

IZUMI VRF SYSTEM



2020



IZUMI VRF SYSTEM

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OUTDOOR UNITS

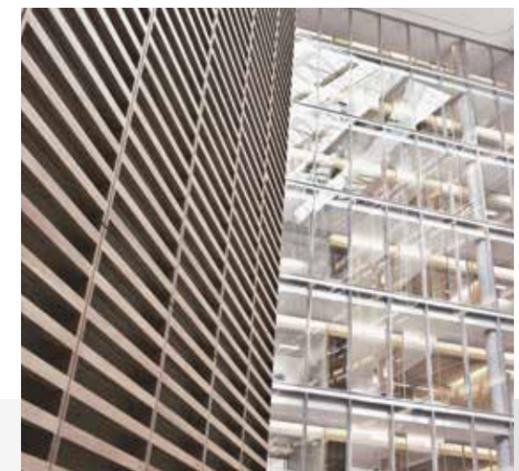
- VRF VX Series
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IZUMI VRF SYSTEM



VRF VZ/Z-i Series

Heat pump
 VX: 8~102HP, max. 3 modules can be combined
 VX-i: 8~34HP, cannot be combined
 All DC inverter compressors
 All DC fan motors

VRF VC Pro Series

Cooling only
 Max. 3 modules can be combined
 8~90HP
 All DC inverter compressors
 All DC fan motors

VRF V Plus Series

Heat recovery
 Simultaneous cooling and heating operation in one system
 Max. 4 modules can be combined
 8~64HP
 All DC inverter compressors
 All DC fan motors

VRF V plus W Series

Water cooled
 Max. 3 modules can be combined
 8~36HP
 DC inverter compressor

VRF V4+i Series

Heat pump, cannot be combined
 7~16HP
 DC inverter compressor
 All DC fan motors for 20-33.5kW models
 DC fan motor + AC fan motor for 40-45kW models

VRF Mini Series

Heat pump and cooling only are both available, cannot be combined
 3~6.5HP
 DC inverter compressor
 All DC fan motors

OUTDOOR UNIT LINEUP

Connectable VRF

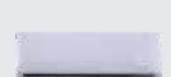
HP	8	10	12	14	16	18	20	22	24	26	28	30	32	34	36	38	40	42	44	46	48	50	52	54	56	58	60	62	64	66	68	70	72	74	76	78	80	82	84	86	88	89	90	92	94	96	98	100	102			
VRF VX SERIES	Single unit										Multi combination																																									
VRF VC Pro SERIES	Single unit										Multi combination																																									
VRF V4 PLUS R SERIES	Single unit					Multi combination																																														
VRF V4 PLUS W SERIES	Single unit				Multi combination																																															

Single VRF

HP	2.5	3	4	4.5	5	6	6.5	7	8	9	10	12	14	16	18	20	22	24	26	28	30	32	34
VRF VX-I SERIES									Single unit		Single unit												
VRF V4 PLUS I SERIES								Single unit															
VRF MINI SERIES (HEAT PUMP)		Single unit																					
VRF MINI SERIES (COOLING ONLY)		Single unit			Single unit																		

Multi combination Single unit

INDOOR UNIT LINEUP

kW			1.5	1.8	2.2	2.8	3.6	4.5	5.6	7.1		8.0	9.0	10.0	11.2	12.5	14.0	16.0	20.0	25.0	28.0	40.0	45.0	56.0		
Btu/h			5k	6k	7k	9k	12k	15k	19k	24k		27k	30k	34k	38k	42k	48k	55k	68k	85k	96k	136k	154k	191k		
Cassette	One-way cassette																									
	Two-way cassette																									
	Four-way cassette																									
	Compact four-way cassette																									
Duct	Medium static pressure																									
	High static pressure																									
	Fresh air processing unit																									
Wall mounted																										
Ceiling & floor																										
Floor standing -concealed																										
Floor standing - exposed																										
Console																										

2nd Gen. Indoor Units¹
 1st Gen. Indoor Units²

Notes:
 1. Fan motors of this series are all DC type.
 2. Fan motors of this series are AC type except the wall mounted and console units.
 Fresh air processing unit is not available for V4+R, V4+W and Mini VRF Series.

Wide Capacity Range

Starting at 8HP, capacity increases in 2HP increments up to 102HP, which is the world's largest single-system VRF capacity.

- 01 26/28/30/32/34HP (with dual fans)
- 02 26-102HP

Total piping length: 1000m

Longest piping length - actual (equivalent): 175m (200m)

Longest piping length after first branch: 90m

Level difference between IDUs: 30m

Long Piping Capability

Total piping length: 1000m

Longest piping length - actual (equivalent): 175m (200m)

Longest piping length after first branch: 90m

Level difference between IDUs and ODU - ODU above (below): 90m (110m)

Level difference between IDUs: 30m



Triple Configurations

Triple (local/remote/network) configurations greatly simplified installation, commissioning and servicing.

- Field local configuration achieves quick and easy on-site settings, simplifies installation and commissioning.
- System checking and settings also can be easily achieved via wired and centralized controller, making the configuration more flexible and convenient.
- A desktop or laptop PC can be used for browser-based access to achieve system configurations through IMM Pro gateway via a LAN connection.





Anti-corrosion Protection

Outdoor units are given anti-corrosion treatment for non-extreme conditions as standard and can also be customized with heavy anti-corrosion treatment on main components for surface protection against corrosive air, acid rain and saline air (for installations in coastal regions) to extend overall useful life. The integrity of the anti-corrosion treatment is ensured by subjecting major components and parts to salt mist testing, moisture and heating testing and light aging testing.



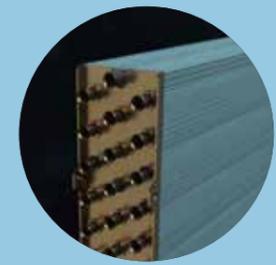
01 Screws / bolts / gaskets
Standard products:
300h of neutral salt mist
Heavy anti-corrosion products:
720h of neutral salt mist



02 Fan motor
Standard products:
72h of neutral salt mist
Heavy anti-corrosion products:
240h of neutral salt mist



03 Electric control box case
Standard products:
96h of neutral salt mist
Heavy anti-corrosion products:
240h of neutral salt mist



04 Heat exchanger aluminum foil
Standard products:
72h of neutral salt mist
Heavy anti-corrosion products:
1000h of neutral salt mist
140h of acid salt mis

Heat exchanger copper pipe
Standard products:
24h of neutral salt mist
Heavy anti-corrosion products:
120h of neutral salt mist



05 Painted sheet metal
Standard products:
500h of neutral salt mist
1000h of moisture and heating test
500h of light aging test

Heavy anti-corrosion products:
1000h of neutral salt mist
2000h of moisture and heating test
720h of light aging test

UL Anti-Corrosion Certificate

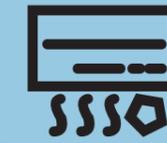
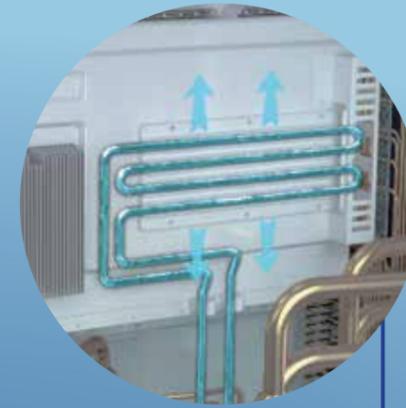
It has been certified by UL that our VRF outdoor unit can withstand 27 years of simulated severe corrosion under a salt contaminated traffic environment.

Note: UL Anti-Corrosion certificate is only available for VRF VX/VX-i Series.



Duty Cycling

Duty cycling equalizes the running time of the outdoor units in a multiple-unit system and of the compressors in each unit, significantly extending compressor lifespan.



Refrigerant Cooling PCB

The VX VRF uses refrigerant cooling technology to cool the electric control box. It decreases the average temperature of electrical control components by about 8 degrees, guaranteeing the stable and safe running of the control system.



Backup Operation

In units with two compressors, if one compressor fails, the other compressor can run on its own for up to 4 days, allowing time for maintenance or repair whilst maintaining comfort.



Operation compressor



Standby compressor



Failed compressor



Auto Snow-blowing Function*

The innovatively designed auto snow-blowing function enables the outdoor unit to prevent the accumulation of snow by itself.

*This function is available as a customization option.



Dust-clean function*

The innovatively designed dust-clean function enables the outdoor unit to prevent the dust by itself.

*This function is available as a customization option.



Automatic Refrigerant Detecting/Charging/Recycling

The temperature and pressure of refrigerant can be real-time monitored by the outdoor unit. When the level of refrigerant is too low or too high, this can cause damage to the unit and poor performance. IZ outdoor unit can detect excessive or insufficient amounts of refrigerant, to ensure consistent performance.

Automatic refrigerant charging makes installation and service easier and more efficient.

*Automatic refrigerant charging and recycling functions are available as a customization option.



Optional Multifunctional PCB

An optional multifunctional small PCB can be installed on the unit's side columns, enabling installation and service engineers to activate Auto-commissioning or check the operating status without removing the front panel. It can also perform automatic data backup of the last 30 minutes' operating record.



-  Indoor Units
VRF indoor units
-  Fresh Air Processing Unit
100% fresh air supply
-  Ventilation
Heat recovery ventilator
-  AHU Connection Kit
Connect to third party DX AHU
-  Control Systems
Smart control systems

- Energy Management System (EMS)
- Enhanced Vapor Injection (EVI) Compressor
- Triple Configurations
- High Efficiency G-Shape Heat Exchanger
- ESP up to 60Pa
- Plate Heat (PHE) Subcooling
- Precise Oil Control Technology
- Multi Silent Modes
- Duty Cycling
- Backup Operation
- UL Anti-Corrosion Certificate
- Refrigerant Cooling PCB
- Auto Snow-blowing Function
- Dust-clean Function
- Optional Multifunction PCB
- Automatic Refrigerant Detecting/Charging/Recycling

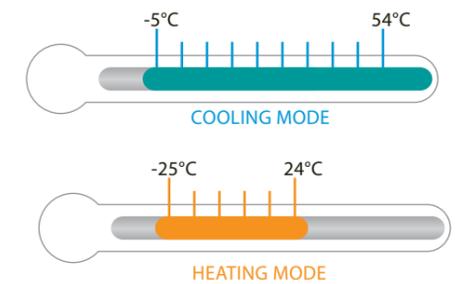
Wide Capacity Range

Starting at 8HP, capacity increases in 2HP increments up to 102HP, which is the world's largest single-system VRF capacity.



Wide Operation Range

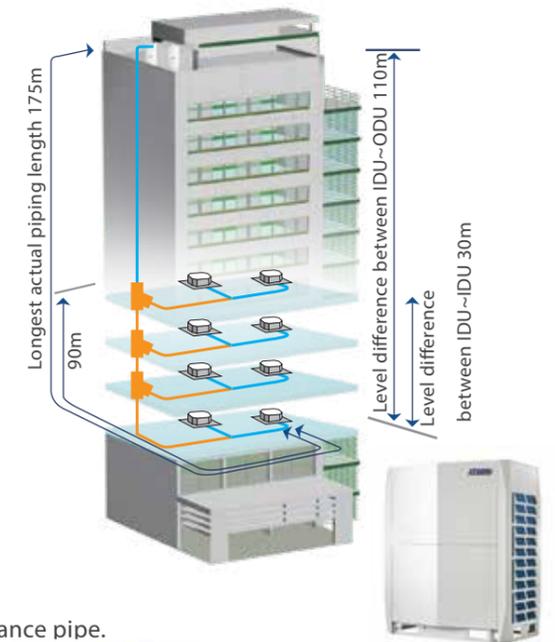
The VX VRF can operate stably in a wide ambient temperature range: from -5°C to 54°C in cooling mode and from -25°C to 24°C in heating mode.



Long Piping Capability

- Total piping length: 1000m
- Longest piping length – actual (equivalent): 175m (200m)
- Longest piping length after first branch: 40/90*m
- Level difference between IDUs and ODU – ODU above (below): 90m (110m)
- Level difference between IDUs: 30m

*The longest length after first branch is 40m as standard but can be extended to up to 90m under certain conditions. Please contact your local Midea dealer for further information.



Oil Balance pipe not required

With the new oil management system, there is no need of oil balance pipe.



VRF ZX Series - Heat Pump

380~415V, 3N, 50(60)Hz



			8	10	12	14
Model name			IZV-252WV2GN1	IZV-280WV2GN1	IZV-335WV2GN1	IZV-400WV2GN1
Power supply			380-415/3/50(60)			
Cooling ¹	Capacity	kW	25.2	28.0	33.5	40.0
		kBtu/h	86.0	95.5	114.3	136.5
	Power input	kW	5.30	6.21	7.77	9.50
	EER		4.75	4.51	4.31	4.21
Heating ²	Capacity	kW	27.0	31.5	37.5	45.0
		kBtu/h	92.1	107.5	128.0	153.5
	Power input	kW	4.82	5.92	7.55	9.57
	COP		5.60	5.32	4.97	4.70
Connected indoor unit	Total capacity		50-130% of outdoor unit capacity			
	Maximum quantity		13	16	20	23
Compressors	Type		DC inverter			
	Quantity		1			
Fan motors	Type		DC			
	Quantity		1			
	Static pressure	Pa	0-20 (default); 20-60 (customized)			
Refrigerant	Type		R410A			
	Factory charge	kg	11			
Pipe connections ³	Liquid pipe	mm	Φ12.7		Φ15.9	Φ15.9
	Gas pipe	mm	Φ25.4		Φ28.6	Φ31.8
Air flow rate			11000			
Sound pressure level ⁴	dB(A)		58	58	60	60
Net dimensions (W×H×D)	mm		990×1635×790			
Packed dimensions (W×H×D)	mm		1090×1805×860			
Net weight	kg		227			
Gross weight	kg		242			
Ambient temp. operation range	Cooling	°C	-5 ~ 54			
	Heating	°C	-25 ~ 24			

			16	18
Model name			IZV-450WV2GN1	IZV-500WV2GN1
Power supply			380-415/3/50(60)	
Cooling ¹	Capacity	kW	45.0	50.0
		kBtu/h	153.5	170.6
	Power input	kW	10.92	12.20
	EER		4.12	4.10
Heating ²	Capacity	kW	50.0	56.0
		kBtu/h	170.6	191.1
	Power input	kW	10.87	12.44
	COP		4.60	4.50
Connected indoor unit	Total capacity		50-130% of outdoor unit capacity	
	Maximum quantity		26	29
Compressors	Type		DC inverter	
	Quantity		1	
Fan motors	Type		DC	
	Quantity		1	
	Static pressure	Pa	0-20 (default); 20-60 (customized)	
Refrigerant	Type		R410A	
	Factory charge	kg	13	
Pipe connections ³	Liquid pipe	mm	Φ15.9	Φ19.1
	Gas pipe	mm	Φ31.8	Φ31.8
Air flow rate	m ³ /h		13000	
Sound pressure level ⁴	dB(A)		60	61
Net dimensions (W×H×D)	mm		1340×1635×850	
Packed dimensions (W×H×D)	mm		1405×1805×910	
Net weight	kg		277	
Gross weight	kg		304	
Ambient temp. operation range	Cooling	°C	-5 ~ 54	
	Heating	°C	-25 ~ 24	

- Notes:
- Indoor temperature 27°C DB, 19°C WB; outdoor temperature 35°C DB; equivalent refrigerant piping length 7.5m with zero level difference.
 - Indoor temperature 20°C DB; outdoor temperature 7°C DB, 6°C WB; equivalent refrigerant piping length 7.5m with zero level difference.
 - Diameters given are those of the unit's stop valve.
 - Sound pressure level is measured at a position 1m in front of the unit and 1.3m above the floor in a semi-anechoic chamber.

VRF ZX Series - Heat Pump

380~415V, 3N, 50(60)Hz



			20	22	24
Model name			IZV-560WV2GN1	IZV-615WV2GN1	IZV-670WV2GN1
Power supply			380-415/3/50(60)		
Cooling ¹	Capacity	kW	56.0	61.5	67.0
		kBtu/h	191.1	209.8	228.6
	Power input	kW	13.83	15.38	17.87
	EER		4.05	4.00	3.75
Heating ²	Capacity	kW	63.0	69.0	75.0
		kBtu/h	215.0	235.4	255.9
	Power input	kW	14.48	16.43	18.07
	COP		4.35	4.20	4.15
Connected indoor unit	Total capacity		50-130% of outdoor unit capacity		
	Maximum quantity		33	36	39
Compressors	Type		DC inverter		
	Quantity		2		
Fan motors	Type		DC		
	Quantity		2		
	Static pressure	Pa	0-20 (default); 20-60 (customized)		
Refrigerant	Type		R410A		
	Factory charge	kg	17		
Pipe connections ³	Liquid pipe	mm	Φ19.1		Φ19.1
	Gas pipe	mm	Φ31.8		Φ31.8
Air flow rate	m ³ /h		17000		
Sound pressure level ⁴	dB(A)		62	63	63
Net dimensions (W×H×D)	mm		1340×1635×825		
Packed dimensions (W×H×D)	mm		1405×1805×910		
Net weight	kg		348		
Gross weight	kg		368		
Ambient temp. operation range	Cooling	°C	-5 ~ 54		
	Heating	°C	-25 ~ 24		

			26	28	30
Model name			IZV-730WV2GN1	IZV-785WV2GN1	IZV-850WV2GN1
Power supply			380-415/3/50(60)		
Cooling ¹	Capacity	kW	73.0	78.5	85.0
		kBtu/h	249.1	267.8	290.0
	Power input	kW	18.48	20.13	22.91
	EER		3.95	3.90	3.71
Heating ²	Capacity	kW	81.5	87.5	95.0
		kBtu/h	278.1	298.6	324.1
	Power input	kW	18.15	19.98	22.09
	COP		4.49	4.38	4.30
Connected indoor unit	Total capacity		50-130% of outdoor unit capacity		
	Maximum quantity		43	46	50
Compressors	Type		DC inverter		
	Quantity		2		
Fan motors	Type		DC		
	Quantity		2		
	Static pressure	Pa	0-20 (default); 20-60 (customized)		
Refrigerant	Type		R410A		
	Factory charge	kg	22		
Pipe connections ³	Liquid pipe	mm	Φ22.2		Φ22.2
	Gas pipe	mm	Φ31.8		Φ38.1
Air flow rate	m ³ /h		25000		
Sound pressure level ⁴	dB(A)		64		
Net dimensions (W×H×D)	mm		1730×1830×850		
Packed dimensions (W×H×D)	mm		1800×2000×910		
Net weight	kg		430		
Gross weight	kg		453		
Ambient temp. operation range	Cooling	°C	-5 ~ 54		
	Heating	°C	-25 ~ 24		

- Notes:
- Indoor temperature 27°C DB, 19°C WB; outdoor temperature 35°C DB; equivalent refrigerant piping length 7.5m with zero level difference.
 - Indoor temperature 20°C DB; outdoor temperature 7°C DB, 6°C WB; equivalent refrigerant piping length 7.5m with zero level difference.
 - Diameters given are those of the unit's stop valve.
 - Sound pressure level is measured at a position 1m in front of the unit and 1.3m above the floor in a semi-anechoic chamber.

VRF ZX Series - Heat Pump

380~415V, 3N, 50(60)Hz



		32		34	
Model name		IZV-900WV2GN1		IZV-950WV2GN1	
Power supply		380-415/3/50(60)			
Capacity	Capacity	90.0		95.0	
		kWh		kWh	
		307.1		324.1	
Power input	Power input	24.66		27.14	
	EER	3.65		3.50	
Capacity	Capacity	100.0		106.0	
		kWh		kWh	
		341.2		361.7	
Power input	Power input	23.36		26.37	
	COP	4.28		4.02	
Connected indoor unit	Total capacity	50-130% of outdoor unit capacity			
	Maximum quantity	53		56	
Compressors	Type	DC inverter			
	Quantity	2			
Fan motors	Type	DC			
	Quantity	2			
Refrigerant	Static pressure	Pa			
	Type	R410A			
Pipe connections ³	Factory charge	kg			
	Liquid pipe	mm			
Air flow rate	Gas pipe	mm			
		m ³ /h			
Sound pressure level ^f		dB(A)			
Net dimensions (W×H×D)		mm			
Packed dimensions (W×H×D)		mm			
Net weight		kg			
Gross weight		kg			
Ambient temp. operation range	Cooling	°C			
	Heating	°C			

VRF ZX Series - Heat Pump

380~415V, 3N, 50(60)Hz



		44		46		48		
Model name		IZV-1230WV2GN1		IZV-1285WV2GN1		IZV-1340WV2GN1		
Combination type		22HP+22HP		22HP+24HP		24HP+24HP		
Power supply		380-415/3/50(60)						
Cooling ¹	Capacity	Capacity	123.0		128.5		134.0	
			kWh		kWh		kWh	
			419.7		438.4		457.2	
Heating ²	Power input	Power input	30.76		33.25		35.74	
			kW		kW		kW	
			3.75		3.86		3.75	
Connected indoor unit	Capacity	Capacity	138.0		144.0		150.0	
			kWh		kWh		kWh	
			470.9		491.3		511.8	
Compressors	Power input	Power input	32.9		34.5		36.1	
			kW		kW		kW	
Fan motors	COP	COP	4.20		4.17		4.15	
Refrigerant	Total capacity	Total capacity	50-130% of outdoor unit capacity					
		Maximum quantity	64					
Pipe connections ³	Type	Type	DC inverter					
		Quantity	4					
Air flow rate	Quantity	Quantity	4					
		Static pressure	Pa					
Refrigerant	Type	Type	R410A					
		Factory charge	kg					
Pipe connections ³	Liquid pipe	Liquid pipe	mm					
		Gas pipe	mm					
Air flow rate			m ³ /h					
Sound pressure level ^f			dB(A)					
Net dimensions (W×H×D)			mm					
Packed dimensions (W×H×D)			mm					
Net weight			kg					
Gross weight			kg					
Ambient temp. operation range	Cooling		°C					
	Heating		°C					

		36		38		40		42		
Model name		IZV-1005WV2GN1		IZV-1070WV2GN1		IZV-1120WV2GN1		IZV-1170WV2GN1		
Combination type		12HP+24HP		14HP+24HP		16HP+24HP		18HP+24HP		
Power supply		380-415/3/50(60)								
Capacity	Capacity	Capacity	100.5		107.0		112.0		117.0	
			kWh		kWh		kWh		kWh	
			342.9		365.1		382.1		399.2	
Power input	Power input	Power input	25.64		27.37		28.79		30.07	
		EER	3.92		3.91		3.89		3.89	
Capacity	Capacity	Capacity	112.5		120.0		125.0		131.0	
			kWh		kWh		kWh		kWh	
			383.9		409.4		426.5		447.0	
Power input	Power input	Power input	25.6		27.6		28.9		30.5	
		COP	4.39		4.34		4.32		4.29	
Connected indoor unit	Total capacity	Total capacity	50-130% of outdoor unit capacity							
		Maximum quantity	59		63		64		64	
Compressors	Type	Type	DC inverter							
		Quantity	3							
Fan motors	Type	Type	DC							
		Quantity	3							
Refrigerant	Static pressure	Static pressure	Pa							
		Type	R410A							
Pipe connections ³	Factory charge	Factory charge	11+17				13+17			
		Liquid pipe	mm							
Air flow rate	Gas pipe	Gas pipe	mm							
			m ³ /h							
Sound pressure level ^f			dB(A)							
Net dimensions (W×H×D)			(990×1635×790)+(1340×1635×825)				(1340×1635×850)+(1340×1635×825)			
Packed dimensions (W×H×D)			(1090×1805×860)+(1405×1805×910)				(1405×1805×910)×2			
Net weight			227+348				277+348			
Gross weight			242+368				304+368			
Ambient temp. operation range	Cooling		°C							
	Heating		°C							

- Notes:
- Indoor temperature 27°C DB, 19°C WB; outdoor temperature 35°C DB; equivalent refrigerant piping length 7.5m with zero level difference.
 - Indoor temperature 20°C DB; outdoor temperature 7°C DB, 6°C WB; equivalent refrigerant piping length 7.5m with zero level difference.
 - Diameters given are those for the pipe connecting the outdoor unit combination to the first indoor branch joint for systems with total equivalent liquid piping lengths of less than 90m. For systems with total equivalent liquid piping lengths of 90m or longer, please refer to the ZX Series Engineering Data for connection piping diameters..
 - Sound pressure level is measured at a position 1m in front of the unit and 1.3m above the floor in a semi-anechoic chamber.

		50		52		54		
Model name		IZV-1400WV2GN1		IZV-1455WV2GN1		IZV-1520WV2GN1		
Combination type		24HP+26HP		24HP+28HP		24HP+30HP		
Power supply		380-415/3/50(60)						
Cooling ¹	Capacity	Capacity	140.0		145.5		152.0	
			kWh		kWh		kWh	
			477.7		496.4		518.6	
Heating ²	Power input	Power input	36.35		38.00		40.78	
			kW		kW		kW	
			3.85		3.83		3.73	
Connected indoor unit	Capacity	Capacity	156.5		162.5		170.0	
			kWh		kWh		kWh	
			534.0		554.5		580.0	
Compressors	Power input	Power input	36.2		38.0		40.2	
			kW		kW		kW	
Fan motors	COP	COP	4.32		4.27		4.23	
Refrigerant	Total capacity	Total capacity	50-130% of outdoor unit capacity					
		Maximum quantity	64					
Pipe connections ³	Type	Type	DC inverter					
		Quantity	4					
Air flow rate	Quantity	Quantity	4					
		Static pressure	Pa					
Refrigerant	Type	Type	R410A					
		Factory charge	kg					
Pipe connections ³	Liquid pipe	Liquid pipe	mm					
		Gas pipe	mm					
Air flow rate			m ³ /h					
Sound pressure level ^f			dB(A)					
Net dimensions (W×H×D)			mm					
Packed dimensions (W×H×D)			mm					
Net weight			kg					
Gross weight			kg					
Ambient temp. operation range	Cooling		°C					
	Heating		°C					

- Notes:
- Indoor temperature 27°C DB, 19°C WB; outdoor temperature 35°C DB; equivalent refrigerant piping length 7.5m with zero level difference.
 - Indoor temperature 20°C DB; outdoor temperature 7°C DB, 6°C WB; equivalent refrigerant piping length 7.5m with zero level difference.
 - Diameters given are those for the pipe connecting the outdoor unit combination to the first indoor branch joint for systems with total equivalent liquid piping lengths of less than 90m. For systems with total equivalent liquid piping lengths of 90m or longer, please refer to the ZX Series Engineering Data for connection piping diameters..
 - Sound pressure level is measured at a position 1m in front of the unit and 1.3m above the floor in a semi-anechoic chamber.

VRF ZX Series - Heat Pump

380~415V, 3N, 50(60)Hz



			56	58	60	62
Model name			IZV-1570WV2GN1	IZV-1635WV2GN1	IZV-1700WV2GN1	IZV-1750WV2GN1
Combination type			28HP+28HP	28HP+30HP	30HP+30HP	30HP+32HP
Power supply			380-415/3/50(60)			
Cooling ¹	Capacity	kW	157.0	163.5	170.0	175.0
		kBtu/h	535.7	557.9	580.0	597.1
	Power input	kW	40.26	43.04	45.82	47.57
		EER	3.90	3.80	3.71	3.68
Heating ²	Capacity	kW	175.0	182.5	190.0	195.0
		kBtu/h	597.1	622.7	648.3	665.3
	Power input	kW	40.0	42.1	44.2	45.5
		COP	4.38	4.34	4.30	4.29
Connected indoor unit	Total capacity		50-130% of outdoor unit capacity			
	Maximum quantity		64			
Compressors	Type		DC inverter			
	Quantity		4			
Fan motors	Type		DC			
	Quantity		4			
Refrigerant	Type		R410A			
	Factory charge	kg	22×2		22+25	
Pipe connections ³	Liquid pipe	mm	Φ19.1			
	Gas pipe	mm	Φ41.3			
Air flow rate		m ³ /h	50000			49000
Sound pressure level ⁴		dB(A)	67			
Net dimensions (W×H×D)		mm	(1730×1830×850)×2			
Packed dimensions (W×H×D)		mm	(1800×2000×910)×2			
Net weight		kg	430×2		430+475	
Gross weight		kg	453×2		453+507	
Ambient temp. operation range	Cooling	°C	-5 ~ 54			
	Heating	°C	-25 ~ 24			

VRF ZX Series - Heat Pump

380~415V, 3N, 50(60)Hz



			70	72
Model name			IZV-1955WV2GN1	IZV-2020WV2GN1
Combination type			12HP+24HP+34HP	14HP+24HP+34HP
Power supply			380-415/3/50(60)	
Cooling ¹	Capacity	kW	195.5	202.0
		kBtu/h	667.0	689.2
	Power input	kW	52.79	54.51
		EER	3.70	3.71
Heating ²	Capacity	kW	218.5	226.0
		kBtu/h	745.5	771.1
	Power input	kW	52.0	54.0
		COP	4.20	4.18
Connected indoor unit	Total capacity		50-130% of outdoor unit capacity	
	Maximum quantity		64	
Compressors	Type		DC inverter	
	Quantity		5	
Fan motors	Type		DC	
	Quantity		5	
Refrigerant	Type		R410A	
	Factory charge	kg	11+17+25	
Pipe connections ³	Liquid pipe	mm	Φ22.2	
	Gas pipe	mm	Φ44.5	
Air flow rate		m ³ /h	52000	
Sound pressure level ⁴		dB(A)	68	
Net dimensions (W×H×D)		mm	(990×1635×790)+(1340×1635×825)+(1730×1830×850)	
Packed dimensions (W×H×D)		mm	(1090×1805×860)+(1405×1805×910)+(1800×2000×910)	
Net weight		kg	227+348+475	
Gross weight		kg	242+368+507	
Ambient temp. operation range	Cooling	°C	-5 ~ 54	
	Heating	°C	-25 ~ 24	

			64	66	68
Model name			IZV-1800WV2GN1	IZV-1850WV2GN1	IZV-1900WV2GN1
Combination type			30HP+34HP	32HP+34HP	34HP+34HP
Power supply			380-415/3/50(60)		
Cooling ¹	Capacity	kW	180.0	185.0	190.0
		kBtu/h	614.2	631.2	648.3
	Power input	kW	50.05	51.80	54.29
		EER	3.60	3.57	3.50
Heating ²	Capacity	kW	201.0	206.0	212.0
		kBtu/h	685.8	702.9	723.3
	Power input	kW	48.5	49.7	52.7
		COP	4.15	4.14	4.02
Connected indoor unit	Total capacity		50-130% of outdoor unit capacity		
	Maximum quantity		64		
Compressors	Type		DC inverter		
	Quantity		4		
Fan motors	Type		DC		
	Quantity		4		
Refrigerant	Type		R410A		
	Factory charge	kg	22+25	25×2	
Pipe connections ³	Liquid pipe	mm	Φ19.1		
	Gas pipe	mm	Φ41.3		
Air flow rate		m ³ /h	49000	48000	
Sound pressure level ⁴		dB(A)	67		
Net dimensions (W×H×D)		mm	(1730×1830×850)×2		
Packed dimensions (W×H×D)		mm	(1800×2000×910)×2		
Net weight		kg	430+475	475×2	
Gross weight		kg	453+507	507×2	
Ambient temp. operation range	Cooling	°C	-5 ~ 54		
	Heating	°C	-25 ~ 24		

- Notes:
- Indoor temperature 27°C DB, 19°C WB; outdoor temperature 35°C DB; equivalent refrigerant piping length 7.5m with zero level difference.
 - Indoor temperature 20°C DB; outdoor temperature 7°C DB, 6°C WB; equivalent refrigerant piping length 7.5m with zero level difference.
 - Diameters given are those for the pipe connecting the outdoor unit combination to the first indoor branch joint for systems with total equivalent liquid piping lengths of less than 90m. For systems with total equivalent liquid piping lengths of 90m or longer, please refer to the ZX Series Engineering Data for connection piping diameters..
 - Sound pressure level is measured at a position 1m in front of the unit and 1.3m above the floor in a semi-anechoic chamber.

			74	76
Model name			IZV-2070WV2GN1	IZV-2120WV2GN1
Combination type			16HP+24HP+34HP	18HP+24HP+34HP
Power supply			380-415/3/50(60)	
Cooling ¹	Capacity	kW	207.0	212.0
		kBtu/h	706.3	723.3
	Power input	kW	54.82	57.21
		EER	3.70	3.71
Heating ²	Capacity	kW	231.0	237.0
		kBtu/h	788.2	808.6
	Power input	kW	55.3	56.9
		COP	4.18	4.17
Connected indoor unit	Total capacity		50-130% of outdoor unit capacity	
	Maximum quantity		64	
Compressors	Type		DC inverter	
	Quantity		5	
Fan motors	Type		DC	
	Quantity		5	
Refrigerant	Type		R410A	
	Factory charge	kg	13+17+25	
Pipe connections ³	Liquid pipe	mm	Φ22.2	
	Gas pipe	mm	Φ44.5	
Air flow rate		m ³ /h	54000	
Sound pressure level ⁴		dB(A)	68	
Net dimensions (W×H×D)		mm	(1340×1635×850)+(1340×1635×825)+(1730×1830×850)	
Packed dimensions (W×H×D)		mm	(1405×1805×910)×2+(1800×2000×910)	
Net weight		kg	277+348+475	
Gross weight		kg	304+368+507	
Ambient temp. operation range	Cooling	°C	-5 ~ 54	
	Heating	°C	-23 ~ 24	

- Notes:
- Indoor temperature 27°C DB, 19°C WB; outdoor temperature 35°C DB; equivalent refrigerant piping length 7.5m with zero level difference.
 - Indoor temperature 20°C DB; outdoor temperature 7°C DB, 6°C WB; equivalent refrigerant piping length 7.5m with zero level difference.
 - Diameters given are those for the pipe connecting the outdoor unit combination to the first indoor branch joint for systems with total equivalent liquid piping lengths of less than 90m. For systems with total equivalent liquid piping lengths of 90m or longer, please refer to the ZX Series Engineering Data for connection piping diameters..
 - Sound pressure level is measured at a position 1m in front of the unit and 1.3m above the floor in a semi-anechoic chamber.

VRF ZX Series - Heat Pump

380~415V, 3N, 50(60)Hz



			78	80	82
Model name			IZV-2180WV2GN1	IZV-2235WV2GN1	IZV-2290WV2GN1
Combination type			22HP+22HP+34HP	22HP+24HP+34HP	24HP+24HP+34HP
Power supply			V/N/Hz 380-415/3/50(60)		
Cooling ¹	Capacity	kW	218.0	223.5	229.0
		kBtu/h	743.8	762.6	781.3
	Power input	kW	57.90	60.39	62.88
		EER	3.76	3.70	3.78
Heating ²	Capacity	kW	244.0	250.0	256.0
		kBtu/h	832.5	853.0	873.5
	Power input	kW	59.2	60.9	62.5
		COP	4.12	4.11	4.10
Connected indoor unit	Total capacity		50-130% of outdoor unit capacity		
	Maximum quantity		64		
Compressors	Type		DC inverter		
	Quantity		6		
Fan motors	Type		DC		
	Quantity		6		
Refrigerant	Type		R410A		
	Static pressure		Pa 0-20 (default); 20-60 (customized)		
Pipe connections ³	Type		R410A		
	Factory charge		kg 17×2+25		
Air flow rate	Liquid pipe		mm Φ22.2		
	Gas pipe		mm Φ44.5		
Sound pressure level ⁴	m ³ /h		58000		
	dB(A)		69		
Net dimensions (W×H×D)		mm (1340×1635×825)×2+(1730×1830×850)			
Packed dimensions (W×H×D)		mm (1405×1805×910)×2+(1800×2000×910)			
Gross weight		kg 348×2+475			
Ambient temp. operation range		Cooling °C -5 ~ 54			
		Heating °C -25 ~ 24			

VRF ZX Series - Heat Pump

380~415V, 3N, 50(60)Hz



			90	92	94	94
Model name			IZV-2520WV2GN1	IZV-2585WV2GN1	IZV-2650WV2GN1	IZV-2700WV2GN1
Combination type			28HP+28HP+34HP	28HP+30HP+34HP	30HP+30HP+34HP	30HP+32HP+34HP
Power supply			V/N/Hz 380-415/3/50(60)			
Cooling ¹	Capacity	kW	252.0	258.5	265.0	270.0
		kBtu/h	859.8	882.0	904.2	921.2
	Power input	kW	67.40	70.18	72.96	74.71
		EER	3.74	3.68	3.63	
Heating ²	Capacity	kW	281.0	288.5	296.0	301.0
		kBtu/h	958.8	984.4	1010.0	1027.0
	Power input	kW	66.3	68.4	70.6	
		COP	4.24	4.22	4.20	
Connected indoor unit	Total capacity		50-130% of outdoor unit capacity			
	Maximum quantity		64			
Compressors	Type		DC inverter			
	Quantity		6			
Fan motors	Type		DC			
	Quantity		6			
Refrigerant	Type		R410A			
	Static pressure		Pa 0-20 (default); 20-60 (customized)			
Pipe connections ³	Type		R410A			
	Factory charge		kg 22×2+25			
Air flow rate	Liquid pipe		mm Φ25.4			
	Gas pipe		mm Φ50.8			
Sound pressure level ⁴	m ³ /h		74000			
	dB(A)		70			
Net dimensions (W×H×D)		mm (1730×1830×850)×3				
Packed dimensions (W×H×D)		mm (1800×2000×910)×3				
Gross weight		kg 430×2+475				
Ambient temp. operation range		Cooling °C -5 ~ 54				
		Heating °C -25 ~ 24				

			84	86	88
Model name			IZV-2350WV2GN1	IZV-2405WV2GN1	IZV-2470WV2GN1
Combination type			24HP+26HP+34HP	24HP+28HP+34HP	24HP+30HP+34HP
Power supply			V/N/Hz 380-415/3/50(60)		
Cooling ¹	Capacity	kW	235.0	240.5	247.0
		kBtu/h	801.8	820.6	842.8
	Power input	kW	63.49	65.14	67.92
		EER	3.70	3.69	3.64
Heating ²	Capacity	kW	262.5	268.5	276.0
		kBtu/h	895.7	916.1	941.7
	Power input	kW	62.6	64.4	66.5
		COP	4.19	4.17	4.15
Connected indoor unit	Total capacity		50-130% of outdoor unit capacity		
	Maximum quantity		64		
Compressors	Type		DC inverter		
	Quantity		6		
Fan motors	Type		DC		
	Quantity		6		
Refrigerant	Type		R410A		
	Static pressure		Pa 0-20 (default); 20-60 (customized)		
Pipe connections ³	Type		R410A		
	Factory charge		kg 17+22+25		
Air flow rate	Liquid pipe		mm Φ25.4		
	Gas pipe		mm Φ50.8		
Sound pressure level ⁴	m ³ /h		66000		
	dB(A)		69		
Net dimensions (W×H×D)		mm (1340×1635×825)+(1730×1830×850)×2			
Packed dimensions (W×H×D)		mm (1405×1805×910)+(1800×2000×910)×2			
Gross weight		kg 348+430+475			
Ambient temp. operation range		Cooling °C -5 ~ 54			
		Heating °C -25 ~ 24			

- Notes:
- Indoor temperature 27°C DB, 19°C WB; outdoor temperature 35°C DB; equivalent refrigerant piping length 7.5m with zero level difference.
 - Indoor temperature 20°C DB; outdoor temperature 7°C DB, 6°C WB; equivalent refrigerant piping length 7.5m with zero level difference.
 - Diameters given are those for the pipe connecting the outdoor unit combination to the first indoor branch joint for systems with total equivalent liquid piping lengths of less than 90m. For systems with total equivalent liquid piping lengths of 90m or longer, please refer to the ZX Series Engineering Data for connection piping diameters..
 - Sound pressure level is measured at a position 1m in front of the unit and 1.3m above the floor in a semi-anechoic chamber.

			98	100	102
Model name			IZV-2750WV2GN1	IZV-2800WV2GN1	IZV-2850WV2GN1
Combination type			30HP+34HP+34HP	32HP+34HP+34HP	34HP+34HP+34HP
Power supply			V/N/Hz 380-415/3/50(60)		
Cooling ¹	Capacity	kW	275.0	280.0	285.0
		kBtu/h	938.3	955.4	972.4
	Power input	kW	77.20	78.94	81.43
		EER	3.56	3.55	3.50
Heating ²	Capacity	kW	307.0	312.0	318.0
		kBtu/h	1047.5	1064.5	1085.0
	Power input	kW	74.8	76.1	79.1
		COP	4.10	4.10	4.02
Connected indoor unit	Total capacity		50-130% of outdoor unit capacity		
	Maximum quantity		64		
Compressors	Type		DC inverter		
	Quantity		6		
Fan motors	Type		DC		
	Quantity		6		
Refrigerant	Type		R410A		
	Static pressure		Pa 0-20 (default); 20-60 (customized)		
Pipe connections ³	Type		R410A		
	Factory charge		kg 22+25×2		
Air flow rate	Liquid pipe		mm Φ25.4		
	Gas pipe		mm Φ50.8		
Sound pressure level ⁴	m ³ /h		73000		
	dB(A)		71		
Net dimensions (W×H×D)		mm (1730×1830×850)×3			
Packed dimensions (W×H×D)		mm (1800×2000×910)×3			
Gross weight		kg 430+475×2			
Ambient temp. operation range		Cooling °C -5 ~ 54			
		Heating °C -25 ~ 24			

- Notes:
- Indoor temperature 27°C DB, 19°C WB; outdoor temperature 35°C DB; equivalent refrigerant piping length 7.5m with zero level difference.
 - Indoor temperature 20°C DB; outdoor temperature 7°C DB, 6°C WB; equivalent refrigerant piping length 7.5m with zero level difference.
 - Diameters given are those for the pipe connecting the outdoor unit combination to the first indoor branch joint for systems with total equivalent liquid piping lengths of less than 90m. For systems with total equivalent liquid piping lengths of 90m or longer, please refer to the ZX Series Engineering Data for connection piping diameters..
 - Sound pressure level is measured at a position 1m in front of the unit and 1.3m above the floor in a semi-anechoic chamber.



Indoor Units
VRF indoor units



Fresh Air Processing Unit
100% fresh air supply



Ventilation
Heat recovery ventilator



AHU Connection Kit
Connect to other brand AHU



Control Systems
Smart control systems



Wide Capacity Range

Starting at 8HP, capacity increases in 2HP increments up to 34HP, which is the world's largest single VRF unit capacity.

8/10/12/14HP
(with single fan)



16/18/20HP
(with single fan)



22/24HP
(with dual fans)

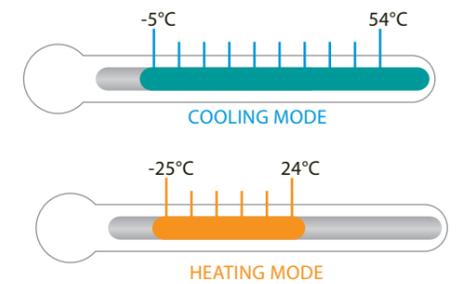


26/28/30/32/34HP
(with dual fans)



Wide Operation Range

The VX-i VRF can operate stably in a wide ambient temperature range: from -5°C to 54°C in cooling mode and from -25°C to 24°C in heating mode.



VRF ZX-i Series Heat Pump

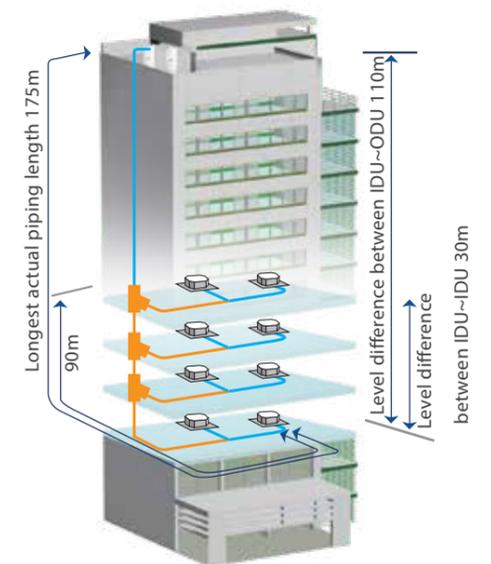
OPTIMIZED DESIGNED

- Energy Management System (EMS)
- Enhanced Vapor Injection (EVI) Compressor
- Triple Configurations
- High Efficiency G-Shape Heat Exchanger
- ESP up to 60Pa
- Plate Heat (PHE) Subcooling
- ▶ Precise Oil Control Technology
- ▶ Multi Silent Modes
- ▶ Duty Cycling
- ▶ Backup Operation
- ▶ UL Anti-Corrosion Certificate
- ▶ Refrigerant Cooling PCB
- ▶ Auto Snow-blowing Function
- ▶ Dust-clean Function
- ▶ Optional Multifunction PCB
- ▶ Automatic Refrigerant Detecting/Charging/Recycling

Long Piping Capability

- Total piping length: 1000m
- Longest piping length – actual (equivalent): 175m (200m)
- Longest piping length after first branch: 40/90*m
- Level difference between IDUs and ODU – ODU above (below): 90m (110m)
- Level difference between IDUs: 30m

*The longest length after first branch is 40m as standard but can be extended to up to 90m under certain conditions. Please contact your local Midea dealer for further information.



VRF ZX-i Series - Heat

380~415V, 3N, 50(60)Hz



HP			8	10	12	14
Model name			IZV-i252WV2GN1	IZV-i280WV2GN1	IZV-i335WV2GN1	IZV-i400WV2GN1
Power supply			380-415/3/50(60)			
Cooling ¹	Capacity	kW	25.2	28.0	33.5	40.0
		kBtu/h	86.0	95.5	114.3	136.5
	Power input	kW	5.79	7.20	8.93	10.96
	EER		4.35	3.89	3.75	3.65
Heating ²	Capacity	kW	27.0	31.5	37.5	45.0
		kBtu/h	92.1	107.5	128.0	153.5
	Power input	kW	5.19	6.18	8.43	10.98
	COP		5.20	5.10	4.45	4.10
Connected indoor unit	Total capacity	50-130% of outdoor unit capacity				
	Maximum quantity	13	16	20	23	
Compressors	Type	DC inverter				
	Quantity	1				
Fan motors	Motor type	DC				
	Quantity	1				
	Static pressure	Pa	0-20 (default); 20-60 (customized)			
Refrigerant	Type	R410A				
	Factory charge	kg	11			
Pipe connection ³	Liquid pipe	mm	Φ12.7		Φ15.9	Φ15.9
	Gas pipe	mm	Φ25.4		Φ28.6	Φ31.8
Air flow rate		m ³ /h	11000			
Sound pressure level ⁴		dB(A)	58	58	60	60
Net dimensions (W×H×D)		mm	990×1635×790			
Packed dimensions (W×H×D)		mm	1090×1805×860			
Net weight		kg	227			
Gross weight		kg	242			
Ambient temp. operation range	Cooling	°C	-5 ~ 54			
	Heating	°C	-25 ~ 24			

VRF ZX-i Series - Heat

380~415V, 3N, 50(60)Hz



HP			22	24
Model name			IZV-i615WV2GN1	IZV-i670WV2GN1
Power supply			380-415/3/50(60)	
Cooling ¹	Capacity	kW	61.5	67.0
		kBtu/h	209.8	228.6
	Power input	kW	19.04	21.61
	EER		3.23	3.10
Heating ²	Capacity	kW	69.0	75.0
		kBtu/h	235.4	255.9
	Power input	kW	18.02	20.00
	COP		3.83	3.75
Connected indoor unit	Total capacity	50-130% of outdoor unit capacity		
	Maximum quantity	36		39
Compressors	Type	DC inverter		
	Quantity	2		
Fan motors	Motor type	DC		
	Quantity	2		
	Static pressure	Pa	0-20 (default); 20-60 (customized)	
Refrigerant	Type	R410A		
	Factory charge	kg	17	
Pipe connection ³	Liquid pipe	mm	Φ19.1	
	Gas pipe	mm	Φ31.8	
Air flow rate		m ³ /h	17000	
Sound pressure level ⁴		dB(A)	63	
Net dimensions (W×H×D)		mm	1340×1635×825	
Packed dimensions (W×H×D)		mm	1405×1805×910	
Net weight		kg	344	
Gross weight		kg	364	
Ambient temp. operation range	Cooling	°C	-5 ~ 54	
	Heating	°C	-25 ~ 24	

HP			16	18	20
Model name			IZV-i450WV2GN1	IZV-i500WV2GN1	IZV-i560WV2GN1
Power supply			380-415/3/50(60)		
Cooling ¹	Capacity	kW	45.0	50.0	56.0
		kBtu/h	153.5	170.6	191.1
	Power input	kW	13.04	14.71	16.47
	EER		3.45	3.40	3.40
Heating ²	Capacity	kW	50.0	56.0	63.0
		kBtu/h	170.6	191.1	215.0
	Power input	kW	11.90	13.66	15.75
	COP		4.20	4.10	4.00
Connected indoor unit	Total capacity	50-130% of outdoor unit capacity			
	Maximum quantity	26	29	33	
Compressors	Type	DC inverter			
	Quantity	1			
Fan motors	Motor type	DC			
	Quantity	1			
	Static pressure	Pa	0-20 (default); 20-60 (customized)		
Refrigerant	Type	R410A			
	Factory charge	kg	13		
Pipe connection ³	Liquid pipe	mm	Φ15.9	Φ19.1	Φ19.1
	Gas pipe	mm	Φ31.8	Φ31.8	Φ31.8
Air flow rate		m ³ /h	13000		
Sound pressure level ⁴		dB(A)	60	61	62
Net dimensions (W×H×D)		mm	1340×1635×850		
Packed dimensions (W×H×D)		mm	1405×1805×910		
Net weight		kg	277		295
Gross weight		kg	304		322
Ambient temp. operation range	Cooling	°C	-5 ~ 54		
	Heating	°C	-25 ~ 24		

Notes:

- Indoor temperature 27°C DB, 19°C WB; outdoor temperature 35°C DB; equivalent refrigerant piping length 7.5m with zero level difference.
- Indoor temperature 20°C DB; outdoor temperature 7°C DB, 6°C WB; equivalent refrigerant piping length 7.5m with zero level difference.
- Diameters given are those of the unit's stop valve.
- Sound pressure level is measured at a position 1m in front of the unit and 1.3m above the floor in a semi-anechoic chamber.

HP			26	28	30	32	34
Model name			IZV-i730WV2GN1	IZV-i785WV2GN1	IZV-i850WV2GN1	IZV-i900WV2GN1	IZV-i950WV2GN1
Power supply			380-415/3/50(60)				
Cooling ¹	Capacity	kW	73.0	78.5	85.0	90.0	95.0
		kBtu/h	249.1	267.8	290.0	307.1	324.1
	Power input	kW	21.47	24.01	27.42	28.48	30.65
	EER		3.40	3.27	3.10	3.16	3.10
Heating ²	Capacity	kW	81.5	87.5	95.0	100.0	106.0
		kBtu/h	278.1	298.6	324.1	341.2	361.7
	Power input	kW	20.63	24.31	27.14	29.41	32.12
	COP		3.95	3.60	3.50	3.40	3.30
Connected indoor unit	Total capacity	50-130% of outdoor unit capacity					
	Maximum quantity	43	46	50	53	56	
Compressors	Type	DC inverter					
	Quantity	2					
Fan motors	Motor type	DC					
	Quantity	2					
	Static pressure	Pa	0-20 (default); 20-60 (customized)				
Refrigerant	Type	R410A					
	Factory charge	kg	22		25		
Pipe connection ³	Liquid pipe	mm	Φ22.2			Φ38.1	
	Gas pipe	mm	Φ31.8				Φ38.1
Air flow rate		m ³ /h	25000		24000		
Sound pressure level ⁴		dB(A)	64				
Net dimensions (W×H×D)		mm	1730×1830×850				
Packed dimensions (W×H×D)		mm	1800×2000×910				
Net weight		kg	407	429	475		
Gross weight		kg	430	452	507		
Ambient temp. operation range	Cooling	°C	-5 ~ 54				
	Heating	°C	-25 ~ 24				

Notes:

- Indoor temperature 27°C DB, 19°C WB; outdoor temperature 35°C DB; equivalent refrigerant piping length 7.5m with zero level difference.
- Indoor temperature 20°C DB; outdoor temperature 7°C DB, 6°C WB; equivalent refrigerant piping length 7.5m with zero level difference.
- Diameters given are those of the unit's stop valve.
- Sound pressure level is measured at a position 1m in front of the unit and 1.3m above the floor in a semi-anechoic chamber.

-  Indoor Units
VRF indoor units
-  Fresh Air Processing Unit
100% fresh air supply
-  Ventilation
Heat recovery ventilator
-  AHU Connection Kit
Connect to third party DX AHU
-  Control Systems
Smart control systems



VRF Cooling Only Models

OPTIMIZED DESIGN

- ▶ Energy Management System (EMS)
- ▶ Triple Configurations
- ▶ High Efficiency G-Shape Heat Exchanger
- ▶ ESP up to 60Pa
- ▶ Precise Oil Control Technology
- ▶ Multi Silent Modes
- ▶ Duty Cycling
- ▶ Backup Operation
- ▶ Refrigerant Cooling PCB
- ▶ Dust-clean Function
- ▶ Automatic Refrigerant Detecting/Charging

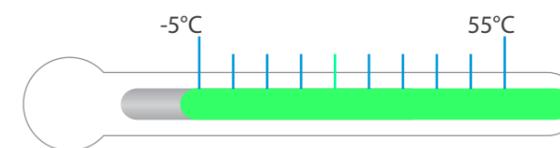
Wide Capacity Range

For single unit, the footprint is small and maximum capacity is up to 30HP. For combined units, maximum three 30HP units can be combined with capacity up to 90HP.



Wide Operation Range

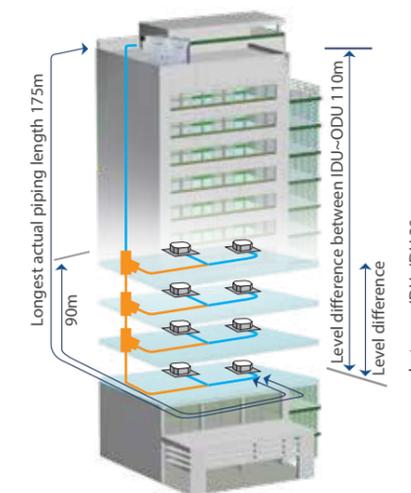
The VC Pro VRF can operate stably in a wide ambient temperature range: from -5°C to 55°C in cooling mode.



Long Piping Capability

- Total piping length: 1000m
- Longest piping length-actual (equivalent): 175m(200m)
- Longest piping length after first branch: 40/90*m
- Level difference between IDUs and ODU-ODU above (below): 90m (110m)
- Level difference between IDUs: 30m

*The longest length after 1st branch is 40m as standard but can be extended up to 90m under certain conditons. Please contact your local Midea dealer for further information.



Oil Balance pipe not required

With the new oil management system, there is no need of oil balance pipe.



VRF VC Pro Series - Cooling Only

380~415V, 3N, 50(60)Hz



HP	8		10		12	
Model name	IVC-224WV2GN1		IVC-280WV2GN1		IVC-335WV2GN1	
Power supply	V/N/Hz		380-415/3/50(60)			
Cooling ¹	Capacity	kW	22.4	28.0	33.5	
		kBtu/h	76.5	95.6	114.4	
	Power input	kW	5.17	6.81	9.13	
		EER	4.33	4.11	3.67	
Connected indoor unit	Total capacity		50-130%			
	Maximum quantity		13	16	20	
Compressor	Type		DC inverter			
	Quantity		1			
Fan	Type		DC			
	Model		ZKSN-560-8-42L			
	Quantity		1			
	Motor output	kW	0.56			
	Max. ESP	Pa	20 default;60 customization option			
	Airflow rate	m ³ /h	10400	10800		
Refrigerant	Type		R410A			
	Factory charge	kg	8			
Pipe connections ²	Liquid pipe	mm	Φ12.7	Φ12.7	Φ15.9	
	Gas pipe	mm	Φ25.4	Φ25.4	Φ28.6	
Sound pressure level ³	dB(A)		57	58	60	
Net dimensions (W×H×D)	mm		960×1615×765			
Packed dimensions (W×H×D)	mm		1025×1790×830			
Net weight	kg		188			
Gross weight	kg		204			
Ambient temp.	Cooling	°C	-5 °C to 55 °C			

VRF VC Pro Series - Cooling Only

380~415V, 3N, 50(60)Hz



HP	22		24		26	
Model name	IVC-615WV2GN1		IVC-670WV2GN1		IVC-730WV2GN1	
Power supply	V/N/Hz		380-415/3/50(60)			
Cooling ¹	Capacity	kW	61.5	67.0	73.0	
		kBtu/h	210.0	228.8	249.3	
	Power input	kW	20.23	20.68	23.40	
		EER	3.04	3.24	3.12	
Connected indoor unit	Total capacity		50-130%			
	Maximum quantity		36	39	43	
Compressor	Type		DC inverter			
	Quantity		2			
Fan	Type		DC			
	Model		ZKSN-560-8-42L			
	Quantity		2			
	Motor output	kW	0.56×2			
	Max. ESP	Pa	20 default;60 customization option			
	Airflow rate	m ³ /h	12200	19600		
Refrigerant	Type		R410A			
	Factory charge	kg	13	19		
Pipe connections ²	Liquid pipe	mm	Φ19.1		Φ22.2	
	Gas pipe	mm	Φ31.8		Φ31.8	
Sound pressure level ³	dB(A)		63	64		
Net dimensions (W×H×D)	mm		1250×1615×765	1585×1615×765		
Packed dimensions (W×H×D)	mm		1305×1790×820	1650×1810×840		
Net weight	kg		278	338		
Gross weight	kg		297	362		
Ambient temp.	Cooling	°C	-5 °C to 55 °C			

HP	14		16		18		20	
Model name	IVC-400WV2GN1		IVC-450WV2GN1		IVC-500WV2GN1		IVC-560WV2GN1	
Power supply	V/N/Hz		380-415/3/50(60)					
Cooling ¹	Capacity	kW	40.0	45.0	50.0		56.0	
		kBtu/h	136.6	153.7	170.8		191.3	
	Power input	kW	10.58	12.26	14.88		17.66	
		EER	3.78	3.67	3.36		3.17	
Connected indoor unit	Total capacity		50-130%					
	Maximum quantity		23	26	29	33		
Compressor	Type		DC inverter					
	Quantity		1		2			
Fan	Type		DC					
	Model		ZKSN-750-8-2		ZKSN-560-8-42L			
	Quantity		1		2			
	Motor output	kW	0.75		0.56×2			
	Max. ESP	Pa	20 default;60 customization option					
	Airflow rate	m ³ /h	11600		12000	12200		
Refrigerant	Type		R410A		R410A			
	Factory charge	kg	11		13			
Pipe connections ²	Liquid pipe	mm	Φ15.9		Φ19.1			
	Gas pipe	mm	Φ31.8		Φ31.8			
Sound pressure level ³	dB(A)		60		63			
Net dimensions (W×H×D)	mm		960×1615×765		1250×1615×765			
Packed dimensions (W×H×D)	mm		1025×1790×830		1305×1790×820			
Net weight	kg		197		278			
Gross weight	kg		213		297			
Ambient temp.	Cooling	°C	-5 °C to 55 °C					

HP	28		30	
Model name	IVC-785WV2GN1		IVC-850WV2GN1	
Power supply	V/N/Hz		380-415/3/50(60)	
Cooling ¹	Capacity	kW	78.5	85.0
		kBtu/h	268.1	290.3
	Power input	kW	26.08	29.51
		EER	3.01	2.88
Connected indoor unit	Total capacity		50-130%	
	Maximum quantity		46	50
Compressor	Type		DC inverter	
	Quantity		2	
Fan	Type		DC	
	Model		ZKSN-560-8-42L	
	Quantity		2	
	Motor output	kW	0.56×2	
	Max. ESP	Pa	20 default;60 customization option	
	Airflow rate	m ³ /h	20600	
Refrigerant	Type		R410A	
	Factory charge	kg	19	
Pipe connections ²	Liquid pipe	mm	Φ22.2	
	Gas pipe	mm	Φ31.8	Φ38.1
Sound pressure level ³	dB(A)		64	
Net dimensions (W×H×D)	mm		1585×1615×765	
Packed dimensions (W×H×D)	mm		1650×1810×840	
Net weight	kg		338	
Gross weight	kg		362	
Ambient temp.	Cooling	°C	-5 °C to 55 °C	

Notes:

- Indoor temperature 27°C DB, 19°C WB; outdoor temperature 35°C DB; equivalent refrigerant piping length 7.5m with zero level difference.
- Diameters given are those of the unit's accessories.
- Sound pressure level is measured at a position 1m in front of the unit and 1.3m above the floor in a semi-anechoic chamber.

Notes:

- Indoor temperature 27°C DB, 19°C WB; outdoor temperature 35°C DB; equivalent refrigerant piping length 7.5m with zero level difference.
- Diameters given are those of the unit's accessories.
- Sound pressure level is measured at a position 1m in front of the unit and 1.3m above the floor in a semi-anechoic chamber.

VRF VC Pro Series - Cooling Only

380~415V, 3N, 50(60)Hz



HP	32		34		36		38	
Model name	IVC-900WV2GN1		IVC-950WV2GN1		IVC-1010WV2GN1		IVC-1065WV2GN1	
Combination type	16HP+16HP		22HP+12HP		20HP+16HP		22HP+16HP	
Power supply	V/N/Hz		380-415/3/50(60)					
Cooling ¹	Capacity	kW	90.0	95.0	101.0	106.5		
		kBtu/h	307.4	324.4	345.0	363.7		
	Power input	kW	24.52	29.36	29.92	32.49		
	EER		3.67	3.24	3.38	3.28		
Connected indoor unit	Total capacity	50-130%						
	Maximum quantity	53	56	59	63			
Compressor	Type	DC inverter						
	Quantity	2	3			3		
Fan	Type	DC						
	Quantity	2	3			3		
	Max. ESP	Pa	20 default;60 customization option					
Refrigerant	Type	R410A						
	Factory charge	kg	11×2	13+8	13+11			
Pipe connections ²	Liquid pipe	mm	19.1	19.1	19.1			
	Gas pipe	mm	31.8	31.8	38.1			
Sound pressure level ³	dB(A)	64	65					
Net dimensions (W×H×D)	mm	(960×1615×765)×2		(1250×1615×765)+(960×1615×765)				
Packed dimensions (W×H×D)	mm	(1025×1790×830)×2		(1305×1790×820)+(1025×1790×830)				
Net weight	kg	188×2		278+188				
Gross weight	kg	204×2		297+204				
Ambient temp.	Cooling	°C	-5°C to 55 °C					

VRF VC Pro Series - Cooling Only

380~415V, 3N, 50(60)Hz



HP	46		48		50		52	
Model name	IVC-1300WV2GN1		IVC-1345WV2GN1		IVC-1400WV2GN1		IVC-1465WV2GN1	
Combination type	30HP+16HP		26HP+22HP		28HP+22HP		30HP+22HP	
Power supply	V/N/Hz		380-415/3/50(60)					
Cooling ¹	Capacity	kW	130.0	134.5	140.0	146.5		
		kBtu/h	444.0	459.3	478.1	500.3		
	Power input	kW	41.77	43.63	46.31	49.74		
	EER		3.11	3.08	3.02	2.95		
Connected indoor unit	Total capacity	50-130%						
	Maximum quantity	64						
Compressor	Type	DC inverter						
	Quantity	3	4			4		
Fan	Type	DC						
	Quantity	3	4			4		
	Max. ESP	Pa	20 default;60 customization option					
Refrigerant	Type	R410A						
	Factory charge	kg	19+11	19+13				
Pipe connections ²	Liquid pipe	mm	19.1					
	Gas pipe	mm	38.1					
Sound pressure level ³	dB(A)	66						
Net dimensions (W×H×D)	mm	(1585×1615×765)+(960×1615×765)		(1585×1615×765)+(1250×1615×765)				
Packed dimensions (W×H×D)	mm	(1650×1810×840)+(1025×1790×830)		(1650×1810×840)+(1305×1790×820)				
Net weight	kg	338+188						
Gross weight	kg	362+204						
Ambient temp.	Cooling	°C	-5°C to 55 °C					

HP	40		42		44	
Model name	IVC-1120WV2GN1		IVC-1180WV2GN1		IVC-1235WV2GN1	
Combination type	24HP+16HP		26HP+16HP		28HP+16HP	
Power supply	V/N/Hz		380-415/3/50(60)			
Cooling ¹	Capacity	kW	112.0	118.0	123.5	
		kBtu/h	382.5	403.0	421.8	
	Power input	kW	32.94	35.66	38.34	
	EER		3.40	3.31	3.22	
Connected indoor unit	Total capacity	50-130%				
	Maximum quantity	64				
Compressor	Type	DC inverter				
	Quantity	3				
Fan	Type	DC				
	Quantity	3				
	Max. ESP	Pa	20 default;60 customization option			
Refrigerant	Type	R410A				
	Factory charge	kg	19+11			
Pipe connections ²	Liquid pipe	mm	19.1			
	Gas pipe	mm	38.1			
Sound pressure level ³	dB(A)	65			66	
Net dimensions (W×H×D)	mm	(1585×1615×765)+(960×1615×765)				
Packed dimensions (W×H×D)	mm	(1650×1810×840)+(1025×1790×830)				
Net weight	kg	338+188				
Gross weight	kg	362+204				
Ambient temp.	Cooling	°C	-5°C to 55 °C			

HP	54		56		58	
Model name	IVC-1515WV2GN1		IVC-1570WV2GN1		IVC-1635WV2GN1	
Combination type	28HP+26HP		28HP+28HP		30HP+28HP	
Power supply	V/N/Hz		380-415/3/50(60)			
Cooling ¹	Capacity	kW	151.5	157.0	163.5	
		kBtu/h	517.4	536.2	558.4	
	Power input	kW	49.48	52.16	55.59	
	EER		3.06	3.01	2.94	
Connected indoor unit	Total capacity	50-130%				
	Maximum quantity	64				
Compressor	Type	DC inverter				
	Quantity	4				
Fan	Type	DC				
	Quantity	4				
	Max. ESP	Pa	20 default;60 customization option			
Refrigerant	Type	R410A				
	Factory charge	kg	19×2			
Pipe connections ²	Liquid pipe	mm	19.1			
	Gas pipe	mm	38.1	41.2		
Sound pressure level ³	dB(A)	66	66			
Net dimensions (W×H×D)	mm	(1585×1615×765)×2				
Packed dimensions (W×H×D)	mm	(1650×1810×840)×2				
Net weight	kg	338×2				
Gross weight	kg	362×2				
Ambient temp.	Cooling	°C	-5°C to 55 °C			

- Notes:
- Indoor temperature 27°C DB, 19°C WB; outdoor temperature 35°C DB; equivalent refrigerant piping length 7.5m with zero level difference.
 - Diameters given are those for the pipe connecting the outdoor unit combination to the first indoor branch joint for systems with total equivalent liquid piping lengths of less than 90m. For systems with total equivalent liquid piping lengths of 90m or longer, please refer to the VC Pro Series Engineering Data Book for connection piping diameters.
 - Sound pressure level is measured at a position 1m in front of the unit and 1.3m above the floor in a semi-anechoic chamber.

- Notes:
- Indoor temperature 27°C DB, 19°C WB; outdoor temperature 35°C DB; equivalent refrigerant piping length 7.5m with zero level difference.
 - Diameters given are those for the pipe connecting the outdoor unit combination to the first indoor branch joint for systems with total equivalent liquid piping lengths of less than 90m. For systems with total equivalent liquid piping lengths of 90m or longer, please refer to the VC Pro Series Engineering Data Book for connection piping diameters.
 - Sound pressure level is measured at a position 1m in front of the unit and 1.3m above the floor in a semi-anechoic chamber.

VRF VC Pro Series - Cooling Only

380~415V, 3N, 50(60)Hz



HP	60		62		64		66		
Model name	IVC-1700WV2GN1		IVC-1750WV2GN1		IVC-1795WV2GN1		IVC-1850WV2GN1		
Combination type	30HP+30HP		30HP+16HP+16HP		26HP+22HP+16HP		28HP+22HP+16HP		
Power supply	V/N/Hz		380-415/3/50(60)						
Cooling ¹	Capacity	kW	170.0	175.0	179.5	185.0			
		kBtu/h	580.6	597.8	613.0	631.8			
	Power input	kW	59.02	54.03	55.89	58.57			
	EER		2.88	3.24	3.21	3.16			
Connected indoor unit	Total capacity	50-130%							
	Maximum quantity	64							
Compressor	Type	DC inverter							
	Quantity	4				5			
Fan	Type	DC							
	Quantity	4				5			
	Max. ESP	Pa	20 default;60 customization option						
Refrigerant	Type	R410A							
	Factory charge	kg	19x2	19+11x2	19+13+11				
Pipe connections ²	Liquid pipe	mm	19.1						
	Gas pipe	mm	41.2						
Sound pressure level ³	dB(A)	66							
Net dimensions (WxHxD)	mm	(1585x1615x765)x2	(1585x1615x765)+(960x1615x765)x2	(1585x1615x765)+(1250x1615x765)+(960x1615x765)					
Packed dimensions (WxHxD)	mm	(1650x1810x840)x2	(1650x1810x840)+(1025x1790x830)x2	(1650x1810x840)+(1305x1790x820)+(1025x1790x830)					
Net weight	kg	338x2	338+188x2	338+278+197					
Gross weight	kg	362x2	362+204x2	362+297+213					
Ambient temp	Cooling	°C	-5°C to 55 °C						

HP	68		70		72		74		
Model name	IVC-1915WV2GN1		IVC-1965WV2GN1		IVC-2020WV2GN1		IVC-2085WV2GN1		
Combination type	30HP+22HP+16HP		28HP+26HP+16HP		28HP+28HP+16HP		30HP+28HP+16HP		
Power supply	V/N/Hz		380-415/3/50(60)						
Cooling ¹	Capacity	kW	191.5	196.5	202.0	208.5			
		kBtu/h	654.1	671.1	689.9	712.2			
	Power input	kW	62.00	61.74	64.42	67.85			
	EER		3.09	3.18	3.14	3.07			
Connected indoor unit	Total capacity	50-130%							
	Maximum quantity	64							
Compressor	Type	DC inverter							
	Quantity	5							
Fan	Type	DC							
	Quantity	5							
	Max. ESP	Pa	20 default;60 customization option						
Refrigerant	Type	R410A							
	Factory charge	kg	19+13+11	19x2+11					
Pipe connections ²	Liquid pipe	mm	22.2						
	Gas pipe	mm	44.5						
Sound pressure level ³	dB(A)	67		68					
Net dimensions (WxHxD)	mm	(1585x1615x765)+(1250x1615x765)+(960x1615x765)	(1585x1615x765)x2+(960x1615x765)						
Packed dimensions (WxHxD)	mm	(1650x1810x840)+(1305x1790x820)+(1025x1790x830)	(1650x1810x840)x2+(1025x1790x830)						
Net weight	kg	338+278+197	338x2+188						
Gross weight	kg	362+297+213	362x2+204						
Ambient temp	Cooling	°C	-5°C to 55 °C						

- Notes:
- Indoor temperature 27°C DB, 19°C WB; outdoor temperature 35°C DB; equivalent refrigerant piping length 7.5m with zero level difference.
 - Diameters given are those for the pipe connecting the outdoor unit combination to the first indoor branch joint for systems with total equivalent liquid piping lengths of less than 90m. For systems with total equivalent liquid piping lengths of 90m or longer, please refer to the VC Pro Series Engineering Data Book for connection piping diameters.
 - Sound pressure level is measured at a position 1m in front of the unit and 1.3m above the floor in a semi-anechoic chamber.

VRF VC Pro Series - Cooling Only

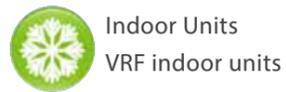
380~415V, 3N, 50(60)Hz



HP	76		78		80		82		
Model name	IVC-2150WV2GN1		IVC-2185WV2GN1		IVC-2250WV2GN1		IVC-2315WV2GN1		
Combination type	30HP+30HP+16HP		28HP+28HP+22HP		30HP+28HP+22HP		30HP+30HP+22HP		
Power supply	V/N/Hz		380-415/3/50(60)						
Cooling ¹	Capacity	kW	215.0	218.5	225.0	231.5			
		kBtu/h	734.4	746.2	768.4	790.6			
	Power input	kW	71.28	72.39	75.82	79.25			
	EER		3.02	3.02	2.97	2.92			
Connected indoor unit	Total capacity	50-130%							
	Maximum quantity	64							
Compressor	Type	DC inverter							
	Quantity	5		6					
Fan	Type	DC							
	Quantity	5		6					
	Max. ESP	Pa	20 default;60 customization option						
Refrigerant	Type	R410A							
	Factory charge	kg	19x2+11	19x2+13					
Pipe connections ²	Liquid pipe	mm	22.2						
	Gas pipe	mm	44.5						
Sound pressure level ³	dB(A)	68							
Net dimensions (WxHxD)	mm	(1585x1615x765)x2+(960x1615x765)	(1585x1615x765)x2+(1250x1615x765)						
Packed dimensions (WxHxD)	mm	(1650x1810x840)x2+(1025x1790x830)	(1650x1810x840)x2+(1305x1790x820)						
Net weight	kg	338x2+188							
Gross weight	kg	362x2+204							
Ambient temp	Cooling	°C	-5°C to 55 °C						

HP	84		86		88		90		
Model name	IVC-2355WV2GN1		IVC-2420WV2GN1		IVC-2485WV2GN1		IVC-2550WV2GN1		
Combination type	28HP+28HP+28HP		30HP+28HP+28HP		30HP+30HP+28HP		30HP+30HP+30HP		
Power supply	V/N/Hz		380-415/3/50(60)						
Cooling ¹	Capacity	kW	235.5	242.0	248.5	255.0			
		kBtu/h	804.3	826.5	848.7	870.9			
	Power input	kW	78.24	81.67	85.10	88.53			
	EER		3.01	2.96	2.92	2.88			
Connected indoor unit	Total capacity	50-130%							
	Maximum quantity	64							
Compressor	Type	DC inverter							
	Quantity	6							
Fan	Type	DC							
	Quantity	6							
	Max. ESP	Pa	20 default;60 customization option						
Refrigerant	Type	R410A							
	Factory charge	kg	19x3						
Pipe connections ²	Liquid pipe	mm	25.4						
	Gas pipe	mm	50.8						
Sound pressure level ³	dB(A)	68							
Net dimensions (WxHxD)	mm	(1585x1615x765)x3							
Packed dimensions (WxHxD)	mm	(1650x1810x840)x3							
Net weight	kg	338x3							
Gross weight	kg	362x3							
Ambient temp	Cooling	°C	-5°C to 55 °C						

- Notes:
- Indoor temperature 27°C DB, 19°C WB; outdoor temperature 35°C DB; equivalent refrigerant piping length 7.5m with zero level difference.
 - Diameters given are those for the pipe connecting the outdoor unit combination to the first indoor branch joint for systems with total equivalent liquid piping lengths of less than 90m. For systems with total equivalent liquid piping lengths of 90m or longer, please refer to the VC Pro Series Engineering Data Book for connection piping diameters.
 - Sound pressure level is measured at a position 1m in front of the unit and 1.3m above the floor in a semi-anechoic chamber.



Indoor Units
VRF indoor units



Ventilation
Heat recovery ventilator



Control Systems
Smart control systems



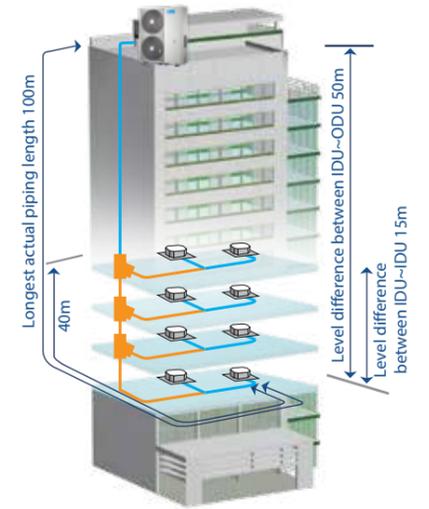
Mini VRF System Heat Pump

Optimized design for middle-sized buildings

- ▶ Capacity up to 16HP
- ▶ Connectable Indoor Units Quantity up to 20
- ▶ Precise Oil Control Technology
- ▶ Advanced Silence Technology

Special Features

Piping length	Capability		
	20/22.4/26kW	28/33.5kW	40/45kW
Total piping length	120m	150m	250m
Longest length - actual (equivalent)	60m (70m)	100(110)m	100m (120m)
Longest length after first branch	20m	40m	40m
Longest length after nearest branch	15m	15m	15m
Largest height difference between indoor and outdoor units - ODU up (down)	30m (20m)	50m(40m)	30m (20m)
Largest height difference between indoor units	8m	15m	8m



Mini VRF, Heat Pump



HP		7	8	9	10	12	14	16	
Model		IZV-V200W/DRN1	IZV-V224W/DRN1	IZV-V260W/DRN1	IZVT-V280W/DGN1	IZVT-V335W/DGN1	IZV-V400W/DRN1	IZV-V450W/DRN1	
Power supply	V/N/Hz	380-415/3/50			380-415/3/50 (60)		380-415/3/50		
Cooling (T1/T3)	Capacity	kW	20.0	22.4	26.0	28.0/25.0	33.5/28.0	40.0	45.0
	Power input	kW	6.1	6.8	7.6	6.83/7.9	9.2/10.0	11.9	13.6
	EER		3.28	3.29	3.42	4.10/3.16	3.64/2.80	3.35	3.32
Heating	Capacity	kW	22.0	24.5	28.5	31.5	37.5	45.0	50.0
	Power input	kW	6.1	5.9	6.8	7.5	9.2	11.1	12.7
	COP		3.61	4.15	4.19	4.20	4.08	4.05	3.93
Connectable indoor unit	Total capacity	50~130% of outdoor unit capacity							
	Max. quantity	10	11	12	16	20	14	15	
Compressor	Type	DC inverter							
	Quantity	1	1	1	1	1	2	2	
Fan motor	Type	DC motor			DC motor		DC motor + AC motor		
	Quantity	2	2	2	2	2	2	2	
Refrigerant	Type	R410A							
	Factory charging	kg	4.8	6.2	6.2	8	8	9	12
Pipe connections	Liquid pipe	mm	Φ9.53	Φ9.53	Φ9.53	Φ9.5	Φ12.7	Φ12.7	Φ12.7
	Gas pipe	mm	Φ19.1	Φ19.1	Φ22.2	Φ22.2	Φ25.4	Φ22.2	Φ25.4
Air flow rate	m ³ /h	10999	10494	10494	11000	11300	16575	16575	
Sound pressure level	dB(A)	59	59	60	59	61	62	62	
Net dimension (WxHxD)	mm	1120x1558x528			1120x1558x528		1360x1650x540	1460x1650x540	
Packing size (WxHxD)	mm	1270x1720x565			1270x1720x565		1450x1785x560	1550x1785x560	
Net weight	kg	137	146.5	147	157		240	275	
Gross weight	kg	153	162.5	163	173		260	290	
Operating temperature range	°C	Cooling: -15~46; Heating: -15~24			Coolin: -5~54 Heating: -20~24		Cooling: -5~48; Heating: -15~24		

Notes:

Capacities are based on the following conditions:

T1 Cooling: Indoor temperature 27°C DB/19°C WB; Outdoor temperature 35°C DB/24°C WB.

T3 Cooling: Indoor temperature 29°C DB/19°C WB; Outdoor temperature 46°C DB/24°C WB.

Heating: Indoor temperature 20°C DB/15°C WB; Outdoor temperature 7°C DB/6°C WB.

Piping length: Interconnecting piping length 7.5m, level difference of zero.

Sound values are measured in a semi-anechoic room, at a position 1m in front of the unit and 1m above the floor.

 Indoor Units
VRF indoor units

 Ventilation
Heat recovery ventilator

 Control Systems
Smart control systems



VRF Plus R Series - Heat Recovery

Offers simultaneous cooling and heating operation in one system

- ▶ Precise Oil Control Technology
- ▶ Night Silent Modes
- ▶ Duty Cycling
- ▶ Backup Operation
- ▶ ESP up to 60Pa

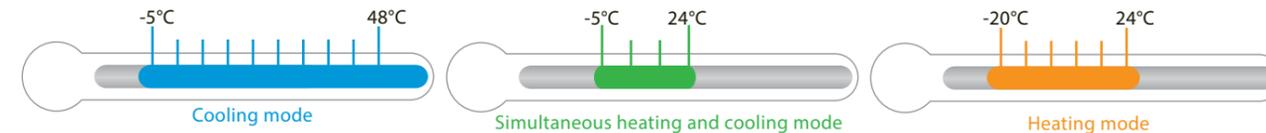
Wide Capacity Range

V4+R Series has extensive capacity ranging from 8HP to 64HP, meets all customer requirement concerning small to large buildings.

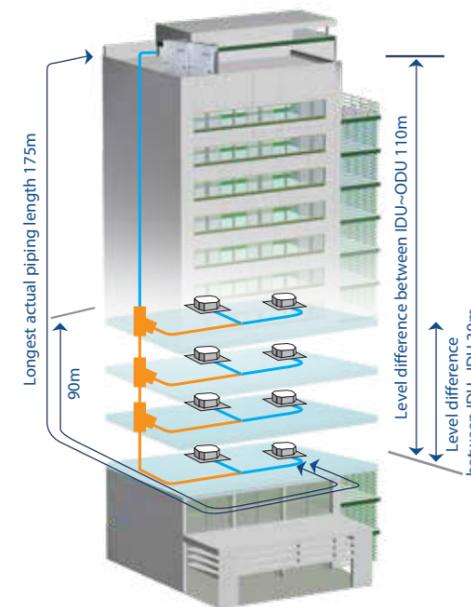


Wide Operation Range

The outdoor temperature can go from as low as -20°C to 24°C for heating mode and from -5°C to as high as 48°C for cooling mode. As for the simultaneous heating and cooling mode, it can run from -5°C to 24°C.



Long Piping Capability

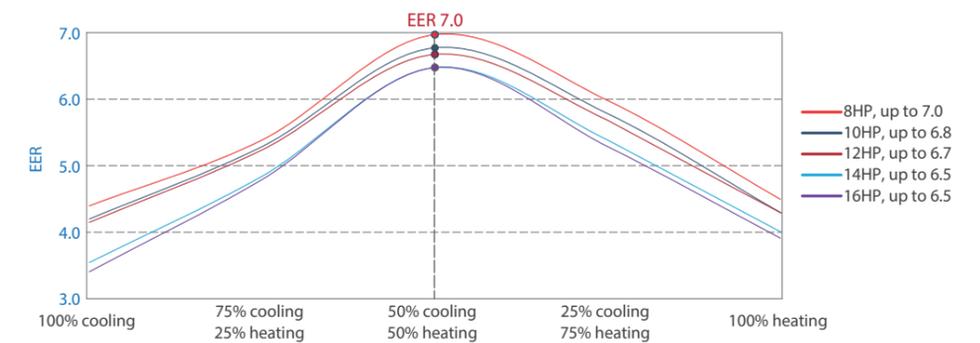


Piping length	Capability
Total piping length	1000m
Longest length - actual (equivalent)	175m (200m)
Longest length after first branch	90m*
Longest length from MS to its downstream indoor unit	40m
Largest height difference between indoor and outdoor units - ODU up (down)	70m (110m)
Largest height difference between indoor units	30m

*The longest length after first branch is 40m as standard but can be extended to up to 90m under certain conditions. Please contact your local Midea dealer for further information.

Heat Recovery, EER up to 7.0

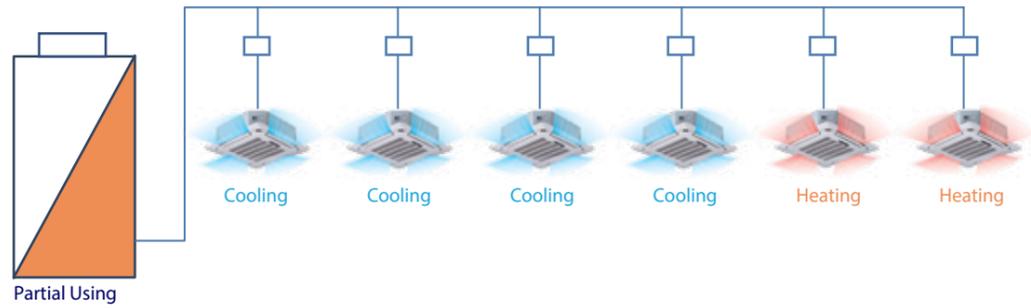
Heat recovery is achieved by diverting exhaust heat from indoor units in cooling mode to areas requiring heating, maximizing energy efficiency, reducing electricity costs and leading to high part load efficiencies (up to 7.0 in the 8HP category).



EER in simultaneous cooling and heating mode are based on the following condition:
Outdoor temperature 7°CDB/6°CWB, indoor temperature 27°CDB/19°CWB for cooling, indoor temperature 20°CDB for heating.

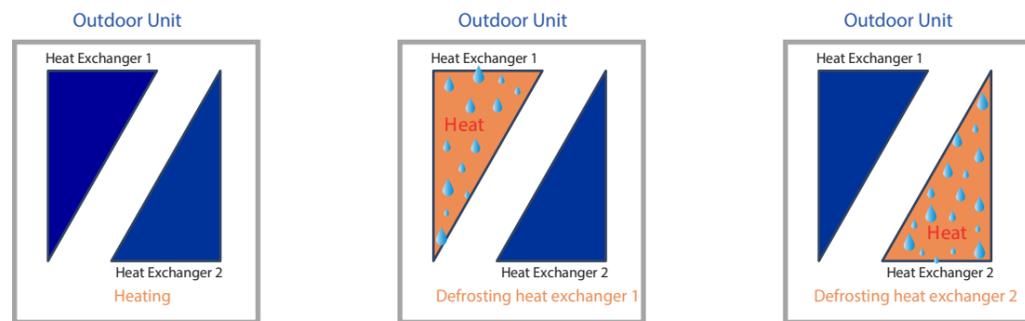
Adjustable Outdoor Heat Exchanger

Two parts condenser individual design, the unit can distribute a part of evaporator to be as condensing area according to the heating load requirement to improve the utilization rate of the condenser.



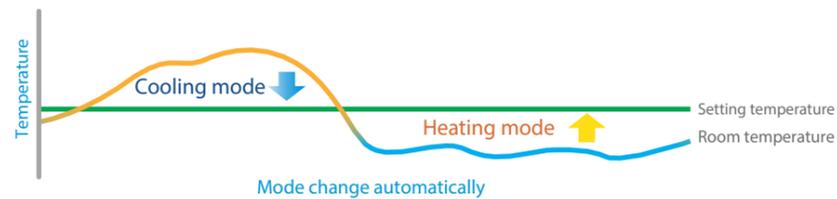
Continuous Heating During Defrost Operation

Each heat exchanger is defrosted by using heat transferred from one heat exchanger to the other in the outdoor unit. Defrost has no impact on the indoor unit on heating mode.



Auto Mode Control

Under the Auto Mode, the indoor unit can change the operation mode automatically, to keep the indoor temperature at a constant level.



Note: Auto Mode can be activated only with wired controller KJR-120B.

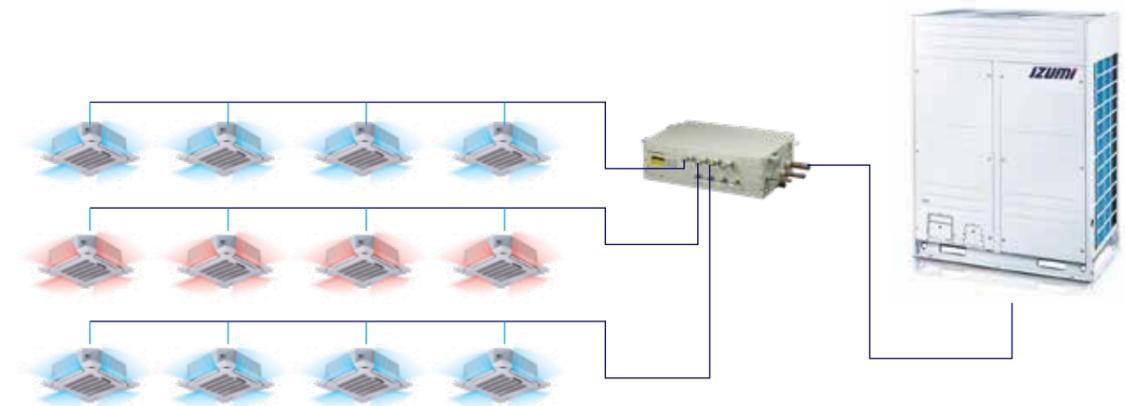
Innovative Mode Switch (MS) Box

Simultaneous cooling and heating achieved for new designed MS (Mode Switch) box.

- Low noise operation for precise control of multiple solenoid valves;
- Max. 24 indoor units connect to a MS box;
- Max. 56kW indoor units connect to a MS box;

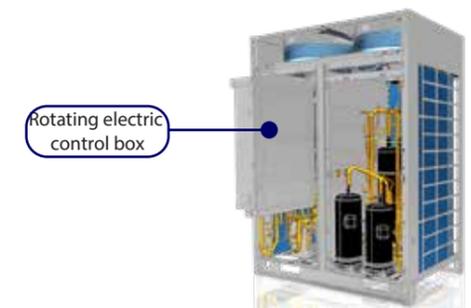


- Indoor units connected to a same MS can realize simultaneous cooling and heating operation.



Rotatable Control Box

Newly designed rotating control box can rotate in a wide angle. It is convenient for the inspection and maintenance of the pipeline system and greatly reduces the dismount time of the electric control box.



VRF Plus R Series - Heat Recovery

380~415V, 3N, 50(60)Hz



HP	8		10		12		14		16	
Model IZV-	252(8)W/D2RN1T(C)		280(10)W/D2RN1T(C)		335(12)W/D2RN1T(C)		400(14)W/D2RN1T(C)		450(16)W/D2RN1T(C)	
Combined type	8HP+10HP		10HP×2		12HP×2		14HP×2		16HP×2	
Power supply	V/N/Hz		380-415/3/50(60)		380-415/3/50(60)		380-415/3/50(60)		380-415/3/50(60)	
Cooling	Capacity	kW	25.2	28	33.5	40	45			
	Power input	kW	5.73	6.67	8.07	11.3	13.24			
	EER		4.4	4.2	4.15	3.54	3.4			
Heating	Capacity	kW	27	31.5	37.5	45	50			
	Power input	kW	6	7.33	8.72	11.19	12.79			
	COP		4.5	4.3	4.3	4.02	3.91			
Connectable indoor unit	Total capacity	50~130% of outdoor unit capacity								
	Max. quantity	13	16	20	23	26				
Compressor	Type	DC inverter								
	Quantity	1	1	1	2	2				
Fan motor	Type	DC motor								
	Quantity	2	2	2	2	2				
Refrigerant	Type	R410A								
	Factory charging	kg	10	10	10	13	13			
Pipe connections	Liquid pipe	mm	Φ12.7	Φ12.7	Φ15.9	Φ15.9	Φ15.9			
	Low pressure gas pipe	mm	Φ22.2	Φ22.2	Φ25.4	Φ28.6	Φ28.6			
	High pressure gas pipe	mm	Φ19.1	Φ19.1	Φ19.1	Φ22.2	Φ22.2			
	High pressure gas balance pipe	mm	Φ19.1	Φ19.1	Φ19.1	Φ19.1	Φ19.1			
	Oil balance pipe	mm	Φ6.35	Φ6.35	Φ6.35	Φ6.35	Φ6.35			
Air flow rate	m³/h	12000	12000	13000	15000	15000				
Sound pressure level	dB(A)	57	57	58	60	60				
Net dimension (W×H×D)	mm	(1250×1615×765)								
Packing size (W×H×D)	mm	(1305×1790×820)								
Net weight	kg	255	255	255	303	303				
Gross weight	kg	273	273	273	322	322				
Operating temperature range	°C	Cooling: -5~48; Heating: -20~24; Simultaneous Cooling and Heating: -5~24								

HP	18		20		22		24	
Model IZV-	532(18)W/D2RN1T(C)		560(20)W/D2RN1T(C)		615(22)W/D2RN1T(C)		680(24)W/D2RN1T(C)	
Combined type	8HP+10HP		10HP×2		10HP+12HP		10HP+14HP	
Power supply	V/N/Hz		380-415/3/50(60)		380-415/3/50(60)		380-415/3/50(60)	
Cooling	Capacity	kW	53.2	56	61.5	68		
	Power input	kW	12.4	13.34	14.74	17.97		
	EER		4.29	4.2	4.17	3.78		
Heating	Capacity	kW	58.5	63	69	76.5		
	Power input	kW	13.33	14.66	16.05	18.52		
	COP		4.39	4.3	4.3	4.13		
Connectable indoor unit	Total capacity	50~130% of outdoor unit capacity						
	Max. quantity	29	33	36	39			
Compressor	Type	DC inverter						
	Quantity	2	2	2	3			
Fan motor	Type	DC motor						
	Quantity	4	4	4	4			
Refrigerant	Type	R410A						
	Factory charging	kg	10×2	10×2	10×2	10+13		
Pipe connections	Liquid pipe	mm	Φ15.9	Φ15.9	Φ15.9	Φ15.9		
	Low pressure gas pipe	mm	Φ31.8	Φ31.8	Φ31.8	Φ34.9		
	High pressure gas pipe	mm	Φ28.6	Φ28.6	Φ28.6	Φ28.6		
	High pressure gas balance pipe	mm	Φ19.1	Φ19.1	Φ19.1	Φ19.1		
	Oil balance pipe	mm	Φ6.35	Φ6.35	Φ6.35	Φ6.35		
Air flow rate	m³/h	24000	24000	25000	27000			
Sound pressure level	dB(A)	61	61	62	63			
Net dimension (W×H×D)	mm	(1250×1615×765)×2						
Packing size (W×H×D)	mm	(1305×1790×820)×2						
Net weight	kg	255×2	255×2	255×2	255+303			
Gross weight	kg	273×2	273×2	273×2	273+322			
Operating temperature range	°C	Cooling: -5~48; Heating: -20~24; Simultaneous Cooling and Heating: -5~24						

Notes:
 Capacities 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/15°C WB; Outdoor temperature 7°C DB/6°C WB.
 Piping length: Interconnecting piping length is 7.5m, level difference is zero.
 Connection piping diameter of single-unit is the stop valve diameter of the unit.
 Connection piping diameter of multi-unit is the main pipe connecting to the first indoor branch joint, is case of the total equivalent liquid length is less than 90m. If the total equivalent liquid length is more than 90m, please refer to technical manual to choose the connection piping diameter.
 Sound values are measured in a semi-anechoic room, at a position 1m in front of the unit and 1.3m above the floor.

VRF Plus R Series - Heat Recovery

380~415V, 3N, 50(60)Hz



HP	26		28		30		32	
Model IZV-	730(26)W/D2RN1T(C)		800(28)W/D2RN1T(C)		850(30)W/D2RN1T(C)		900(32)W/D2RN1T(C)	
Combined type	10HP+16HP		14HP×2		14HP+16HP		16HP×2	
Power supply	V/N/Hz		380-415/3/50(60)		380-415/3/50(60)		380-415/3/50(60)	
Cooling	Capacity	kW	73	80	85	90		
	Power input	kW	19.9	22.6	24.54	26.48		
	EER		3.67	3.54	3.46	3.4		
Heating	Capacity	kW	81.5	90	95	100		
	Power input	kW	20.1	22.4	23.98	25.58		
	COP		4.05	4.02	3.96	3.91		
Connectable indoor unit	Total capacity	50~130% of outdoor unit capacity						
	Max. quantity	43	46	50	53			
Compressor	Type	DC inverter						
	Quantity	3	4	4	4			
Fan motor	Type	DC motor						
	Quantity	4	4	4	4			
Refrigerant	Type	R410A						
	Factory charging	kg	10+13	13×2	13×2	13×2		
Pipe connections	Liquid pipe	mm			Φ19.1			
	Low pressure gas pipe	mm			Φ34.9			
	High pressure gas pipe	mm			Φ28.6			
	High pressure gas balance pipe	mm			Φ19.1			
	Oil balance pipe	mm			Φ6.35			
Air flow rate	m³/h	27000	30000	30000	30000			
Sound pressure level	dB(A)	63	64	64	64			
Net dimension (W×H×D)	mm	(1250×1615×765)×2						
Packing size (W×H×D)	mm	(1305×1790×820)×2						
Net weight	kg	255+303	303×2	303×2	303×2			
Gross weight	kg	273+322	322×2	322×2	322×2			
Operating temperature range	°C	Cooling: -5~48; Heating: -20~24; Simultaneous Cooling and Heating: -5~24						

HP	34		36		38		40	
Model IZV-	960(34)W/D2RN1T(C)		1010(36)W/D2RN1T(C)		1065(38)W/D2RN1T(C)		1130(40)W/D2RN1T(C)	
Combined type	10HP×2+14HP		10HP×2+16HP		10HP+12HP+16HP		10HP+14HP+16HP	
Power supply	V/N/Hz		380-415/3/50(60)		380-415/3/50(60)		380-415/3/50(60)	
Cooling	Capacity	kW	96	101	106.5	113		
	Power input	kW	24.64	26.58	27.98	31.21		
	EER		3.9	3.8	3.81	3.62		
Heating	Capacity	kW	108	113	119	126.5		
	Power input	kW	25.85	27.45	28.84	31.31		
	COP		4.18	4.12	4.13	4.04		
Connectable indoor unit	Total capacity	50~130% of outdoor unit capacity						
	Max. quantity	56	59	63	64			
Compressor	Type	DC inverter						
	Quantity	4	4	4	5			
Fan motor	Type	DC motor						
	Quantity	6	6	6	6			
Refrigerant	Type	R410A						
	Factory charging	kg	10×2+13	10×2+13	10×2+13	10+13×2		
Pipe connections	Liquid pipe	mm			Φ19.1			
	Low pressure gas pipe	mm			Φ41.3			
	High pressure gas pipe	mm			Φ34.9			
	High pressure gas balance pipe	mm			Φ19.1			
	Oil balance pipe	mm			Φ6.35			
Air flow rate	m³/h	39000	39000	40000	42000			
Sound pressure level	dB(A)	65	65	65	66			
Net dimension (W×H×D)	mm	(1250×1615×765)×3						
Packing size (W×H×D)	mm	(1305×1790×820)×3						
Net weight	kg	255×2+303	255×2+303	255×2+303	255+303×2			
Gross weight	kg	273×2+322	273×2+322	273×2+322	273+322×2			
Operating temperature range	°C	Cooling: -5~48; Heating: -20~24; Simultaneous Cooling and Heating: -5~24						

Notes:
 Capacities 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/15°C WB; Outdoor temperature 7°C DB/6°C WB.
 Piping length: Interconnecting piping length is 7.5m, level difference is zero.
 Connection piping diameter of single-unit is the stop valve diameter of the unit.
 Connection piping diameter of multi-unit is the main pipe connecting to the first indoor branch joint, is case of the total equivalent liquid length is less than 90m. If the total equivalent liquid length is more than 90m, please refer to technical manual to choose the connection piping diameter.
 Sound values are measured in a semi-anechoic room, at a position 1m in front of the unit and 1.3m above the floor.

VRF Plus R Series - Heat Recovery

380~415V, 3N, 50(60)Hz



HP	42		44		46		48	
Model IZV-	1200(42)W/D2RN1T(C)		1250(44)W/D2RN1T(C)		1300(46)W/D2RN1T(C)		1350(48)W/D2RN1T(C)	
Combined type	14HPx3		14HPx2+16HP		14HP+16HPx2		16HPx3	
Power supply	V/N/Hz	380-415/3/50(60)						
Cooling	Capacity	kW	120	125	130	135		
	Power input	kW	33.9	35.84	37.78	39.72		
	EER		3.54	3.49	3.44	3.4		
Heating	Capacity	kW	135	140	145	150		
	Power input	kW	33.57	35.17	36.77	38.37		
	COP		4.02	3.98	3.94	3.91		
Connectable indoor unit	Total capacity		50~130% of outdoor unit capacity					
	Max. quantity		64					
Compressor	Type		DC inverter					
	Quantity		6					
Fan motor	Type		DC motor					
	Quantity		6					
Refrigerant	Type		R410A					
	Factory charging	kg	13x3					
Pipe connections	Liquid pipe	mm	Φ19.1					
	Low pressure gas pipe	mm	Φ41.3					
	High pressure gas pipe	mm	Φ34.9					
	High pressure gas balance pipe	mm	Φ19.1					
	Oil balance pipe	mm	Φ6.35					
Air flow rate	m³/h	45000						
Sound pressure level	dB(A)	67						
Net dimension (WxHxD)	mm	(1250x1615x765)x3						
Packing size (WxHxD)	mm	(1305x1790x820)x3						
Net weight	kg	303x3						
Gross weight	kg	322x3						
Operating temperature range	°C	Cooling: -5~48; Heating: -20~24; Simultaneous Cooling and Heating: -5~24						

VRF Plus R Series - Heat Recovery

380~415V, 3N, 50(60)Hz



HP	58		60		62		64	
Model IZV-	1650(58)W/D2RN1T(C)		1700(60)W/D2RN1T(C)		1750(62)W/D2RN1T(C)		1800(64)W/D2RN1T(C)	
Combined type	14HPx3+16HP		14HPx2+16HPx2		14HP+16HPx3		16HPx4	
Power supply	V/N/Hz	380-415/3/50(60)						
Cooling	Capacity	kW	165	170	175	180		
	Power input	kW	47.14	49.08	51.02	52.96		
	EER		3.5	3.46	3.43	3.4		
Heating	Capacity	kW	185	190	195	200		
	Power input	kW	46.36	47.96	49.56	51.16		
	COP		3.99	3.96	3.93	3.91		
Connectable indoor unit	Total capacity		50~130% of outdoor unit capacity					
	Max. quantity		64					
Compressor	Type		DC inverter					
	Quantity		8					
Fan motor	Type		DC motor					
	Quantity		8					
Refrigerant	Type		R410A					
	Factory charging	kg	13x4					
Pipe connections	Liquid pipe	mm	Φ22.2					
	Low pressure gas pipe	mm	Φ44.5					
	High pressure gas pipe	mm	Φ38.1					
	High pressure gas balance pipe	mm	Φ19.1					
	Oil balance pipe	mm	Φ6.35					
Air flow rate	m³/h	60000						
Sound pressure level	dB(A)	69						
Net dimension (WxHxD)	mm	(1250x1615x765)x4						
Packing size (WxHxD)	mm	(1305x1790x820)x4						
Net weight	kg	303x4						
Gross weight	kg	322x4						
Operating temperature range	°C	Cooling: -5~48; Heating: -20~24; Simultaneous Cooling and Heating: -5~24						

VRF Plus Heat Recovery- MS Box

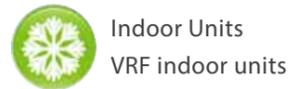


HP	50		52		54		56	
Model IZV-	1432(50)W/D2RN1T(C)		1460(52)W/D2RN1T(C)		1515(54)W/D2RN1T(C)		1580(56)W/D2RN1T(C)	
Combined type	8HP+10HP+16HPx2		10HPx2+16HPx2		10HP+12HP+16HPx2		10HP+14HP+16HPx2	
Power supply	V/N/Hz	380-415/3/50(60)						
Cooling	Capacity	kW	143.2	146	151.5	158		
	Power input	kW	38.88	39.82	41.22	44.45		
	EER		3.68	3.67	3.68	3.55		
Heating	Capacity	kW	158.5	163	169	176.5		
	Power input	kW	38.91	40.24	41.63	44.1		
	COP		4.07	4.05	4.06	4		
Connectable indoor unit	Total capacity		50~130% of outdoor unit capacity					
	Max. quantity		64					
Compressor	Type		DC inverter					
	Quantity		6					
Fan motor	Type		DC motor					
	Quantity		8					
Refrigerant	Type		R410A					
	Factory charging	kg	10x2+13x2					
Pipe connections	Liquid pipe	mm	Φ22.2					
	Low pressure gas pipe	mm	Φ44.5					
	High pressure gas pipe	mm	Φ38.1					
	High pressure gas balance pipe	mm	Φ19.1					
	Oil balance pipe	mm	Φ6.35					
Air flow rate	m³/h	54000	54000	55000	57000			
Sound pressure level	dB(A)	68						
Net dimension (WxHxD)	mm	(1250x1615x765)x4						
Packing size (WxHxD)	mm	(1305x1790x820)x4						
Net weight	kg	255x2+303x2		255x2+303x2		255x2+303x2		255+303x3
Gross weight	kg	273x2+322x2		273x2+322x2		273x2+322x2		273+322x3
Operating temperature range	°C	Cooling: -5~48; Heating: -20~24; Simultaneous Cooling and Heating: -5~24						

Model	IZS01/N1-C	IZS02/N1-C	MS04/N1-C	IZS06/N1-C	IZS02E/N1-C	IZS04E/N1-C			
Applicable indoor units	All VRF indoor units except high static pressure duct				Only high static pressure duct				
Max. indoor unit groups	1	2	4	6	1	1			
Max. number of each group of indoor units	4	4	4	4	1	1			
Max. number of downstream indoor units	4	8	16	24	1	1			
Max. capacity of each group of indoor units	kW	16	16	16	28	56			
Max. total capacity of all downstream indoor units	kW	16	28	45	45	56			
Piping connections	Connected to outdoor unit	Liquid pipe	mm	Φ9.53	Φ12.7	Φ15.9	Φ15.9	Φ12.7	Φ15.9
		High pressure gas pipe	mm	Φ15.9	Φ19.1	Φ22.2	Φ22.2	Φ19.1	Φ22.2
		Low pressure gas pipe	mm	Φ19.1	Φ25.4	Φ31.8	Φ31.8	Φ25.4	Φ31.8
	Connected to indoor unit	Liquid pipe	mm	Φ9.53	Φ9.53	Φ9.53	Φ9.53	Φ9.53	Φ9.53
		Gas pipe	mm	Φ15.9	Φ15.9	Φ15.9	Φ15.9	Φ15.9	Φ15.9
Sound pressure level	dB(A)	33	33	33	40	33	33		
Net dimension (WxHxD)	mm	630x225x600	630x225x600	960x225x600	960x225x600	630x225x600	960x225x600		
Packing size (WxHxD)	mm	725x325x685	725x325x685	1055x325x685	1055x325x685	725x325x685	1055x325x685		
Net weight	kg	18	19.5	31	35	19.5	31		
Gross weight	kg	25	27	40	44.5	27	40		

Notes:
 Capacities 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/15°C WB; Outdoor temperature 7°C DB/6°C WB.
 Piping length: Interconnecting piping length is 7.5m, level difference is zero.
 Connection piping diameter of single-unit is the stop valve diameter of the unit.
 Connection piping diameter of multi-unit is the main pipe connecting to the first indoor branch joint, in case of the total equivalent liquid length is less than 90m. If the total equivalent liquid length is more than 90m, please refer to technical manual to choose the connection piping diameter.
 Sound values are measured in a semi-anechoic room, at a position 1m in front of the unit and 1.3m above the floor.

Note:
 Sound values are measured in a semi-anechoic room, at a position 1m below the MS equipment in mode switch condition.
 It is not recommended to install in a place where low noise performance is required.



Indoor Units
VRF indoor units



Ventilation
Heat recovery ventilator



Control Systems
Smart control systems

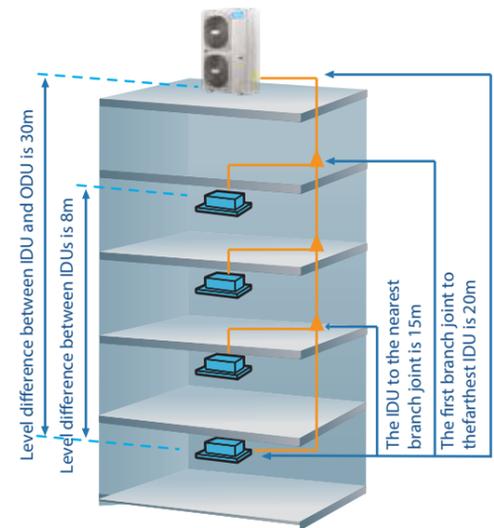


Mini VRF System Heat Pump/Cooling Only

Optimized design for small buildings

- ▶ Capacity up to 18kW
- ▶ Connectable Indoor Units Quantity up to 9
- ▶ Precise Oil Control Technology
- ▶ Advanced Silence Technology

Special Features



Piping length	Capability	
	7-11kW	12-18kW
Total piping length	100m	100m
Longest length - actual (equivalent)	45m (50m)	60m (70m)
Longest length after first branch	20m	20m
Largest height difference between indoor and outdoor units - ODU up (down)	30m (20m)	30m (20m)
Largest height difference between indoor units	8m	8m

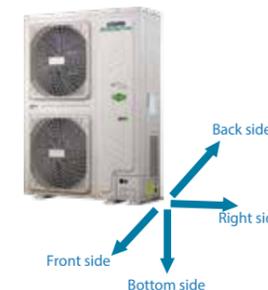
More Convenient Piping Connector – Branch Box



Easier and safer installation thanks to a branch box that simplifies piping work greatly.



Four-Way Piping Connection



A four-direction space is available for connecting pipes and wiring in various installation sites.

Mini VRF System, R10A, Heat Pump 380-415V/50Hz/3Ph



Model		MDV-V80W/DN1	MDV-V105W/DN1	MDV-V120W/DN1	MDV-V140W/DN1	MDV-V160W/DN1(B)	
Power supply		V/N/Hz 220-240/1/50					
Cooling	Capacity	kW	7.2(1.5~8.0)	9.0(2.0~10.0)	12.3	14	15.5
	Power input	kW	1.85	2.3	3.25	3.95	4.52
	EER		3.9	3.92	3.78	3.54	3.43
Heating	Capacity	kW	7.2(1.6~8.4)	9.0(2.1~10.5)	13.2	15.4	17
	Power input	kW	1.79	2.27	3.47	4.16	4.77
	COP		4.02	3.97	3.8	3.7	3.56
Connectable indoor unit	Total capacity	45~130% of outdoor unit capacity					
	Max. quantity	4	5	6	6	7	
Compressor	Type	DC inverter					
	Quantity	1					
Fan motor	Type	DC					
	Quantity	1		2			
Refrigerant	Type	R410A					
	Factory charging	kg	2.95	3.3	3.9	3.9	
Pipe connections	Liquid pipe	mm Φ 9.53					
	Gas pipe	mm Φ 15.9			mm Φ 19.1		
Air flow rate	m ³ /h	5500		6000			
Sound pressure level	dB(A)	56	57				
Net dimension (W×H×D)	mm	1075×966×396		900×1327×400			
Packing size (W×H×D)	mm	1120×1100×435		1030×1456×435			
Net weight	kg	75.5		95	100		
Gross weight	kg	85.5		106	111		
Operating temperature range	°C	Cooling: -15~43; Heating: -15~27					

Notes:
 Capacities 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/15°C WB; Outdoor temperature 7°C DB/6°C WB.
 Piping length: Interconnecting piping length is 7.5m, level difference is zero.
 Sound values are measured in a semi-anechoic room, at a position 1m in front of the unit and 1m above the floor.
 In Mini VRF system, if only one indoor unit is connected, the capacity of indoor unit should be not more than outdoor unit's capacity. If more than one indoor unit are connected, the capacity of each indoor unit should be not more than 8kW for refrigerant uniform distribution.

Mini VRF System, R10A, Heat Pump 380-415V/50Hz/3Ph



Model		MDV-V120W/DRN1	MDV-V140W/DRN1	MDV-V160W/DRN1	MDV-V180W/DRN1	
Power supply		V/N/Hz 380-415/3/50				
Cooling	Capacity	kW	12.3	14	15.5	17.5
	Power input	kW	3.25	3.95	4.52	5.3
	EER		3.78	3.54	3.43	3.3
Heating	Capacity	kW	13.2	15.4	17	19
	Power input	kW	3.47	4.16	4.77	5
	COP		3.8	3.7	3.56	3.8
Connectable indoor unit	Total capacity	45~130% of outdoor unit capacity				
	Max. quantity	6	6	7	9	
Compressor	Type	DC inverter				
	Quantity	1				
Fan motor	Type	DC				
	Quantity	2				
Refrigerant	Type	R410A				
	Factory charging	kg	3.3	3.9	3.9	4.5
Pipe connections	Liquid pipe	mm Φ 9.53				
	Gas pipe	mm Φ 15.9		mm Φ 19.1		
Air flow rate	m ³ /h	6000		6800		
Sound pressure level	dB(A)	57		59		
Net dimension (W×H×D)	mm	900×1327×400				
Packing size (W×H×D)	mm	1030×1456×435				
Net weight	kg	95	102	107		
Gross weight	kg	106	113	118		
Operating temperature range	°C	Cooling: -15~43; Heating: -15~27				

Notes:
 Capacities 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/15°C WB; Outdoor temperature 7°C DB/6°C WB.
 Piping length: Interconnecting piping length is 7.5m, level difference is zero.
 Sound values are measured in a semi-anechoic room, at a position 1m in front of the unit and 1m above the floor.
 In Mini VRF system, if only one indoor unit is connected, the capacity of indoor unit should be not more than outdoor unit's capacity. If more than one indoor unit are connected, the capacity of each indoor unit should be not more than 8kW for refrigerant uniform distribution.

Mini VRF System, R10A, Heat Pump 380-415V/60Hz/3Ph



HP			4	4.5	5	6
Model MDV-			V105W/DVN1	V120W/DVN1	V140W/DVN1	V160W/DVN1
Power supply	V/N/Hz	208-230/1/60				
Cooling	Capacity	kW	10.5	12.0	14.0	15.5
		kBtu/h	35.8	40.9	47.8	52.9
	Power input	kW	2.68	3.25	3.95	4.52
	EER		3.92	3.69	3.54	3.43
Heating	Capacity	kW	11.5	13.2	15.4	17.0
		kBtu/h	39.2	45.0	52.5	58.0
	Power input	kW	2.90	3.47	4.16	4.77
	COP		3.97	3.80	3.70	3.56
Connectable indoor unit	Total capacity	45~130% of outdoor unit capacity				
	Max. quantity	5	6	6	7	
Compressor	Type	DC inverter				
	Quantity	1	1	1	1	
Fan motor	Type	DC motor				
	Quantity	1	2	2	2	
Refrigerant	Type	R410A				
	Factory charging	kg(lbs.)	3(6.6)	3.3(7.3)	3.9(8.6)	3.9(8.6)
Pipe connections	Liquid pipe	mm(in.)	Φ9.53(Φ3/8)	Φ9.53(Φ3/8)	Φ9.53(Φ3/8)	Φ9.53(Φ3/8)
	Gas pipe	mm(in.)	Φ15.9(Φ5/8)	Φ15.9(Φ5/8)	Φ15.9(Φ5/8)	Φ19.1(Φ3/4)
Air flow rate	m ³ /h	5100	6000	6000	6000	
Sound pressure level	dB(A)	57	57	57	57	
Net dimension (W×H×D)	mm	1075x966x396	900x1327x400	900x1327x400	900x1327x400	
	inch	42-21/64 x38-1/32 x15-19/32	35-7/14x52-1/4x15-3/4	35-7/14x52-1/4x15-3/4	35-7/14x52-1/4x15-3/4	
Packing size (W×H×D)	mm	1120x1100x435	1030x1456x435	1030x1456x435	1030x1456x435	
	inch	44-3/32 x43-5/16 x17-1/8	40-9/16x57-5/16x17-1/8	40-9/16x57-5/16x17-1/8	40-9/16x57-5/16x17-1/8	
Net weight	kg(lbs.)	78(171.9)	95(209.4)	95(209.4)	102(224.9)	
Gross weight	kg(lbs.)	85(187.3)	106(233.7)	106(233.7)	113(249.1)	
Operating temperature range	°C(°F)	Cooling -15~43°C (5~109.4°F) Heating -15 ~ 27°C(5~80.6°F)				

Notes:
 Capacities are based on the following conditions:
 Cooling: Indoor temperature 27°C(80.6°F) DB/19°C(66.2°F) WB; Outdoor temperature 35°C(95°F) DB/24°C(75.2°F) WB.
 Heating: Indoor temperature 20°C(68°F) DB/15°C(59°F) WB; Outdoor temperature 7°C(44.6°F) DB/6°C(42.8°F) WB.
 Piping length: Interconnecting piping length is 7.5m(24.6ft.), level difference is zero.
 Sound values are measured in a semi-anechoic room, at a position of 1m(3.28ft.) in front of the unit and 1m(3.28ft.) above the floor.
 In Mini VRF system, if only one indoor unit is connected, the capacity of indoor unit should be not more than outdoor unit's capacity. If more than one indoor unit are connected, the capacity of each indoor unit should be not more than 8kW for refrigerant uniform distribution.

Mini VRF System, R10A, Heat Pump 380-415V/60Hz/3Ph



HP			4.5	5	6
Model MDV-			V120W/DCN1	V140W/DCN1	V160W/DCN1
Power supply	V/N/Hz	380-415/3/60			
Cooling	Capacity	kW	12.0	14.0	15.5
		kBtu/h	40.9	47.8	52.9
	Power input	kW	3.25	3.95	4.52
	EER		3.69	3.54	3.43
Heating	Capacity	kW	13.2	15.4	17.0
		kBtu/h	45.0	52.5	58.0
	Power input	kW	3.47	4.16	4.77
	COP		3.8	3.7	3.56
Connectable indoor unit	Total capacity	45~130% of outdoor unit capacity			
	Max. quantity	6	6	7	
Compressor	Type	DC inverter			
	Quantity	1	1	1	
Fan motor	Type	DC motor			
	Quantity	2	2	2	
Refrigerant	Type	R410A			
	Factory charging	kg(lbs.)	3.3(7.3)	3.9(8.6)	3.9(8.6)
Pipe connections	Liquid pipe	mm(in.)	Φ9.53(Φ3/8)	Φ9.53(Φ3/8)	Φ9.53(Φ3/8)
	Gas pipe	mm(in.)	Φ15.9(Φ5/8)	Φ15.9(Φ5/8)	Φ19.1(Φ3/4)
Air flow rate	m ³ /h	6983	6500	6000	
Sound pressure level	dB(A)	57	57	57	
Net dimension (W×H×D)	mm	900x1327x400			
	inch	35-7/14x52-1/4x15-3/4			
Packing size (W×H×D)	mm	1030x1456x435			
	inch	40-9/16x57-5/16x17-1/8			
Net weight	kg(lbs.)	92(203)	95(209.4)	102(224.9)	
Gross weight	kg(lbs.)	106(234)	106(233.7)	113(249.1)	
Operating temperature range	°C(°F)	Cooling -15 ~ 43°C (5~109.4°F) Heating -15 ~ 27°C(5~80.6°F)			

Notes:
 Capacities are based on the following conditions:
 Cooling: Indoor temperature 27°C(80.6°F) DB/19°C(66.2°F) WB; Outdoor temperature 35°C(95°F) DB/24°C(75.2°F) WB.
 Heating: Indoor temperature 20°C(68°F) DB/15°C(59°F) WB; Outdoor temperature 7°C(44.6°F) DB/6°C(42.8°F) WB.
 Piping length: Interconnecting piping length is 7.5m(24.6ft.), level difference is zero.
 Sound values are measured in a semi-anechoic room, at a position of 1m(3.28ft.) in front of the unit and 1m(3.28ft.) above the floor.
 In Mini VRF system, if only one indoor unit is connected, the capacity of indoor unit should be not more than outdoor unit's capacity. If more than one indoor unit are connected, the capacity of each indoor unit should be not more than 8kW for refrigerant uniform distribution.

Mini VRF System, R10A, Cooling Only 220VV/50Hz/1Ph



Model (220~240V, 1N, 50Hz)			MDVC-V72W/DN1	MDVC-V92W/DN1	MDVC-V110W/DN1
Model (208~230V, 1N, 60Hz)			MDVC-V72W/DVN1	MDVC-V92W/DVN1	MDVC-V110W/DVN1
Cooling ¹	Capacity	kW	7.2	9.2	11
	Power input	kW	1.64	2.06	2.75
	EER		4.39	4.47	4
Connected indoor units	Total capacity		45-130% of outdoor unit capacity		
	Maximum quantity		4	5	6
Compressor	Type		DC inverter		
	Quantity		1		
Fan motor	Motor Type		DC		
	Quantity		1		
Refrigerant	Type		R410A		
	Factory charging	kg	1.4	1.4	1.4
Pipe connections	Liquid pipe	mm	Φ9.53	Φ9.53	Φ9.53
	Gas pipe	mm	Φ15.9	Φ15.9	Φ15.9
Airflow rate		m ³ /h	3400	3400	3400
Sound pressure level ²		dB(A)	54	54	54
Net dimensions (W×H×D)		mm	973×862×302	973×862×302	973×862×302
Packed dimensions (W×H×D)		mm	1025×910×410	1025×910×410	1025×910×410
Net weight		kg	58	58	58
Gross weight		kg	63	63	63
Operating temperature range		°C	Cooling: -5 to 48		

Notes:

- Indoor air temperature 27°CDB, 19°CWB; outdoor air temperature 35°CDB; equivalent refrigerant piping length 7.5°Cm with zero level difference.
- Sound pressure level is measured at a position 1m in front of the unit and 1.3m above the floor in a semi-anechoic chamber.
- For a system with more than one IDU, to ensure even distribution of refrigerant, the capacity of each indoor unit should not exceed 8kW.

Mini VRF System, R10A, Cooling Only 220VV/60Hz/1Ph



Model (220~240V, 1N, 50Hz)			MDVC-V145W/DN1	MDVC-V170W/DN1
Model (208~230V, 1N, 60Hz)			MDVC-V145W/DVN1	MDVC-V170W/DVN1
Cooling ¹	Capacity	kW	14.5	17
	Power input	kW	3.57	3.99
	EER		4.06	4.26
Connected indoor units	Total capacity		45-130% of outdoor unit capacity	
	Maximum quantity		8	9
Compressor	Type		DC inverter	
	Quantity		1	
Fan motor	Motor Type		DC	
	Quantity		1	
Refrigerant	Type		R410A	
	Factory charging	kg	2.6	2.6
Pipe connections	Liquid pipe	mm	Φ9.53	Φ9.53
	Gas pipe	mm	Φ15.9	Φ15.9
Airflow rate		m ³ /h	5100	5100
Sound pressure level ²		dB(A)	55	55
Net dimensions (W×H×D)		mm	1053×865×523	1053×865×523
Packed dimensions (W×H×D)		mm	1120×890×560	1120×890×560
Net weight		kg	85	85
Gross weight		kg	92	92
Operating temperature range		°C	Cooling: -5 to 48	

Notes:

- Indoor air temperature 27°CDB, 19°CWB; outdoor air temperature 35°CDB; equivalent refrigerant piping length 7.5°Cm with zero level difference.
- Sound pressure level is measured at a position 1m in front of the unit and 1.3m above the floor in a semi-anechoic chamber.
- For a system with more than one IDU, to ensure even distribution of refrigerant, the capacity of each indoor unit should not exceed 8kW.