x 37.28	
Shipping Dimensions (WxHxD)			mm	990 x 414 x 990	990 x 414 x 990	
			inch	38.98 x 16.30 x 38.98	38.98 x 16.30 x 38.98	
Panel Size (see note 4 below)	Panel model (Square type)		-	PC4N*DM*N	PC4N*DM*N	
	Panel Net Weight		kg	3.60	3.60	
			lbs	7.94	7.94	
	Shipping Weight		kg	6.30	6.30	
			lbs	13.89	13.89	
	Net Dimensions (WxHxD)		mm	1,000 x 66 x 1,000	1,000 x 66 x 1,000	
		inch	39.37 x 2.60 x 39.37	39.37 x 2.60 x 39.37		
Shipping Dimensions (WxHxD)			mm	1,093 x 85 x 1,083	1,093 x 85 x 1,083	
			inch	43.03 x 3.35 x 42.64	43.03 x 3.35 x 42.64	
Additional Accessories	Drain pump	Drain pump	-	Built-in	Built-in	
	Air Filter	Max. Lifting	in. / gal/h	29.53 / 6.34	29.53 / 6.34	
			-	-	-	
Power Supply			Ø, #, V, Hz	1,2,208-230,60	1,2,208-230,60	
Compressor	Type		-	Twin BLDC Rotary	Twin BLDC Rotary	
	Model		-	UG8T300LNBJU	UG5T450FUEJX	
	Output		kW	2.82	4.12	
Fan	Oil	Type	-	PVE	PVE	
	Air Flow Rate	Cooling	CFM	2,219.00	3,039.00	
Sound	Pressure	Cooling/Heating	dB(A)	50 / 52	49 / 51	
External Dimension	Net Weight		kg	70.00	88.00	
			lbs	154.32	194.01	
	Shipping Weight		kg	74.00	98.00	
			lbs	163.14	216.05	
	Net Dimensions (WxHxD)		mm	940 x 998 x 330	940 x 1,210 x 330	
			inch	37.01 x 39.29 x 12.99	37.01 x 47.64 x 12.99	
Shipping Dimensions (WxHxD)			mm	995 x 1,096 x 426	995 x 1,388 x 426	
			inch	39.17 x 43.15 x 16.77	39.17 x 54.65 x 16.77	
Operating Temp.	Cooling		°F	0.0 ~ 115.0	0.0 ~ 115.0	
	Heating		°F	-4.0 ~ 75.2	-4.0 ~ 75.2	

\* Specifications may be subject to change without prior notice.

1) Nominal capacity are based on (Refrigerant Piping : 24.6ft , Level Differences : 0ft);

. Cooling : Indoor temp. 80°F DB, 67°F WB / Outdoor temp. 95°F DB, 75°F WB . Heating : Indoor temp. 70°F DB, 60°F WB / Outdoor temp. 47°F DB, 43°F WB

2) Sound pressure level is acquired in an anechoic room. Thus actual noise level may be different depending on the installation conditions.

3) These products contain R410A which is fluorinated greenhouse gas.

4) Optional ceiling panels (Detailed specifications for other panels are available on dimensional drawing pages.)

. Square type : PC4NUDMAN, PC4NUDMUN (White), PC4NBDMAN, PC4NBDMUN (Black) . Circle type : PC4NUNMAN, PC4NUNMUN (White), PC4NBNMAN, PC4NBNMUN (Black)

# 2 Specifications

## 360 Cassette

Type				360 Cassette	360 Cassette	
Model Name	Indoor Unit			AC042KN4DCH/AA	AC048KN4DCH/AA	
	Outdoor Unit			AC042JXADCH/AA	AC048JXADCH/AA	
US Code	Indoor Unit			CNH424DK	CNH484DK	
	Outdoor Unit			CXH42ADJ	CXH48ADJ	
System	Mode		-	Heat Pump	Heat Pump	
	Capacity	Cooling(Min/Std/Max)		kW	4.78 / 12.31 / 13.19	5.45 / 14.07 / 14.95
				Btu/h	16,300 / 42,000 / 45,000	18,600 / 48,000 / 51,000
				US RT	1.36 / 3.50 / 3.75	1.55 / 4.00 / 4.25
		Heating(Min/Std/Max)		kW	3.93 / 13.77 / 14.65	4.48 / 15.53 / 16.12
				Btu/h	13,400 / 47,000 / 50,000	15,300 / 53,000 / 55,000
				US RT	1.12 / 3.92 / 4.17	1.28 / 4.42 / 4.58
	Power	Power Input (Nominal)	Cooling(Min/Std/Max)	kW	1.08 / 4.20 / 4.60	1.24 / 5.41 / 5.50
			Heating(Min/Std/Max)		0.84 / 4.53 / 5.40	0.96 / 5.12 / 5.70
		Current Input (Nominal)	Cooling(Min/Std/Max)	A	5.60 / 18.80 / 21.00	6.40 / 23.80 / 24.00
			Heating(Min/Std/Max)		4.30 / 20.50 / 25.00	5.00 / 23.50 / 28.00
		MCA		A	22.08	22.08
		MOP		A	35.00	35.00
	Energy Efficiency	EER (Nominal Cooling)		-	2.93	2.60
		EER (Nominal Cooling, US)		Btu/Wh	10.00	8.87
		COP (Nominal Heating)		-	3.04	3.02
		Energy Grade		-	SEER 19.7	SEER 19.0
				-	HSPF 9.5	HSPF 9.5
	Piping Connections	Liquid Pipe		Ø, mm	9.52	9.52
				Ø, inch	3/8"	3/8"
		Gas Pipe		Ø, mm	15.88	15.88
				Ø, inch	5/8"	5/8"
		Installation Limitation	Max. Length	m	75 (75)	75 (75)
				ft	246 (246)	246 (246)
		Max. Height	m	30 (30)	30 (30)	
			ft	98 (98)	98 (98)	
	Refrigerant	Type		-	R410A	R410A
		Control Method		-	-	-
Factory Charging			kg 2.80 lbs 6.17	kg 2.80 lbs 6.17		
Power Supply	Type		Ø, #, V, Hz	1,2,208-230,60	1,2,208-230,60	
	Motor		Output W x n	97 x 1	97 x 1	
Fan	Air Flow Rate		High/Mid/Low CFM	1,218.00 / 981.00 / 745.00	1,257.00 / 1,024.00 / 822.00	
	Drain		Drain Pipe Ø,mm	VP25 (OD 32,ID 25)	VP25 (OD 32,ID 25)	
Sound	Pressure	High/Mid/Low	dB(A)	44 / 39 / 34	45 / 40 / 35	
		External Dimension		Net Weight	kg 24.00 lbs 52.91	kg 24.00 lbs 52.91
Panel Size (see note 4 below)	Shipping Weight		kg 28.50 lbs 62.83	kg 28.50 lbs 62.83		
	Net Dimensions (WxHxD)		mm 947 x 365 x 947	mm 947 x 365 x 947		
			inch 37.28 x 14.37 x 37.28	inch 37.28 x 14.37 x 37.28		
	Shipping Dimensions (WxHxD)		mm 990 x 414 x 990	mm 990 x 414 x 990		
			inch 38.98 x 16.30 x 38.98	inch 38.98 x 16.30 x 38.98		
	Panel model (Square type)		-	PC4N*DM*N	PC4N*DM*N	
Additional Accessories	Panel Net Weight		kg 3.60 lbs 7.94	kg 3.60 lbs 7.94		
	Shipping Weight		kg 6.30 lbs 13.89	kg 6.30 lbs 13.89		
	Net Dimensions (WxHxD)		mm 1,000 x 66 x 1,000	mm 1,000 x 66 x 1,000		
			inch 39.37 x 2.60 x 39.37	inch 39.37 x 2.60 x 39.37		
	Shipping Dimensions (WxHxD)		mm 1,093 x 85 x 1,083	mm 1,093 x 85 x 1,083		
			inch 43.03 x 3.35 x 42.64	inch 43.03 x 3.35 x 42.64		
Compressor	Drain pump	Drain pump	-	Built-in	Built-in	
	Air Filter	Max. Lifting	in. / gal/h	29.53 / 6.34	29.53 / 6.34	
Power Supply	Type		Ø, #, V, Hz	1,2,208-230,60	1,2,208-230,60	
	Model			Twin BLDC Rotary	Twin BLDC Rotary	
Fan	Output		kW	4.12	4.12	
	Oil		Type	PVE	PVE	
Sound	Pressure	Cooling/Heating	CFM	3,039.00	3,039.00	
		External Dimension		Net Weight	kg 88.00 lbs 194.01	kg 88.00 lbs 194.01
Operating Temp.	Shipping Weight		kg 98.00 lbs 216.05	kg 98.00 lbs 216.05		
	Net Dimensions (WxHxD)		mm 940 x 1,210 x 330	mm 940 x 1,210 x 330		
			inch 37.01 x 47.64 x 12.99	inch 37.01 x 47.64 x 12.99		
	Shipping Dimensions (WxHxD)		mm 995 x 1,388 x 426	mm 995 x 1,388 x 426		
			inch 39.17 x 54.65 x 16.77	inch 39.17 x 54.65 x 16.77		
	Cooling		°F	0.0 ~ 115.0	0.0 ~ 115.0	
Heating		°F	-4.0 ~ 75.2	-4.0 ~ 75.2		

\* Specifications may be subject to change without prior notice.

1) Nominal capacity are based on (Refrigerant Piping : 24.6ft , Level Differences : 0ft);

. Cooling : Indoor temp. 80°F DB, 67°F WB / Outdoor temp. 95°F DB, 75°F WB . Heating : Indoor temp. 70°F DB, 60°F WB / Outdoor temp. 47°F DB, 43°F WB

2) Sound pressure level is acquired in an anechoic room. Thus actual noise level may be different depending on the installation conditions.

3) These products contain R410A which is fluorinated greenhouse gas.

4) Optional ceiling panels (Detailed specifications for other panels are available on dimensional drawing pages.)

. Square type : PC4NUDMAN, PC4NUDMUN (White), PC4NBDMAN, PC4NBDMUN (Black) . Circle type : PC4NUNMAN, PC4NUNMUN (White), PC4NBNMAN, PC4NBNMUN (Black)



# 3 Capacity table

## 360 Cassette

CNH184DK + CXH18ADJ (AC018KN4DCH/AA + AC018JXADCH/AA)

### Cooling

TC(Total Capacity), SHC(Sensible Heat Capacity), PI(Power Input)

Outdoor Temperature (°F, DB)	Indoor Temperature (°F, DB / WB)																				
	68 / 57			72 / 61			77 / 64			80 / 67			82 / 70			86 / 72			90 / 75		
	TC	SHC	PI	TC	SHC	PI	TC	SHC	PI	TC	SHC	PI	TC	SHC	PI	TC	SHC	PI	TC	SHC	PI
0	20.0	16.0	0.65	20.5	16.4	0.67	21.0	16.8	0.68	21.5	17.2	0.70	21.7	17.4	0.71	21.9	17.5	0.71	22.2	17.7	0.72
70	21.8	17.5	1.19	22.4	17.9	1.22	22.9	18.3	1.25	23.5	18.8	1.28	23.7	19.0	1.29	24.0	19.2	1.31	24.2	19.4	1.32
95	16.7	13.4	1.47	17.1	13.7	1.51	17.6	14.1	1.54	18.0	14.4	1.58	18.2	14.5	1.60	18.4	14.7	1.61	18.5	14.8	1.63
115	16.3	13.0	2.18	16.7	13.3	2.23	17.1	13.7	2.28	17.5	14.0	2.34	17.7	14.1	2.36	17.9	14.3	2.39	18.0	14.4	2.41

### Heating

TC : Total Capacity, PI: Power Input

Outdoor Temperature (°F, DB)	Indoor Temperature (°F, DB)											
	61		64		68		70		72		75	
	TC	PI	TC	PI	TC	PI	TC	PI	TC	PI	TC	PI
-4.0	10.5	1.39	10.4	1.38	10.3	1.36	10.2	1.35	10.1	1.3	10.0	1.3
14.0	19.5	1.80	19.3	1.79	19.1	1.77	18.9	1.75	18.7	1.7	18.5	1.7
32.0	20.4	1.77	20.2	1.75	20.0	1.74	19.8	1.72	19.6	1.7	19.4	1.7
47.0	20.6	1.65	20.4	1.63	20.2	1.62	20.0	1.60	19.8	1.6	19.6	1.6
75.2	26.0	1.24	25.7	1.22	25.5	1.21	25.2	1.20	24.9	1.2	24.7	1.2

CNH244DK + CXH24ADJ (AC024KN4DCH/AA + AC024JXADCH/AA)

### Cooling

TC(Total Capacity), SHC(Sensible Heat Capacity), PI(Power Input)

Outdoor Temperature (°F, DB)	Indoor Temperature (°F, DB / WB)																				
	68 / 57			72 / 61			77 / 64			80 / 67			82 / 70			86 / 72			90 / 75		
	TC	SHC	PI	TC	SHC	PI	TC	SHC	PI	TC	SHC	PI	TC	SHC	PI	TC	SHC	PI	TC	SHC	PI
0	25.2	20.2	0.86	25.8	20.7	0.88	26.4	21.2	0.90	27.1	21.7	0.92	27.4	21.9	0.93	27.6	22.1	0.94	27.9	22.3	0.95
70	25.9	20.7	2.00	26.5	21.2	2.05	27.2	21.7	2.10	27.8	22.3	2.15	28.1	22.5	2.17	28.4	22.7	2.19	28.7	22.9	2.22
95	22.3	17.9	2.01	22.9	18.3	2.06	23.4	18.7	2.11	24.0	19.2	2.16	24.2	19.4	2.18	24.5	19.6	2.20	24.7	19.8	2.23
115	21.5	17.2	2.77	22.1	17.6	2.84	22.6	18.1	2.91	23.2	18.5	2.98	23.4	18.7	3.01	23.6	18.9	3.04	23.9	19.1	3.07

### Heating

TC : Total Capacity PI: Power Input

Outdoor Temperature (°F, DB)	Indoor Temperature (°F, DB)											
	61		64		68		70		72		75	
	TC	PI	TC	PI	TC	PI	TC	PI	TC	PI	TC	PI
-4.0	17.2	2.42	17.0	2.40	16.8	2.37	16.7	2.35	16.5	2.3	16.3	2.3
14.0	26.1	3.35	25.9	3.32	25.6	3.28	25.4	3.25	25.1	3.2	24.9	3.2
32.0	26.4	2.91	26.1	2.88	25.8	2.85	25.6	2.82	25.3	2.8	25.1	2.8
47.0	27.8	2.54	27.5	2.52	27.3	2.49	27.0	2.47	26.7	2.4	26.5	2.4
75.2	34.4	2.67	34.1	2.64	33.7	2.62	33.4	2.59	33.1	2.6	32.7	2.5

# 3 Capacity table

## 360 Cassette

CNH304DK + CXH30ADJ (AC030KN4DCH/AA + AC030JXADCH/AA)

### Cooling

TC(Total Capacity), SHC(Sensible Heat Capacity), PI(Power Input)

Outdoor Temperature (°F, DB)	Indoor Temperature (°F, DB / WB)																				
	68 / 57			72 / 61			77 / 64			80 / 67			82 / 70			86 / 72			90 / 75		
	TC	SHC	PI	TC	SHC	PI	TC	SHC	PI	TC	SHC	PI	TC	SHC	PI	TC	SHC	PI	TC	SHC	PI
0	32.8	26.2	1.79	33.6	26.9	1.83	34.4	27.5	1.87	35.3	28.2	1.92	35.6	28.5	1.94	36.0	28.8	1.96	36.3	29.1	1.98
70	32.1	25.7	1.84	32.9	26.3	1.89	33.7	26.9	1.93	34.5	27.6	1.98	34.9	27.9	2.00	35.2	28.2	2.02	35.6	28.4	2.04
95	27.9	22.3	2.69	28.6	22.9	2.75	29.3	23.4	2.82	30.0	24.0	2.89	30.3	24.2	2.92	30.6	24.5	2.95	30.9	24.7	2.98
115	23.5	18.8	3.01	24.1	19.3	3.09	24.7	19.8	3.16	25.3	20.2	3.24	25.6	20.4	3.27	25.8	20.6	3.31	26.1	20.9	3.34

### Heating

TC : Total Capacity, PI: Power Input

Outdoor Temperature (°F, DB)	Indoor Temperature (°F, DB)											
	61		64		68		70		72		75	
	TC	PI	TC	PI	TC	PI	TC	PI	TC	PI	TC	PI
-4.0	21.4	3.07	21.2	3.04	21.0	3.01	20.8	2.98	20.6	3.0	20.4	2.9
14.0	34.2	4.48	33.9	4.44	33.5	4.39	33.2	4.35	32.9	4.3	32.5	4.3
32.0	34.1	3.59	33.8	3.55	33.4	3.51	33.1	3.48	32.8	3.4	32.4	3.4
47.0	33.0	3.15	32.6	3.12	32.3	3.09	32.0	3.06	31.7	3.0	31.4	3.0
75.2	44.0	3.03	43.5	3.00	43.1	2.97	42.7	2.94	42.3	2.9	41.8	2.9

CNH364DK + CXH36ADJ (AC036KN4DCH/AA + AC036JXADCH/AA)

### Cooling

TC(Total Capacity), SHC(Sensible Heat Capacity), PI(Power Input)

Outdoor Temperature (°F, DB)	Indoor Temperature (°F, DB / WB)																				
	68 / 57			72 / 61			77 / 64			80 / 67			82 / 70			86 / 72			90 / 75		
	TC	SHC	PI	TC	SHC	PI	TC	SHC	PI	TC	SHC	PI	TC	SHC	PI	TC	SHC	PI	TC	SHC	PI
0	36.0	28.8	2.31	36.9	29.5	2.36	37.8	30.2	2.42	38.7	31.0	2.48	39.1	31.3	2.50	39.5	31.6	2.53	39.9	31.9	2.56
70	35.7	28.6	2.40	36.6	29.3	2.46	37.5	30.0	2.52	38.4	30.7	2.58	38.8	31.0	2.61	39.2	31.3	2.63	39.6	31.7	2.66
95	33.5	26.8	2.79	34.3	27.4	2.86	35.1	28.1	2.93	36.0	28.8	3.00	36.4	29.1	3.03	36.7	29.4	3.06	37.1	29.7	3.09
115	24.7	19.8	2.93	25.3	20.3	3.00	25.9	20.8	3.07	26.6	21.3	3.15	26.8	21.5	3.18	27.1	21.7	3.21	27.4	21.9	3.25

### Heating

TC : Total Capacity PI: Power Input

Outdoor Temperature (°F, DB)	Indoor Temperature (°F, DB)											
	61		64		68		70		72		75	
	TC	PI	TC	PI	TC	PI	TC	PI	TC	PI	TC	PI
-4.0	27.5	4.38	27.2	4.34	27.0	4.29	26.7	4.25	26.4	4.2	26.2	4.2
14.0	38.9	4.82	38.6	4.77	38.2	4.73	37.8	4.68	37.4	4.6	37.0	4.6
32.0	40.4	4.34	40.0	4.29	39.6	4.25	39.2	4.21	38.8	4.2	38.4	4.1
47.0	41.2	3.55	40.8	3.52	40.4	3.48	40.0	3.45	39.6	3.4	39.2	3.4
75.2	49.2	3.11	48.8	3.08	48.3	3.05	47.8	3.02	47.3	3.0	46.8	3.0

# 3 Capacity table

## 360 Cassette

CNH424DK + CXH42ADJ (AC042KN4DCH/AA + AC042JXADCH/AA)

### Cooling

TC(Total Capacity), SHC(Sensible Heat Capacity), PI(Power Input)

Outdoor Temperature (°F, DB)	Indoor Temperature (°F, DB / WB)																				
	68 / 57			72 / 61			77 / 64			80 / 67			82 / 70			86 / 72			90 / 75		
	TC	SHC	PI	TC	SHC	PI	TC	SHC	PI	TC	SHC	PI	TC	SHC	PI	TC	SHC	PI	TC	SHC	PI
0	41.9	33.5	2.96	43.0	34.4	3.03	44.0	35.2	3.10	45.1	36.1	3.18	45.6	36.4	3.21	46.0	36.8	3.24	46.5	37.2	3.28
70	41.0	32.8	3.11	42.0	33.6	3.19	43.0	34.4	3.27	44.1	35.3	3.35	44.5	35.6	3.38	45.0	36.0	3.42	45.4	36.3	3.45
95	39.0	31.2	3.90	40.0	32.0	4.00	41.0	32.8	4.10	42.0	33.6	4.20	42.4	33.9	4.24	42.8	34.3	4.28	43.3	34.6	4.33
115	27.8	22.2	3.82	28.5	22.8	3.92	29.2	23.3	4.01	29.9	23.9	4.11	30.2	24.1	4.15	30.5	24.4	4.19	30.8	24.6	4.23

### Heating

TC : Total Capacity, PI: Power Input

Outdoor Temperature (°F, DB)	Indoor Temperature (°F, DB)											
	61		64		68		70		72		75	
	TC	PI	TC	PI	TC	PI	TC	PI	TC	PI	TC	PI
-4.0	27.6	4.48	27.3	4.44	27.1	4.39	26.8	4.35	26.5	4.3	26.3	4.3
14.0	41.3	5.26	40.9	5.21	40.5	5.16	40.1	5.11	39.7	5.1	39.3	5.0
32.0	45.7	4.92	45.3	4.88	44.8	4.83	44.4	4.78	44.0	4.7	43.5	4.7
47.0	48.4	4.67	47.9	4.62	47.5	4.58	47.0	4.53	46.5	4.5	46.1	4.4
75.2	53.0	4.04	52.5	4.00	52.0	3.96	51.5	3.92	51.0	3.9	50.5	3.8

CNH484DK + CXH48ADJ (AC048KN4DCH/AA + AC048JXADCH/AA)

### Cooling

TC(Total Capacity), SHC(Sensible Heat Capacity), PI(Power Input)

Outdoor Temperature (°F, DB)	Indoor Temperature (°F, DB / WB)																				
	68 / 57			72 / 61			77 / 64			80 / 67			82 / 70			86 / 72			90 / 75		
	TC	SHC	PI	TC	SHC	PI	TC	SHC	PI	TC	SHC	PI	TC	SHC	PI	TC	SHC	PI	TC	SHC	PI
0	48.8	39.0	3.24	50.0	40.0	3.31	51.2	41.0	3.40	52.5	42.0	3.48	53.0	42.4	3.51	53.6	42.8	3.55	54.1	43.3	3.59
70	47.8	38.2	3.32	49.0	39.2	3.40	50.2	40.1	3.48	51.4	41.1	3.57	51.9	41.5	3.61	52.4	41.9	3.64	53.0	42.4	3.68
95	44.6	35.7	5.03	45.7	36.6	5.15	46.8	37.5	5.28	48.0	38.4	5.41	48.5	38.8	5.46	49.0	39.2	5.52	49.5	39.6	5.57
115	35.5	28.4	4.38	36.3	29.1	4.49	37.2	29.8	4.60	38.2	30.5	4.71	38.5	30.8	4.76	38.9	31.1	4.80	39.3	31.4	4.85

### Heating

TC : Total Capacity PI: Power Input

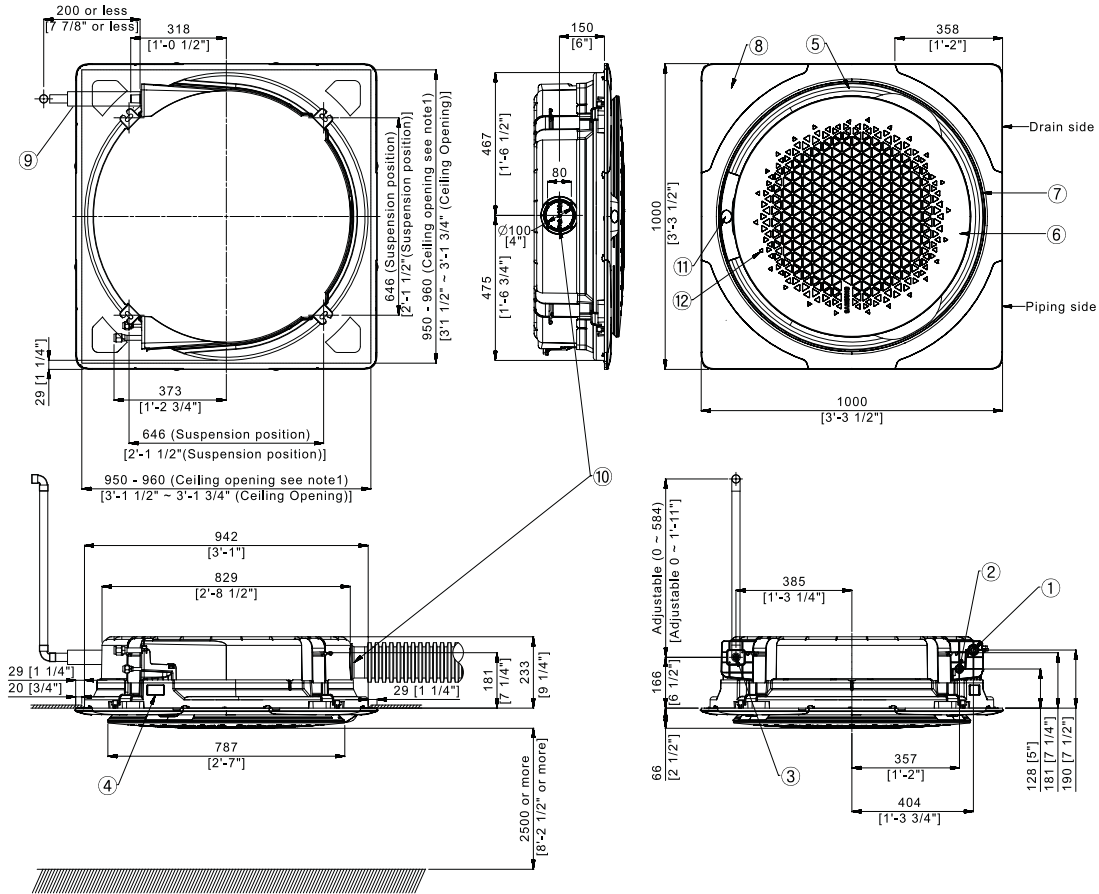
Outdoor Temperature (°F, DB)	Indoor Temperature (°F, DB)											
	61		64		68		70		72		75	
	TC	PI	TC	PI	TC	PI	TC	PI	TC	PI	TC	PI
-4.0	27.9	4.68	27.6	4.63	27.4	4.59	27.1	4.54	26.8	4.5	26.6	4.4
14.0	41.3	5.12	40.9	5.07	40.5	5.02	40.1	4.97	39.7	4.9	39.3	4.9
32.0	45.8	5.29	45.4	5.23	44.9	5.18	44.5	5.13	44.1	5.1	43.6	5.0
47.0	54.6	5.28	54.1	5.22	53.5	5.17	53.0	5.12	52.5	5.1	51.9	5.0
75.2	57.5	4.88	56.9	4.84	56.4	4.79	55.8	4.74	55.2	4.7	54.7	4.6

# 4 Dimensional drawing

## Indoor : 360 Cassette (Square)

CNH184DK (AC018KN4DCH/AA), CNH244DK (AC024KN4DCH/AA)

Units : mm / inches



### Note

1. Make sure the spacing between the ceiling and the cassette is no more than 10mm[3/8"].
2. When the conditions exceed 30°C[86°F] and RH 80% in the ceiling or fresh air is inducted into the ceiling, and additional insulation is required (polyethylene foam, thickness 10mm[3/8"] or more)
3. Square type : PC4NUDMAN, PC4NUMUN (White), PC4NBDMAN, PC4NBDMUN (Black)
  - Weight [lbs] : 7.94 (Net), 13.23 (Shipping)
  - Dimensions (W x H x D) [inch] : 39.37 x 2.60 x 39.37 (Net), 43.03 x 3.35 x 42.64 (Shipping)

Table of descriptions

1	Refrigerant gas pipe	7	Suction rim for Booster fan
2	Refrigerant liquid pipe	8	Decoration cover
3	Condensate drain	9	Drain hose
4	Power & Comm. wiring conduits	10	Fresh air intake knock out hole
5	Air discharge opening	11	Display window
6	Air suction grille	12	Infrared receiver

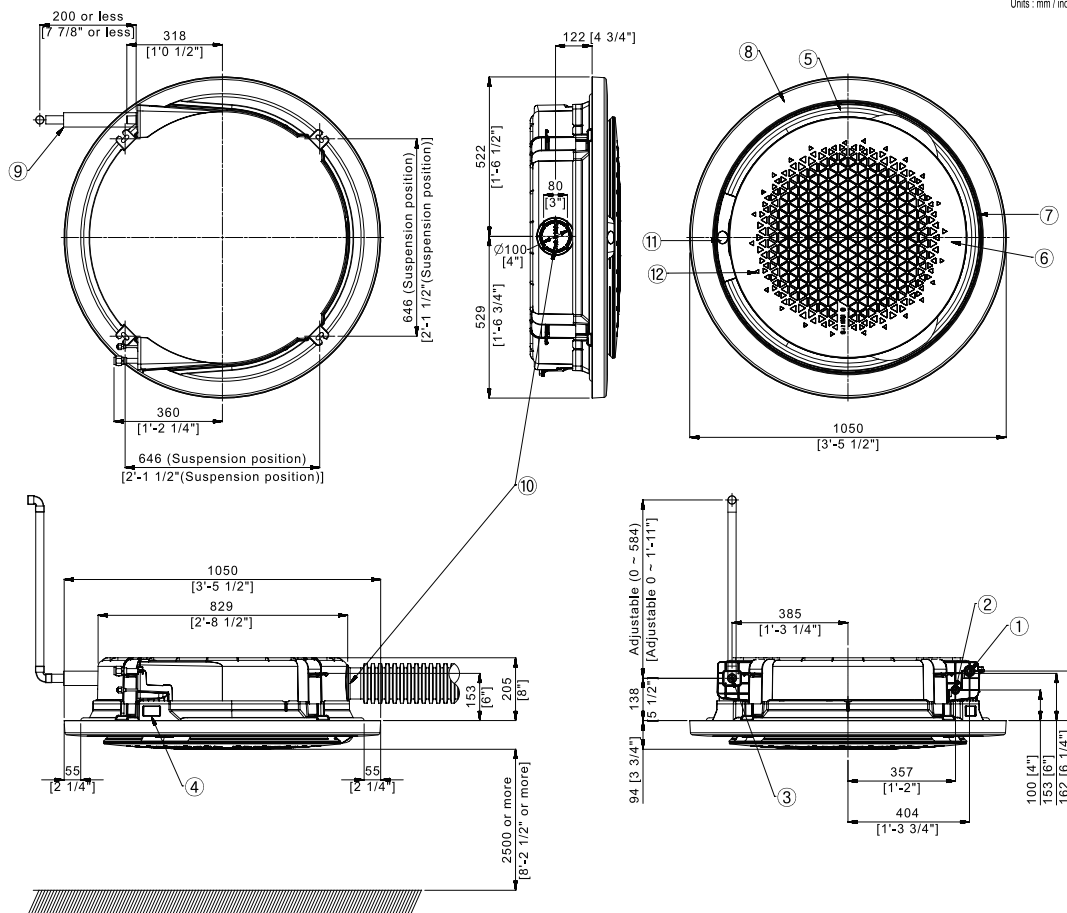
Category	Inspection hole		
	Recessed installation		Exposed installation
	Integrated	Suspended	
Square panel	1 ea		
Circular panel	2 ea		

# 4 Dimensional drawing

## Indoor : 360 Cassette (Circle)

CNH184DK (AC018KN4DCH/AA), CNH244DK (AC024KN4DCH/AA)

Units : mm / inches



### Note

1. Make sure the spacing between the ceiling and the cassette is no more than 10mm[3/8"].
2. When the conditions exceed 30°C[86°F] and RH 80% in the ceiling or fresh air is inducted into the ceiling, and additional insulation is required (polyethylene foam, thickness 10mm[3/8"] or more)
3. Circle type : PC4NUNMAN, PC4NUNMUN (White), PC4NBNMAN, PC4NBNMUN (Black)  
 - Weight [lbs] : 5.95 (Net), 11.24 (Shipping)  
 - Dimensions (W x H x D) [inch] : 41.34 x 3.70 x 41.34 (Net), 43.03 x 3.35 x 42.64 (Shipping)
4. The circular panel is by default available in exposed installation.
5. Make inspection holes on the ceiling for easier installation and maintenance, as shown in the following table.  
 (The size of an inspection hole must be at least 450 mm x 450 mm.)
6. A suspended ceiling structure can substitute for the inspection holes.

Category	Inspection hole		
	Recessed installation		Exposed installation
	Integrated	Suspended	
Square panel	1 ea		
Circular panel	2 ea		

### Table of descriptions

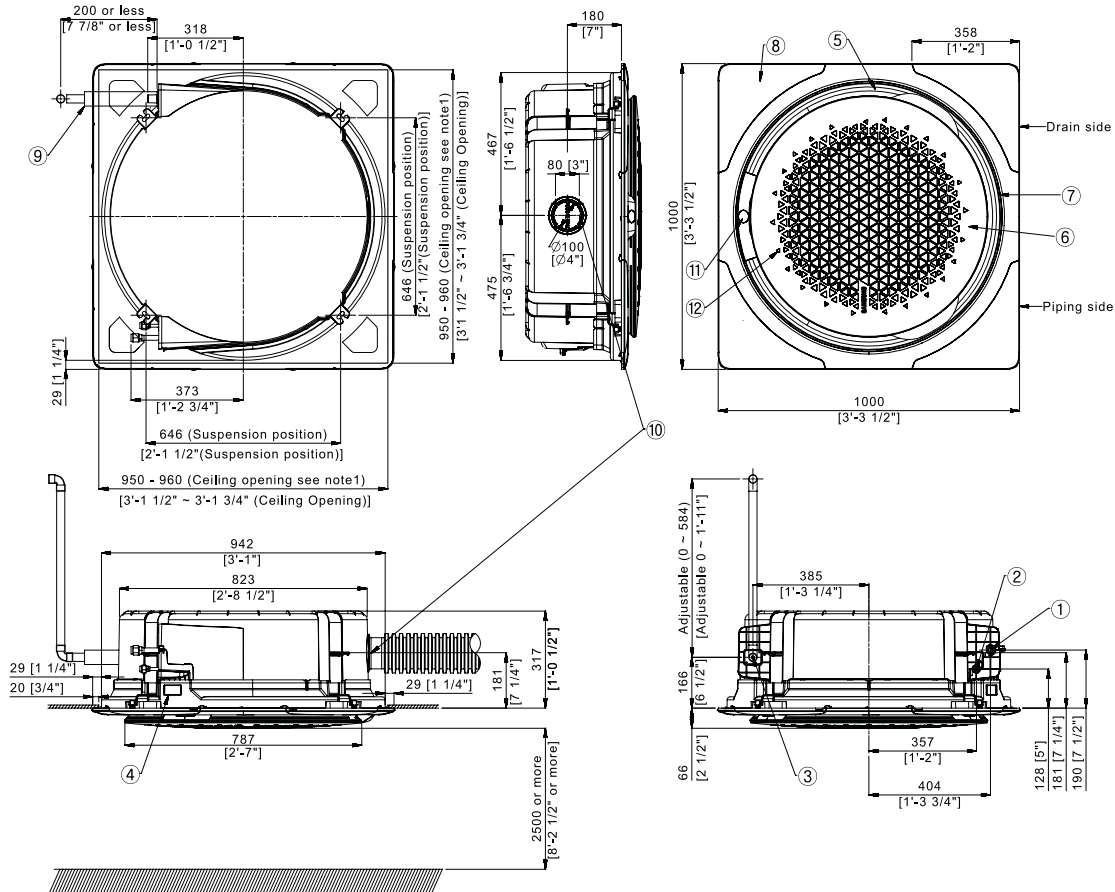
1	Refrigerant gas pipe	7	Suction rim for Booster fan
2	Refrigerant liquid pipe	8	Decoration cover
3	Condensate drain	9	Drain hose
4	Power & Comm. wiring conduits	10	Fresh air intake knock out hole
5	Air discharge opening	11	Display window
6	Air suction grille	12	Infrared receiver

# 4 Dimensional drawing

## Indoor : 360 Cassette (Square)

CNH304DK (AC030KN4DCH/AA), CNH364DK (AC036KN4DCH/AA), CNH424DK (AC042KN4DCH/AA), CNH484DK (AC048KN4DCH/AA)

Units : mm / inches



### Note

1. Make sure the spacing between the ceiling and the cassette is no more than 29mm[1 1/4"]. Max ceiling opening : 960mm[3'-1 3/4"]
2. When the conditions exceed 30°C and RH 80% in the ceiling or fresh air is inducted into the ceiling, and additional insulation is required (polyethylene foam, thickness 10mm[3/8"] or more)
3. Square type : PC4NUDMAN, PC4NUDMUN (White), PC4NBDMAN, PC4NBDMUN (Black)  
 - Weight [lbs] : 7.94 (Net), 13.23 (Shipping)  
 - Dimensions (W x H x D) [inch] : 39.37 x 2.60 x 39.37 (Net), 43.03 x 3.35 x 42.64 (Shipping)

### Table of descriptions

1	Refrigerant gas pipe	7	Suction rim for Booster fan
2	Refrigerant liquid pipe	8	Corner decoration cover
3	Condensate drain	9	Drain hose
4	Power & Comm. wiring conduits	10	Fresh air intake knock out hole
5	Air discharge opening	11	Display window
6	Air suction grille	12	Infrared receiver

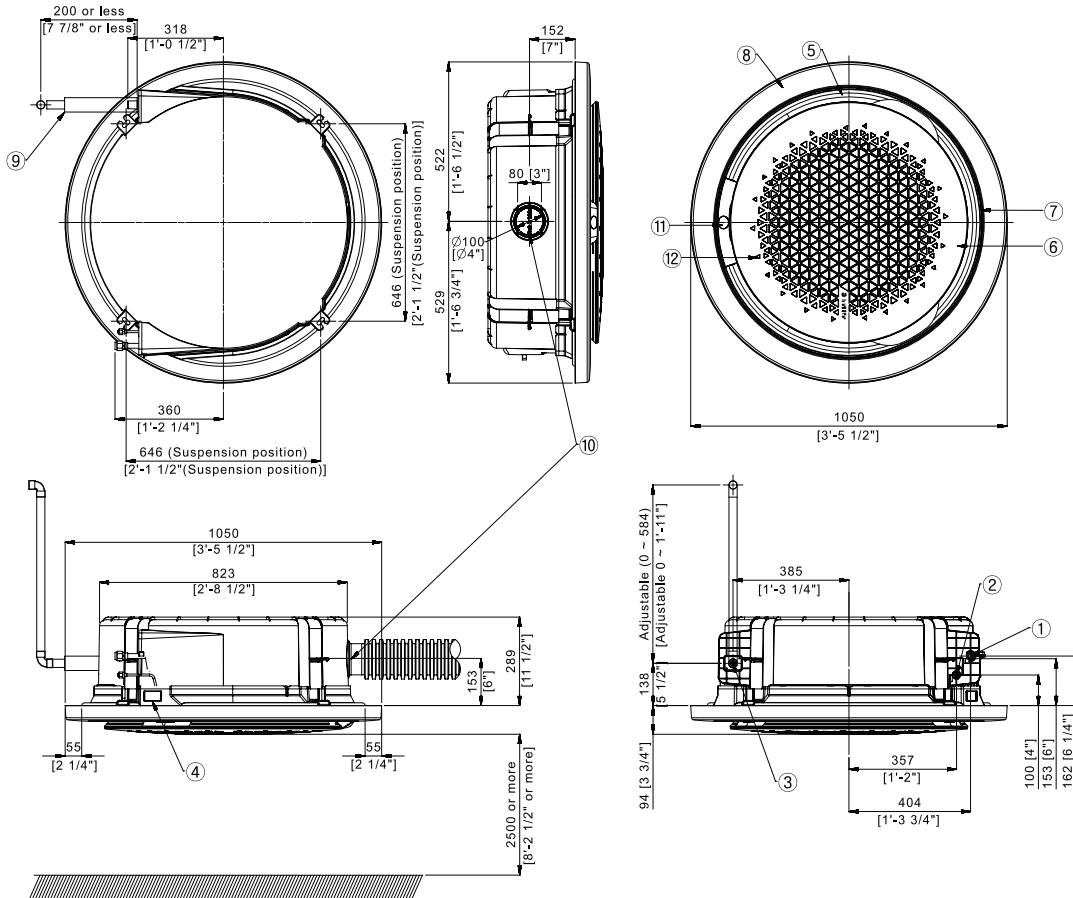
Category	Inspection hole		
	Recessed installation		Exposed installation
	Integrated	Suspended	
Square panel	1 ea		
Circular panel	2 ea		

# 4 Dimensional drawing

## Indoor : 360 Cassette (Circle)

CNH304DK (AC030KN4DCH/AA), CNH364DK (AC036KN4DCH/AA), CNH424DK (AC042KN4DCH/AA), CNH484DK (AC048KN4DCH/AA)

Units : mm / inches



### Note

1. Make sure the spacing between the ceiling and the cassette is no more than 10mm[3/8"].
2. When the conditions exceed 30°C[86°F] and RH 80% in the ceiling or fresh air is inducted into the ceiling, and additional insulation is required (polyethylene foam, thickness 10mm[3/8"] or more)
3. Circle type : PC4NUNMAN, PC4NUNMUN (White), PC4NBNMAN, PC4NBNMUN (Black)
  - Weight [lbs] : 5.95 (Net), 11.24 (Shipping)
  - Dimensions (W x H x D) [inch] : 41.34 x 3.70 x 41.34 (Net), 43.03 x 3.35 x 42.64 (Shipping)
4. The circular panel is by default available in exposed installation.
5. Make inspection holes on the ceiling for easier installation and maintenance, as shown in the following table.  
(The size of an inspection hole must be at least 450 mm x 450 mm.)
6. A suspended ceiling structure can substitute for the inspection holes.

Category	Inspection hole		
	Recessed installation		Exposed installation
	Integrated	Suspended	
Square panel	1 ea		
Circular panel	2 ea		

### Table of descriptions

1	Refrigerant gas pipe	7	Suction rim for Booster fan
2	Refrigerant liquid pipe	8	Decoration cover
3	Condensate drain	9	Drain hose
4	Power & Comm. wiring conduits	10	Fresh air intake knock out hole
5	Air discharge opening	11	Display window
6	Air suction grille	12	Infrared receiver

# 4 Dimensional drawing

## Outdoor

CXH18ADJ (AC018JXADCH/AA)

Units : mm / inches

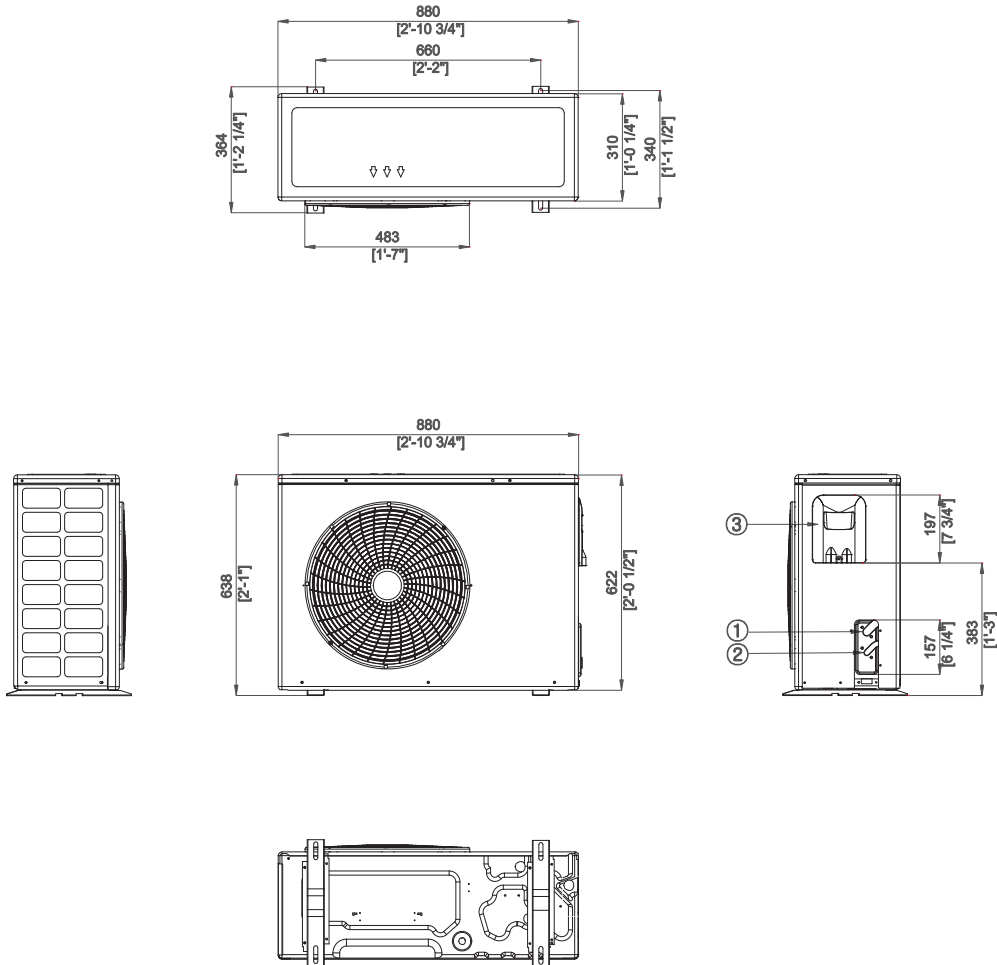


Table of descriptions

1	Refrigerant gas pipe	7	
2	Refrigerant liquid pipe	8	
3	Power & Comm. wiring conduits	9	
4		10	
5		11	
6		12	



# 4 Dimensional drawing

## Outdoor

CXH24ADJ (AC024JXADCH/AA), CXH30ADJ (AC030JXADCH/AA)

Units : mm / inches

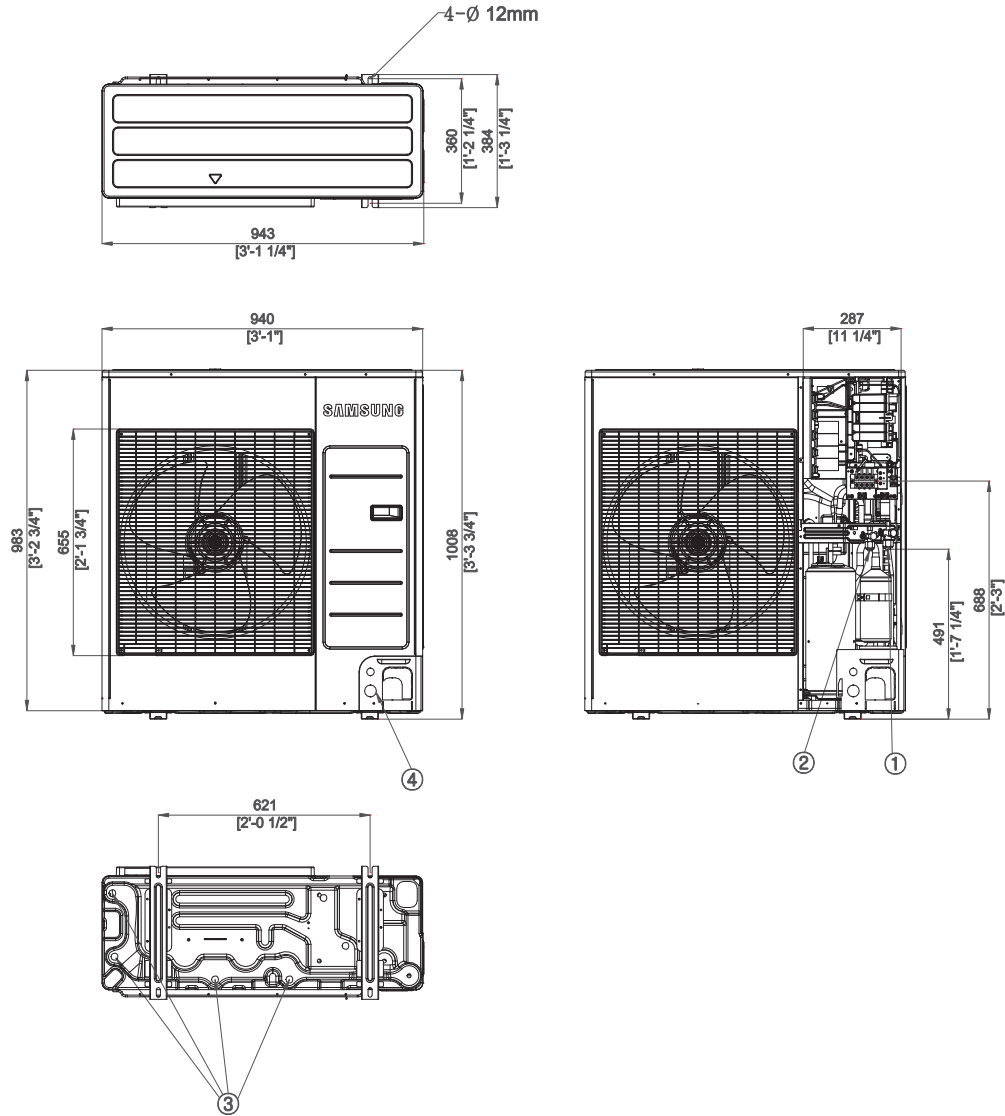


Table of descriptions

1	Refrigerant gas pipe	7	
2	Refrigerant liquid pipe	8	
3	Drain Hole	9	
4	Power & Comm. wiring conduits	10	
5		11	
6		12	

# 4 Dimensional drawing

## Outdoor

CXH36ADJ (AC036JXADCH/AA), CXH42ADJ (AC042JXADCH/AA), CXH48ADJ (AC048JXADCH/AA)

Units : mm / inches

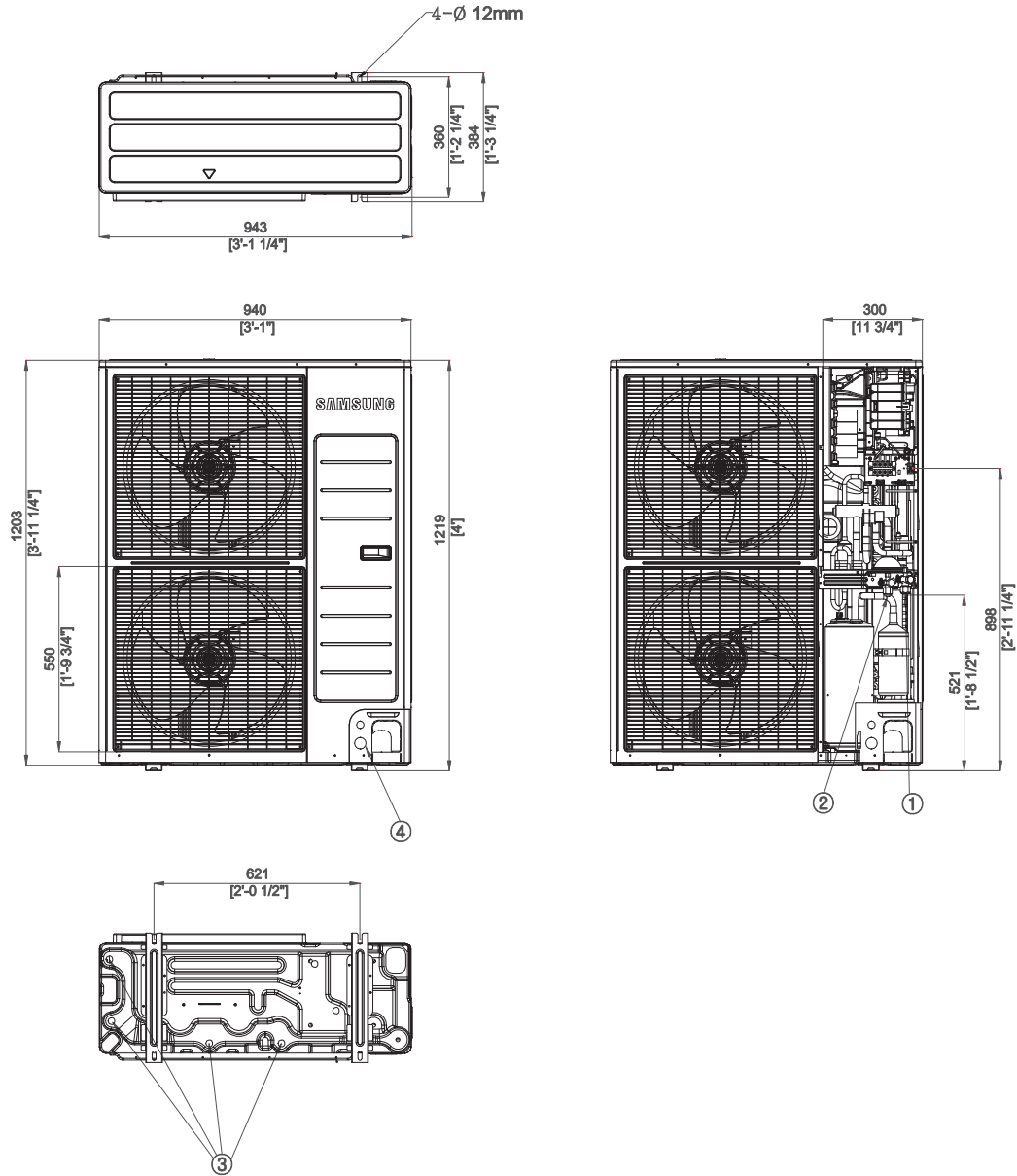


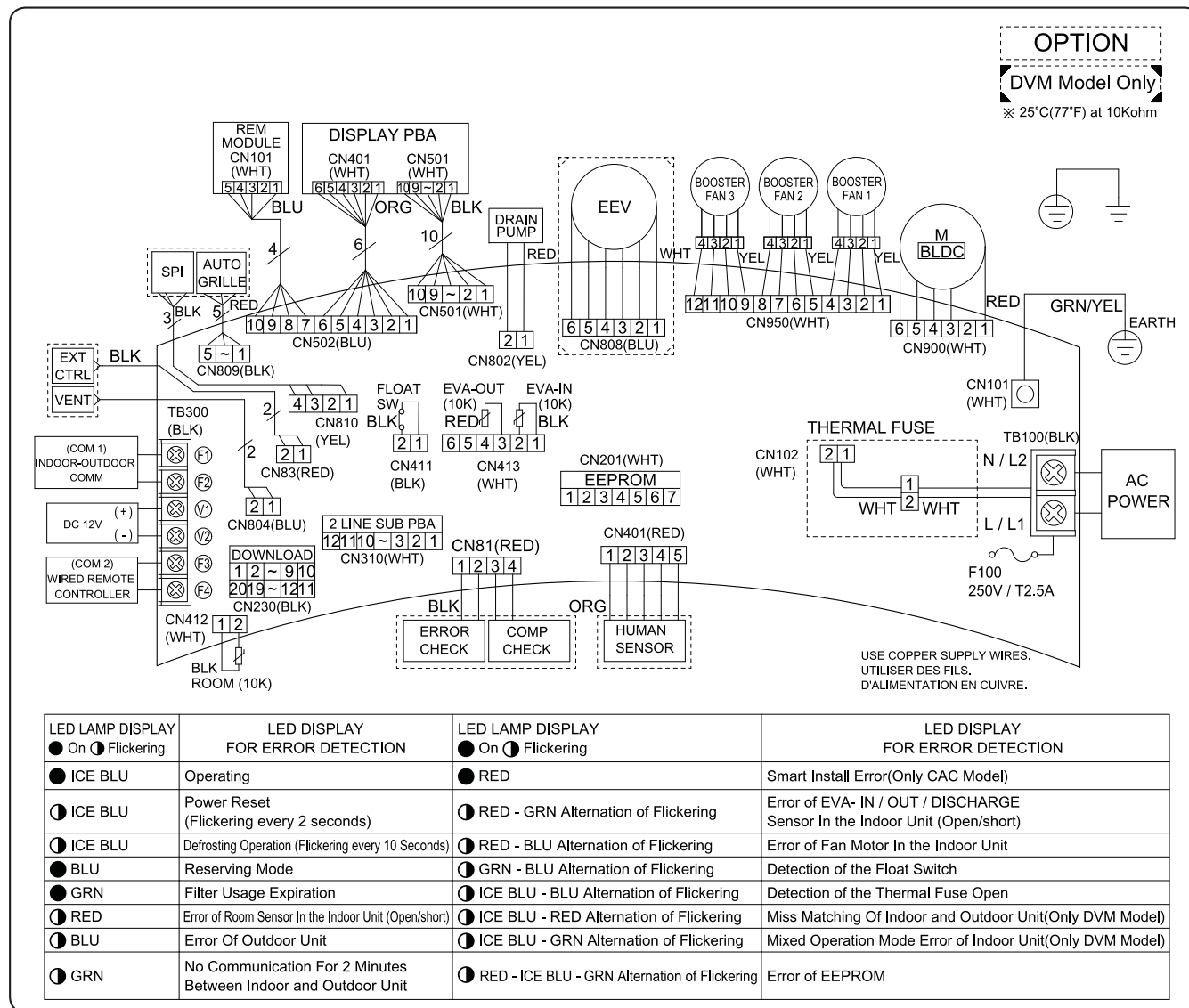
Table of descriptions

1	Refrigerant gas pipe	7	
2	Refrigerant liquid pipe	8	
3	Drain Hole	9	
4	Power & Comm. wiring conduits	10	
5		11	
6		12	

# 5 Electrical wiring diagram

## Indoor : 360 Cassette

CNH184DK(AC018KN4DCH/AA), CNH244DK(AC024KN4DCH/AA), CNH304DK(AC030KN4DCH/AA),  
CNH364DK(AC036KN4DCH/AA), CNH424DK(AC042KN4DCH/AA), CNH484DK(AC048KN4DCH/AA)



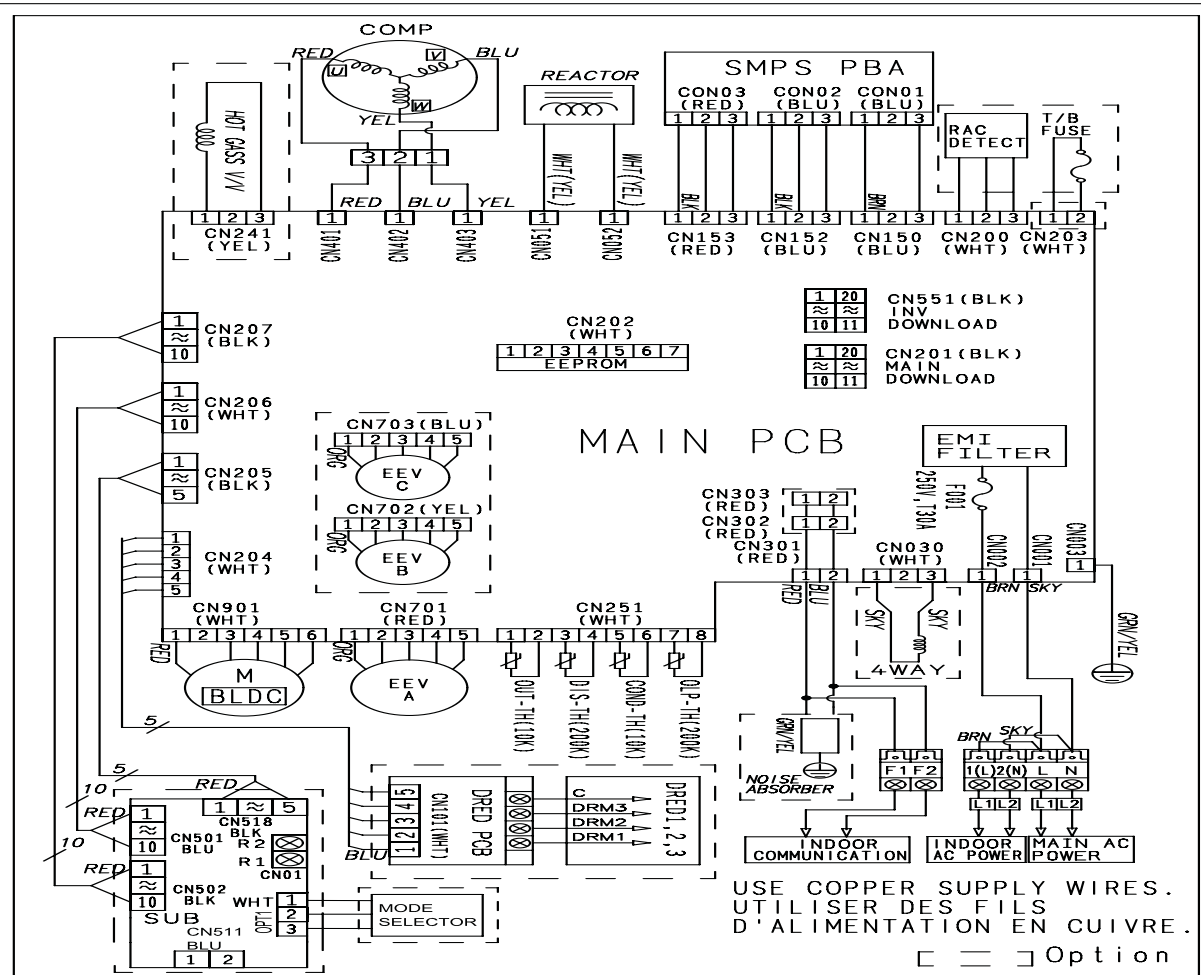
### NOTE

- This wiring diagram applies only to the indoor unit.
- Symbols show as follow :  
BLK: black, RED: red, BLU: blue, WHT: white, YEL: yellow, BRN: brown, SKY: sky blue, GRN: green
- For connection wiring indoor-outdoor transmission F1-F2, indoor-wired remote controller transmission F3-F4.
- ⊕ Protective earth(SCREW)

# 5 Electrical wiring diagram

## Outdoor

CXH18ADJ(AC018JXADCH/AA)



### ERROR MODE

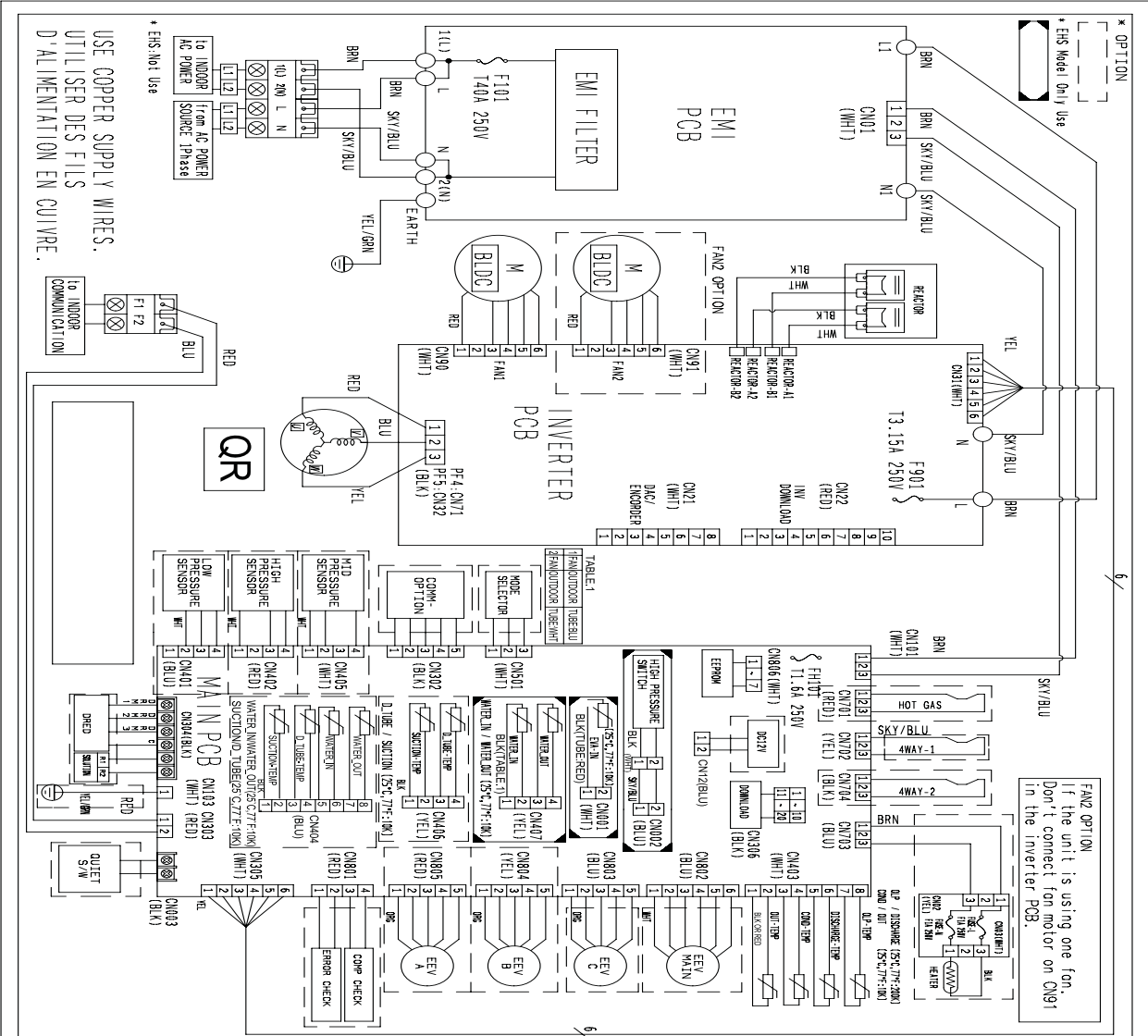
E198	IDU Terminal Block Thermal Fuse Error
E201	Communication Error (Pre tracking fail or The mismatched of indoor unit)
E202	Communication Error between the outdoor and indoor unit
E203	Time out Comm. (Inv Micom → Main Micom)
E221	Outdoor Temperature Sensor Error (OPEN/SHORT)
E231	COND Temperature Sensor Error (OPEN/SHORT)
E251	Discharge Temperature Sensor Error (OPEN/SHORT)
E320	COMP-OLP Temperature Sensor Error (Open/Short)
E403	Comp Down by a freezing protection
E404	System stop to protect from overload
E416	Discharge Temperature Sensor Over Error
E422	EEV or Valve Close
E440	Prohibit Operation Condition Error (Heating)
E441	Prohibit Operation Condition Error (Cooling)
E458	Fan Error
E461	Comp Starting Error
E462	AC Input I_Limit Trip Error
E463	System stop due to OLP (Temp.)
E464	IPM Over Current (O.C) Error
E465	Comp V_Limit/I_Limit Error
E466	DC Link Voltage Protecting Error
E467	Comp Wire Missing Error
E468	Current Sensor Error
E469	DC Link Voltage Sensor Error
E470	EEPROM Read/Write Error
E471	EEPROM Read/Write Error (H/W)
E474	Heatsink Sensor Error
E483	Over Voltage Protecting Error
E484	PFC Overload Error
E485	Input Current Sensor Error
E488	AC Input V_Limit Sensor Error
E500	IPM Overheat Error
E554	Gas Leak Error
E556	Model Mismatching Error (ODU/IDU)
E590	EEPROM CHECKSUM Error (Main → INVERTER)

DB68-04513A OUTDOOR UNIT

# 5 Electrical wiring diagram

## Outdoor

CXH24ADJ(AC024JXADCH/AA), CXH30ADJ(AC030JXADCH/AA), CXH36ADJ(AC036JXADCH/AA), CXH42ADJ(AC042JXADCH/AA), CXH48ADJ(AC048JXADCH/AA)

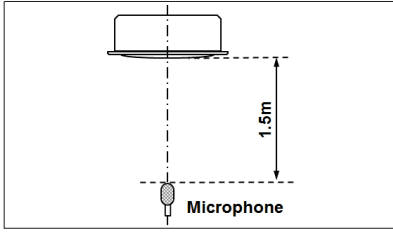


Wiring Diagram for Outdoor CODE:DB68-04592A

ERROR NO	DI SCRIPTION
E198	Indoor Terminal Block Thermal Fuse error
E201	Unit Quantity Miss Matching between Indoor and Outdoor
E202	Abnormal state or Main Time out Com between Indoor and Outdoor
E203	Main Time out Com between Inverter and Outdoor
E221	Outdoor Temp Sensor error
E231	Cond Temp Sensor error
E251	Discharge Temp Sensor error
E320	OLP Sensor error
E403	Detection of Outdoor Freezing when Comp Stop
E404	Protection of Outdoor Overload when Comp Stop
E407	HIGH PRESS SWITCH error
E416	Discharge over Temp error when Comp Stop
E419	Outdoor EEV open error
E422	EEV Close error
E439	Gas leakage error (stop state)
E440	Out of Operation Temp range in heating
E441	Out of Operation Temp range in Cooling
E443	Gas leakage error (before operating)
E458	Outdoor Fanl error
E461	Comp Starting error
E462	Ltrip error/PFC Over Current
E463	OLP Over Heat and Comp Stop
E464	IPM Over Current(O.C) error
E465	COMP Over Load error
E466	DC Link Under/Over Voltage error
E467	COMP Wire Missing error
E468	Current Sensor error
E469	DC Link Voltage Sensor error
E470	Outdoor EEPROM data checksum error
E471	

# 6 Sound pressure level

## Indoor : 360 Cassette



Unit: dB(A)

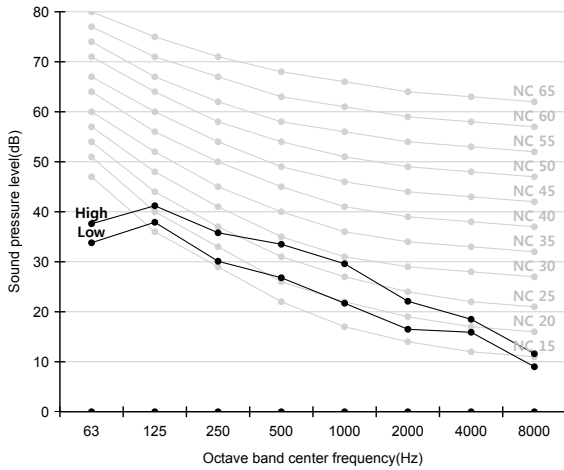
Model	High	Low
CNH184DK (AC018KN4DCH/AA)	35	29
CNH244DK (AC024KN4DCH/AA)	36	29
CNH304DK (AC030KN4DCH/AA)	38	31
CNH364DK (AC036KN4DCH/AA)	43	32

### Note

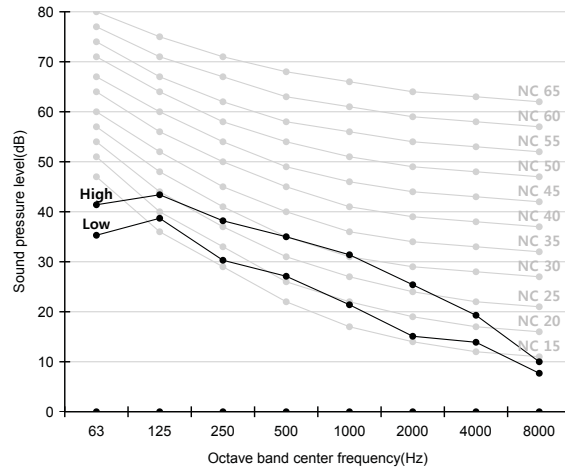
- \* Specifications may be subject to change without prior notice
- These operation values are obtained in an anechoic room.
- Sound pressure level is a relative value, depending on the distance and acoustic environment.
- Sound pressure level may differ depending on operation condition

## NC curve

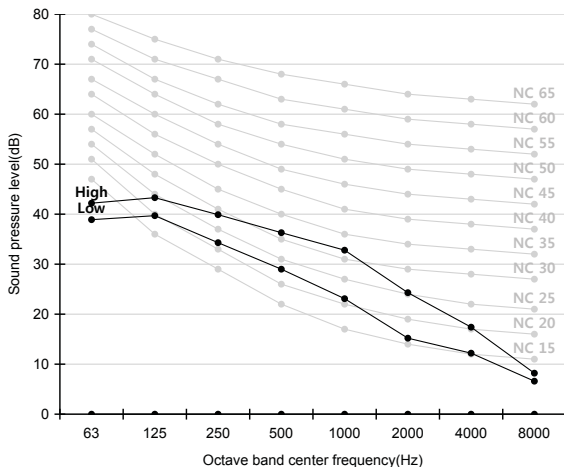
1) CNH184DK (AC018KN4DCH/AA)



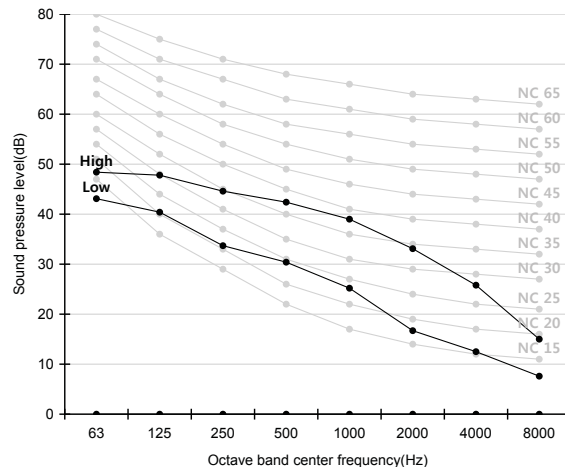
2) CNH244DK (AC024KN4DCH/AA)



3) CNH304DK (AC030KN4DCH/AA)

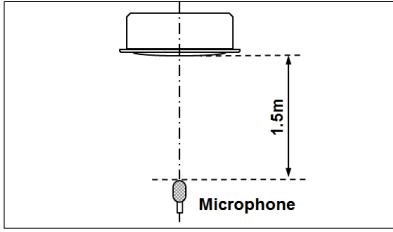


4) CNH364DK (AC036KN4DCH/AA)



# 6 Sound pressure level

## Indoor : 360 Cassette



Unit: dB(A)

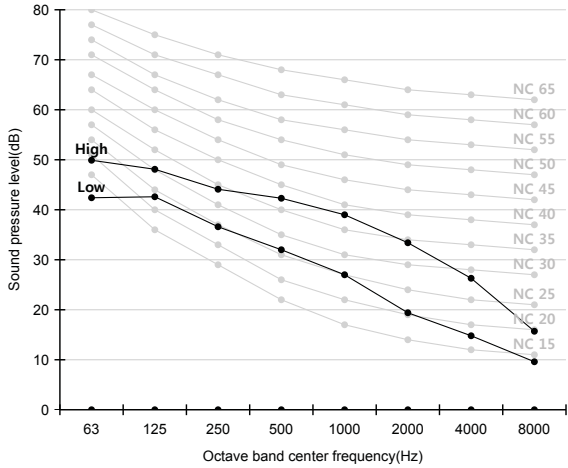
Model	High	Low
CNH424DK (AC042KN4DCH/AA)	44	34
CNH484DK (AC048KN4DCH/AA)	45	35

### Note

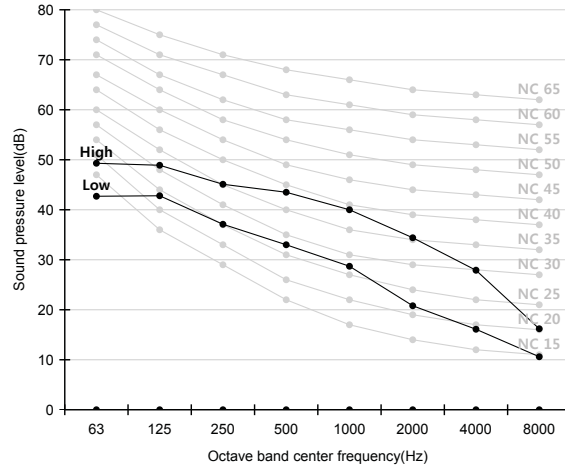
- \* Specifications may be subject to change without prior notice
- These operation values are obtained in an anechoic room.
- Sound pressure level is a relative value, depending on the distance and acoustic environment.
- Sound pressure level may differ depending on operation condition

## NC curve

1) CNH424DK (AC042KN4DCH/AA)

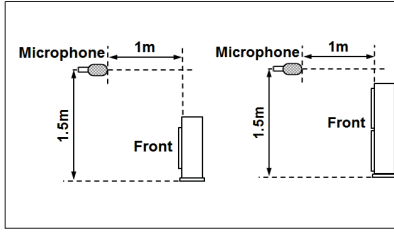


2) CNH484DK (AC048KN4DCH/AA)



# 6 Sound pressure level

## Outdoor



Unit: dB(A)

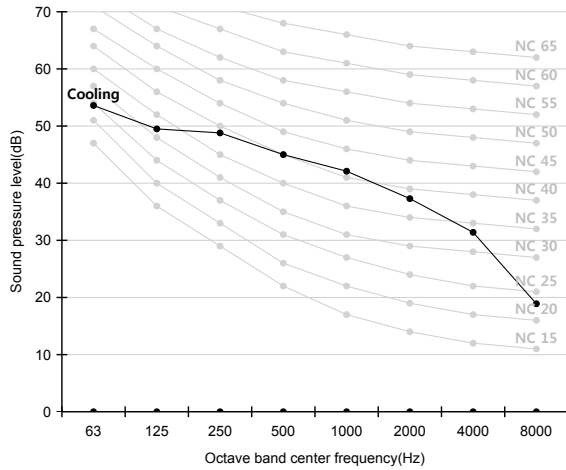
Model	Cooling
CXH18ADJ (AC018JXADCH/AA)	48
CXH24ADJ (AC024JXADCH/AA)	50
CXH30ADJ (AC030JXADCH/AA)	50
CXH36ADJ (AC036JXADCH/AA)	49

### Note

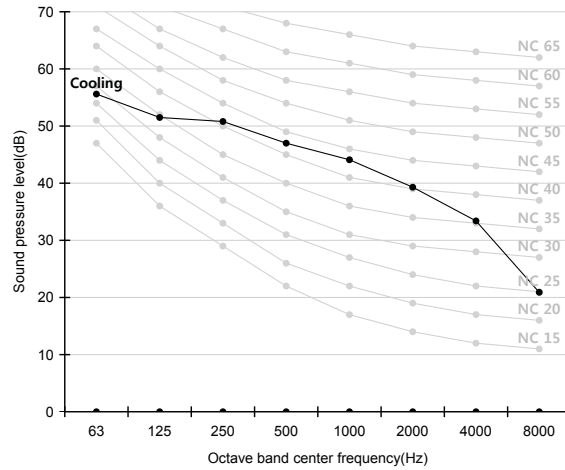
- \* Specifications may be subject to change without prior notice
- These operation values are obtained in an anechoic room.
- Sound pressure level is a relative value, depending on the distance and acoustic environment.
- Sound pressure level may differ depending on operation condition

## NC curve

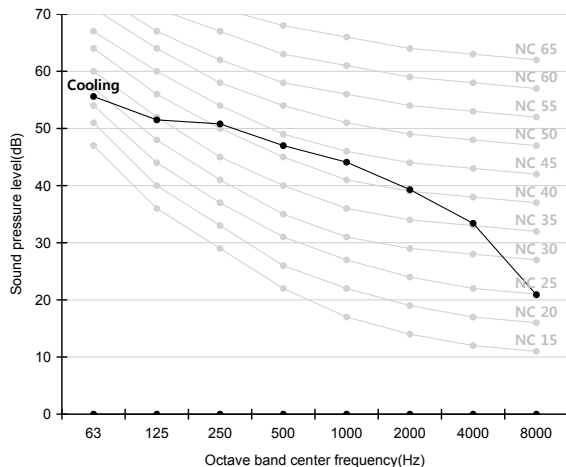
1) CXH18ADJ (AC018JXADCH/AA)



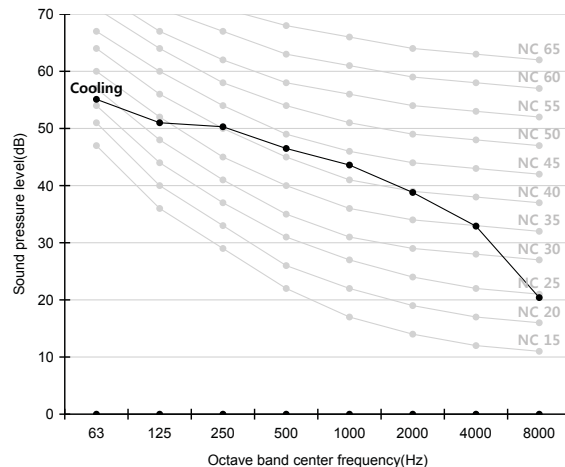
2) CXH24ADJ (AC024JXADCH/AA)



3) CXH30ADJ (AC030JXADCH/AA)



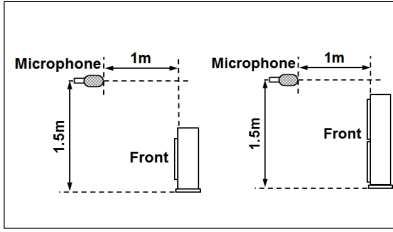
4) CXH36ADJ (AC036JXADCH/AA)





# 6 Sound pressure level

## Outdoor



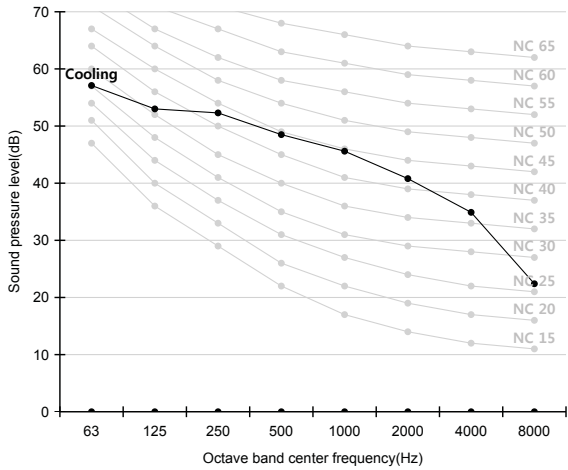
Unit: dB(A)	
Model	Cooling
CXH42ADJ (AC042JXADCH/AA)	51
CXH48ADJ (AC048JXADCH/AA)	53

### Note

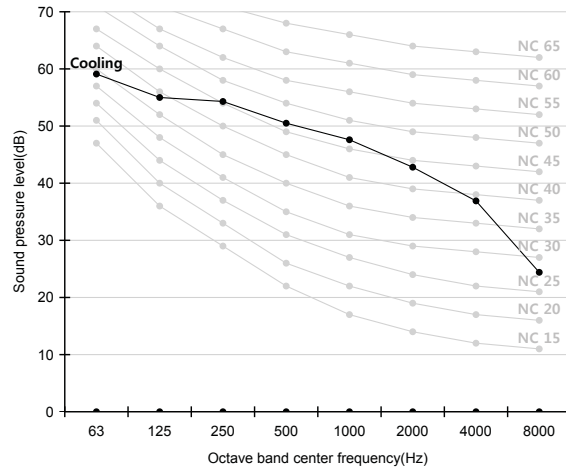
- \* Specifications may be subject to change without prior notice
- These operation values are obtained in an anechoic room.
- Sound pressure level is a relative value, depending on the distance and acoustic environment.
- Sound pressure level may differ depending on operation condition

## NC curve

### 1) CXH42ADJ (AC042JXADCH/AA)



### 2) CXH48ADJ (AC048JXADCH/AA)



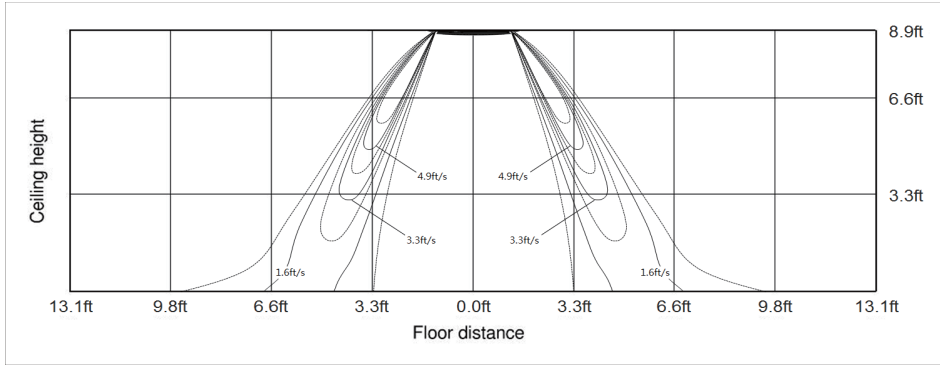
# 7 Temperature and air flow distribution

## Indoor : 360 Cassette

CNH184DK (AC018KN4DCH/AA)

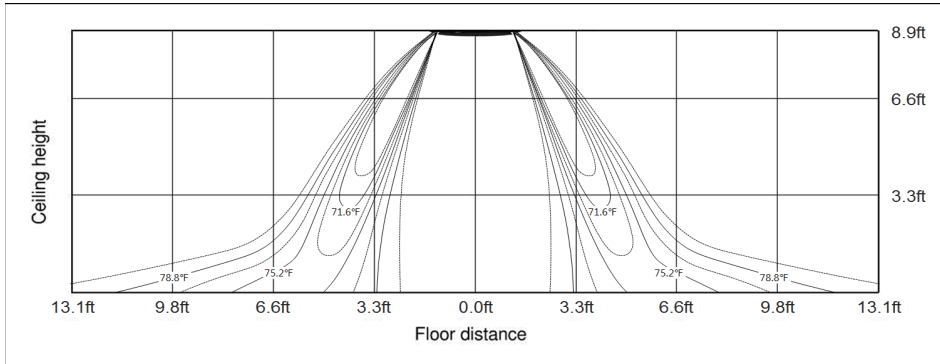
### (1) Cooling air velocity distribution

Discharge angle : 60°



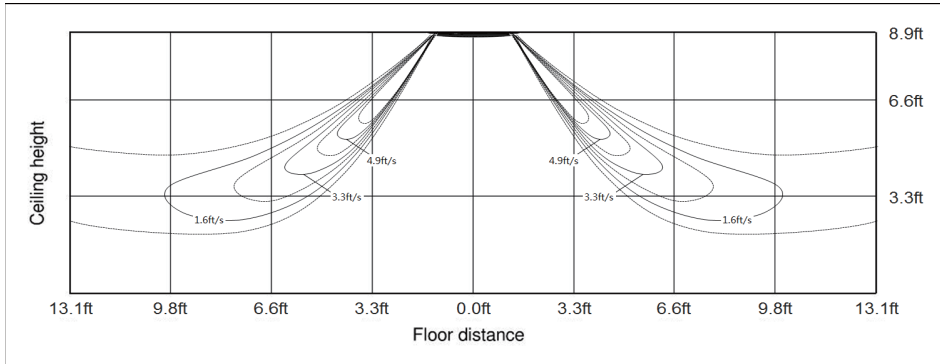
### (2) Cooling temperature distribution

Discharge angle : 60°



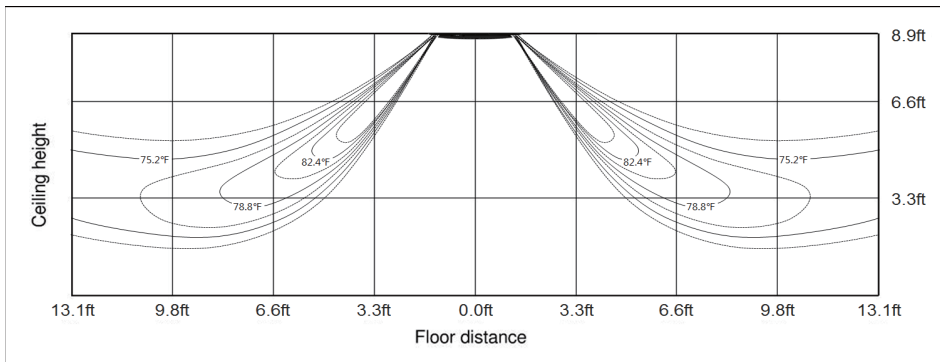
### (3) Heating air velocity distribution

Discharge angle : 60°



### (4) Heating temperature distribution

Discharge angle : 60°



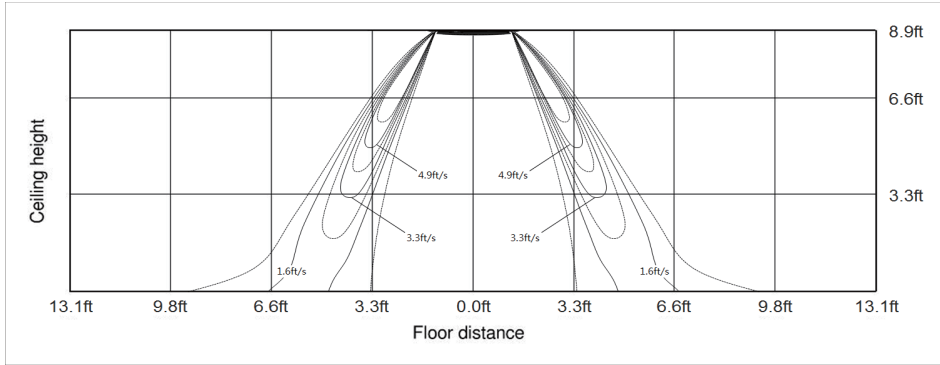
# 7 Temperature and air flow distribution

## Indoor : 360 Cassette

CNH244DK (AC024KN4DCH/AA)

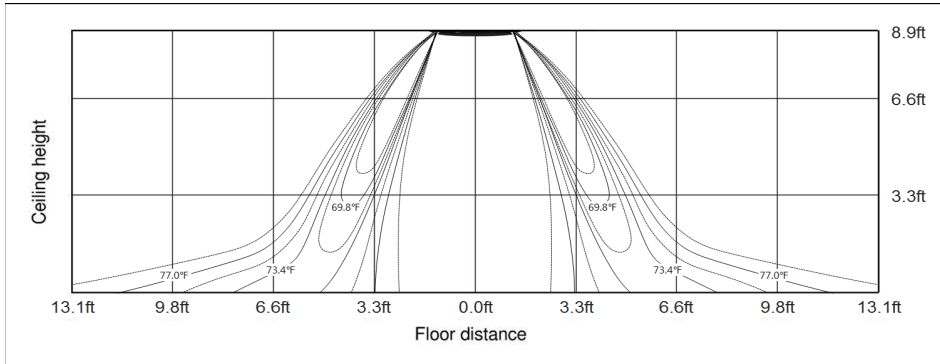
### (1) Cooling air velocity distribution

Discharge angle : 60°



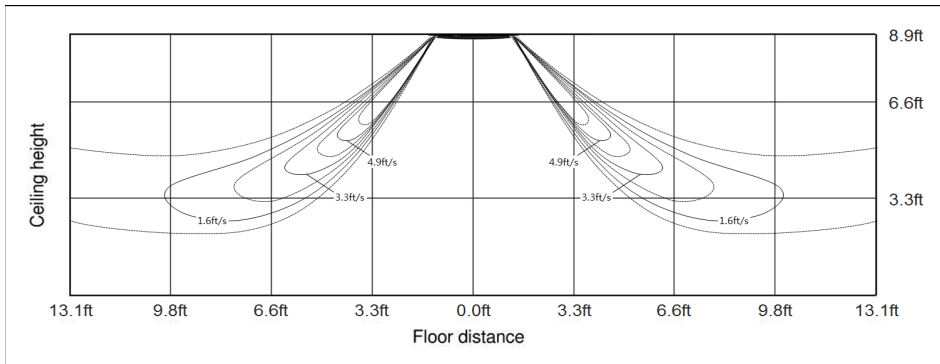
### (2) Cooling temperature distribution

Discharge angle : 60°



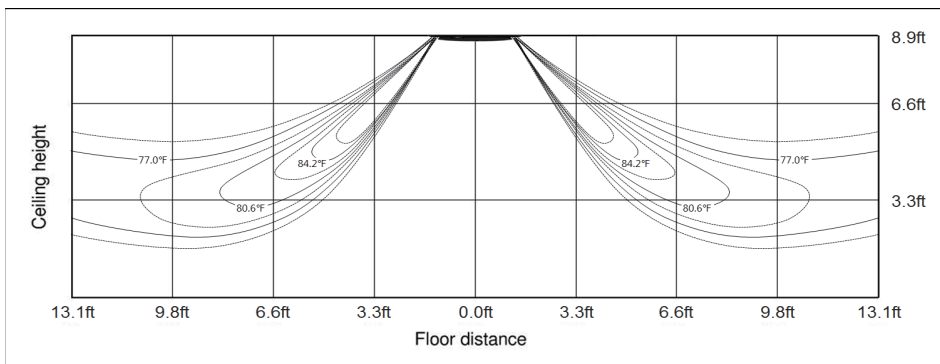
### (3) Heating air velocity distribution

Discharge angle : 60°



### (4) Heating temperature distribution

Discharge angle : 60°



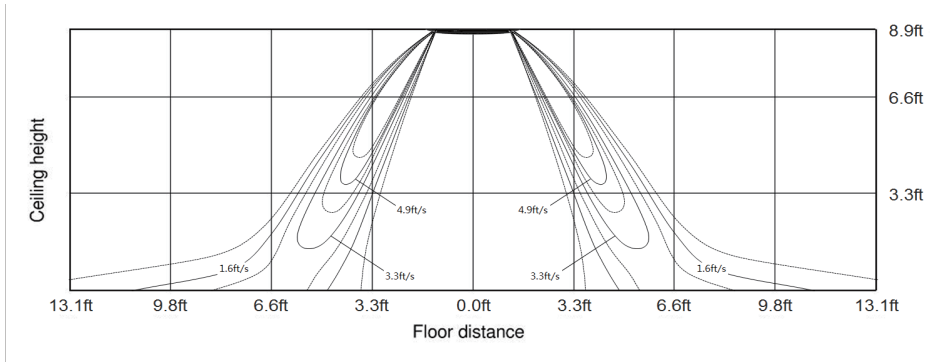
# 7 Temperature and air flow distribution

## Indoor : 360 Cassette

CNH304DK (AC030KN4DCH/AA)

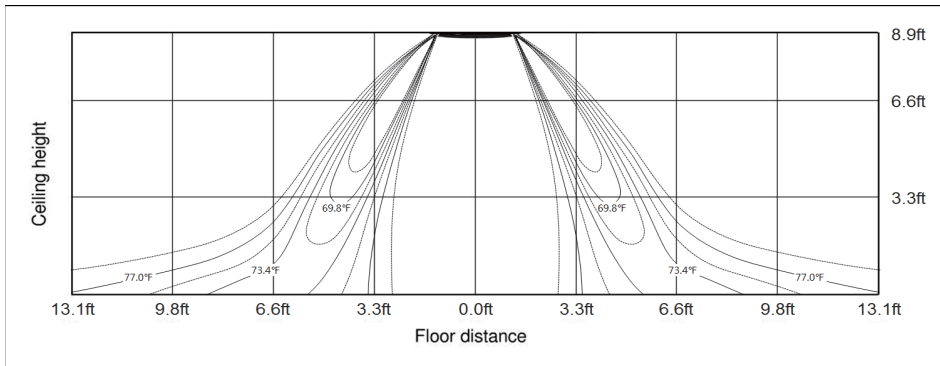
### (1) Cooling air velocity distribution

Discharge angle : 60°



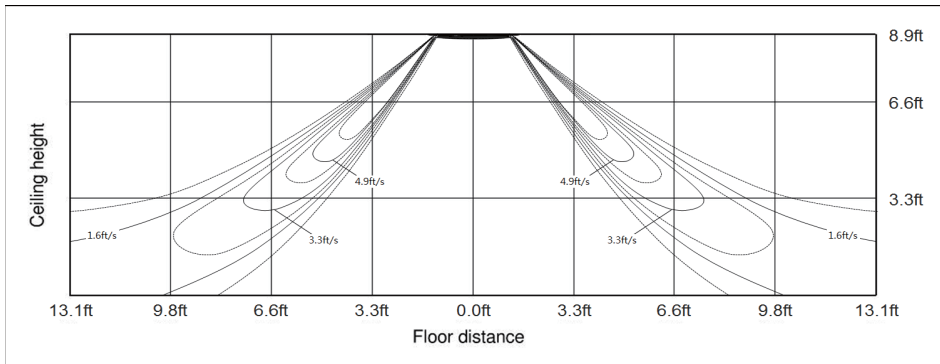
### (2) Cooling temperature distribution

Discharge angle : 60°



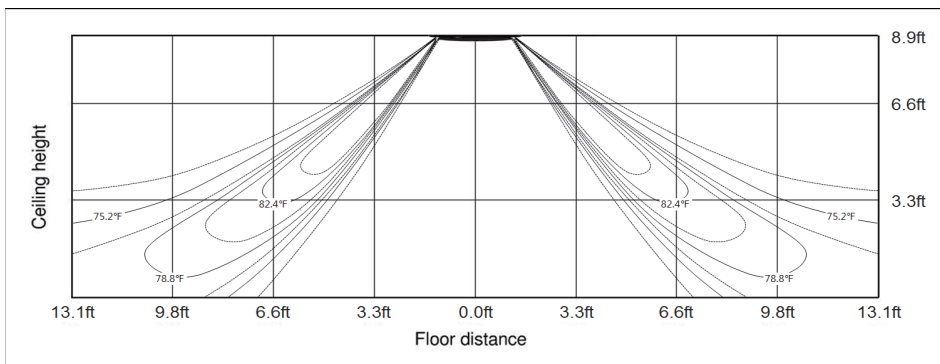
### (3) Heating air velocity distribution

Discharge angle : 60°



### (4) Heating temperature distribution

Discharge angle : 60°



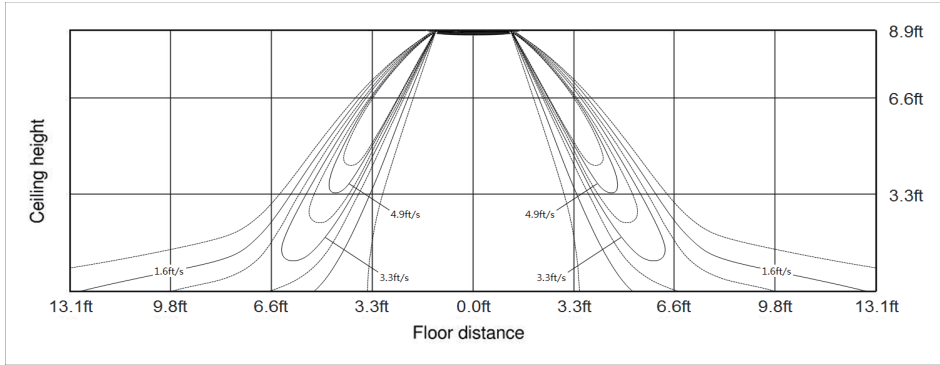
# 7 Temperature and air flow distribution

## Indoor : 360 Cassette

CNH364DK (AC036KN4DCH/AA)

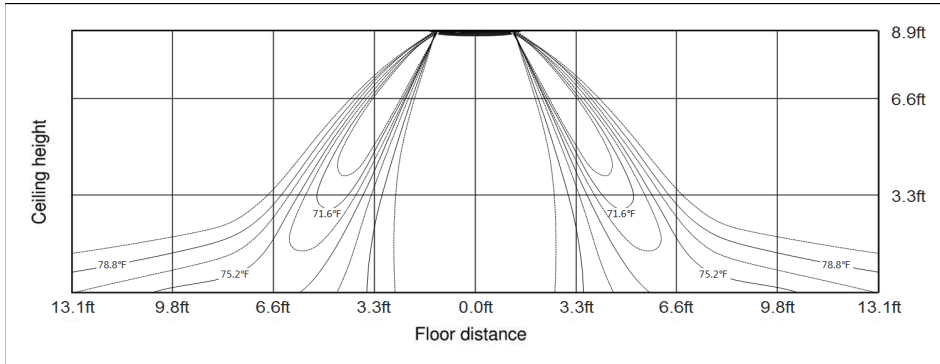
### (1) Cooling air velocity distribution

Discharge angle : 60°



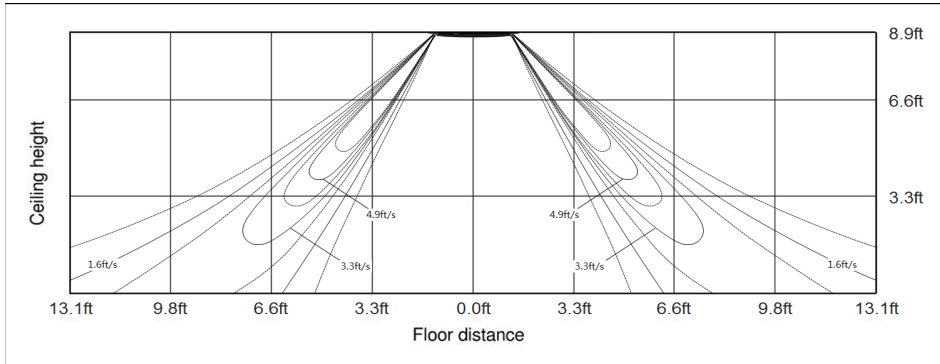
### (2) Cooling temperature distribution

Discharge angle : 60°



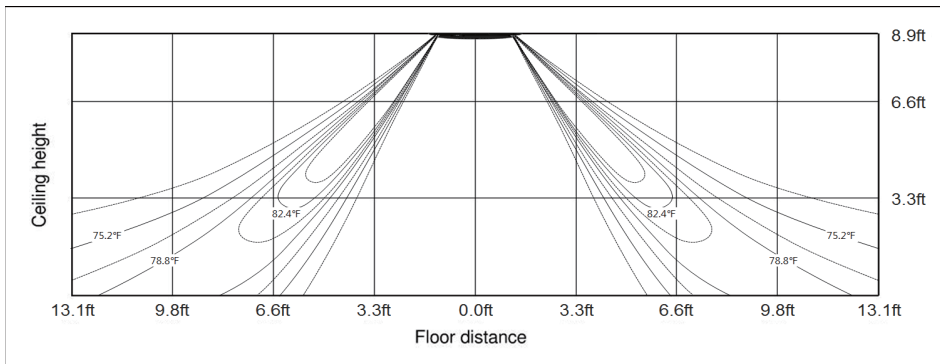
### (3) Heating air velocity distribution

Discharge angle : 60°



### (4) Heating temperature distribution

Discharge angle : 60°



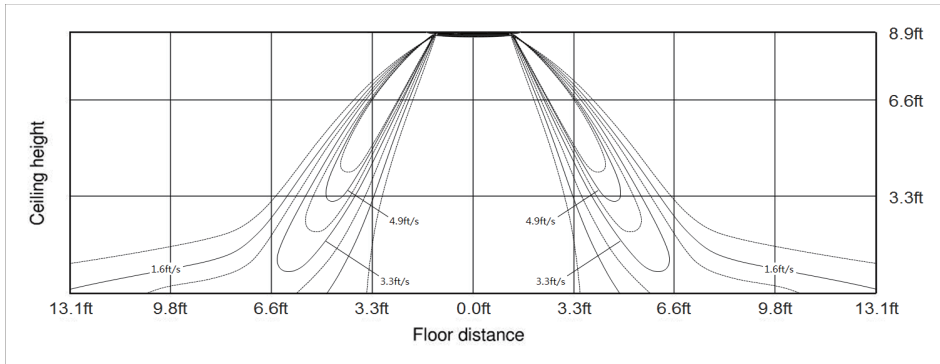
# 7 Temperature and air flow distribution

## Indoor : 360 Cassette

CXH42ADJ (AC042KN4DCH/AA)

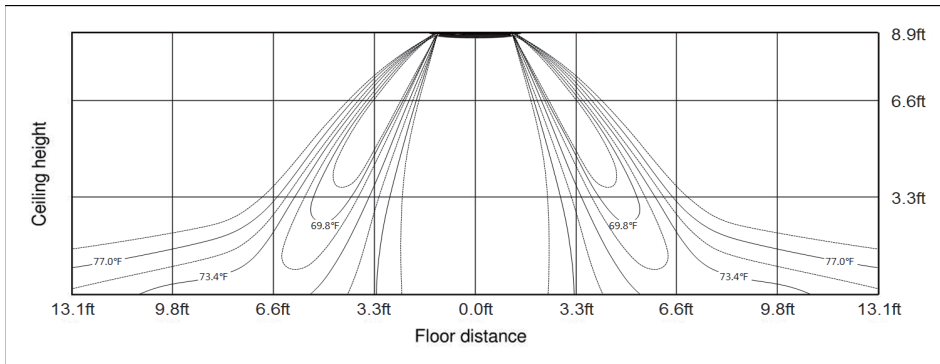
### (1) Cooling air velocity distribution

Discharge angle : 60°



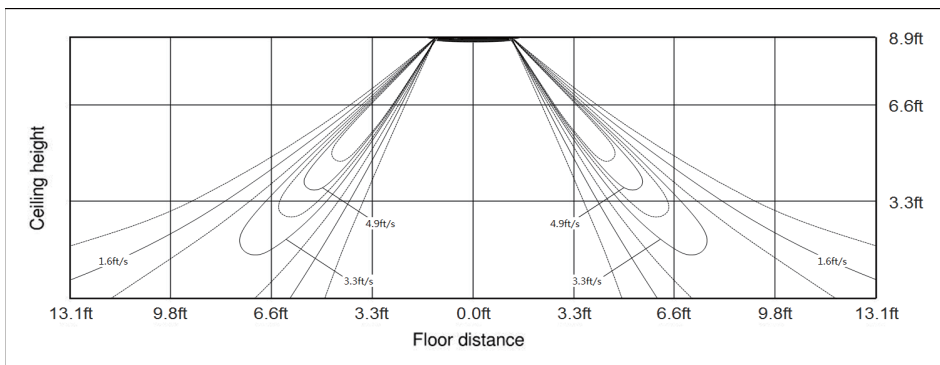
### (2) Cooling temperature distribution

Discharge angle : 60°



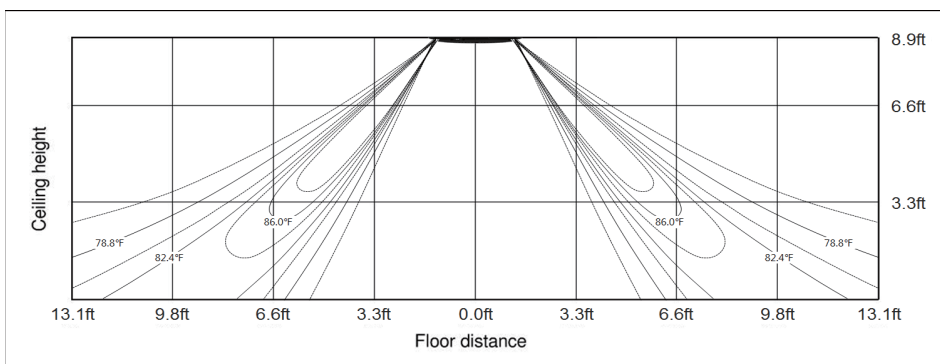
### (3) Heating air velocity distribution

Discharge angle : 60°



### (4) Heating temperature distribution

Discharge angle : 60°



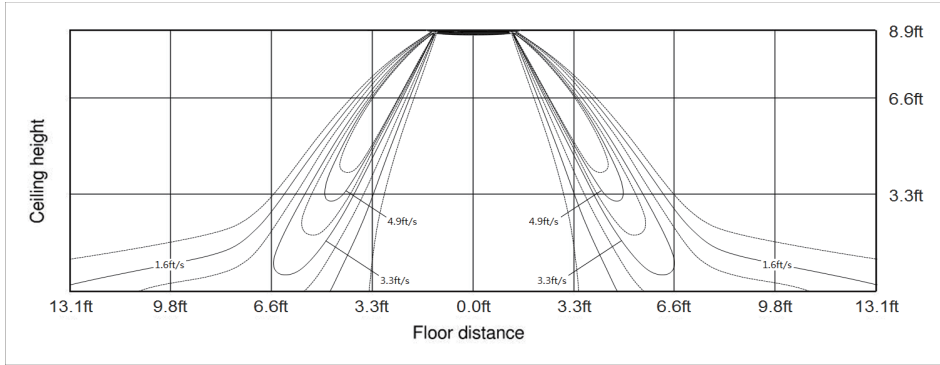
# 7 Temperature and air flow distribution

## Indoor : 360 Cassette

CXH48ADJ (AC048KN4DCH/AA)

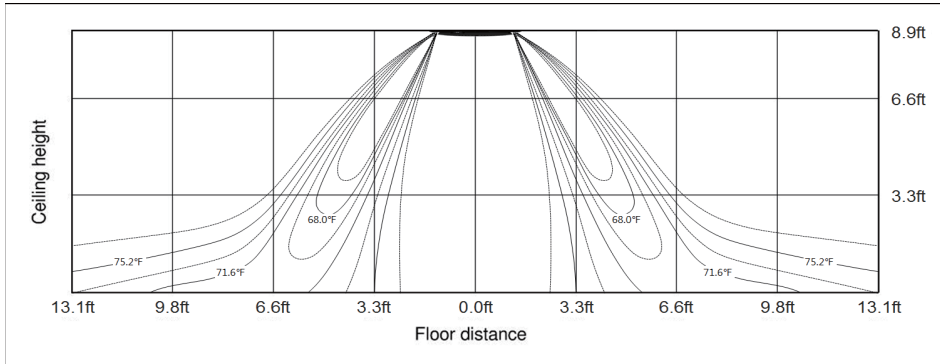
### (1) Cooling air velocity distribution

Discharge angle : 60°



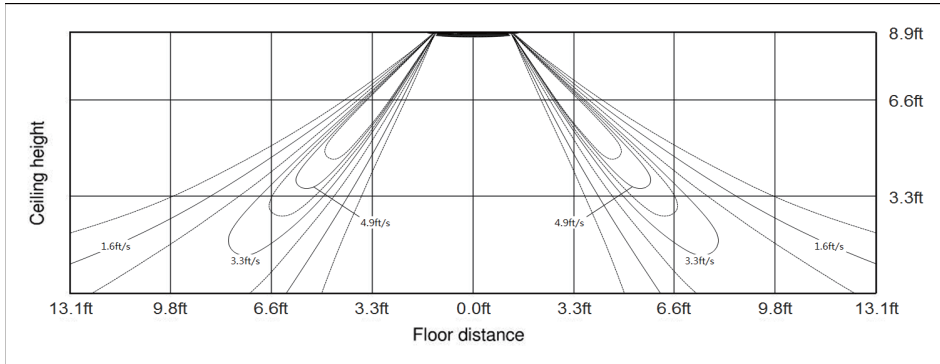
### (2) Cooling temperature distribution

Discharge angle : 60°



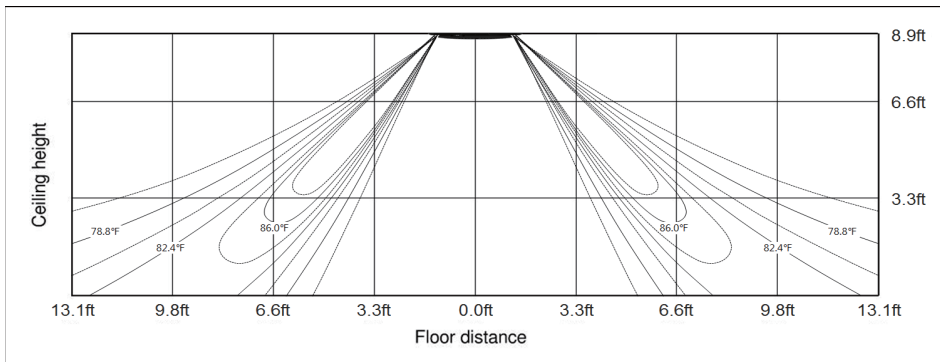
### (3) Heating air velocity distribution

Discharge angle : 60°



### (4) Heating temperature distribution

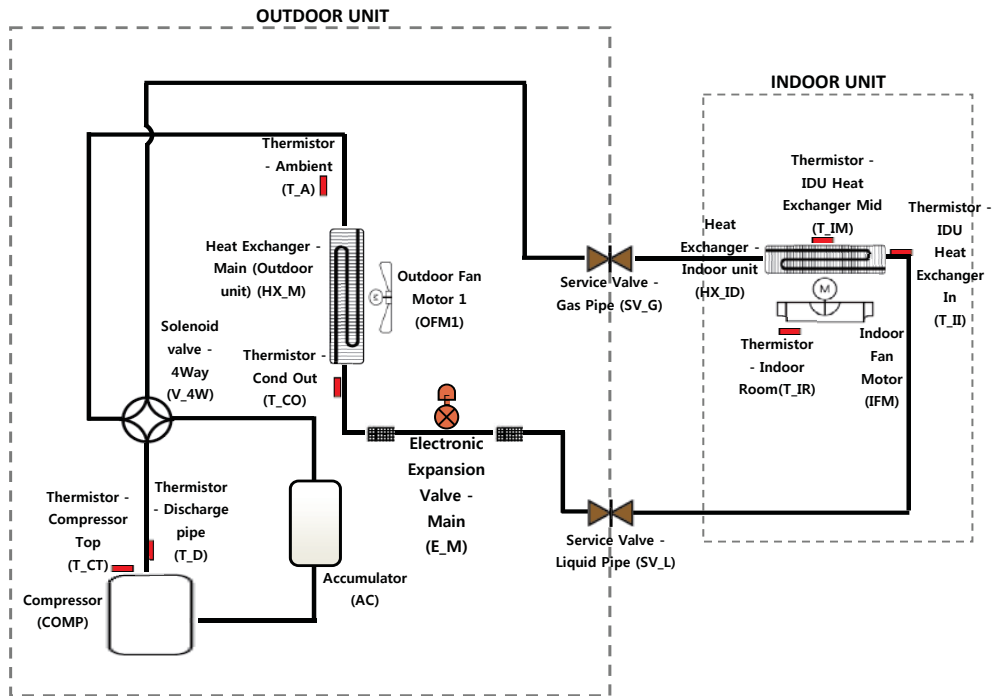
Discharge angle : 60°



# 8 Cycle diagram

## Outdoor

CXH18ADJ (AC018JXADCH/AA)



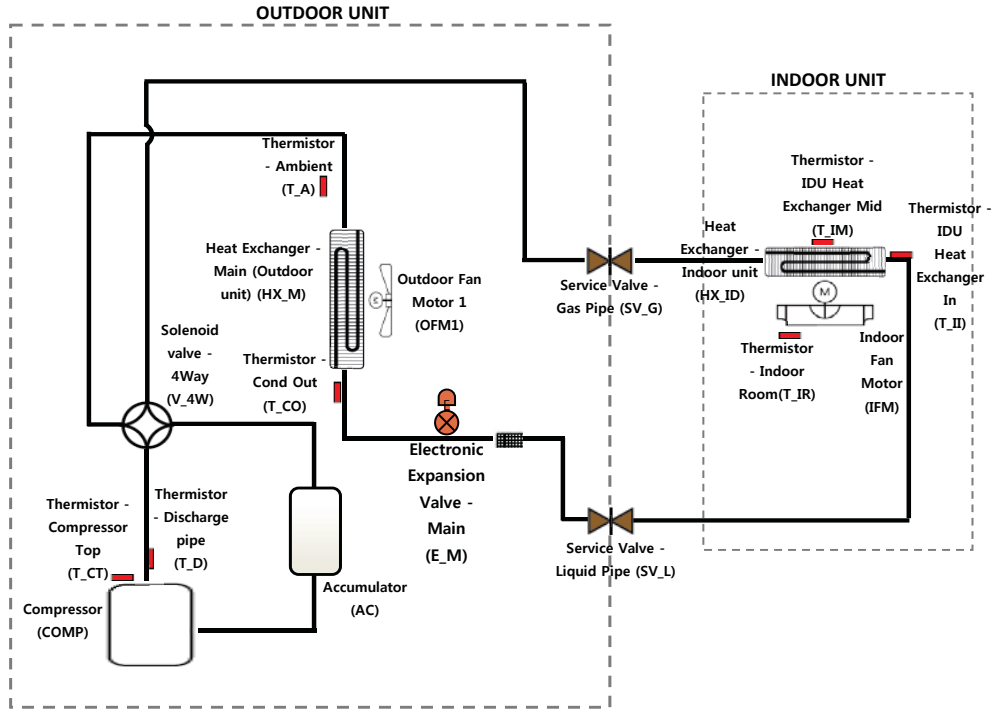
Category	Symbol	Description
Compressor		Compressor
Heat Exchanger	HX_M	Heat Exchanger - Main (Outdoor unit)
	HX_ID	Heat Exchanger - Indoor unit
Tank		Accumulator
Filter		Filter
EEV	E_M	Electronic Expansion Valve - Main
Solenoid valve	V_4W	Solenoid valve - 4Way
Valve (etc)	SV_G	Service Valve - Gas Pipe
	SV_L	Service Valve - Liquid Pipe
Thermistor	TT_CT	Thermistor - Compressor Top
	T_D	Thermistor - Discharge pipe
	T_CO	Thermistor - Cond Out
	T_A	Thermistor - Ambient
	T_IR	Thermistor - Indoor Room
	T_IM	Thermistor - IDU Heat Exchanger Mid
Fan	OFM1	Outdoor Fan Motor 1
	IFM	Indoor Fan Motor



# 8 Cycle diagram

## Outdoor

CXH24ADJ (AC024JXADCH/AA), CXH30ADJ (AC030JXADCH/AA)

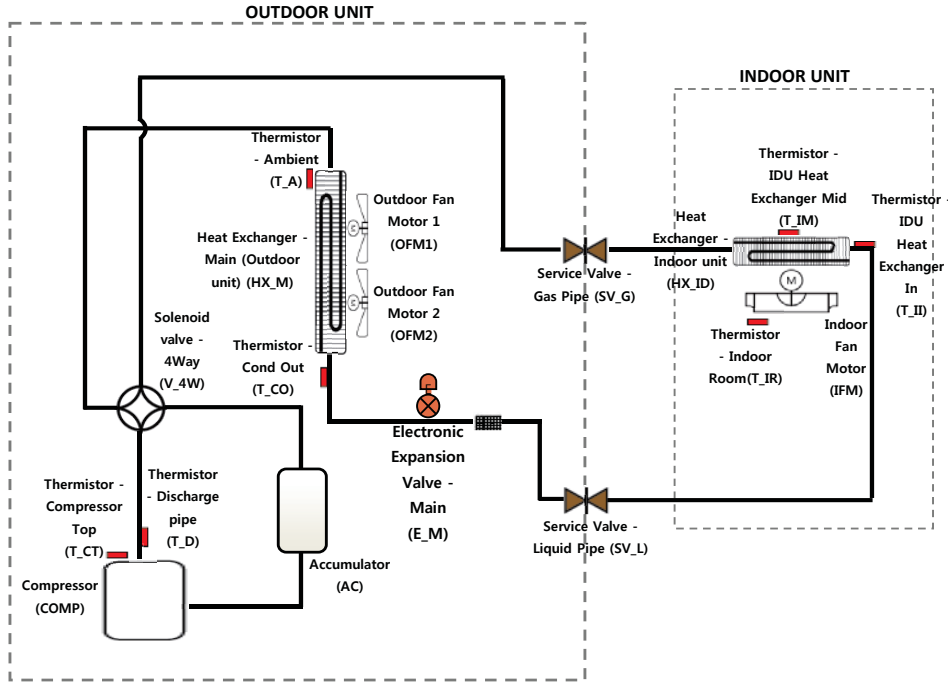


Category	Symbol	Description
Compressor		Compressor
Heat Exchanger		Heat Exchanger - Main (Outdoor unit)
		Heat Exchanger - Indoor unit
Tank		Accumulator
Filter		Filter
EEV		Electronic Expansion Valve - Main
Solenoid valve		Solenoid valve - 4Way
Valve (etc)		Service Valve - Gas Pipe
		Service Valve - Liquid Pipe
Thermistor		Thermistor - Compressor Top
		Thermistor - Discharge pipe
		Thermistor - Cond Out
		Thermistor - Ambient
		Thermistor - Indoor Room
		Thermistor - IDU Heat Exchanger Mid
Fan		Outdoor Fan Motor 1
		Indoor Fan Motor

# 8 Cycle diagram

## Outdoor

CXH36ADJ (AC036JXADCH/AA), CXH42ADJ (AC042JXADCH/AA), CXH48ADJ (AC048JXADCH/AA)




Category	Symbol	Description
Compressor		Compressor
Heat Exchanger		Heat Exchanger - Main (Outdoor unit)
		Heat Exchanger - Indoor unit
Tank		Accumulator
Filter		Filter
EEV		Electronic Expansion Valve - Main
Solenoid valve		Solenoid valve - 4Way
Valve (etc)		Service Valve - Gas Pipe
		Service Valve - Liquid Pipe
Thermistor		Thermistor - Compressor Top
		Thermistor - Discharge pipe
		Thermistor - Cond Out
		Thermistor - Ambient
		Thermistor - Indoor Room
		Thermistor - IDU Heat Exchanger Mid
Fan		Outdoor Fan Motor 1
		Outdoor Fan Motor 2
		Indoor Fan Motor

# Capacity correction

## Outdoor


CNH184DK + CXH18ADJ (AC018KN4DCH/AA + AC018JXADCH/AA)

### Cooling



		Pipe Length (ft)					
		16	33	49	66	82	98
Level Difference (ft)	66	-	-	-	0.96	0.94	0.93
	49	-	-	0.97	0.96	0.94	0.93
	33	-	0.99	0.97	0.96	0.94	0.93
	16	1.00	0.99	0.97	0.96	0.94	0.93
	0	1.00	0.99	0.97	0.96	0.94	0.93
	-16	1.00	0.98	0.97	0.95	0.94	0.92
	-33	-	0.97	0.96	0.95	0.94	0.92
	-49	-	-	0.96	0.94	0.93	0.92
	-66	-	-	-	0.94	0.92	0.91


### Heating



		Pipe Length (ft)					
		16	33	49	66	82	98
Level Difference (ft)	66	-	-	-	0.94	0.92	0.90
	49	-	-	0.96	0.94	0.92	0.90
	33	-	0.98	0.96	0.94	0.92	0.90
	16	1.00	0.98	0.96	0.94	0.92	0.90
	0	1.00	0.98	0.96	0.94	0.92	0.90
	-16	1.00	0.98	0.96	0.94	0.92	0.90
	-33	-	0.98	0.96	0.94	0.92	0.90
	-49	-	-	0.96	0.94	0.92	0.90
	-66	-	-	-	0.94	0.92	0.90


CNH244DK + CXH24ADJ (AC024KN4DCH/AA + AC024JXADCH/AA)

### Cooling



		Pipe Length (ft)									
		16	33	49	66	82	98	115	131	148	164
Level Difference (ft)	98	-	-	-	-	-	0.94	0.93	0.92	0.91	0.90
	82	-	-	-	-	0.96	0.94	0.93	0.92	0.91	0.90
	66	-	-	-	0.97	0.96	0.94	0.93	0.92	0.91	0.90
	49	-	-	0.98	0.97	0.96	0.94	0.93	0.92	0.91	0.90
	33	-	0.99	0.98	0.97	0.96	0.94	0.93	0.92	0.91	0.90
	16	1.00	0.99	0.98	0.97	0.96	0.94	0.93	0.92	0.91	0.90
	0	1.00	0.99	0.98	0.97	0.96	0.94	0.93	0.92	0.91	0.90
	-16	1.00	0.98	0.97	0.96	0.95	0.94	0.93	0.92	0.90	0.88
	-33	-	0.98	0.97	0.96	0.95	0.94	0.92	0.91	0.89	0.87
	-49	-	-	0.97	0.96	0.94	0.93	0.92	0.90	0.88	0.85
	-66	-	-	-	0.95	0.94	0.93	0.91	0.89	0.87	0.83
	-82	-	-	-	-	0.94	0.92	0.91	0.89	0.86	0.82
	-98	-	-	-	-	-	0.92	0.90	0.88	0.85	0.80

### Heating




		Pipe Length (ft)									
		16	33	49	66	82	98	115	131	148	164
Level Difference (ft)	98	-	-	-	-	-	0.94	0.93	0.92	0.91	0.90
	82	-	-	-	-	0.96	0.94	0.93	0.92	0.91	0.90
	66	-	-	-	0.97	0.96	0.94	0.93	0.92	0.91	0.90
	49	-	-	0.98	0.97	0.96	0.94	0.93	0.92	0.91	0.90
	33	-	0.99	0.98	0.97	0.96	0.94	0.93	0.92	0.91	0.90
	16	1.00	0.99	0.98	0.97	0.96	0.94	0.93	0.92	0.91	0.90
	0	1.00	0.99	0.98	0.97	0.96	0.94	0.93	0.92	0.91	0.90
	-16	1.00	0.99	0.98	0.97	0.96	0.94	0.93	0.92	0.91	0.90
	-33	-	0.99	0.98	0.97	0.96	0.94	0.93	0.92	0.91	0.90
	-49	-	-	0.98	0.97	0.96	0.94	0.93	0.92	0.91	0.90
	-66	-	-	-	0.97	0.96	0.94	0.93	0.92	0.91	0.90
	-82	-	-	-	-	0.96	0.94	0.93	0.92	0.91	0.90
	-98	-	-	-	-	-	0.94	0.93	0.92	0.91	0.90

# Capacity correction

## Outdoor


CNH304DK + CXH30ADJ (AC030KN4DCH/AA + AC030JXADCH/AA)

### Cooling



		Pipe Length (ft)									
		16	33	49	66	82	98	115	131	148	164
Level Difference (ft)	98	-	-	-	-	-	0.94	0.93	0.92	0.91	0.90
	82	-	-	-	-	0.96	0.94	0.93	0.92	0.91	0.90
	66	-	-	-	0.97	0.96	0.94	0.93	0.92	0.91	0.90
	49	-	-	0.98	0.97	0.96	0.94	0.93	0.92	0.91	0.90
	33	-	0.99	0.98	0.97	0.96	0.94	0.93	0.92	0.91	0.90
	16	1.00	0.99	0.98	0.97	0.96	0.94	0.93	0.92	0.91	0.90
	0	1.00	0.99	0.98	0.97	0.96	0.94	0.93	0.92	0.91	0.90
	-16	1.00	0.98	0.97	0.96	0.95	0.94	0.93	0.92	0.90	0.88
	-33	-	0.98	0.97	0.96	0.95	0.94	0.92	0.91	0.89	0.87
	-49	-	-	0.97	0.96	0.94	0.93	0.92	0.90	0.88	0.85
	-66	-	-	-	0.95	0.94	0.93	0.91	0.89	0.87	0.83
	-82	-	-	-	-	0.94	0.92	0.91	0.89	0.86	0.82
	-98	-	-	-	-	-	0.92	0.90	0.88	0.85	0.80


### Heating



		Pipe Length (ft)									
		16	33	49	66	82	98	115	131	148	164
Level Difference (ft)	98	-	-	-	-	-	0.94	0.93	0.92	0.91	0.90
	82	-	-	-	-	0.96	0.94	0.93	0.92	0.91	0.90
	66	-	-	-	0.97	0.96	0.94	0.93	0.92	0.91	0.90
	49	-	-	0.98	0.97	0.96	0.94	0.93	0.92	0.91	0.90
	33	-	0.99	0.98	0.97	0.96	0.94	0.93	0.92	0.91	0.90
	16	1.00	0.99	0.98	0.97	0.96	0.94	0.93	0.92	0.91	0.90
	0	1.00	0.99	0.98	0.97	0.96	0.94	0.93	0.92	0.91	0.90
	-16	1.00	0.99	0.98	0.97	0.96	0.94	0.93	0.92	0.91	0.90
	-33	-	0.99	0.98	0.97	0.96	0.94	0.93	0.92	0.91	0.90
	-49	-	-	0.98	0.97	0.96	0.94	0.93	0.92	0.91	0.90
	-66	-	-	-	0.97	0.96	0.94	0.93	0.92	0.91	0.90
	-82	-	-	-	-	0.96	0.94	0.93	0.92	0.91	0.90
	-98	-	-	-	-	-	0.94	0.93	0.92	0.91	0.90


CNH364DK + CXH36ADJ (AC036KN4DCH/AA + AC036JXADCH/AA)

### Cooling



		Pipe Length (ft)														
		16	33	49	66	82	98	115	131	148	164	180	197	213	230	246
Level Difference (ft)	98	-	-	-	-	-	0.96	0.95	0.94	0.93	0.92	0.91	0.91	0.90	0.89	0.88
	82	-	-	-	-	0.97	0.96	0.95	0.94	0.93	0.92	0.91	0.91	0.90	0.89	0.88
	66	-	-	-	0.97	0.97	0.96	0.95	0.94	0.93	0.92	0.91	0.91	0.90	0.89	0.88
	49	-	-	0.98	0.97	0.97	0.96	0.95	0.94	0.93	0.92	0.91	0.91	0.90	0.89	0.88
	33	-	0.99	0.98	0.97	0.97	0.96	0.95	0.94	0.93	0.92	0.91	0.91	0.90	0.89	0.88
	16	1.00	0.99	0.98	0.97	0.97	0.96	0.95	0.94	0.93	0.92	0.91	0.91	0.90	0.89	0.88
	0	1.00	0.99	0.98	0.97	0.97	0.96	0.95	0.94	0.93	0.92	0.91	0.91	0.90	0.89	0.88
	-16	1.00	0.99	0.98	0.97	0.96	0.95	0.95	0.94	0.93	0.92	0.91	0.90	0.89	0.88	0.87
	-33	-	0.98	0.98	0.97	0.96	0.95	0.94	0.93	0.92	0.92	0.91	0.90	0.89	0.87	0.85
	-49	-	-	0.97	0.97	0.96	0.95	0.94	0.93	0.92	0.91	0.90	0.89	0.88	0.86	0.84
	-66	-	-	-	0.96	0.95	0.95	0.94	0.93	0.92	0.91	0.90	0.89	0.88	0.86	0.83
	-82	-	-	-	-	0.95	0.94	0.93	0.92	0.92	0.91	0.90	0.88	0.87	0.85	0.81
	-98	-	-	-	-	-	0.94	0.93	0.92	0.91	0.90	0.89	0.88	0.86	0.84	0.80

### Heating



		Pipe Length (ft)														
		16	33	49	66	82	98	115	131	148	164	180	197	213	230	246
Level Difference (ft)	98	-	-	-	-	-	0.96	0.95	0.94	0.93	0.92	0.91	0.91	0.90	0.89	0.88
	82	-	-	-	-	0.97	0.96	0.95	0.94	0.93	0.92	0.91	0.91	0.90	0.89	0.88
	66	-	-	-	0.97	0.97	0.96	0.95	0.94	0.93	0.92	0.91	0.91	0.90	0.89	0.88
	49	-	-	0.98	0.97	0.97	0.96	0.95	0.94	0.93	0.92	0.91	0.91	0.90	0.89	0.88
	33	-	0.99	0.98	0.97	0.97	0.96	0.95	0.94	0.93	0.92	0.91	0.91	0.90	0.89	0.88
	16	1.00	0.99	0.98	0.97	0.97	0.96	0.95	0.94	0.93	0.92	0.91	0.91	0.90	0.89	0.88
	0	1.00	0.99	0.98	0.97	0.97	0.96	0.95	0.94	0.93	0.92	0.91	0.91	0.90	0.89	0.88
	-16	1.00	0.99	0.98	0.97	0.97	0.96	0.95	0.94	0.93	0.92	0.91	0.91	0.90	0.89	0.88
	-33	-	0.99	0.98	0.97	0.97	0.96	0.95	0.94	0.93	0.92	0.91	0.91	0.90	0.89	0.88
	-49	-	-	0.98	0.97	0.97	0.96	0.95	0.94	0.93	0.92	0.91	0.91	0.90	0.89	0.88
	-66	-	-	-	0.97	0.97	0.96	0.95	0.94	0.93	0.92	0.91	0.91	0.90	0.89	0.88
	-82	-	-	-	-	0.97	0.96	0.95	0.94	0.93	0.92	0.91	0.91	0.90	0.89	0.88
	-98	-	-	-	-	-	0.96	0.95	0.94	0.93	0.92	0.91	0.91	0.90	0.89	0.88



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