



Internal Use Only

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Multi Air Conditioner

SVC MANUAL(Exploded View)

MODEL : A5UW30GFA0
[MU5M30 U42]

CAUTION

Before Servicing the unit, read the safety precautions in General SVC manual.
Only for authorized service personnel.

1. Specification

Outdoor unit				A5UW30GFA0 [MU5M30 U42]
Testing Combination				MS07AQ NB0 x 5EA
Capacity	Cooling	Min.~Rated~Max.	kW	5.27 ~ 8.79 ~ 10.5
		Min.~Rated~Max.	Btu/h	18,000 ~ 30,000 ~ 36,000
	Heating	Min.~Rated~Max.	kW	6.06 ~ 10.1 ~ 12.1
		Min.~Rated~Max.	Btu/h	20,700 ~ 34,500 ~ 41,400
Power Input	Cooling	Min.~Rated~Max.	kW	1.28 ~ 2.20 ~ 3.38
	Heating	Min.~Rated~Max.	kW	1.32 ~ 2.20 ~ 3.70
EER / COP			W / W	4.00 / 4.60
Energy Efficiency Class (Rated)	Cooling / Heating		-	A / A
SEER / SCOP			Wh / Wh	6.10 / 3.81
Energy Efficiency Class (Seasonal)	Cooling / Heating		-	A / A
P-design	Cooling / Heating(@-10°C)		kW	8.8 / 9.1
Power Supply			V , Ø , Hz	220-240 / 1 / 50
Running Current	Cooling	Min.~Rated~Max.	A	5.7 ~ 9.9 ~ 16.2
	Heating	Min.~Rated~Max.	A	5.8 ~ 9.8 ~ 16.5
Starting Current	Cooling	Max.	A	-
	Heating	Max.	A	-
Wiring Connections	Power Supply Cable (included Earth)		No. x mm² (AWG)	3C x 2.5 (12)
	Power and Communication Cable (included Earth)	Outdoor ~ BD unit	No. x mm² (AWG)	-
Combination	Sum of Indoor Units Capacity		kBtu/h	48
	Number of Indoor Units		EA	5
	Number of BD Units		EA	-
Casing Color			-	Warm Gray
Dimensions	W x H x D		mm	950 x 834 x 330
	W x H x D		inch	37-13/32 x 32-27/32 x 13
Net Weight			kg (lbs)	64 (141.1)
Compressor	Type		-	Twin Rotary
	Model		Model x No.	GJT240MA x 1
	Motor type		-	BLDC
	Motor Output		W x No.	2,020 (at 60Hz) x 1
Refrigerant	Type		-	R410A
	Precharged Amount		g (oz)	3,200 (112.9)
	Chargeless-Pipe Length		m (ft)	37.5 (123)
	Additional Charging Volume		g/m (oz/ft)	20 (0.22)
	Control		-	Electronic Expansion Valve
Refrigerant Oil	Type		-	FVC68D
	Charged volume		cc x No.	900 x 1
Heat Exchanger	(Row x Column x Fins per inch) x No.		-	(2 x 38 x 14) x 1
Fan	Type		-	Propeller
	Air Flow Rate		m³/min x No.	60 x 1
Fan Motor	Type		-	BLDC
	Output		W x No.	124.2 x 1
Sound Pressure Level	Cooling	Rated	dB(A)	51
	Heating	Rated	dB(A)	53
Sound Power Level	Cooling	Rated	dB(A)	64
Piping Connections	Liquid	Outer Dia.	mm(inch) x No.	Ø 6.35 (1/4) x 5
	Gas	Outer Dia.	mm(inch) x No.	Ø 9.52 (3/8) x 5
Piping Length	Total Piping	Max.	m (ft)	75 (246.1)
	Main Piping	Max.	m (ft)	-
	Total Branch Piping	Max.	m (ft)	-
	Each Branch Piping	Max.	m (ft)	25 (82.0)
Maximum Height Difference	Outdoor Unit ~ Indoor Unit	Max.	m (ft)	15 (49.2)
	Indoor Unit ~ Indoor Unit	Max.	m (ft)	7.5 (24.6)
Operation Range (Outdoor Temperature)	Cooling	Min. ~ Max.	°C DB (°F DB)	-10 (14.0) ~ 48 (118.4)
	Heating	Min. ~ Max.	°C WB (°F WB)	-18 (-0.4) ~ 18 (64.4)

Note:

- All data are based on the following conditions:
 - Cooling Temperature : Indoor 27°C(80.6°F) DB / 19°C(66.2°F) WB
Outdoor 35°C(95°F) DB / 24°C(75.2°F) WB
 - Heating Temperature : Indoor 20°C(68°F) DB / 15°C(59°F) WB
Outdoor 7°C(44.6°F) DB / 6°C(42.8°F) WB
 - Piping Length : Interconnected Pipe Length = 7.5m
 - Difference Limit of Elevation (Outdoor ~ Indoor Unit) is Zero.

- Wiring cable size must comply with the applicable local and national code.
- Due to our policy of innovation some specifications may be changed without notification.
- Sound Level Values are measured at Anechoic chamber. Therefore, these values can be increased(maximum 3dB(A)) owing to ambient conditions during operation.

2. List of Functions & Accessory

2.1 List of Functions

Category	Functions	A5UW30GFA0 [MU5M30 U42]
Reliability	Defrost / Deicing	O
	High pressure switch	X
	Low pressure switch	X
	Phase protection	X
	Restart delay (3-minutes)	O
	Self diagnosis	O
	Soft start	O
	Test function	X
Convenience	Night Silent Operation	O
Network function	Network solution(LGAP)	O

Note :

O : Applied, x : Not applied

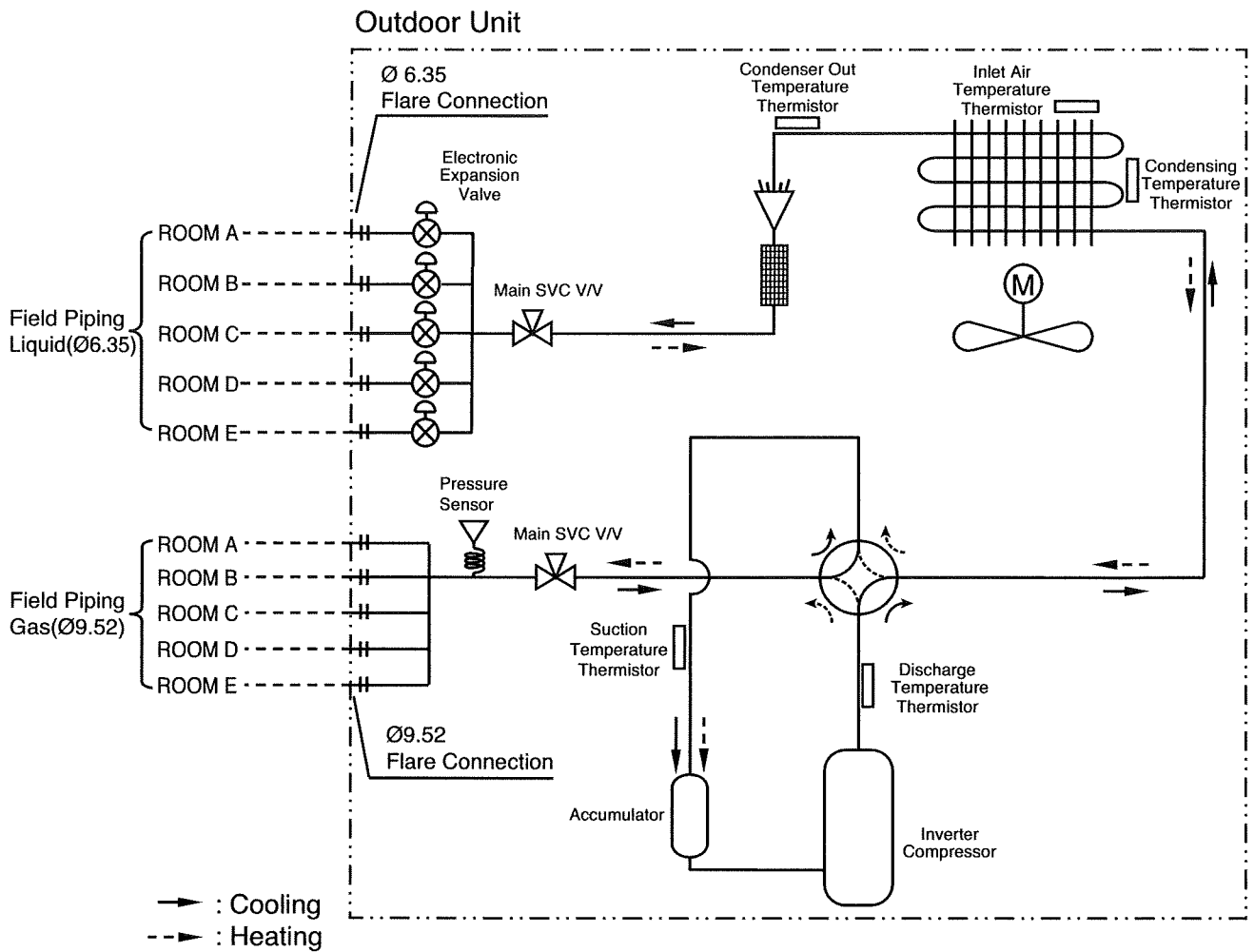
* Option : Model name & price are different according to options, and assembled in factory with main unit.

Accessory model name : Installed at field, ordered and purchased separately by the corresponding model name, supplied with separate package.

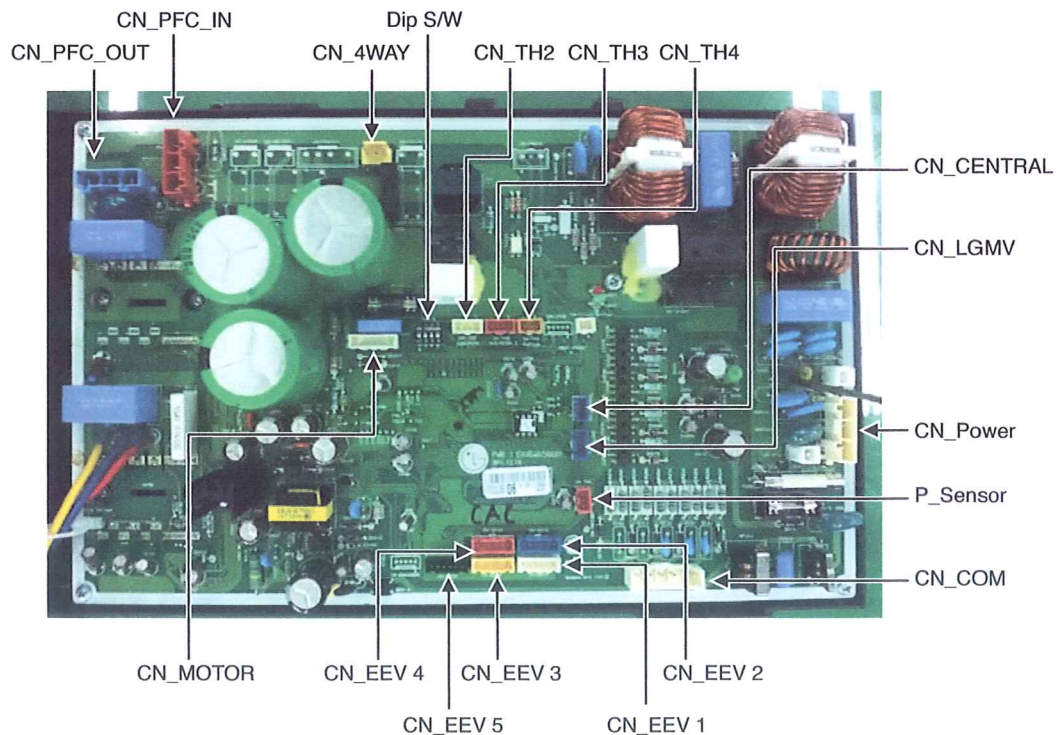
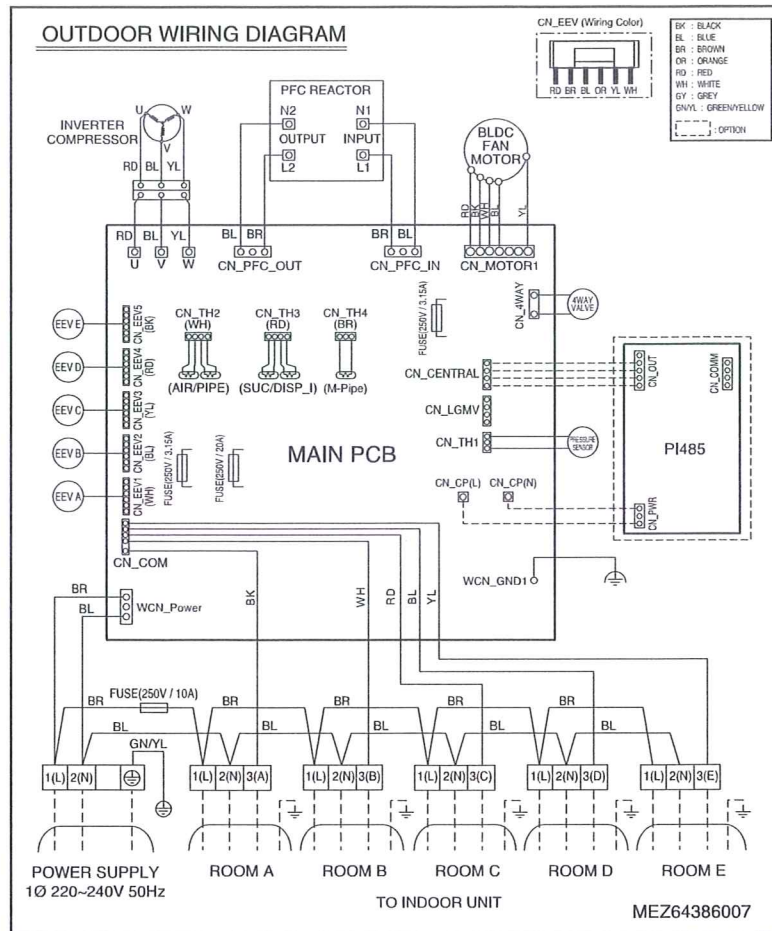
2.2 List of Accessory

Device		A5UW30GFA0 [MU5M30 U42]
Central Controller	Simple Controller	PQCSB101S0
	Function controller	PQCSB101S0 + PQCSC101S0
	Function Scheduler	PQCSB101S0 + PQCSD130A0
	AC Ez	PQCSZ250S0
	AC Smart II	PQCSW320A1E
	Option Kit (SD card type)	PQCSE341A0 / PQCSE342A0
	ACP(Advanced Control Platform)	PQCPA11A0E / PQCPB11A0E
	AC Manager	PQCSS520A0E
	PI485	PMNFP14A0/PMNFP14A1
	DO(Digital Output) Kit	PQNFP00T0
BNU (Building Network Unit)	LONWORKS Gateway	PQNFB16A1
	BACnet Gateway	PQNFB17B0
Installation	Y branch	Accessory
	Header branch	Accessory
	Air Guide	X
ODU Dry Contact		X
Low Ambient Kit		O (Logical operation)

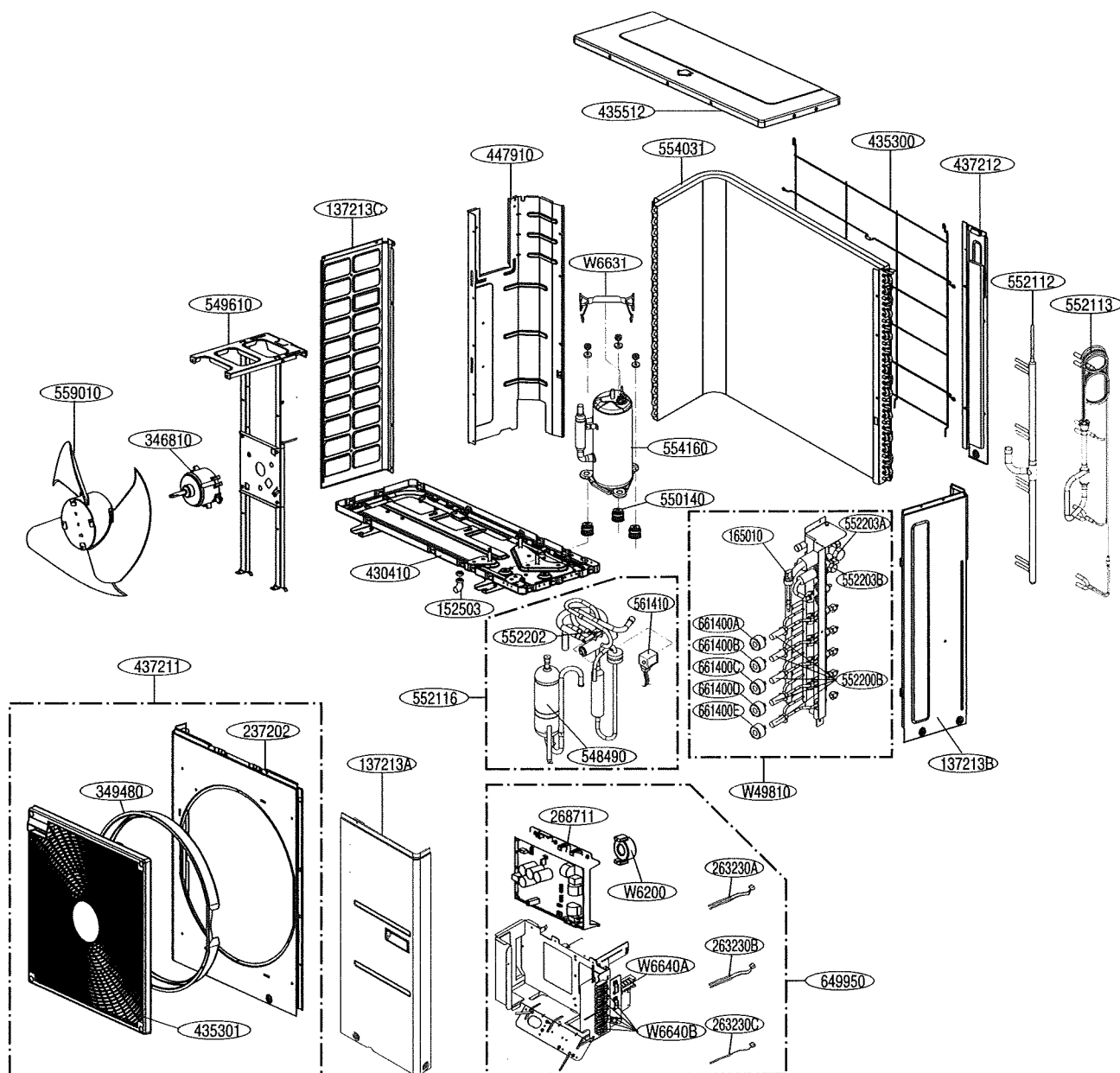
3. Piping Diagrams



4. Wiring Diagrams



5. Exploded View

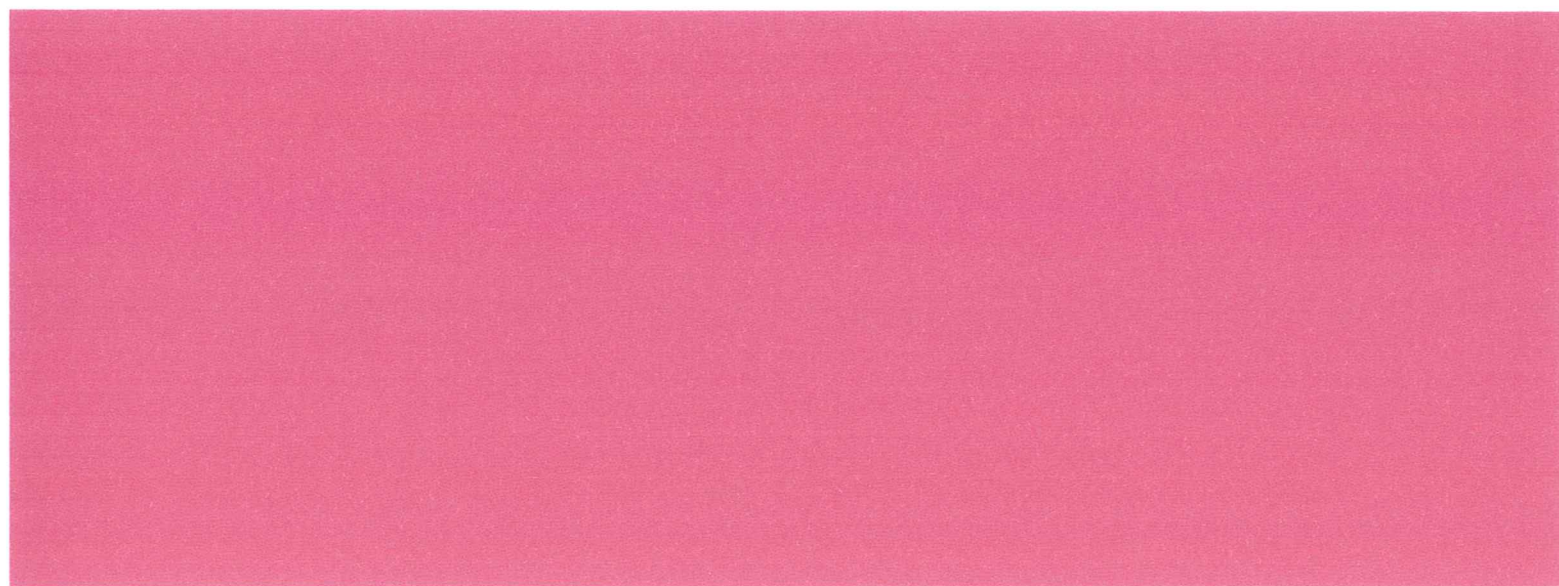


Location No.	Description	Sensor Information	Housing Color
263230A	Temp.Sensor(CN_TH2)	Air / Cond Out Pipe	Red
263230B	Temp.Sensor(CN_TH3)	Suction / Discharge Pipe	White
263230C	Temp.Sensor(CN_TH4)	Cond Mid Pipe	Orange
165010	Pressure Sensor(P-Sensor(H))	Pressure Sensor	Red



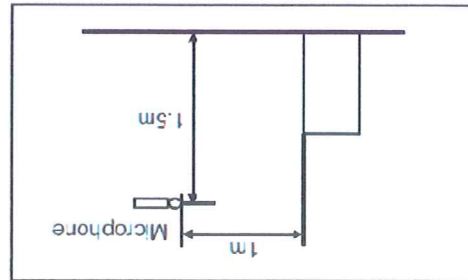
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1.12 Sound levels

1.12.1 Sound pressure level



Notes:

- Sound measured at 1m away from the center of the unit.
- Data is valid at free field condition.
- Data is valid at nominal operation condition.
- Reference acoustic pressure $0\text{dB} = 20\mu\text{Pa}$.
- Sound level will vary depending on a range of factors such as the construction (acoustic absorption coefficient) of particular room in which the equipment is installed.
- The operating conditions are assumed to be standard.

Model		Sound Pressure Level [dB(A)]
Cooling	A2UW14GFA0 [MU2M15 U12]	49
	A2UW16GFA0 [MU2M17 U12]	49
Heating	A3UW18GFA0 [MU3M19 U12]	50
	A3UW21GFA0 [MU3M21 U12]	51

Model		Sound Pressure Level [dB(A)]
Cooling	A4UW24GFA0 [MU4M25 U12]	51
	A4UW27GFA0 [MU4M27 U12]	51
Heating	A5UW30GFA0 [MU5M30 U12]	53
	A5UW40GFA0 [MU5M40 U02]	53

A5UW30GFA0 [MU5M30 U12]

