

VRF



Line-up outdoor

	Name	Image	Capacity (kW)
Heat Pump	DVM S Eco Heat Pump		4 5 6 8 10 12 14 16 18 20 22 24 26 30
	DVM S Essential Heat Pump (2-pipe)		8 10 12 14 16 18 20 22 24 26 30
	DVM S Standard Heat Pump (2-pipe)		4 5 6 8 10 12 14 16 18 20 22 24 26 30
	DVM S High EER Heat Pump (2-pipe)		4 5 6 8 10 12 14 16 18 20 22 24 26 30
Heat Recovery	DVM S Eco Heat Recovery (With Heat Recovery Changer Kit)		4 5 6 8 10 12 14 16 18 20 22 24 26 30
	DVM S High EER Heat Recovery (2-pipe)		8 10 12 14 16 18 20 22 24 26 30
Water-to-Water	DVM S Water		4 5 6 8 10 12 14 16 18 20 22 24 26 30



Line-up indoor

Model	Image	1.1	1.7	1.3	2.8	3.2	3.6	4.1	5.6	6.0	7.1
Mini-Free™ 1-Way Cassette		•			•	•	•	•	•	•	•
Mini-Free™ 4-Way Cassette		•			•	•	•	•	•	•	•
360 Cassette									•	•	•
Duct S								•	•	•	•
MSP Duct						•	•	•	•	•	•
LSP Slim Duct				•	•	•	•	•	•	•	•
HSP Duct						•	•	•	•	•	•
Big Duct											
Console						•	•	•	•	•	•
Ceiling								•			
Concealed Floor-Standing							•	•	•	•	•
Packaged Floor-Standing											
Babyzy Wall-Mounted (EEV included)				•	•	•	•	•	•	•	•
Babyzy Wall-Mounted (EEV excluded)				•	•	•	•	•	•	•	•
AB1000 Wall-Mounted (EEV included)				•	•	•	•	•	•	•	•
Max Wall-Mounted											
HydroLink SE											
HydroLink SE											

NOTE

- Make sure to use an indoor unit that is compatible with DVM.
- Indoor units can be connected with in the range indicated in the following table.
- If the total capacity of the connected indoor units exceeds the indicated maximum capacity, the cooling and heating capacity of the indoor unit may decrease.
- The total allowable capacity of the connected indoor units can be from 50 % to 150 % of the total outdoor unit capacity. $0.5 \times I \leq \text{Total capacity of the connected indoor units} \leq 1.5 \times I$ (Outdoor unit capacity).

Capacity (kW)	8.1	9.0	11.2	12.8	14.0	16.0	18.0	20.0	22.0	25.0	28.0	32.0	39.0
	•	•	•	•	•	•	•	•	•	•	•	•	•
		•	•	•	•	•	•	•	•	•	•	•	•
			•	•	•	•	•	•	•	•	•	•	•
				•	•	•	•	•	•	•	•	•	•
					•	•	•	•	•	•	•	•	•
						•	•	•	•	•	•	•	•
							•	•	•	•	•	•	•
								•	•	•	•	•	•
									•	•	•	•	•
										•	•	•	•
											•	•	•



Selection guide

Model	Heat Pump				
	ZVM E&S	ZVM E&H	ZVM E&E	ZVM E&H/EV	ZVM E&H/EV
Type	Heat Pump				
Heat Recovery					
Coaxial range	4–8 hp	6–14 hp	10–40 hp	8–80 hp	8–80 hp
Connectibility					
Standard Cassette	•	•	•	•	•
Wind-Free® Cassette	•	•	•	•	•
SDU Cassette	•	•	•	•	•
LSP Direct	•	•	•	•	•
MSP Direct	•	•	•	•	•
HSP Direct	•	•	•	•	•
Wall-Mounted	•	•	•	•	•
Floor-Standing/Concealed/Keling	•	•	•	•	•
EVPI System	•	•	•	•	•
Modular multi-H2/HT	•	•	•	•	•
MCU AX					
AHU AX					
Features					
Refrigerant check mode	•	•	•	•	•
Simplified cooling and heating					
7-Segment display	•	•	•	•	•
Four-way fixed piping connection	•	•	•	•	•
Fan filter injection					
Heating 0–25 °C	•	•	•	•	•
Intelligent defrost	•	•	•	•	•
Improved fan filter	•	•	•	•	•
Reduced air flow noise					
Leak detection (no deionization)					
No gasket mode	•	•	•	•	•
Variable outdoor temperature	•	•	•	•	•
Intelligent compressor	•	•	•	•	•
Twin RDC rotary compressor	•	•	•	•	•
D.C. fan motor	•	•	•	•	•
Smart Protection Technology	R410A	R410A	R410A	R410A	R410A
Technology	All-in-one Single	•	•	•	•
Refrigerant type					
All-in-one Single	•	•	•	•	•
Refrigerant cooled PCB					
Resonance Advance Technology	•	•	•	•	•

Model	Heat Recovery		
	ZVM E&S	ZVM E&H/EV	ZVM E&W/EV
Type			
Heat Recovery			
Coaxial range	4–8 hp	8–80 hp	8–80 hp
Connectibility			
Standard Cassette	•	•	•
Wind-Free® Cassette	•	•	•
SDU Cassette	•	•	•
LSP Direct	•	•	•
MSP Direct	•	•	•
HSP Direct	•	•	•
Wall-Mounted			
Floor-Standing/Concealed/Keling			
EVPI System			
Modular multi-H2/HT			
MCU AX			
AHU AX			
Features			
Refrigerant check mode	•	•	•
Simplified cooling and heating			
7-Segment display	•	•	•
Four-way fixed piping connection	•	•	•
Fan filter injection			
Heating 0–25 °C	•	•	•
Intelligent defrost	•	•	•
Improved fan filter	•	•	•
Reduced air flow noise			
Leak detection (no deionization)			
No gasket mode	•	•	•
Variable outdoor temperature	•	•	•
Intelligent compressor	•	•	•
Twin RDC rotary compressor	•	•	•
D.C. fan motor	•	•	•
Technology	R410A	R410A	R410A

1 Can be connected as a 2-pipe system.

Selection guide

Model	Cassette		
	Wind-Free™ Cassette	Wind-Free™ Wall	360° Cassette
Airflow	Wind-Free™ Cooling 360° Air Supply		
Air Purification	Silencer Air filter	Optional Optional	Optional
Functions	Compatible with Samsung SmartThings Compatible with Wi-Fi Kit Humidity Sensor MSI Motion Detect Sensor Automatic ESP Setting Quiet Mode	● ● ● ● ● ●	● ● ● ● ● ●
Controls	Wireless remote controller included		
Others	EDV included Built-in Drain Pump	● ●	● ●

Duct				
Duct S	LSP Duct	MSP Duct	HSP Duct	Big Duct
Optional	● ● ● ●	● ● ● ●	● ● ● ●	● ● ● ●
	Model-specific	Model-specific	Model-specific	Optional

Model	Others				
	Console	Floor/ceiling	Big Ceiling	Concealed Floor-Standing	Packaged Floor-Standing
Airflow	Wind-Free™ Cooling 360° Air Supply				
Air Purification	Silencer Air filter	● ●	● ●	● ●	● ●
Functions	Compatible with Samsung SmartThings Compatible with Wi-Fi Kit Humidity Sensor MSI Motion Detect Sensor Automatic ESP Setting Quiet Mode	● ● ● ● ● ●	● ● ● ● ● ●	● ● ● ● ● ●	● ● ● ● ● ●
Controls	Wireless remote controller included	● ●			
Others	EDV included Built-in Drain Pump	● ●	● ●	● ●	● ●

Others		Wall-Mounted	
Hybrid Unit HE	Hybrid Link HT	Horiz Wall-Mounted	Vertic Wall-Mounted
● ● ● ●	● ● ● ●	● ● ● ●	● ● ● ●
Model-specific	Model-specific	Model-specific	● ●



Nomenclature

Indoor units

AM	045	N	N	4	D	E	H
1	2	3	4	5	6	7	8

1	Classification	AM	VRF	
		AN	Ventilation (ERV)	
2	Capacity	x1/10 hp DVM (3 digits)		
		F	2013	
		H	2014	
		J	2015	
		K	2016	
		M	2017	
		N	2018	
		R	2019	
		T	2020	
3	Version			
4	Product Type	N	Indoor Unit (NASA)	
		S	ERV	
5	Product Notation	'1'	Wind-Free™ 1-Way Cassette	
		'2'	2-Way Cassette	
		'4'	360 Cassette & Wind-Free™ 4-Way Cassette	
		N	Small chassis Wind-Free™ 4-Way Cassette	
		L	Low Static Pressure Duct (Slim Duct)	
		M	Medium Static Pressure Duct	
		H	High Static Pressure Duct	
		E	Outdoor Air Processing Duct	
		C	Ceiling	
		J	Console	
		F	Floor-Standing	
		P	Packaged Floor-Standing	
		T	Boracay Wall-Mounted without EEV	
		Q	Boracay Wall-Mounted (EEV)	
		V	AR5000 Wall-Mounted (EEV)	
		B	Hydro Unit	
		K	ERV (Plus)	
		W	DVM S Water	
6	Feature	F	Flagship	
		P	Premium	
		D	Deluxe	
		S	Standard	
7	Voltage Rating	E	10,220–240 V, 50 Hz	
		K	10,220–240 V, 50/60 Hz	
		G	30,380–415 V, 50 Hz	
8	Mode	H	Heat Pump (R410A)	
		B	Heat Pump (R134A)	
		N	ERV	

Outdoor units

AM	080	K	X	V	A	G	H
1	2	3	4	5	6	7	8

1	Classification	AM	VRF	
2	Capacity	x1/10 hp DVM (3 digits)		
		F	2013	
		H	2014	
		J	2015	
		K	2016	
3	Version	M	2017	
		N	2018	
		R	2019	
		T	2020	
4	Product Type	X	DVM S	
5	Product Notation	V	DVM S Essential/Standard/High EER	
		W	DVM S Water	
		M	DVM S Eco	
6	Feature	A	Standard + General Temperature + Module	
		H	High EER + Low Temperature + Module	
		G	High EER + General Temperature + Module	
		D	Standard + General Temperature + Non-Module	
7	Voltage Rating	E	10,220–240 V, 50 Hz	
		G	30,380–415 V, 50 Hz	
		N	30,380–415 V, 50/60 Hz	
8	Mode	H	Heat Pump	
		R	Heat Recovery	

Specifications

DVM S Eco Heat Pump

- Heating, cooling, charge and heat extraction by means of one (4-5 hp) or two (8-14 hp) Twin BLDC compressors.
- Each module houses one compressor: Twin BLDC Rotatory (4-8 hp).
- Compressor micro frequency control with 0.01 Hz step.
- High Start Modulation.
- Eurovent certified and EIP (Ecodesign) compliant.
- Four-way direction piping connection.



Model Name	AM040XMD/EU	AM080XMD/EU	AM120XMD/EU
Power Supply	Ø 4~50 Hz 400, 2, 220-240 V, 50 Hz	Ø 4~50 Hz 400, 2, 220-240 V, 50 Hz	Ø 4~50 Hz 380, 4, 380-415 V, 50 Hz
Performance	hp Coating Heating kW	4 123 14.0 23.4	5 123 14.0 23.4
Capacity	Coating Heating kW	123 123 14.0	123 123 14.0
Maximum number of connectable indoor units	ex Max. kW	4.0 5.6 7.0	8.0 11.2 13.0
Total capacity of the connected indoor units	Max. kW	15.7	18.2 29.1
Power	Power Input Coating Heating kW	3.40 4.00 4.90	3.40 4.00 4.90
Current Input	Coating Heating A	2.90 3.40 3.80	2.90 3.40 3.80
Current	Max. in MS-raise MVA MCs MFs	19.50 16.50	19.50 16.50
Energy Efficiency	I _{EER} Cooling W/W	3.36	3.50 3.25
	Heating W/W	4.17	4.12 3.86
	I _{COP} W/W	7.25	6.71 7.48
Compressor	Type —	Twin BLDC Rotatory	Twin BLDC Rotatory
Oil	Oil Type Initial Charge cc	412 1,700	412 1,700
Fan	Type & Discharge direction —	Propeller Horizontal	Propeller Horizontal
	Number of Fans —	1 1	2 2
Airflow Rate	m ³ /min 1/5	64 1067	70 1167
External Static Pressure	Max. mmH2O	3.00	3.00 3.00
Fan Motor	Motor —	BLDC Motor	BLDC Motor
Piping Connections	Outer Pipe a, mm a, inch	125 x 1 9.52	139 x 1 9.52
	Gas Pipe a, mm a, inch	1067 15.88	1167 19.05
	Piping length (D1-D2) Max. [m] [in.]	50 (65)	50 (65) 100 (130)
	Piping length (D1-D2) Max. [m]	40	40
	Total piping length (System) Max. [m]	150	150
	Level Difference (Outer in highest position) Max. [m]	30	30
	Level Difference (Inner in highest position) Max. [m]	25	25
	Level Difference (D1-D2) Max. [m]	15	15
Wiring Connection	Communication Max. [m] Remark	0.75	0.75 0.75 F1, F2
Refrigerant	Type —	R410A	R410A
Sensor	Factory Charging Sound Pressure Cooling Heating dB(A)	2.00/4.18	2.50/5.22 5.2 55 59
	Sound Power dB(A)	54	57 59
External Dimensions	Net Weight kg	79.0	83.5 115.0
	Net Dimensions (W x H x D) mm	940 x 996 x 330	940 x 996 x 330 940 x 1420 x 330
Operating Temperature Range	Cooling Heating °C	-5.0-48.0	-5.0-48.0 -20.0-24.0

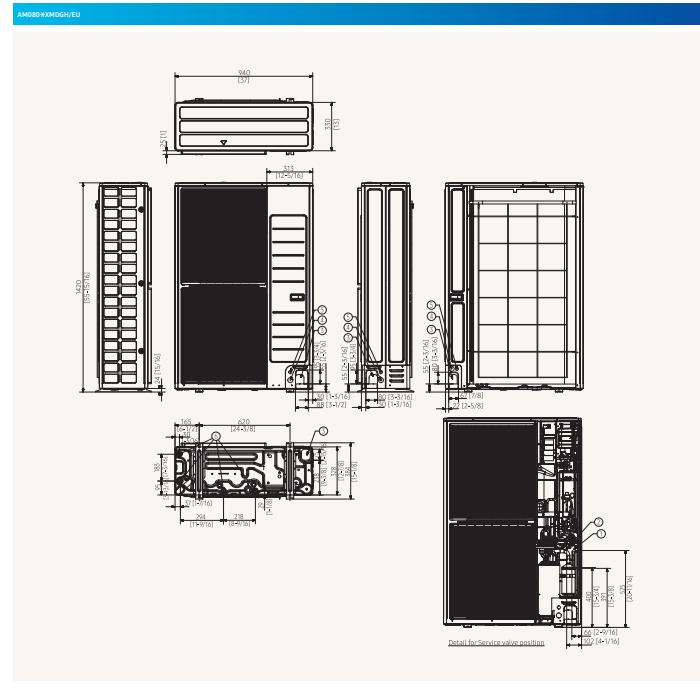
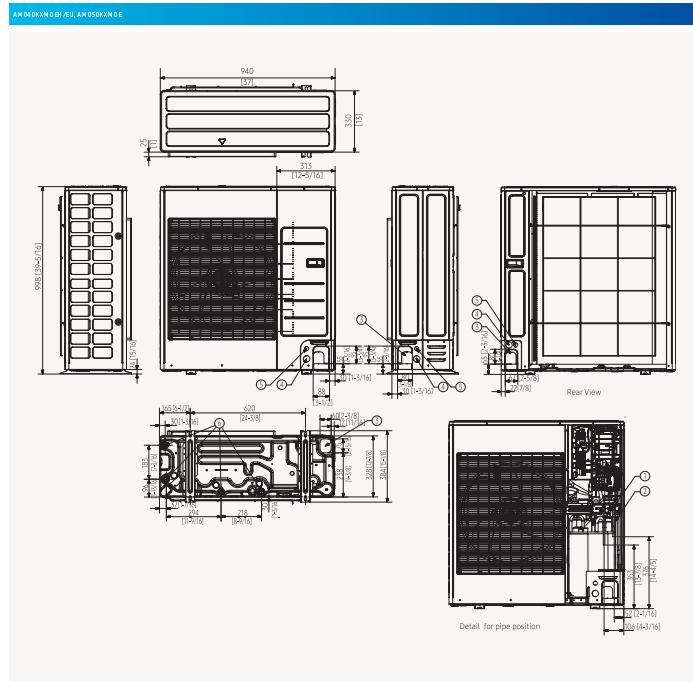
AM080XMD/EU	AM100XMD/EU	AM120XMD/EU	AM140XMD/EU
38, 4, 380-415 V, 50 Hz			
8	10	12	14
22.4	28.0	33.5	40.0
26.0	31.5	37.5	46.0
13.0	18.0	21.0	26.0
11.2	14.0	16.8	20.0
29.1	34.4	41.6	52.0
5.2	7.29	8.77	10.59
4.88	6.74	7.81	9.88
9.66	11.51	13.34	16.48
8.24	10.58	12.23	15.55
3.4	4.6	5.1	5.9
18.0	21.5	23.5	32.0
25	30	30	40
392	3.94	3.82	3.76
5.12	4.67	4.79	4.55
9.22	7.09	6.94	6.83
Inverter Scroll	Inverter Scroll	Inverter Scroll	Inverter Scroll
4.96 x 1	5.10 x 1	6.39 x 1	6.76 x 1
PVE	PVE	PVE	PVE
2,800	2,300	2,300	2,300
Propeller	Propeller	Propeller	Propeller
Horizontal	Horizontal	Horizontal	Horizontal
2	2	2	2
135	165	168	180
2250	2750	2768.67	3000
3.00	3.00	3.00	3.00
29.40	29.40	29.40	29.40
BLDC Motor	BLDC Motor	BLDC Motor	BLDC Motor
139 x 2	244 x 2	244 x 2	244 x 2
9.52	9.52	12.7	12.7
3/8	3/8	1/2	1/2
19.05	22.22	28.58	28.58
5/4	7/8	11/8	11/8
100 (130)	160 (185)	160 (185)	160 (185)
40	40	40	40
300	300	300	300
50	50	50	50
30	40	40	40
50	50	50	50
0.75	0.75	0.75	0.75
F1, F2	F1, F2	F1, F2	F1, F2
145.0	145.0	155.0	162.0
135.0	145.0	155.0	162.0
3.70/7.75	3.70/7.75	4.30/8.98	4.80/10.02
56	58	59	62
58	60	61	64
74	74	76	79
135.0	145.0	155.0	162.0
940 x 1420 x 330	940 x 1420 x 460	940 x 1420 x 460	940 x 1420 x 460
940 x 996 x 330	940 x 1420 x 460	940 x 1420 x 460	940 x 1420 x 460
-5.0-48.0	-5.0-48.0	-5.0-52.0	-5.0-52.0
-20.0-24.0	-20.0-24.0	-20.0-24.0	-20.0-24.0

Performances are based on the following test condition:

- Cooling: Indoor temperature: 27 °C DB, 19 °C WB,
- Outdoor temperature: 35 °C DB, 24 °C WB,
- Height difference between indoor and outdoor: 10 m, 15 °C WB,
- Equivalent refrigerant piping: 7.5 m,
- Level differences: 0 m
- Sound pressure level: measured in an anechoic room.
- Sound pressure level is a relative value depending on the distance and acoustic environment.
- Sound pressure level may differ according to operating conditions. Sound power level is an absolute value that a sound source generates.

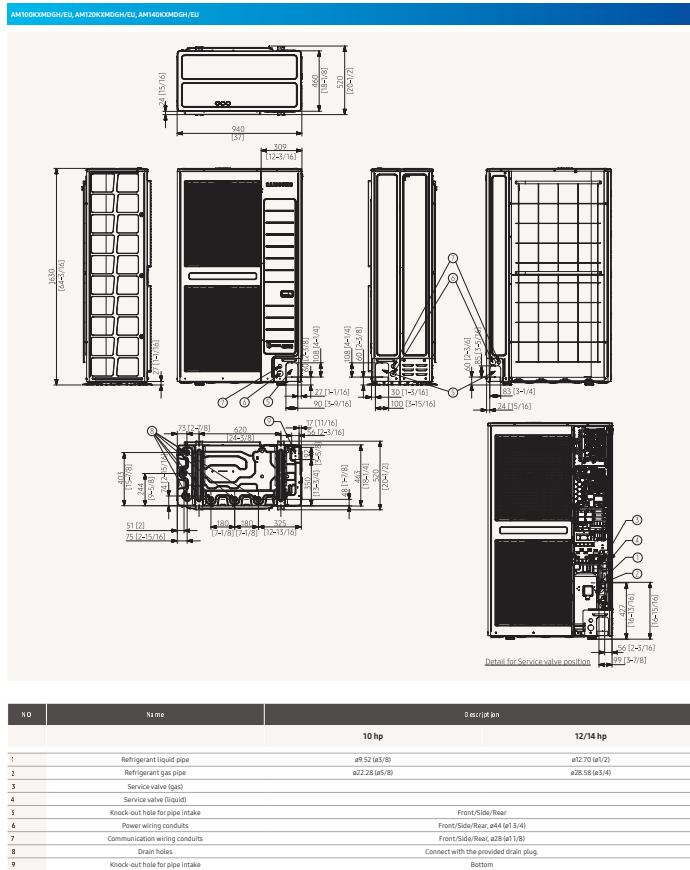
Dimensional drawings

DVM S Eco Heat Pump



Dimensional drawings

DVM S Eco Heat Pump



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Specifications

DVM S Essential Heat Pump (2-Pipe)

- Intelligent charge and refrigerant by means of one (4-5 hp) or two (8-12 hp) scroll compressors (inverter fans).
- Each module houses one Inverter Scroll compressor.
- Night Silent Mode available.
- Pump Down function (leak detection).
- "Intelligent scroll" (air-resistant factor added) technology to prevent defrosting.
- Eurovent certified and EiP (Ecodesign) compliant.
- Continuous operation in heating even during oil recovery cycle.



Model Name	A M 80 MX VGD/H/ET	A M 120 MX VGD/H/ET	A M 40 MX VGD/H/ET
Power Supply	Ø 4~ V, Hz	380, 4, 380-415 V, 50 Hz	380, 4, 380-415 V, 50 Hz
Performance	hp	hp	hp
Cooling	Cooling (Rated)	28.0	33.6
Heating	Heating (Rated)	28.0	33.6
Heating (Max)	Heating (Max)	31.5	37.8
Max. number of connectable indoor units	ex	18	21
Total capacity of the annexed indoor units	Mph. kW	14.0	16.8
	Mph. kW	36.4	43.7
Power	power input		
	Cooling (Rated)	718	936
	Heating (Rated)	6.67	8.20
	Heating (Max)	799	982
Curent	Cooling (Rated)	A	11.50
	Heating (Rated)		10.70
	Heating (Max)		15.80
Current	Minimum MSC value	MVA	4.5
	MCA	A	213
	MFA		32
Energy efficiency	EER	Cooling (Rated)	W/W
	Heating (Rated)	W/W	3.90
	ESER	W/W	4.20
Compressor	Type	-	Inverter Scroll x1
Output	kWh/h	6.39 x1	6.39 x1
Oil	Type	-	PVE
Initial Charge	cc/m	1,100 x1	1,100 x1
Fan	Type	-	Propeller
	Discharge direction		Vertical
	Number of Fans	-	2
Airflow Rate	m³/min	170	220
	l/s	2.835	3.647
External Static Pressure	Max.	mmH2O	8.00
	Pa		78.45
Pump Motor	Type	-	BLDC Motor
Output	W/m	830 x1	830 x1
Piping Connections	Lat. pipe	A, mm	9.52
	A, inch	3/8	1/2
	Gas pipe	A, mm	22.22
	A, inch	7/8	11/8
	Piping length (D0-D1)	Max., (Excl.)	200 [220]
	Max.,	m	90
	Piping length (Branch-D1)	Max.,	90
	Total piping length (System)	Max.,	1,000
	Level difference (D1) in heating position	Max.,	110
	Level difference (D1) in higher position	Max.,	110
	Level difference (D1-D2)	Max.,	50
Wiring connections	Trans. span cable	MS, mm²	0.75
	Remarks		0.75
Refrigerant	Type	-	R410A
Factory Charging	kg	5.5	6.5
Sound ^a	Sound Pressure	tB(A)	11.48
	Cooling		13.57
	Heating		16.08
	Sound Power		62
	Cooling		61
	Heating		63
External Dimensions	Net Weight	kg	197.0
	Net Dimensions (W + H + D)	mm	880 x 1,695 x 765
Operating	Cooling	°C	-5-48
	Heating	°C	-25-24

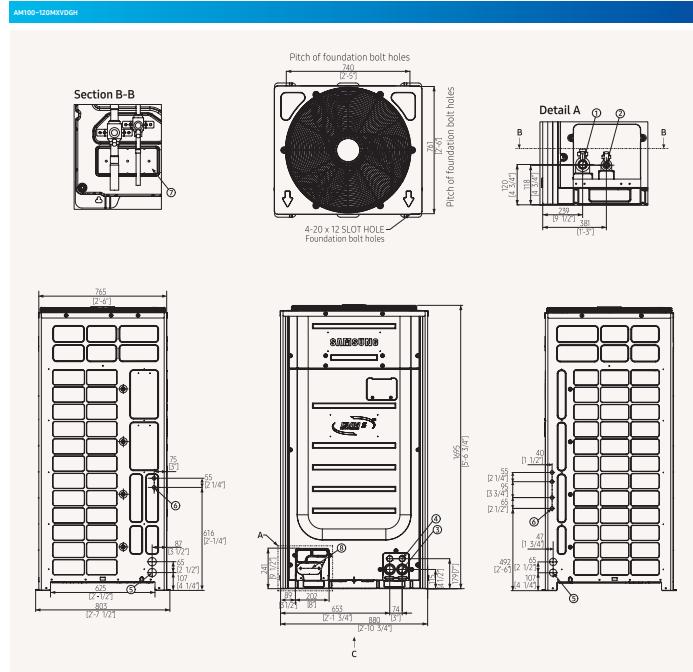
AM 40M XVD GH/ET	AM 80M XVD GH/ET
38, 4, 380-415 V, 50 Hz	38, 4, 380-415 V, 50 Hz
16	18
45.0	50.4
45.0	50.4
50.4	56.7
29	32
22.5	25.2
58.5	65.5
13.80	16.00
11.28	13.16
13.51	15.77
22.10	25.70
18.10	21.10
21.00	25.30
7.2	8.8
32.0	39.2
40	50
5.26	3.15
3.99	3.83
6.39	5.91
Inverter Scroll x1	Inverter Scroll x1
7.81 x1	7.81 x1
PVE	PVE
1,400 x1	1,400 x1
Propeller	Propeller
Vertical	Vertical
2	2
255	290
4,250	4,833
8.00	8.00
78.45	78.45
BLDC Motor	BLDC Motor
420 x 2	420 x 2
12.70	15.88
1/2	5/8
28.58	28.58
11/8	11/8
200 [220]	200 [220]
90	90
1,000	1,000
110	110
110	110
50	50
0.75	0.75
F1, F2	F1, F2
R410A	R410A
8.4	8.4
17.54	17.54
65	64
67	67
85	84
253.0	255.0
1,295 x 1,695 x 765	1,295 x 1,695 x 765
5-48	5-48
-25-24	-25-24

Performance based on the following test conditions:

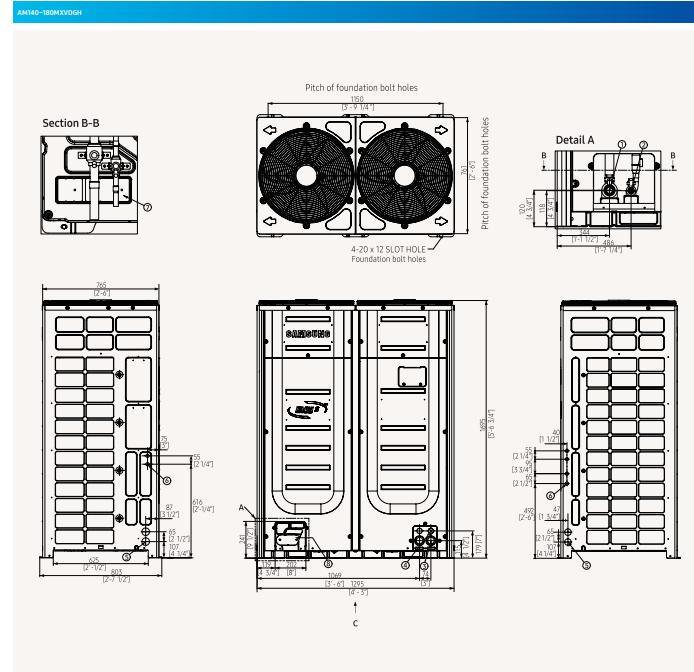
- Cooling: Indoor temperature: 27 °C DB, 19 °C WB,
- Outdoor temperature: 35 °C DB, 24 °C WB,
- Heating: Indoor temperature: 18 °C DB, 15 °C WB,
- Equivalent refrigerant piping: 7.5 m,
- Level differences: 0 m
- Sound pressure level: It is a relative value depending on the distance and acoustic environment; sound pressure level may differ according to operating conditions; sound power level is an absolute value that is a sound source generated.

Dimensional drawings

DVM S Essential Heat Pump (2-Pipe)



No	Name	Description
1	Gas Ref. pipe	See note 4
2	Liquid Ref. pipe	See note 4
3	Power-wiring conduits	a64
4	Communication wiring conduits	a54
5	Power-wiring conduits	a64
6	Communication wiring conduits	a52
7	Knock-out hole for Ref. piping (bottom)	
8	Knock-out hole for Ref. piping (front)	



No	Name	Description
1	Gas Ref. pipe	See note 4
2	Liquid Ref. pipe	See note 4
3	Power-wiring conduits	a64
4	Communication wiring conduits	a54
5	Power-wiring conduits	a64
6	Communication wiring conduits	a52
7	Knock-out hole for Ref. piping (bottom)	
8	Knock-out hole for Ref. piping (front)	

Specifications

DVM S Standard Heat Pump (2-Pipe)

- Vertical design and silent operation by means of one (8-18 hp) or two (20-26 hp) premium BLDC Inverter fans.
- Each module houses one (8-18 hp) or two (20-26 hp) Inverter Scroll compressors with Flash Injection technology.
- Night Silent Mode available.
- Pump Defrost (ice detection).
- Independent defrost (anti-resonant factor added) technology to minimise defrost operation.
- Eurovent certified and E.P.I (Ecodesign) compliant.
- Continuous operation in heating even during oil recovery cycle.



Module Name	AM08DXVAGH/ET	AM10DXVAGH/ET	AM12DXVAGH/ET		
Power Supply	Φ, φ, V, Hz	30, 4, 380-415 V, 50 Hz	30, 4, 380-415 V, 50 Hz	30, 4, 380-415 V, 50 Hz	
Performance	hp	hp	8	10	12
Cooling	kW	22.4	28.0	33.6	
Heating	kW	22.4	28.0	33.6	
Max/min number of compressible inlets/outlets	4/4	14	16	21	
Toxicity of the annexed refrigerants	M1+	11.2	14.0	16.8	
M2+	kW	29.1	36.4	43.7	
Power Input	Cooling	kW	5.0	6.9	8.2
Heating	kW	4.5	5.9	7.1	
Current Input	Cooling	A	8.00	11.00	13.10
Heating	A	7.30	9.50	11.40	
Current	MCB	A	18.0	21.1	25.0
MFB	A	25.0	32.0	32.0	
Energy Efficiency	EER	Cooling W/W	4.48	4.09	4.12
COP	Heating W/W	4.94	4.74	4.71	
compressor	Output	kW x h	4.39 x 1	6.39 x 1	6.39 x 1
Oil	Type	-	PVE	PVE	PVE
Initial Charge	kg	900	1,100	1,100	1,100
Fan	Type	-	Propeller	Propeller	Propeller
Drive (rotation)	-	-	Vertical	Vertical	Vertical
Number of Fans	-	-	1	1	1
Airflow Rate	m³/min	170	170	220	
-	l/s	2,833.5	2,833.5	3,666.7	
External Static Pressure	Max.	mmHg	8.00	8.00	8.00
	Pa	78.50	78.50	78.50	
Fan Motor	Type	-	BLDC Motor	BLDC Motor	BLDC Motor
Output	W x n	850 x 1	850 x 1	850 x 1	
Piping Connections	Line 1 Pipe	A, mm	9.52	9.52	12.70
	A, inch	3/8	3/8	1/2	
Gas Pipe	A, mm	19.05	22.22	28.58	
	A, inch	3/4	7/8	11/8	
	Piping length (O.D.1/O.D.2)	Max./Extr. I	m	200 [220]	200 [220]
	Piping length (I.O.D.1/I.O.D.2)	Max.	m	90	90
	Total piping length (O.D.1)	Max.	m	1,000	1,000
	Level (Preface O.D.1) in height position	Max.	m	110	110
	Level (Preface O.D.1) in height position	Max.	m	110	110
	Level (Preface O.D.1) in height position	Max.	m	50	50
Wiring Connection	Transistor/Cable	mm²	0.75	0.75	0.75
Remark	-	F1, F2	F1, F2	F1, F2	F1, F2
Refrigerant	Type	-	R410A	R410A	R410A
Factory Charging	kg	5.5	5.5	6.5	
	tC0,6	11.5	11.5	13.6	
Sound ¹	Sound Pressure	dB(A)	57	58	62
	Cooling	dB(A)	59	60	64
	Heating	dB(A)	77	79	81
External Dimensions	Net Weight	kg	186.0	197.0	210.0
	Net Dimensions (W x H x D)	mm	878 x 1,695 x 765	878 x 1,695 x 765	878 x 1,695 x 765
Operating Temperature Range	Cooling	°C	-5-48	-5-48	-5-48
	Heating	°C	-25-24	-25-24	-25-24

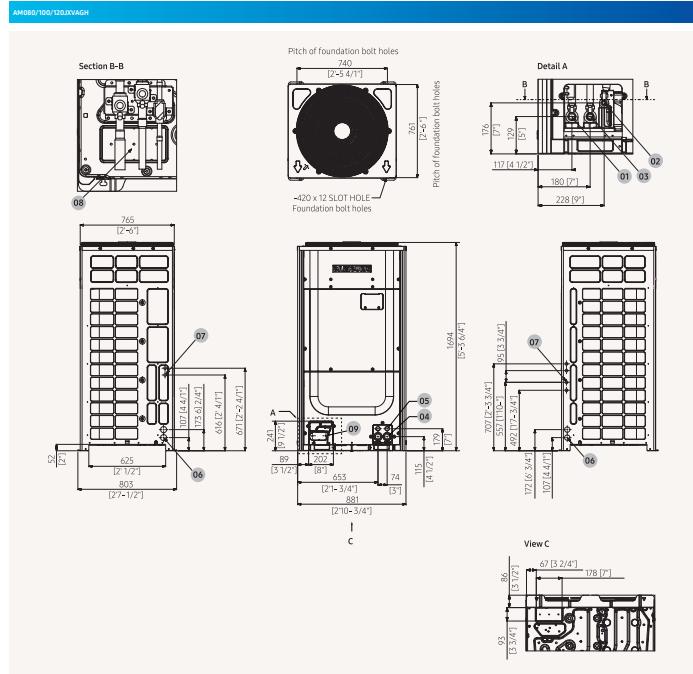
AM14DXVAGH/ET	AM16DXVAGH/ET	AM18DXVAGH/ET	AM20DXVAGH/ET	AM22DXVAGH/ET	AM24DXVAGH/ET	AM26DXVAGH/ET
30, 4, 380-415 V, 50 Hz						
14	16	18	20	22	24	26
40.0	45.0	50.4	56.0	61.6	67.2	72.8
40.0	45.0	50.4	56.0	61.6	67.2	72.8
28	29	31	36	40	43	47
20.0	21.5	21.2	26.0	30.8	33.6	36.4
6.0	5.5	6.5	7.8	8.0	9.4	10.5
10.9	11.6	12.2	14.5	16.2	21.0	22.5
9.0	10.1	10.8	12.2	12.9	14.9	16.5
17.50	18.70	21.90	26.00	29.70	33.70	36.00
14.50	16.20	17.30	19.50	20.70	23.90	26.50
25.0	32.0	39.2	42.0	44.6	55.0	60.0
32.0	40.0	50.0	63.0	63.0	75.0	75.0
3.66	3.87	3.70	3.45	3.32	3.20	3.20
4.43	4.46	4.68	4.60	4.50	4.40	4.40
6.39 x 1	7.81 x 1	7.81 x 1	5.18 x 2	6.39 x 2	6.39 x 2	6.39 x 2
PVE						
1,400	1,400	1,400	1,000 x 2	1,000 x 2	1,000 x 2	1,000 x 2
Propeller						
Vertical						
1	1	1	1	1	1	1
255	255	290	290	340	340	340
4,250.0	4,250.0	4,833.5	4,833.5	5,666.7	5,666.7	5,666.7
8.00	8.00	8.00	8.00	8.00	8.00	8.00
75.50	75.50	78.50	78.50	78.50	78.50	78.50
620 x 2						
12.70	12.70	15.88	15.88	15.88	15.88	19.05
1/2	1/2	5/8	5/8	5/8	5/8	3/4
28.58	28.58	28.58	28.58	28.58	34.92	34.92
11.8	11.8	11.8	11.8	11.8	13.8	13.8
200 [220]	200 [220]	200 [220]	200 [220]	200 [220]	200 [220]	200 [220]
90	90	90	90	90	90	90
1,000	1,000	1,000	1,000	1,000	1,000	1,000
110	110	110	110	110	110	110
110	110	110	110	110	110	110
50	50	50	50	50	50	50
0.75	0.75	0.75	0.75	0.75	0.75	0.75
F1, F2						
R410A						
77	8.4	8.4	8.4	8.4	14.0	14.0
16.1	17.5	17.5	17.5	17.5	29.2	29.2
61	63	64	65	65	66	66
63	67	67	67	67	69	69
81	83	84	87	89	89	89
226.0	233.0	235.0	235.0	282.0	290.0	350.0
1,291 x 1,695 x 765						
-5-48	-5-48	-5-48	-5-48	-5-48	-5-48	-5-48
-25-24	-25-24	-25-24	-25-24	-25-24	-25-24	-25-24

¹ performances are based on the following test condition:
 - Cooling: Indoor temperature: 27 °C DB, 19 °C WB, Outdoor temperature: 35 °C DB, 24 °C WB
 - Heating: Indoor temperature: 27 °C DB, 15 °C WB, Outdoor temperature: 7 °C DB, 6 °C WB
 - Equivalent refrigerant piping: 7.5 m, Level differences: 0 m

250 and pressure level is obtained in an anechoic room. Sound pressure level is a relative value. Sound pressure level, sound intensity and acoustic environment, sound pressure level may differ according to operating conditions. Sound power level is an absolute value at a sound source reference.

Dimensional drawings

DVM S Standard Heat Pump (2-Pipe)



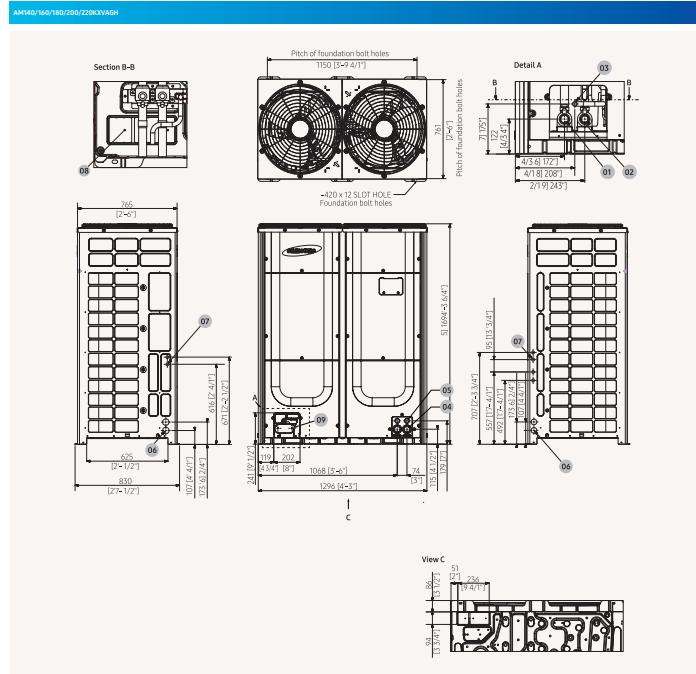
No	Name	Description
1	Low Pressure Gas Ref. pipe	See note 4
2	High Pressure Gas Ref. pipe	See note 4
3	Liquid Ref. pipe	a04
4	Power wiring conduits	a04
5	Communication wiring conduits	a04
6	Power wiring conduits	a02
7	Communication wiring conduits	
8	Knock-out hole for Ref. piping (bottom)	
9	Knock-out hole for Ref. piping (front)	

1. Detail A and SECTION B-B indicate the dimensions after fixing the attached piping.

2. Item 4-9: Knock-out hole.

3. View C indicates the dimensions of the knock-out hole (bottom).

4. Pipe [a, mm (inch)]: Braze connection.



No	Name	Description
1	Low Pressure Gas Ref. pipe	See note 4
2	High Pressure Gas Ref. pipe	See note 4
3	Liquid Ref. pipe	a04
4	Power wiring conduits	a04
5	Communication wiring conduits	a04
6	Power wiring conduits	a02
7	Communication wiring conduits	
8	Knock-out hole for Ref. piping (bottom)	
9	Knock-out hole for Ref. piping (front)	

1. Detail A and SECTION B-B indicate the dimensions after fixing the attached piping.

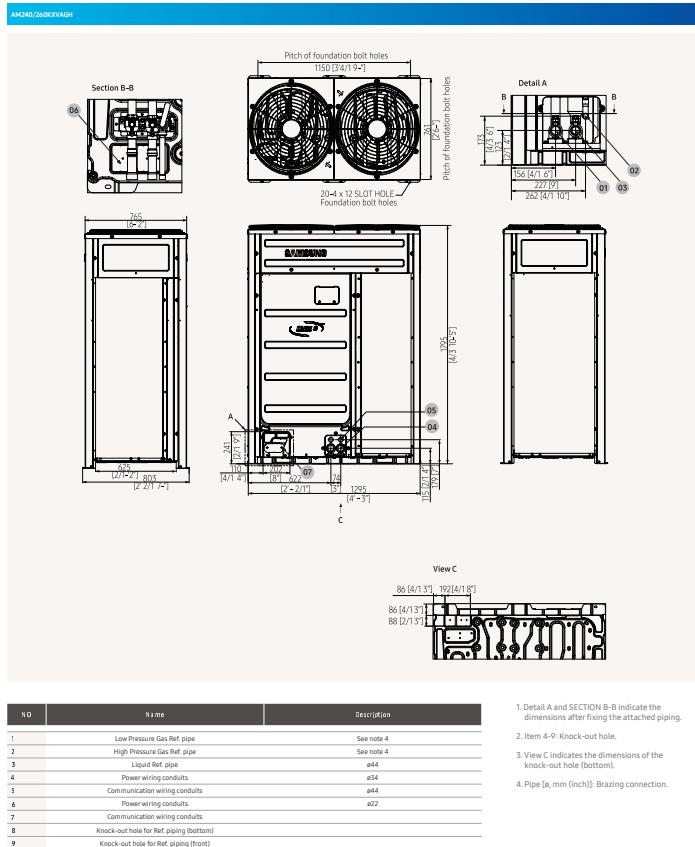
2. Item 4-9: Knock-out hole.

3. View C indicates the dimensions of the knock-out hole (bottom).

4. Pipe [a, mm (inch)]: Braze connection.

Dimensional drawings

DVM S Standard Heat Pump (2-Pipe)



Specifications

DVM S High EER Heat Pump (2-Pipe)

- Ventilation and silent operation by means of one (8–18 hp) or two (20–26 hp) Inverter Scroll compressors.
- Each module houses one (8–18 hp) or two (20–26 hp) Inverter Scroll compressors with Flash Injection technology.
- Europart certified and E/EP (Ecodesign) compliant.
- Continuous operation in heating even during oil recovery cycle.
- Night Silent Mode available.
- Pump Defrost (ice detection).
- Intelligent defrost (an frost factor added) technology to minimise defrost operation.
- Europart certified and E/EP (Ecodesign) compliant.
- Continuous operation in heating even during oil recovery cycle.



Model Name	AM100XVH/GH/ET	AM100XVHG/H/ET	AM120XVH/GH/ET
Power Supply	Ø 4~ V, Hz	30, 4, 380–415 V, 50 Hz	30, 4, 380–415 V, 50 Hz
Performance	hp	hp	hp
Cooling	8	10	12
Heating	22.4	28.0	33.6
Max. number of connectable indoor units	es	14	18
Total capacity of the connected indoor units	kW	22.4	28.0
Mins. / Max. M/S/C ratio	M/s	11.2	14.0
Max. M/S/C ratio	kW	29.1	36.4
Power	Power Input	kW	4.59
Cooling	6.22	7.57	
Heating	4.08	6.72	
Current Input	cooling	A	7.40
Cooling	10.00	12.10	
Heating	6.50	8.40	10.80
Current	Mains input MVA	MVA	3.1
MCA	A	18.0	21.1
MFA	2.5	3.2	3.2
Energy Efficiency	EER	W/W	4.88
COP	W/W	5.49	5.35
compressor	Output	kW x n	5.18 x 1
Oil	Type	PVE	PVE
Instl. Charge	cc x n	1300 x 1	1300 x 1
Fan	Type	-	Propeller
Discharge direction	-	Propeller	Propeller
Number of Fans	-	Top	Top
Airflow Rate	m³/min	170	170
External Static Pressure	Pa	2,813	2,833
External Static Pressure	mmH2O	6.37 x 1	6.39 x 1
External Static Pressure	Pa	3,667	3,667
Fan Motor	Type	-	BLDC Motor
Output	W x n	850 x 1	850 x 1
Piping Connections	Unit pipe	A, mm	9.52
	A, inch	9/16	9/16
Gas Pipe	A, mm	10/05	22.22
	A, inch	3/4	7/8
Piping length (D-U-D-U)	Max./Gesamt	m	200 [220]
Piping length (D-U-Branch -D-U)	Max.	m	90
Total piping length system	Max.	m	1,000
Level Difference (D-U) in highest position	Max.	m	110
Level Difference (D-U) in highest position	Max.	m	110
Level Difference (D-U-D-U)	Max.	m	50
Wiring connections	Transistorable	mm²	0.75
Remark	-	F1, F2	F1, F2
Refrigerant	Type	R410A	R410A
	Recovery charging	kg	6.5
Sound	Sound pressure	dB(A)	13.57
Cooling	57	58	62
Heating	59	60	64
Sound Power	dB(A)	77	79
Net Weight	kg	195.5	195.5
External Dimensions	Net Dimensions (W x H x D)	mm	880 x 1,695 x 765
Operating Temperature Range	Cooling	°C	-5–48
	Heating	°C	-25–24

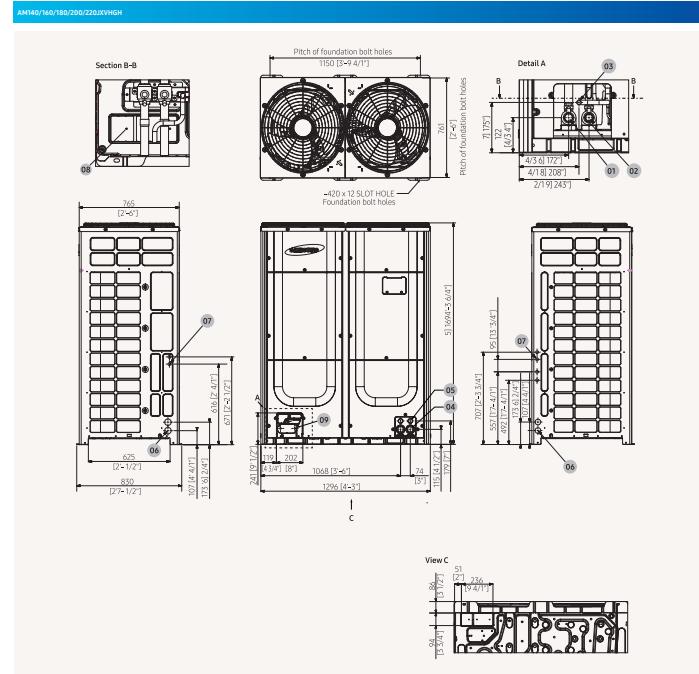
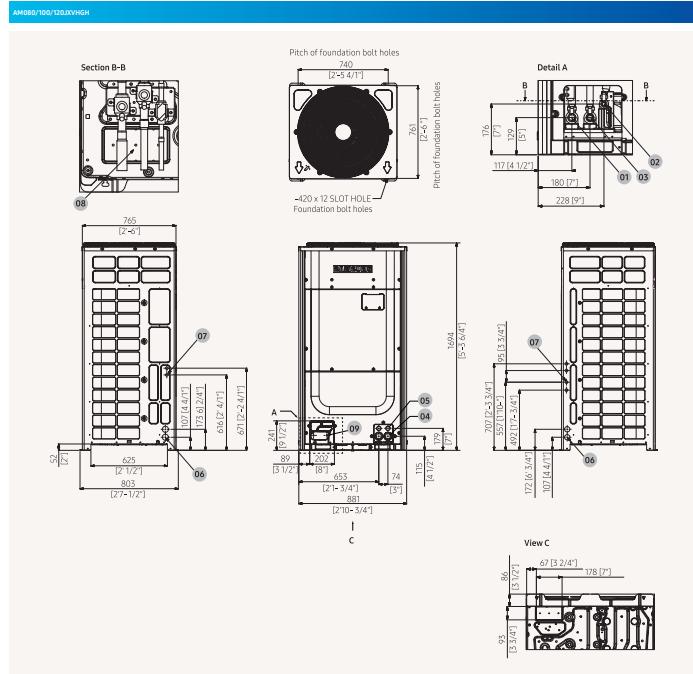
AM100XVH/GH/ET	AM100XVHG/H/ET	AM120XVH/GH/ET	AM120XVHG/H/ET	AH200XVH/GH/ET	AH200XVG/H/ET	AH240XVH/GH/ET
30, 4, 380–415 V, 50 Hz						
14	16	18	20	22	24	26
40.0	45.0	50.4	56.0	61.6	67.2	72.8
40.0	45.0	50.4	56.0	61.6	67.2	72.8
26	29	32	36	40	43	47
52.0	58.5	65.5	72.8	80.1	87.4	94.6
8.89	10.92	12.32	15.83	15.88	18.61	20.92
8.55	8.95	10.02	11.22	12.91	13.20	15.17
14.30	17.50	19.80	22.20	25.50	29.80	33.40
13.70	14.40	16.10	18.00	20.70	21.20	24.30
5.3	6.6	7.6	8.0	8.6	12.5	12.2
25.0	32.0	39.2	42.0	44.6	55.0	60
32	40	50	63	63	75	75
4.50	4.72	4.91	4.93	5.88	5.81	5.48
4.48	5.03	4.99	4.77	5.09	4.90	4.90
4.39 x 1	4.39 x 2	4.39 x 2	4.39 x 2	4.39 x 2	4.76 x 2	5.81 x 2
PVE						
1300 x 1	900 x 2	1300 x 2	1300 x 2	1300 x 2	1300 x 2	1400 x 2
Propeller						
Top						
2	2	2	2	2	2	2
255	295	290	290	340	340	340
4,250	4,250	4,833	4,833	5,667	5,667	5,667
8.00	8.00	8.00	8.00	8.00	8.00	8.00
78.45	78.45	78.45	78.45	78.45	78.45	78.45
BLDC Motor						
620 x 2						
12.70	15.88	15.88	15.88	15.88	15.88	19.95
12	12	15	15	15	15	15
28.58	28.58	28.58	28.58	28.58	28.58	28.58
11/8	11/8	11/8	11/8	11/8	11/8	11/8
200 [220]	200 [220]	200 [220]	200 [220]	200 [220]	200 [220]	200 [220]
90	90	90	90	90	90	90
1,000	1,000	1,000	1,000	1,000	1,000	1,000
110	110	110	110	110	110	110
110	110	110	110	110	110	110
50	50	50	50	50	50	50
0.75	0.75	0.75	0.75	0.75	0.75	0.75
F1, F2						
R410A						
9.4	9.4	8.4	11.0	11.0	14.0	14.0
19.63	19.63	17.54	22.97	22.97	29.23	29.23
57	58	62	64	64	69	69
65	66	67	67	71	71	71
81	82	85	86	90	90	90
253.0	264.0	291.0	308.0	308.0	342.0	350.0
1,295 x 1,695 x 765						
-5/-48	-5/-48	-5/-48	-5/-48	-5/-48	-5/-48	-5/-48
-25/-24	-25/-24	-25/-24	-25/-24	-25/-24	-25/-24	-25/-24

Performance are based on the following conditions:
 - Cooling: Indoor temperature: 27 °C DB, 19 °C WB, Outdoor temperature: 35 °C DB, 24 °C WB
 - Heating: Indoor temperature: 20 °C DB, 19 °C WB, Outdoor temperature: 7 °C DB, 6 °C WB
 - Equivalent refrigerant piping: 7.5 m, Level differences: 0 m

25m and pressure level is obtained in an anechoic room. Sound pressure level is a relative value dependent on distance and acoustic environment. Sound pressure level may differ according to operating conditions. Sound power level is an absolute value that a sound source generates.

Dimensional drawings

DVM S High EER Heat Pump (2-Pipe)

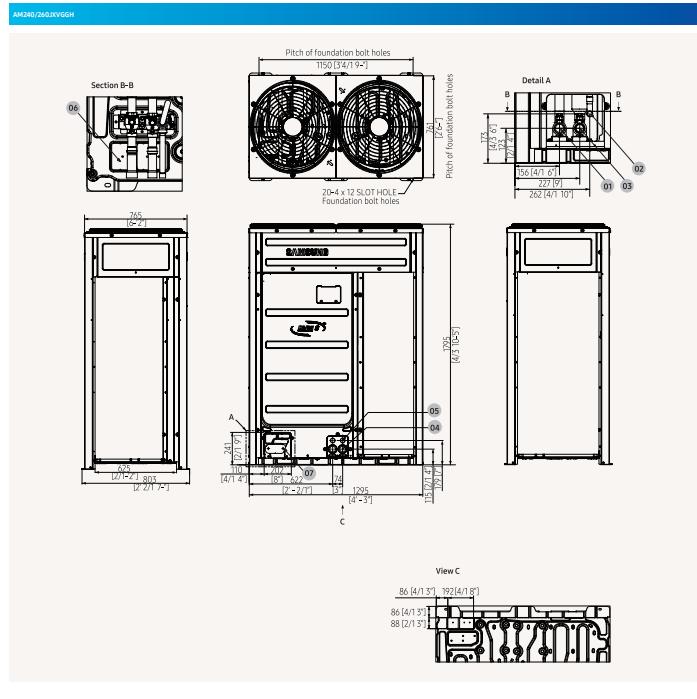


No	Name	Description
1	Refrigerant gas pipe	See note 4
2	Refrigerant liquid pipe	See note 4
3	Power wiring conduits	a04
4	Communication wiring conduits	a04
5	Power wiring conduits	a04
6	Communication wiring conduits	a02
7	Knock-out hole for Ref. piping (bottom)	
8	Knock-out hole for Ref. piping (front)	

No	Name	Description
1	Refrigerant gas pipe	See note 4
2	Refrigerant liquid pipe	See note 4
3	Power wiring conduits	a04
4	Communication wiring conduits	a04
5	Power wiring conduits	a04
6	Communication wiring conduits	a02
7	Knock-out hole for Ref. piping (bottom)	
8	Knock-out hole for Ref. piping (front)	

Dimensional drawings

DVM S High EER Heat Pump (2-Pipe)



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Specifications

DVM S Eco Heat Recovery (With Heat Recovery Changer Kit)

- Horizontal discharge and rear suction by means of two propeller BLDC Inverter fans.
- Each module houses one Twin BLDC Rotatory compressor.
- Night Silent Mode available.
- Eurovent certified and E.I.P (Ecodesign) compliant.
- Four-way direction piping connection.



Model Code	A H040 NX MO ER/EU	A M01 NX MO ER/EU	A M060 NX MO ER/EU		
Power Supply					
Performance	Φ, V, Hz	10, 220-240 V, 50 Hz	10, 220-240 V, 50 Hz	10, 220-240 V, 50 Hz	
Cooling	hp	4	5	6	
Heating	kW	12.1	14.0	15.5	
Power					
Power Input (Nominal)	Cooling	kW	2.69	3.41	4.13
	Heating		2.58	3.11	3.65
Current Input (Nominal)	Cooling	A	4.1	5.2	6.3
	Heating		3.8	4.5	5.3
Current	Max	A	22.0	24.0	30.0
	Min	mA	25	30	40
Energy Efficiency					
EER (Nominal Cooling)	-	4.50	4.11	3.75	
COP (Nominal Heating)	-	4.69	4.50	4.25	
SEER	-	10.50	10.10	9.50	
Compressor					
Type	-	Twin BLDC Rotary	Twin BLDC Rotary	Twin BLDC Rotary	
Output	kW	4.04	4.04	4.04	
Oil	Type	-	PVE	PVE	PVE
	Initial charge	cc	1,700	1,700	1,700
Fan					
Type	-	Propeller/BLDC	Propeller/BLDC	Propeller/BLDC	
Discharge direction	-	Horizontal	Horizontal	Horizontal	
Max. Output	kW x n	125.0 x 2	125.0 x 2	125.0 x 2	
Airflow Rate	(m³/M.s)	100	100	100	
	(kg/M.s)	1/3	1,666.7	1,666.7	1,666.7
External Static Pressure	(mPa/Stat.MPa)	1	1	1	
Piping Connections					
Liquid Pipe	a, mm	9.52	9.52	9.52	
	a, inch	3/8	3/8	3/8	
Gas Pipe	a, mm	15.88	15.88	19.05	
	a, inch	5/8	5/8	3/4	
Discharge Gas Pipe	a, mm	15.88	15.88	15.88	
	a, inch	5/8	5/8	5/8	
Installation Max. Length	m	150	150	150	
Installation Max. Height	m	50	50	50	
Field Wiring					
Transmission cable	m	0.75-1.50	0.75-1.50	0.75-1.50	
Refrigerant					
Type	-	R410A	R410A	R410A	
Factory Charging	kg	3.2	3.2	3.3	
	kg/tCO ₂	6.7	6.7	6.9	
Sound¹					
Sound Pressure	dB(A)	52	52	53	
Sound Power	-	67	68	70	
External Dimensions					
Net Weight	kg	97.0	97.0	100.0	
Net Dimensions (W x H x D)	mm	940 x 1,210 x 330	940 x 1,210 x 330	940 x 1,210 x 330	
Operating Temperature Range					
Cooling	°C	-5.0-48.0	-5.0-48.0	-5.0-48.0	
Heating	°C	-25.0-26.0	-25.0-26.0	-25.0-26.0	

AM 040 NX MO GR/EU	AM 050 NX MO GR/EU	AM 060 NX MO GR/EU
30, 380-415 V, 50 Hz	30, 380-415 V, 50 Hz	30, 380-415 V, 50 Hz
4	5	6
12.1	14.0	15.5
2.69	3.41	4.13
2.58	3.11	3.65
4.1	5.2	6.3
3.8	4.5	5.3
10.0	12.0	12.0
16	16	16
4.50	4.11	3.75
4.69	4.50	4.25
10.50	10.10	9.50
Twin BLDC Rotary	Twin BLDC Rotary	Twin BLDC Rotary
4.04	4.04	4.04
PVE	PVE	PVE
1,700	1,700	1,700
Propeller/BLDC	Propeller/BLDC	Propeller/BLDC
Horizontal	Horizontal	Horizontal
125.0 x 2	125.0 x 2	125.0 x 2
100	100	100
1,666.7	1,666.7	1,666.7
1	1	1
9.52	9.52	9.52
3/8	3/8	3/8
19.05	19.05	19.05
3/4	3/4	3/4
15.88	15.88	15.88
5/8	5/8	5/8
150	150	150
50	50	50
0.75-1.50	0.75-1.50	0.75-1.50
R410A	R410A	R410A
3.2	3.2	3.3
6.7	6.7	6.9
52	52	53
67	68	70
95.0	95.0	98.0
940 x 1,210 x 330	940 x 1,210 x 330	940 x 1,210 x 330
-5.0-48.0	-5.0-48.0	-5.0-48.0
-25.0-26.0	-25.0-26.0	-25.0-26.0

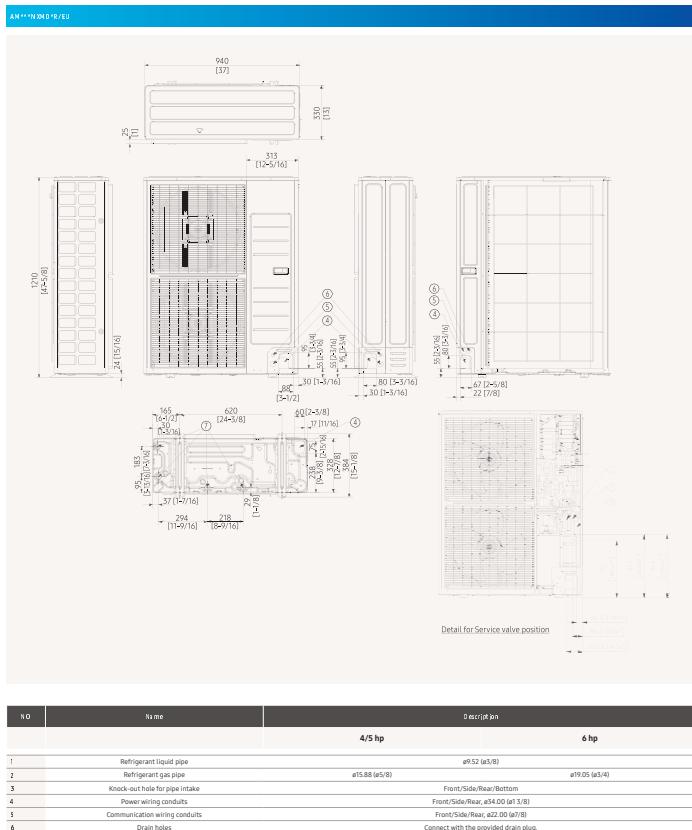
Performances are based on the following test condition:

- Cooling: Indoor temperature: 27 °C DB, 19 °C WB,
Outdoor temperature: 35 °C DB, 24 °C WB
- Heating: Indoor temperature: 20 °C DB, 15 °C WB,
Outdoor temperature: 7 °C DB, 6 °C WB
- Equivalent refrigerant piping: 7.5 m,
Level differences: 0 m

¹ Sound pressure level measured in an anechoic room.
Sound power level is a relative value depending on the distance and acoustic environment; sound pressure level may differ according to operating conditions; sound power level is an absolute value that is a sound source generated.

Dimensional drawings

DVM S Eco Heat Recovery (With Heat Recovery Changer Kit)



Specifications

DVM S High EER Heat Recovery (3-Pipe)

- Vertical design and side-tilt suction by means of one (8-14 hp) or two (14-26 hp) BLDC inverter fans.
- Each module houses one (8-14 hp) or two (16-26 hp) Inverter Scroll compressors with Flash Injection technology.
- Pump Detection (flow detection).
- Independent defrost (anti-resist factor added) technology to minimise defrost operation.
- Eurovent certified and ErP (Ecodesign) compliant.
- Night Silent Mode available.



Model Name		A100XVGR/ET	A160XVGR/ET	A210XVGR/ET	
Power S 95*	Φ, V, Hz	30, 4, 380-415 V, 50 Hz	30, 4, 380-415 V, 50 Hz	30, 4, 380-415 V, 50 Hz	
Mode		HEAT RECOVERY	HEAT RECOVERY	HEAT RECOVERY	
Performance	hp	hp	8	10	
Cooling	Cooling kW	22/42/24*	28/52/30*	33/66/46*	
	Heating kW	25/27/24*	31/52/28*	37/83/64*	
Max. number of connectable indoor units	ex. kW	14	18	21	
Total capacity of the connectable indoor units	Mph. kW	11.2	14.0	16.8	
	Mph. kW	29.1	36.4	43.7	
Power input	Cooling kW	4.9/6.4/5*	6.22/6.22*	7.57/7.57*	
	Heating kW	4.9/6.4/5*	5.89/5.23*	7.56/6.72*	
Current input	Cooling A	7.40	10.00	12.10	
	Heating A	7.40	9.40	12.10	
Current	Maximum SC, kA & N/A	3.1	4.5	5.3	
	Max. A	18.0	21.1	24.0	
	Max. A	27	32	32	
Energy Efficiency	ESR	Cooling W/W	4.88/4.88*	4.50/4.50*	
	Heating W/W	5.49/5.49*	5.35/5.35*	5.00/5.00*	
	ESER	W/W	8.00	7.43	7.23
Compressor	Output kW x n	5.18 x 1	6.39 x 1	6.39 x 1	
Model Name	-	DS-G80S7FAV*x1	DS-G80B6AV*x1	DS-G80B6AV*x1	
Oil	Type	PVE	PVE	PVE	
Fan	Initial Charge	ccm	1,100 x 1	1,100 x 1	1,100 x 1
Type	-	Propeller	Propeller	Propeller	
Discharge elevation	-	Top	Top	Top	
Number of fans	-	1	1	1	
Airflow Rate	m³/min	170	200	200	
	J/R	2,833	2,833	3,533	
External Static Pressure	Max. mmH2O	8.00	8.00	8.00	
	Pa	78.45	78.45	78.45	
Fan Motor	Type	BLDC Motor	BLDC Motor	BLDC Motor	
Output	W x n	830 x 1	830 x 1	830 x 1	
Piping Connections	Up/1st Pipe	A, mm	9.52	9.52	12.70
	A, inch	3/8	3/8	1/2	
	Gas pipe	A, mm	19.05	22.22	28.58
	A, inch	3/4	7/8	11/8	
	High Pressure Gas Pipe (R8 Only)	A, mm	15.88	19.05	19.05
	A, inch	5/8	3/4	3/4	
Piping length (D+U-D)	Max. /Ext. m	200 (220)	200 (220)	200 (220)	
Piping length (Branch -D-U)	Max. m	90	90	90	
Total piping length System	Max. m	1,000	1,000	1,000	
Level difference (D in highest position)	Max. m	110	110	110	
Level difference (D in highest position)	Max. m	110	110	110	
Level difference (D=0)	Max. m	40	40	40	
Wiring Connections	Transmission cable mm²	0.75	0.75	0.75	
Remarks	-	F1,F2	F1,F2	F1,F2	
Refrigerant	Type	-	R410A	R410A	R410A
	Factory Charging	kg	6.5	6.5	6.5
Sound ¹	Sound Pressure	Cooling dB(A)	57	58	62
	Heating dB(A)	59	60	64	
	Sound Power	dB(A)	77	79	81
External Dimensions	Net Weight kg	200.5	200.5	200.5	
	Net Dimensions (W + H + D) mm	880 x 1,695 x 765	880 x 1,695 x 765	880 x 1,695 x 765	
Operating Temperature Range	Cooling °C	-15-48	-15-48	-15-48	
	Heating °C	-25-24	-25-24	-25-24	



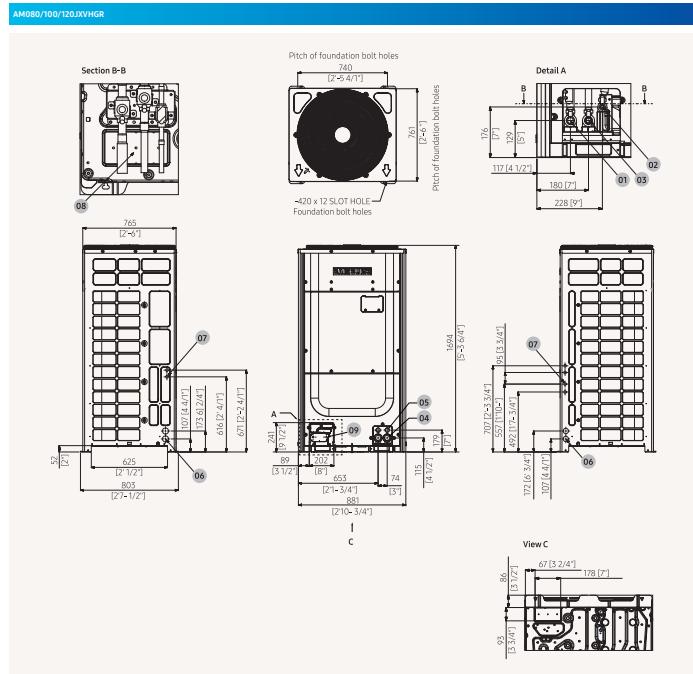
*Performance are based on the following test condition:
- Cooling: Indoor temperature: 27 °C DB, 19 °C WB, Outdoor temperature: 35 °C DB, 24 °C WB
- Heating: Indoor temperature: 20 °C DB, 15 °C WB, Outdoor temperature: 7 °C DB, 6 °C WB
- Equivalent refrigerant piping: 7.5 m, Level differences: 0 m

¹ Sound pressure level is obtained in an anechoic room. Sound pressure level is a relative value. Sound pressure level and sound intensity and acoustic environment, sound pressure levels may differ according to operating conditions. Sound power level is an absolute value that a sound source generates.

² Eurovent certified.

Dimensional drawings

DVM S High EER Heat Recovery (3-Pipe)



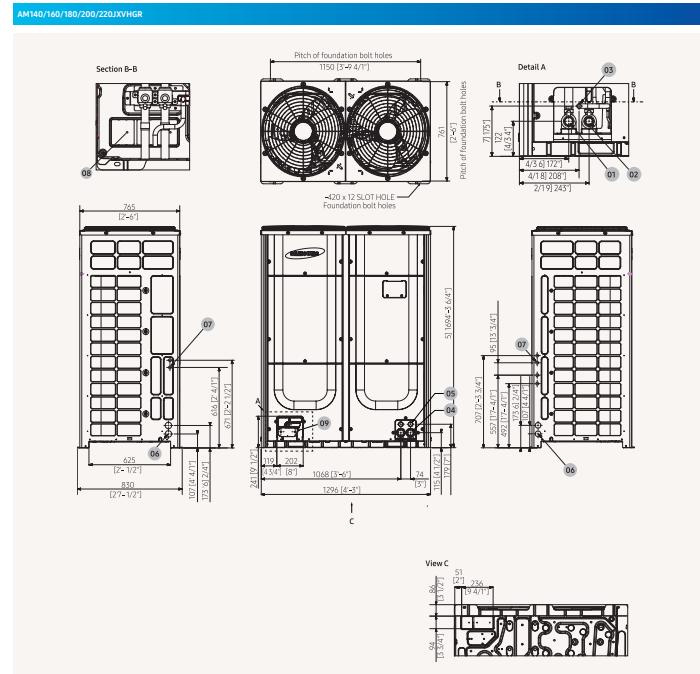
No	Name	Description
1	Low Pressure Gas Ref. pipe	See note 4
2	High Pressure Gas Ref. pipe	See note 4
3	Liquid Ref. pipe	See note 4
4	Power wiring conduits	a44
5	Communication wiring conduits	a54
6	Power wiring conduits	a44
7	Communication wiring conduits	a54
8	Knock-out hole for Ref. piping (bottom)	a22
9	Knock-out hole for Ref. piping (front)	

1. Detail A and SECTION B-B indicate the dimensions after fixing the attached piping.

2. Item 4-9: Knock-out hole.

3. View C indicates the dimensions of the knock-out hole (bottom).

4. Pipe [a, mm (inch)]: Braze connection.



No	Name	Description
1	Low Pressure Gas Ref. pipe	See note 4
2	High Pressure Gas Ref. pipe	See note 4
3	Liquid Ref. pipe	See note 4
4	Power wiring conduits	a44
5	Communication wiring conduits	a54
6	Power wiring conduits	a44
7	Communication wiring conduits	a54
8	Knock-out hole for Ref. piping (bottom)	a22
9	Knock-out hole for Ref. piping (front)	

1. Detail A and SECTION B-B indicate the dimensions after fixing the attached piping.

2. Item 4-9: Knock-out hole.

3. View C indicates the dimensions of the knock-out hole (bottom).

4. Pipe [a, mm (inch)]: Braze connection.

Specifications

DVM S Water

- Water Cooled, Variable Refrigerant Flow Heat Pump/Heat Recovery Unit RA10A.
- Suitable for indoor and outdoor installation.

- Each unit houses one (8-12 hp) or two (20-30 hp) Inverter Scroll compressors with Flash injection technology.



Model Name	Φ, φ, V, Hz	AM100MXWNR/EU	AM100MXWNR/EU	AM120MXWNR/EU	
Power Supply	Φ, φ, V, Hz	3Ø, 4, 380-415 V, 50/60 Hz	3Ø, 4, 380-415 V, 50/60 Hz	3Ø, 4, 380-415 V, 50/60 Hz	
Performance	hp	8	10	12	
Cooling (Nominal)	kW	22.4	28.0	33.6	
Heating	kW	25.2	31.5	37.8	
Max. number of connectable indoor units	Max. number of connectable indoor units	14	18	22	
Total capacity of the connected indoor units	kW	112.0	140.0	168.0	
Power Input	kW	29.1	36.4	43.7	
Cooling (Nominal)	kW	3.67	4.87	6.00	
Heating	kW	3.57	5.04	6.23	
Current Input (Nominal)	A	5.9	8.1	9.6	
Cooling	A	6.4	8.4	10.0	
Heating	A	16.1	16.1	20.0	
Min. A	A	20	20	25	
Max. A	A	20	20	25	
COP	Nominal Cooling	W/W	6.10	5.75	5.60
Nominal Heating	W/W	6.35	6.25	6.05	
Compressor	Type	-	Inverter Scroll	Inverter Scroll	
Output	kW x n	4.96 x 1	4.96 x 1	6.13 x 1	
Oil Type	-	PVE	PVE	PVE	
Initial Charge	cc	3,900	3,900	4,200	
Condenser	Type	Type	Plate Heat Exchanger	Plate Heat Exchanger	
Pipe Size	A, mm	PT1 1/4	PT1 1/4	PT1 1/4	
Water flow	kW	22	30	42	
Water flow rate	l/min	80	96	114	
Max. pressure	MPa	1.96	1.96	1.96	
Liquid pipe	A, mm	9.52	9.52	12.70	
A, inch		3/8	3/8	1/2	
Gas pipe	A, mm	19.05	22.22	28.58	
A, inch		3/4	7/8	11/8	
Piping Connections	Discharge Gas Pipe	A, mm	15.88	19.05	19.05
	A, inch	5/8	3/4	3/4	
Piping length	Outdoor-indoor	m	170 (190)	170 (190)	170 (190)
	After branch	m	90	90	90
Total piping length	A, m	500	500	500	
Level difference	Outdoor-indoor	m	50	50	50
	Indoor in highest position	m	50	50	50
	Indoor in lowest position	m	40	40	40
	Indoor height	m	50	50	50
Wiring Connections	Communication	mm ²	0.75	0.75	0.75
	Remarks	-	F1, F2	F1, F2	F1, F2
Refrigerant	Type	-	R410A	R410A	R410A
Factory Charging	kg	5.5	5.8	6.0	
	tCO ₂ e	11.48	12.11	12.53	
Sound¹	Sound pressure	cooling	48	48	50
	Heating	dB(A)	51	51	52
External Dimensions	Net Power	kg	160.0	160.0	160.0
Net Dimensions (W + D)	mm	770 x 1,000 x 545	770 x 1,000 x 545	770 x 1,000 x 545	
Operating Temperature Range	Cooling	°C	10.0-45.0	10.0-45.0	10.0-45.0
	Heating	°C	10.0-45.0	10.0-45.0	10.0-45.0

Model Name	Φ, φ, V, Hz	AM100MXWA9R/EU	AM120MXWA9R/EU
	3Ø, 4, 380-415 V, 50/60 Hz	3Ø, 4, 380-415 V, 50/60 Hz	3Ø, 4, 380-415 V, 50/60 Hz
	20	30	30
	56.0	84	94.5
	65	95	104.5
	56	85	95
	28.0	42.0	42.0
	72.8	109.2	109.2
	10.77	16.80	16.80
	12.56	18.88	18.88
	17.3	24.4	24.4
	17.4	26.5	26.5
	22	32.2	48.0
	40	63	63
	5.20	5.00	5.00
	5.80	5.60	5.60
	Inverter Scroll	SSC Scroll x 2	SSC Scroll x 2
	4.96 x 2	6.75 x 2	6.75 x 2
	PVE	PVE	PVE
	6,200	6,200	6,200
	Plate Heat Exchanger	Plate Heat Exchanger	Plate Heat Exchanger
	PT1 1/4	PT2	PT2
	1.4	1.0	1.0
	190	285	285
	1.96	1.94	1.94
	15.88	16.05	16.05
	5.8	3.4	3.4
	28.58	34.92	34.92
	11/8	13/8	13/8
	28.58	28.58	28.58
	11/8	11/8	11/8
	170 (190)	170 (190)	170 (190)
	90	90	90
	500	500	500
	50	50	50
	40	40	40
	50	50	50
	0.75	0.75	0.75
	F1, F2	F1, F2	F1, F2
	R410A	R410A	R410A
	9.8	11.0	11.0
	20.46	22.96	22.96
	51	55	55
	52	58	58
	75	75	75
	240.0	280.0	280.0
	1,000 x 1,000 x 545	1,000 x 1,000 x 545	1,000 x 1,000 x 545
	10.0-45.0	10.0-45.0	10.0-45.0
	10.0-45.0	10.0-45.0	10.0-45.0

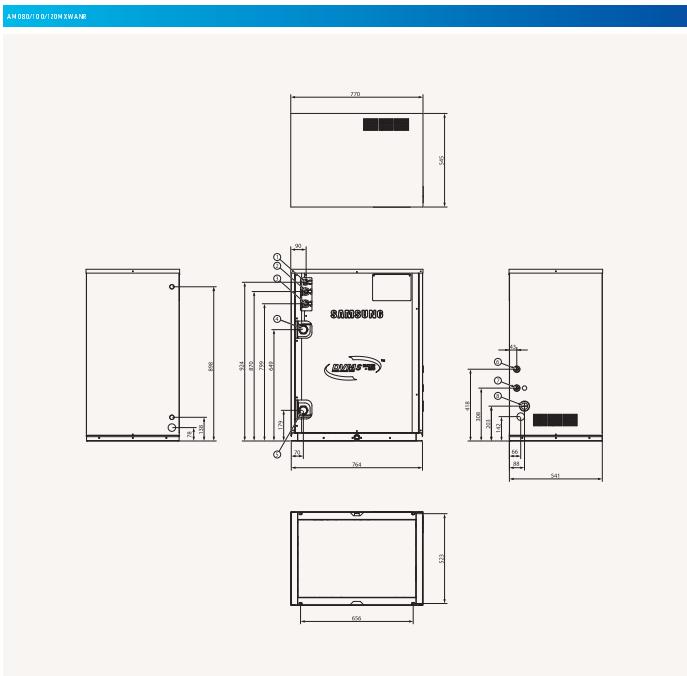
Performances are based on the following test condition:

- Cooling: Indoor temperature: 27 °C DB, 19 °C WB,
Inlet water temperature: 30 °C
- Heating: Indoor temperature: 20 °C DB, 15 °C WB,
Inlet water temperature: 20 °C WB

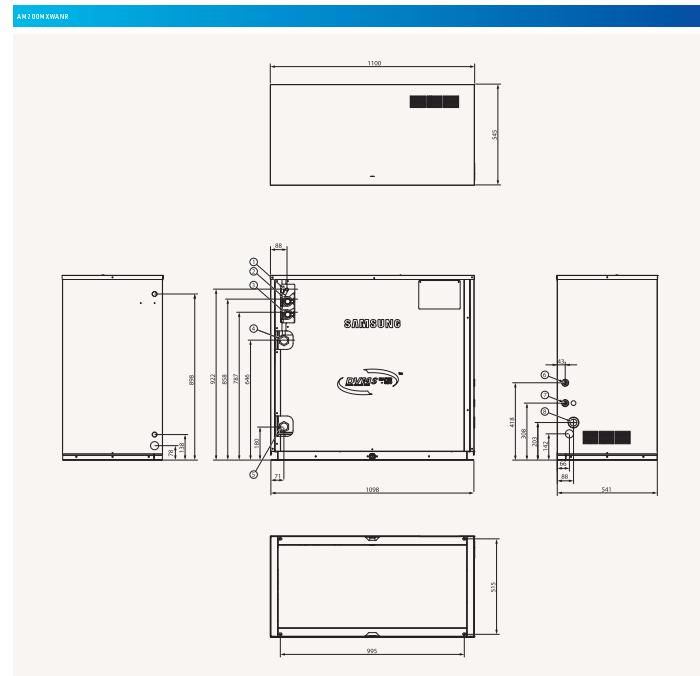
- Equivalent refrigerant piping: 7.5 m,
Level differences: 0 m,
Sound pressure level: 100 dB(A) measured in an anechoic room.
Sound power level is a relative value depending on the distance and acoustic environment; sound pressure level may differ according to operating conditions; sound power level is an absolute value that is a sound source generated.

Dimensional Drawing

DVM S Water



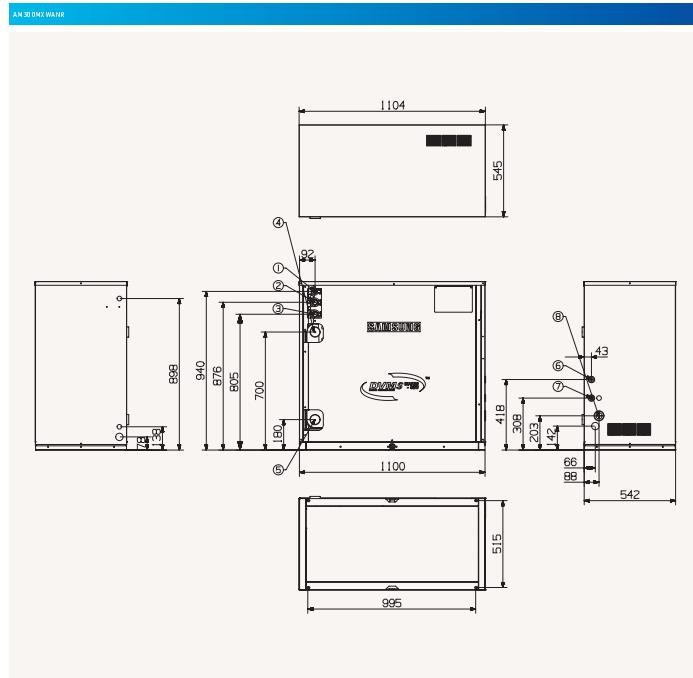
No	Name	Description
1	Liquid Ref pipe	a1905 (3/4)
2	High Pressure Gas Ref pipe	a28.58 (1 1/8)
3	Low Pressure Gas Ref pipe	a34.92 (1 3/8)
4	Water outlet pipe	PT 2
5	Water inlet pipe	PT 2
6	Communication wiring conduits	
7	External contact wiring	
8	Power wiring conduits	



No	Name	Description
1	Liquid Ref pipe	15.88 (5/8)
2	High Pressure Gas Ref pipe	a28.58 (1 1/8)
3	Low Pressure Gas Ref pipe	a34.92 (1 3/8)
4	Water outlet pipe	PT11/4
5	Water inlet pipe	PT11/4
6	Communication wiring conduits	
7	External contact wiring	
8	Power wiring conduits	

Dimensional Drawing

DVM S Water



No	Name	Description
1	Liquid Ref. pipe	a1905 (3/4)
2	High Pressure Liquid Ref. pipe	a2858 (1 1/8)
3	Low Pressure Liquid Ref. pipe	a3420 (1/2)
4	Water outlet pipe	PT 2
5	Water inlet pipe	PT 2
6	Communication wiring conduits	
7	External contact wiring	
8	Power wiring conduits	

